

Available Online at http://www.recentscientific.com

CODEN: IJRSFP (USA)

International Journal of Recent Scientific Research Vol. 10, Issue, 03(G), pp. 31621-31624, March, 2019 International Journal of Recent Scientific Re*r*earch

DOI: 10.24327/IJRSR

Research Article

DEPRESSION AMONG CANCER PATIENTS - A REVIEW

Dhivya R, Prabavathy S and Renuka K

Department of Mental Health Nursing, Kasturba Gandhi Nursing College Sri Balaji Vidypeet, Puducherry

DOI: http://dx.doi.org/10.24327/ijrsr.2019.1003.3302

ARTICLE INFO	ABSTRACT
<i>Article History:</i> Received 06 th December, 2018 Received in revised form 14 th January, 2019 Accepted 23 rd February, 2019 Published online 28 th March, 2019	People with depression have increased the risk of mortality rate among cancer patients. Research literature was reviewed with regard to depression, its prevalence among cancer patients and associated factors. A literature search was conducted with the following search terms, key-words and phrases'depression' and 'cancer patients'. The search was performed in the following databases - PubMed, ProQuest and Google Scholar. Considerable debate exists regarding the causes for the high prevalence of depression in patients with cancer, however gaps remain in relevant aspects, encouraging further studies in specific subgroups of cancer patients to evaluate the impact of each variable on the risk for developing
Key Words:	
Cancer patients and Depression.	depression. From this review we infer, that there are various factors which influence the increased prevalence of depression, among patients with cancer. Rather than a single causative factor, there are multiple factors associated with depression, such as socio-demographic variables and clinical variables. Research literature supports the necessity for early identification of depression in people with cancer
	and initiation of suitable interventions. It is of paramount importance that guidelines specific to the Indian context are developed for the screening and monitoring of cancer patients with reference to depression.

Copyright © **Dhivya R, Prabavathy S and Renuka K, 2019**, this is an open-access article distributed under the terms of the Creative Commons Attribution License, which permits unrestricted use, distribution and reproduction in any medium, provided the original work is properly cited.

INTRODUCTION

"Cancer Survived is a Life Revived". Cancer is the leading cause of death in economically developed countries and the second leading cause of death in developing countries.¹ India stands 3^{rd} highest number of cancer cases among women, Slightly more than 1 million new cases of cancer are diagnosed every year in a population of 1.2 billion.² Cancer is a grave illness and can lead to great distress in patients.³ It is often thought of as an untreatable, unbearably painful disease with no cure. In india due to cancer, people are facing profound social and economic consequences. It often associated with tobacco use, infections, and other social factors especially inequalities, are major cause of India's cancer burden. People are more likely to die before the age of 70 years due to cancer.⁴

Persons who are diagnosed with cancer can generates a higher level of distress.³ The recognition of cancer is a tough event can lead to psychological anguish.⁵ Eventually, high level of mental stress may lead to anxiety, depression or both in cancer patients.⁶ Among cancer patients, depression is a common comorbidity. A strong body of evidence demonstrates the coexistence of depression and cancer, reported the prevalence rates of depression ranging from 20 to 50%. The rate of depression is three times higher in cancer patients when compared to general population.⁷ Depression affects the quality of life which resulting in high mortality rate in cancer.⁸

Research literature was reviewed with regard to prevalence of depression among cancer patients. A literature search was conducted with the following search terms and key-words which includes 'prevalence' 'depression', 'cancer patients', 'screening', 'socio-demographic variables' and 'clinical variables'. The search was performed in the following databases - PubMed, Medline Plus and Google Scholar.

This review commences with an overview of depression. Next, it focuses on screening o depression among cancer patients. The review subsequently focuses on the prevalence of depression among cancer patients and its associated factors.

An overview of Depression Among Cancer Patients

Depression is a common comorbidity in cancer cases. A strong body of evidence demonstrates the coexistence of depression

Department of Mental Health Nursing, Kasturba Gandhi Nursing College Sri Balaji Vidypeet, Puducherry

and cancer, reported the prevalence rates of depression ranging from 20 to 50%.⁷ Depression is the not about just feeling down in the dumps or sad for a few days. It can interfere with your everyday life. According to the World Health Organization (2014), depression is projected to become the second leading contributor to the global burden of disease by 2020.⁹ Higher mortality rate of cancer occur due to poorer quality of life.¹⁰ A meta-analysis study revealed that, major depression 39%, and depressive symptoms of about 25%.¹¹ The effect of mood and mental wellbeing regard to cancer progression of about >70% of oncologists and 85% of them patients are believing mood and mental wellness will worsen the cancer.¹²

Studies based on the usage of Statistical Manual of Mental Disorders (DSM) criteria ¹⁴ in which major depressive disorder (MDD) have identified the prevalence ranges from 2.0–43.5%. ^{15,16} In case of palliative care, documented of depression abouts49.0%.¹⁷ Many studies reported, difference in prevalence due to assessment tools, types of patients interviewed, age groups, gender proportions, inpatient status and other factors^{18,19}

Non-pathological sadness may be a normal response to a cancer diagnosis, however, stress beyond the coping mechanisms of patients may result in major depressive disorder. Depression leads to a poorer quality of life and compromises patient outcomes, with depression resulting in higher rates of mortality in cancer. ⁸ On account of fatigue or lack of motivation, person with untreated depression aren't likely to take their cancer treatment. Persons will not ask for emotional and financial support to cope with cancer due to withdraw from family or other social support systems, which provoke the stress and feelings of despair.²⁰

Recognition of depression and determining the appropriate level of intervention, ranging from brief counseling and support groups to medication and psychotherapy is an important aspect of cancer care, which unfortunately is missing in most palliative care settings.²¹

Prevalence of Depression Among Cancer Patients

A cross-sectional study was conducted on 270 breast cancer patients. Prevalence rates of depression were noted as, 17(6%) had mild depression, 19(7%) had moderate depression, 12 (4%) had moderately severe depression, and 10(4%) had severe depression.²⁵ A study was conducted on prevalence of depression and depressive spectrum disorders. The data shows that, prevalence of depression and depressive disorders are 5% and 60% respectively.²⁶

A descriptive study was conducted on prevalence of depression among 174 cancer patients who are in chemotherapy admitted in tertiary care of hospital, North Bengal. Finding shows that, 97 (55.7%) were in depression.²⁷ World Health Survey involving 2,45,404 participants from 60 countries in all regions of the world, showed that between 9.3% and 23% of participants with one or more chronic physical diseases had comorbid depression reported by WHO. ²⁸ A cross sectional study was conducted to assess the depression and anxiety among 300 cancer patients in tertiary care hospitals. Finding shows that, 154 (51.3%) patients were not anxious or depressed and 146 (48.7%) patients were anxious or depressed.²⁹ A strong body of evidence demonstrates the coexistence of depression and cancer, reported prevalence rates of depression for solid tumors ranging from 20 to 50%.³⁰ A descriptive Study on prevalence of Anxiety and Depression among 200 Breast Cancer Patients from North India Finding shows that, prevalence of anxiety and depression among the breast cancer patients was 37.0% and 28.0% respectively.³¹

In 2016, 322 million people are living with depression and anxiety worldwide and nearly half of them live in South East Asian and Western Pacific region, reflecting relatively large populations of India and China. "The total number of people living with depression, anxiety in the world is 322 million. The total estimated number of people living with depression increased by 18.4% between 2005 and 2017.³² A descriptive study on prevalence of depression and anxiety. Nearly 50% of the women with early breast cancer had depression, anxiety, 25% in the second, third, and fourth years, and 15% in the fifth year were reported ³³

A descriptive study on prevalence of depression and anxiety among 930 cancer patients in Bhopal. Finding shows that (23.1%) had scores 11 or greater and would be the most likely to have had anxiety (17.7%) or depressive (9.9%) disorders ³⁴. In India 2016 . Tamilnadu having high burden of cancer cases in that, cancer patient having 56% of depression, 43.8% of stress and 63.8% of anxiety ³⁵

A descriptive study to assess Prevalence of Depression among 356 Cancer patient who attending cancer department at city hospital at Bihar. Finding shows that Depression is highly associated with oropharyngeal (22%–57%), pancreatic (33%–50%), breast (1.5%–46%), and lung (11%–44%) cancers were reported.³⁶

A cross sectional study was conducted on Prevalence and Risk Factors of Major Depressive Disorders among 109 Gynaecological Cancer Patients. The results shows that prevalence of depression estimated to be 20%.³⁷ A descriptive study on Prevalence of depression and anxiety among 150 cancer patients in Bangalore. Findings shows that 44 (29.3%) are in mild anxiety, 25 (16.7%) are in symptomatic anxiety and 40 (26.7%) are in mild depression and 32 (21.3%) are in symptomatic depression.³⁸

Variables Associated with Depression in Cancer Patients Socio-Demographic Variables

Among the various studies conducted on depression in cancer patients , socio-demographic variables, such as, age, gender, educational status were studied by most researchers. A study reported the higher prevalence of depression in the age group 18–40 years and lowest among those above 60 years. ²⁵ In contrast to another study, who reported depression was comparatively higher in patients \geq 50 years. ²⁴ Certain studies highlighted low socio-economic status as a correlate of depression^{25,27}. Depression was comparatively higher in male patients were reported²², But in another study reported that, female patients have higher depression level. ²⁹ Depression was higher in cancer patients who received higher education ²⁴, But in contrast to another study depression level was higher in illiterate caner patients were reported. ³¹

Clinical Variables

Variables like duration of illness and exposure to type of treatment and type of cancer are reviewed here.

Overall, 81 (40%) cancer patients reported an episode of depression, anxiety, or both lasting at least 90 days, 41 (20%) reported an episode lasting fewer than 90 days, and 80 (40%) reported no episodes.²⁶ Cancer patients who received chemotherapy as a single treatment (66.7% had symptomatic depression and 77.8% symptomatic anxiety ²⁷ were calculated. In the type of cancer, breast cancer patients are having 28.1%, colorectal cancer patients are having 9.4%, stomach cancer patients are having 28.1%, lung cancer patients are having 15.6% and thyroid cancer patients are having 3.1% of depression.³⁴

Screening of Depression Among cancer Patients

There are simple validated tools are used for screening purposes and helps to complete within 5 minutes. A varies studies shown the potential tools for the screening of depression ^{22,23} in that, 35 short tools are for the screening of depression, which consists of 1-14 items. Most of them are used to assess depression among cancer patients. Scores can be worsen when there is deterioration of the patient health condition; BDI (Beck Depression Inventory) has the criticism with it ²⁴. Others, tool which includes, HADS (Hospital Anxiety and Depression Scale), helps to assess emotional distress. Single Verbal Item, Patient Health Questionnaire (PHQ1), (PHQ2)and PHQ2 + Help Question, two verbal items which includes BCFD (Bried Case Find for Depression), Edinburgh Postnatal Depression Scale (EPDS), Brief (EPDS), Hornheide Screening Instrument and (Hornheide Short Form), General Health Questionnaire 9, BDI Short Form, HADS and (HADS depression subscale) are tools which are commonly used for cancer patients.

Summary of Review & Need for Further Research

From this review it is apparent that studies on the prevalence of depression among cancer patients. Compare to other countries, Indian studies are less in number. Based on this review, no clear pattern emerges with regard to the association between variables and depression among cancer patients. Emphasis needs to be laid on more studies in future, the importance of psychiatric treatment and rehabilitation programmes. The prevalence of depression among patients with cancer patients is cause for concern. While considerable debate are exists related to prevalence of depression among cancer patients. Still, gaps remain in some of the aspects. So, there is a need for further studies in cancer patients to evaluate the effect of each variable on the risk for developing depression.. From this review we elicit, that there are various associated factors which influence the increased prevalence of depression among cancer patients. Rather than a single causative factor, there are multiple factors associated with depression.

Research literature supports the necessity for early identification of depression among cancer patients and initiation of suitable interventions. It is of paramount importance that guidelines specific to the Indian context are developed for the screening and monitoring of cancer patients with reference depression. Appropriate screening for depression is likely to contribute to a better overall outcome. The fact that depression is widely prevalent among individuals with cancer, and studies in this part of the country are scarce, underscores the need for further research on this topic.

References

- 1. Quatrin R,Zanini A,Buchini S,Turello D,Annunziata MA,Vidotti C *et al*.Use of reflexology foot massage to reduce anxiety in hospitalized cancer patients in chemotherapy treatment: methodology and outcome, 2006;14:96-105
- Ferlay J, Soerjomataram I, Ervik M, et al. GLOBOCAN 2012 v1.0, Cancer Incidence and Mortality Worldwide: IARC CancerBase No. 11.Lyon, France: International Agency for Research on Cancer, 2013. http://globocan.iarc.fr (accessed Dec 23, 2013).
- Mishel MH, Hostetter T, King B, Graham V. Predictors of psychosocial adjustment in patients newly diagnosed with gynecological cancer. Cancer Nurs. 1984;7:291– 299.
- 4. The growing burden of cancer in India: Epidemiology and social context Article in The Lancet Oncology 15(6) April 2014 with1,226 Reads DOI: 10.1016/S1470-2045(14)70115-9.
- 5. Pirl W. F. Evidence report on the occurrence, assessment, and treatment of depression in cancer patients. *Journal of the National Cancer Institute. Monographs.* 2004;32:32–39.
- 6. Linden W, Vodermaier A, Mackenzie R, Greig D. Anxiety and depression after cancer diagnosis: prevalence rates by cancer type, gender, and age. J Affect Disorder. 2012;141:343–351
- 7. Massie M. J. Prevalence of depression in patients with cancer. *Journal of the National Cancer Institute*. *Monographs*. 2004;32:57–71.
- Pinquart M, Duberstein PR. Depression and cancer mortality: a meta-analysis. Psychol Med. 2010;40:1797– 1810.
- 9. Depression in india", lets talk who organization 2017
- Colleoni M, Mandala M, Peruzzotti G, et al. Depression and degree of acceptance of adjuvant cytotoxic drugs. Lancet
- 11. Satin JR, Linden W, Phillips MJ. Depression as a predictor of disease progression and mortality in cancer patients: a meta-analysis. Cancer. 2009;115:5349–5361.
- Lemon J, Edelman S, Kidman AD. Perceptions of the "Mind-Cancer" Relationship Among the Public, Cancer Patients, and Oncologists. J Psychosoc Oncol. 2004;21:43–58.
- 13. Linden W, Vodermaier A, Mackenzie R, Greig D. Anxiety and depression after cancer diagnosis: prevalence rates by cancer type, gender, and age. J Affect Disorder. 2012;141:343–351
- American Psychiatric Association. Diagnostic and Statistical Manual of Mental Disorders. 5th edition. American Psychiatric Publishing; Arlington, VA: 2013.
- 15. Sneeuw KCA, Aaronson NK, van Wouwe MCC, et al. Prevalence and screening of psychiatric disorder in patients with early stage breast cancer. Qual Life Res. 1993;2:50–51.
- 16. Okamura M, Yamawaki S, Akechi T, et al. Psychiatric disorders following first breast cancer recurrence: prevalence, associated factors and relationship to quality of life. Jpn J Clin Oncol. 2005;35:302–309.
- 17. Ciaramella A, Poli P. Assessment of depression among cancer patients: the role of pain, cancer type and

treatment. Psychooncology. 2001;10:156–165.doi: 10.1002/pon.505.

- Linden W, Vodermaier A, Mackenzie R, Greig D. Anxiety and depression after cancer diagnosis: prevalence rates by cancer type, gender, and age. J Affect Disord. 2012;141:343–351. doi: 10.1016/j.jad.2012.03.025.
- Ng CG, Boks MP, Zainal NZ, de Wit NJ. The prevalence and pharmacotherapy of depression in cancer patients. J Affect Disord. 2011;131:1–7. doi: 10.1016/j.jad.2010.07.034.
- 20. Mary.J, Prevalence of depression in patients with cancer.Oxford Journal.2004; 32 (5): 57-71
- Allen R, Newman SP, Souhami RL. Anxiety and depression in adolescent cancer: findings in patients and parents at the time of diagnosis. Eur J Cancer. 1997;33:1250–1255.
- 22. Chitra Venkateswaran et al. Prevalence of Depression in Breast Cancer Patients and its Association with their Quality of Life: A Cross-sectional Observational Study, *Indian Journal of Palliative Care* 23(3):268 · July 2017
- 23. Caruso et al. Depressive spectrum disorders in cancer: prevalence, risk factors and screening for depression: a critical review, Feb;56(2):146-155.
- 24. Bhattacharyya S, Depression in cancer patients undergoing chemotherapy in a tertiary care hospital of North Bengal, India, 2017, Vol: 61, Issue: 1, Page: 14-18
- 25. "About Depression", https://www.depression.gov/aboutdepression stattistics. Anish Khalil et al. Prevalence of Depression and Anxiety amongst Cancer Patients in a Hospital Setting: A Cross-Sectional Study, 2016 Sep 26.

- 26. Purohit samit, Depression in cancer patients: a critical review of medical oncology, AIIMS, New delhi department of psychiatry, Hospital, university of delhi *psychiatry journal* vol. 13 no. 2 october 2010
- 27. Vivek Srivastava et al. Prevalence and Psychosocial Factors of Anxiety and Depression in Breast Cancer Patients 90(10):2164-74 · November 2017
- 28. "Comprehensive Cancer Information." National Cancer Institute, https://www.cancer.gov/.
- 29. Caroline Burgess et al. Depression and anxiety in women with early breast cancer: five year observational cohort study2015 Mar 26; 330(7493): 702.
- Brendan et al. Prevalence of depression and anxiety among cancer patients Int J Environ Res Public Health. 2015 Feb; 16(3): 411
- 31. "Cancer Research UK." Cancer Research UK, https://www.cancerresearchuk.org/home
- 32. Mary Jane Massie, descriptive study to assess Prevalence of Depression among Cancer patient, JNCI Monographs 2004(32):57-71 · February 2004.
- 33. CK Phang et al. Cross sectional study on Prevalence and Risk Factors of Major Depressive Disorders among Cancer Patients, *Malaysian Journal of Medicine and Health Sciences*, vol-9, issue-1, Published 2013.
- 34. Novin Nikbakhsh et al. Descriptive study on Prevalence of depression and anxiety among cancer patients, *Caspian journal of internal medicine* Volume; 5(3): 167–170.

How to cite this article:

Shameemrani K.2019, Efficacy of Aedes Aegypti and Culex Quinquefasciatus Against Padina Gymnospora And Caulerpa Racemosa. *Int J Recent Sci Res.* 10(03), pp. 31612-31624. DOI: http://dx.doi.org/10.24327/ijrsr.2019.1003.3302
