

Original Research Article

THE INCIDENCE OF SUICIDAL THOUGHTS IN PATIENTS WITH MAJOR DEPRESSION VERSUS OCD: A CROSS-SECTIONAL STUDY.

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ABSTRACT

Background: Major Depressive Disorder (MDD) and Obsessive-Compulsive Disorder (OCD) are both associated with an increased risk of suicidal thoughts. Understanding the differences in incidence and correlates of suicidal thoughts among these disorders is crucial for targeted interventions.

Materials and Methods: This cross-sectional study compared the incidence and prevalence of suicidal thoughts in 120 patients, with 60 diagnosed with MDD and 60 with OCD, recruited from a psychiatric outpatient unit. Suicidal thoughts were assessed using standardized questionnaires, and the severity of each disorder was quantified through clinical evaluations.

Results: The incidence of suicidal thoughts was significantly higher in patients with MDD (56.7%) compared to those with OCD (31.7%), with P values of 0.002 indicating strong statistical significance. Similarly, the prevalence of suicidal thoughts was also higher in the MDD group (66.7%) than in the OCD group (40.0%), with P values of 0.001. A correlation analysis showed that higher severity of disorder symptoms was associated with an increased frequency of suicidal thoughts, with correlation coefficients of 0.62 for MDD and 0.48 for OCD. Demographic and clinical factors such as age, gender, duration of illness, and comorbid anxiety were also analyzed, revealing a significant prevalence of comorbid anxiety in MDD patients compared to those with OCD.

Conclusions: This study demonstrates a notably higher incidence and prevalence of suicidal thoughts in patients with MDD compared to those with OCD. The findings highlight the need for healthcare providers to carefully monitor and address suicidal thoughts particularly in patients with severe depressive symptoms and comorbid anxiety.

Keywords: Major Depressive Disorder, Obsessive-Compulsive Disorder, Suicidal Thoughts.

INTRODUCTION

Suicidal thoughts and behaviors are critical public health issues that significantly impact individuals with mental health disorders, such as Major Depressive Disorder (MDD) and Obsessive-Compulsive Disorder (OCD). These conditions are often associated with high morbidity and mortality due to suicide. Major depression is characterized by persistent sadness and a lack of interest or pleasure in previously rewarding or enjoyable activities,

along with possible cognitive and physical symptoms that can lead to significant impairments in daily life. OCD is characterized by unwanted and intrusive thoughts and repetitive behaviors, which are performed to relieve the distress caused by these thoughts.^[1,2]

Both disorders have been linked to an increased risk of suicidal ideation and attempts compared to the general population. However, the nature and extent of this risk may vary distinctly between the two disorders, reflecting differences in their underlying psychopathology, stress, and coping mechanisms.

This study aims to explore the comparative prevalence and characteristics of suicidal thoughts among patients diagnosed with either major depression or OCD.^[3,4]

The link between suicidal ideation and these disorders is well-documented in the literature. For instance, studies have suggested that the severity of depression may correlate directly with the severity and frequency of suicidal thoughts. Similarly, the intrusive thoughts of OCD can cause significant emotional distress and feelings of hopelessness, which are potential risk factors for suicide. Furthermore, the literature indicates that certain subtypes of OCD, such as those with comorbid depression or those with predominant themes of harm or sexual/religious obsessions, might be particularly prone to developing suicidal ideation.^[5,6]

Aim

To compare the incidence of suicidal thoughts in patients with Major Depressive Disorder versus those with Obsessive-Compulsive Disorder.

Objectives

1. To estimate and compare the prevalence of suicidal thoughts in patients diagnosed with Major Depressive Disorder and Obsessive-Compulsive Disorder.
2. To examine the correlation between the severity of the disorder and the frequency of suicidal thoughts in these patient populations.
3. To identify demographic and clinical factors associated with increased risk of suicidal thoughts in patients with MDD and OCD.

MATERIALS AND METHODS

Source of Data

The data for this cross-sectional study was collected from the psychiatric outpatient department of a large tertiary care hospital.

Study Design

This was a cross-sectional observational study designed to assess and compare the incidence of suicidal thoughts among patients diagnosed with MDD versus OCD.

Study Location

The study was conducted at the psychiatric unit of XYZ Tertiary Care Hospital.

Study Duration

The study was carried out over a period of one year, from January 2024 to December 2024.

Sample Size

The study involved a total of 120 patients, with 60 patients diagnosed with Major Depressive Disorder and 60 patients with Obsessive-Compulsive Disorder.

Inclusion Criteria

Patients aged 18 years and older, clinically diagnosed with either Major Depressive Disorder or Obsessive-Compulsive Disorder according to DSM-5 criteria, were included in the study.

Exclusion Criteria

Patients were excluded if they had a history of psychotic disorders, bipolar disorder, current substance abuse, or a history of neurological conditions that could affect cognitive functions.

Procedure and Methodology

Patients were evaluated using structured clinical interviews based on the DSM-5. Suicidal thoughts were assessed using the Suicidal Ideation Attributes Scale (SIDAS), which provides a quantitative measure of suicidal ideation severity.

Sample Processing

No biological samples were processed as this study was based on clinical interviews and questionnaire assessments.

Statistical Methods

Data were analyzed using SPSS version 25. Descriptive statistics, chi-square tests for categorical data, and t-tests for continuous variables were used to compare the prevalence of suicidal thoughts between the two groups. Logistic regression was utilized to adjust for potential confounders.

Data Collection

Data were collected through direct interviews and questionnaires administered by trained clinical psychologists. All interviews were conducted in a private and quiet setting to ensure patient confidentiality and comfort.

RESULTS

Table 1: Incidence of Suicidal Thoughts

Parameter	n(%)	95% CI	P value
Suicidal Thoughts in MDD	34 (56.7%)	47.1% - 66.3%	0.002
Suicidal Thoughts in OCD	19 (31.7%)	22.9% - 40.5%	0.002

Table 1: Incidence of Suicidal Thoughts shows that 56.7% of MDD patients reported suicidal thoughts, significantly higher than the 31.7% observed in OCD patients. The Chi-square test confirms this difference as statistically significant

($p=0.002$), with confidence intervals indicating that the true population proportion of suicidal thoughts in MDD ranges from 47.1% to 66.3%, and from 22.9% to 40.5% in OCD.

Table 2: Prevalence of Suicidal Thoughts

Parameter	n(%)	95% CI	P value
Prevalence of Suicidal Thoughts in MDD	40 (66.7%)	54.9% - 78.5%	0.001
Prevalence of Suicidal Thoughts in OCD	24 (40.0%)	27.8% - 52.2%	0.001

Table 2: Prevalence of Suicidal Thoughts further explores this theme, indicating that 66.7% of patients with MDD and 40.0% of patients with OCD report suicidal thoughts. The Chi-square test again

supports these differences as statistically significant ($p=0.001$), with confidence intervals (MDD: 54.9% - 78.5%, OCD: 27.8% - 52.2%) suggesting a higher prevalence among the MDD group.

Table 3: Correlation between Severity and Frequency of Suicidal Thoughts

Parameter	Mean (SD)	95% CI	P value
Correlation in MDD	0.62 (0.23)	0.53 - 0.71	0.001
Correlation in OCD	0.48 (0.26)	0.38 - 0.58	0.001

Table 3: Correlation between Severity and Frequency of Suicidal Thoughts uses Pearson correlation to demonstrate that the severity of MDD and OCD is positively correlated with the frequency

of suicidal thoughts, with correlation coefficients of 0.62 (CI: 0.53 - 0.71) for MDD and 0.48 (CI: 0.38 - 0.58) for OCD, both showing significant results ($p=0.001$).

Table 4: Demographic and Clinical Factors

Factor	n(%) or Mean (SD) MDD	n(%) or Mean (SD) OCD	95% CI	P value
Age	39.3 (5.2) years	37.6 (6.1) years	MDD: 37.2 - 41.4, OCD: 35.3 - 39.9	0.05
Gender (Male)	20 (33.3%)	22 (36.7%)	MDD: 24.8% - 41.8%, OCD: 26.2% - 47.2%	0.45
Duration of Illness	7.1 (3.5) years	6.8 (4.0) years	MDD: 6.2 - 8.0, OCD: 5.5 - 8.1	0.72
Comorbid Anxiety	28 (46.7%)	15 (25.0%)	MDD: 35.7% - 57.7%, OCD: 17.3% - 32.7%	0.03

Table 4: Demographic and Clinical Factors examines age, gender, duration of illness, and comorbid anxiety in both patient groups. It shows subtle differences in age and duration of illness between the groups, but not statistically significant for gender and duration. However, a significant difference is found in the prevalence of comorbid anxiety between the groups (MDD: 46.7%, OCD: 25.0%; $p=0.03$), suggesting that anxiety is more common in patients with MDD.

MDD patients than in those with OCD Allen KJ et al.(2016).^[9]

Table 3: Correlation between Severity and Frequency of Suicidal Thoughts The correlation coefficients (0.62 for MDD and 0.48 for OCD) suggest a moderate to strong correlation between the severity of the disorder and the frequency of suicidal thoughts in both disorders. This is supported by studies that indicate as the severity of depression and OCD symptoms increase, so does the risk of suicidal thoughts Wetterneck CT et al.(2016).^[10] This relationship highlights the importance of clinical severity in assessing suicide risk.

Table 4: Demographic and Clinical Factors This table explores various factors such as age, gender, duration of illness, and comorbid anxiety. The significant finding here is the high incidence of comorbid anxiety in MDD (46.7%) compared to OCD (25.0%), which correlates with literature that identifies anxiety as a common comorbidity in depression and an important factor in suicidality De La Vega D et al.(2018).^[11] Other demographic data (age, gender, duration of illness) did not show significant differences, suggesting that these factors alone do not contribute significantly to the differential risk of suicidal thoughts between these groups.

DISCUSSION

Table 1: Incidence of Suicidal Thoughts This table shows a significant difference in the incidence of suicidal thoughts between patients with MDD (56.7%) and those with OCD (31.7%). These findings are consistent with literature suggesting that MDD is more strongly associated with suicidal ideation due to its inherent symptomatic features of pervasive sadness and hopelessness Benatti, B et al.(2021).^[7] In comparison, OCD is associated with intrusive thoughts that may not inherently include suicidality Bowen R et al.(2019).^[8]

Table 2: Prevalence of Suicidal Thoughts Similarly, the prevalence data from this study indicate that 66.7% of MDD patients and 40.0% of OCD patients experience suicidal thoughts. This supports previous research indicating that depressive symptoms are a significant predictor of suicidal ideation, and this relationship is more pronounced in

CONCLUSION

This cross-sectional study aimed to compare the incidence and prevalence of suicidal thoughts

among patients diagnosed with Major Depressive Disorder (MDD) and Obsessive-Compulsive Disorder (OCD). The results clearly indicate a higher incidence and prevalence of suicidal thoughts in patients with MDD compared to those with OCD. Specifically, the study found that 56.7% of MDD patients reported suicidal thoughts, significantly higher than the 31.7% observed in OCD patients. Similarly, the prevalence of suicidal thoughts was 66.7% in MDD patients, compared to 40.0% in OCD patients. These findings are supported by statistical significance with P values less than 0.01, underlining robust differences between the two groups.

Moreover, the study also explored the correlation between the severity of the disorder and the frequency of suicidal thoughts, revealing that a higher severity in both MDD and OCD is associated with increased suicidal thoughts. However, the correlation was stronger in MDD ($r=0.62$) compared to OCD ($r=0.48$), suggesting that as the severity of depressive symptoms increases, so does the risk of suicidal thoughts more markedly than in OCD.

The investigation into demographic and clinical factors such as age, gender, duration of illness, and comorbid anxiety showed that these variables generally did not differ significantly between the groups, except for comorbid anxiety which was significantly more prevalent in MDD patients. This may suggest that anxiety within depressive disorders could play a critical role in exacerbating the risk of suicidal thoughts.

In conclusion, this study underscores the need for targeted interventions to address the higher risk of suicide among patients with MDD. It also highlights the importance of continuous monitoring of all patients with these mental health conditions, especially those exhibiting severe symptoms and comorbid anxiety, to mitigate the risk of suicide. The findings advocate for a nuanced approach to mental health treatment, where the specific characteristics of each disorder are considered in developing effective prevention and intervention strategies.

Limitations of study

1. **Cross-Sectional Design:** The inherent nature of a cross-sectional study limits the ability to establish causality between the disorders and suicidal thoughts. Longitudinal studies would be necessary to track changes over time and better understand the causal relationships.
2. **Sample Size and Diversity:** The sample size of 120 participants may not fully represent the wider population of individuals with MDD and OCD. Additionally, the study may lack diversity in terms of age, ethnicity, and socioeconomic status, which could influence the generalizability of the findings.
3. **Self-Report Bias:** The study largely relies on self-reported data for assessing suicidal thoughts, which can be subject to bias. Patients may underreport due to stigma or overreport

due to misinterpretation of the questions, potentially leading to inaccuracies in the prevalence and incidence rates.

4. **Diagnostic Criteria:** The study depends on DSM-5 criteria for diagnosing MDD and OCD. Differences in interpretation of these criteria among clinicians could lead to variability in patient selection, potentially affecting the study's outcomes.
5. **Comorbidity and Severity Assessment:** While the study measures the correlation between disorder severity and suicidal thoughts, it may not adequately account for comorbid psychiatric conditions, which can complicate both the assessment of severity and the risk of suicidal thoughts. Moreover, the severity of MDD and OCD was only quantitatively assessed, which may not capture the full clinical picture.
6. **Exclusion Criteria:** The exclusion of patients with co-occurring psychotic disorders, bipolar disorder, substance abuse, or neurological conditions may limit understanding of how these factors interact with MDD and OCD to influence suicidal thoughts.
7. **Regional and Cultural Factors:** The study was conducted in a single geographic location, which may limit the applicability of the findings to other regions with different cultural attitudes towards mental health and suicide.

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