CHARACTERISING PATIENTS WITH MAJOR DEPRESSIVE DISORDER WITH MODERATE-TO-HIGH SUICIDE INTENT AND THEIR HEALTHCARE RESOURCE UTILISATION IN ENGLAND

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INTRODUCTION & OBJECTIVES

- Major depressive disorder (MDD) is a serious mood disorder that can affect all aspects of daily life [1].
- Suicidal ideation (SI) can be a core symptom of MDD and 1 of the 9 Diagnostic and Statistical Manual of Mental Disorders (DSM-V) criteria. A high level of SI can result in suicide intent, serious injury, and early death [2].
- The aim of this study was to compare the characteristics and healthcare resource utilisation HCRU of patients with MDD and moderate-to-high suicide intent in England to patients with MDD without moderate-to-high suicide intent and better understand their treatment pathways .

METHODS

- **Data source**: Clinical Practice Research Datalink (CPRD) GOLD data linked with Hospital Episode Statistics (HES), Mental Health Dataset (MHDS), and Office for National Statistics (ONS) data in England.
- **Study population**: Adults with ≥1 MDD diagnosis between 4/2007-11/2015 were included. Patients with a diagnosis for psychosis, schizophrenia, mania, bipolar disorder, or dementia were excluded.
  - Patients without moderate-to-high suicide intent were followed from their first MDD diagnosis (index date).
  - Patients with moderate-to-high suicide intent were selected based on appropriate diagnosis codes. The index date was defined as their first moderate-to-high suicide intent diagnosis.
- **Outcomes**: descriptive analyses on patient characteristics at the index date, anxiety as comorbidity and HCRU during 1-year follow-up (among patients with ≥1 year of follow-up), and index and subsequent treatments.

RESULTS

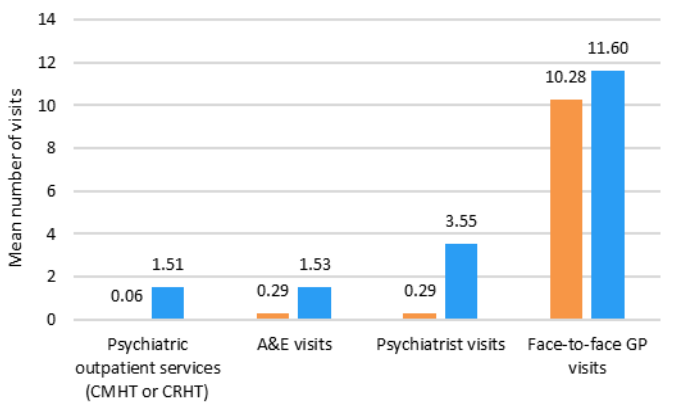
- **Patient characteristics:** Patients with MDD and moderate-to-high suicide intent were younger on average than those without moderate-to-high suicide intent (**Table 1**). The proportion of females was also lower.
- **Incidence of moderate-to-high suicide intent**: 12/1,000 person-years in patients with MDD.
- **Anxiety**: 44.4% and 31.9% of MDD patients with and without moderate-to-high suicide intent, respectively, were diagnosed with anxiety in the first follow-up year (p<0.0001).

Table 1. Patient characteristics at the index date

	MDD without moderate-to-high suicide intent	MDD with moderate-to-high suicide intent
Number of patients	294,259	13,217
Age – Mean (SD)	44.8 (17.1)	39.0 (14.7)
Female – N (%)	191,692 (65.1%)	7,642 (57.8%)
Ethnicity		
White	258,846 (88.0%)	12,417 (93.9%)
Asian	6,399 (2.2%)	174 (1.3%)
Black	3,882 (1.3%)	107 (0.8%)
Mixed	1,289 (0.4%)	63 (0.5%)
Other	2,101 (0.7%)	51 (0.4%)
Unknown	21,742 (7.4%)	405 (3.1%)
Charlson Comorbidity Index		
0	202,630 (68.9%)	8,923 (67.5%)
1-2	28,250 (9.6%)	1,919 (14.5%)
3-4	4,597 (1.6%)	202 (1.5%)
5+	4,322 (1.5%)	101 (0.8%)
Unknown	54,460 (18.5%)	2,072 (15.7%)

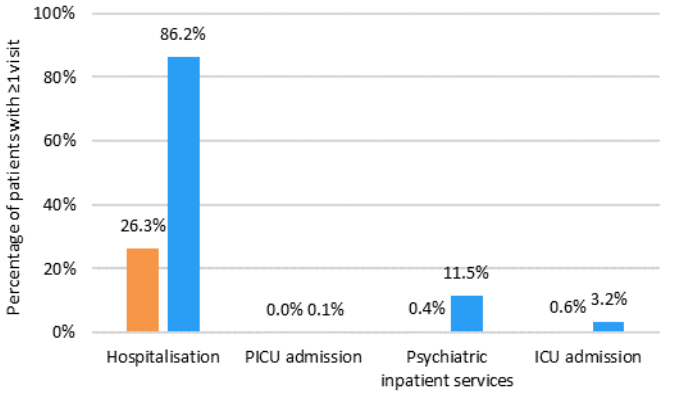
- **HCRU**: Patients with MDD and moderate-to-high suicide intent incurred greater HCRU than those without moderate-to-high suicide intent (**Figures 1 & 2**).
  - Although the proportion of patients with moderate-to-high suicide intent requiring a psychiatric inpatient stay was higher (11.5% versus 0.4%, Figure 2), the average length of stay among these patients was shorter, at 19.1 days compared to 27.8 days among patients without moderate-to-high suicide intent.

Figure 1. Outpatient visits during the first follow-up year



CMHT: Community Mental Health Team; CRHT: Crisis Resolution and Home Treatment Team; A&E: Accident & Emergency; GP: General Practitioner

Figure 2. Inpatient services during the first follow-up year



PICU: Psychiatric Intensive Care Unit; ICU: Intensive Care Unit

- **Treatments**: 56% of patients with MDD and moderate-to-high suicide intent had an antidepressant prescribed within 30 days of the index date, with citalopram being the most frequently prescribed.

DISCUSSION

- This study provides unique data on the patient characteristics, HCRU, and treatment pathways among patients with MDD and moderate-to-high suicide intent in England.
- **Limitations:**
  - Using diagnosis codes (ICD-10 and Read) to identify patients with MDD and moderate-to-high suicide intent is subject to limitations due to the complexity of identifying suicide intent. The codes were validated with clinical experts to minimise risk of bias.
  - The datasets might not capture all HCRU, as patients may encounter services outside of the network of practices that contribute to the data.
  - Certain patient characteristics (i.e., smoking status and body mass index) were inconclusive due to a high proportion of missing values.

CONCLUSIONS

- Patients with MDD and moderate-to-high suicide intent incurred greater HCRU than those without moderate-to-high suicide intent.
- Given the disparities observed in this study between patients with MDD with and without moderate-to-high suicide intent, the need for effective treatment and medical care is even higher for patients with moderate-to-high suicide intent. Improving treatment options and care for these patients could help to reduce associated symptoms, mortality due to suicide, and HCRU.

REFERENCES

[1] National Institute of Mental Health. Depression. https://www.nimh. nih.gov/health/topics/ depression/.

[2] Hawton KC et al. University of Oxford's Centre for Suicide Research. Clinical guide: Assessment of suicide risk in people with depression. https://www.dpt.nhs.uk/download/2hn1ZTaUXY.

DISCLOSURES & FUNDING

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