ISSN: 2329-9126 Open Access

# Evaluation of the Management of Patients on Psychotropic Drugs in the Bembla Delegation Hospital

# Noura Brahem<sup>1\*</sup>, Kaouther Bouzid<sup>2</sup> and Haifa Taher<sup>3</sup>

## **Abstract**

**Background:** Human beings are worthy of psychological well-being to live in perfect health. Unfortunately, the complexity of modern life could cause psycho-mental disorders that destabilize the state of health of citizens. These disorders range from psychosomatic manifestations to proven psychoses.

Faced with this situation, an ambitious National Mental Health Program (PNSM) was launched in Tunisia in 1990. A better understanding of the current practices of patients on psychotropic drugs and the monitoring carried out by family doctors will make it possible to provide practical responses to the expectations of all stakeholders (patients, parents and doctors).

**Objective:** The study focuses on the identification and classification of psycho-mental patients in the Bembla delegation, the analysis of the components of their medication prescriptions, as well as their possible associated pathologies, which will make it possible to propose practical solutions for the best application of the national mental health program.

**Method:** This is a statistical study carried out throughout 2023, including 197 participants of all ages who constitute all patients on psychotropic drugs treated in the seven health establishments.

The data were collected from the care registers of psycho-mental patients treated on an outpatient basis and more particularly, the patients' medical files.

Data analysis was performed using SPSS Version 29.0. Qualitative variables were expressed as numbers and percentages.

Results: Of the 197 patients studied, whose ages ranged from 3 to 82, the age group under 30 only represents a quarter and the population most exposed to psychological disorders is those between 30 and 60 years old or 57.4%. It is essentially antiepileptics (33.33%) and neuroleptics (27.94%) that are most often prescribed. Nearly 50% of patients take a single medication and only 14.2% take three or more products. 22% of patients have at least one associated pathology.

In terms of respecting psychiatric and neurological consultation appointments and the regularity of the supply of medications, the study shows that half of the patients are either irregular in the supply of treatment and appointments or completely lost of sight. Hence, there is a need for specific, individualized and personalized medical monitoring at the level of health establishments in the delegation through better application of the National Mental Health Program.

**Conclusion:** This contribution to a better understanding of the current practices of patients on psychotropic drugs and the monitoring currently carried out by family doctors will make it possible to provide practical responses to failures in the care of patients on psychotropic drugs at the delegation level and to the expectations of all stakeholders.

Keywords: Psycho-mental patients • Psychotropic drugs • Polypharmacy in psychiatry

\*Address for Correspondence: Noura Brahem, Department of General Medicine, Hospital of Bembla, Monastir, Tunisia; E-mail: noura.brahem.sakli@gmail.com

Copyright: © 2025 Brahem N, et al. 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 author and source are credited.

Received: 27 February, 2024, Manuscript No. JGPR-24-128308; Editor assigned: 01 March, 2024, PreQC No. JGPR-24-128308 (PQ); Reviewed: 18 March, 2024, QC No. JGPR-24-128308; Revised: 28 March, 2025, Manuscript No. JGPR-24-128308 (R); Published: 04 April, 2025, DOI: 10.37421/2329-9126.2025.13.607

<sup>&</sup>lt;sup>1</sup>Department of General Medicine, Hospital of Bembla, Monastir, Tunisia

<sup>&</sup>lt;sup>2</sup>Department of General Medicine, Hospital of Bouhjar, Monastir, Tunisia

<sup>&</sup>lt;sup>3</sup>Department of General Medicine, Hospital of Kairouan, Kairouan, Tunisia

# Introduction

The importance of psychological well-being in maintaining optimal health in humans is undeniable. But modern life can cause psychological disorders that affect our health. These disorders range from psychosomatic manifestations to full-blown psychoses, thus affecting the overall health of individuals. As early as 1990, Tunisia took the initiative to launch a mental health program to help people who needed help.

This work will study different aspects of this problem to better understand how to help patients. We will examine the prevalence of psychological disorders according to different age groups, polypharmacy in patients taking psychotropic drugs, the types of psychotropic drugs prescribed, the risks of drug interactions, the prevalence of comorbidities in these patients, as well as the adherence to treatment and medical monitoring of people taking psychotropic medications.

## **Objective**

- Determine and classify psycho-mental patients in the Bembla delegation.
- Analyze the components of their medication prescriptions as well as their possible associated pathologies.
- Propose practical solutions for better monitoring of these patients and better application of the National Mental Health Program in the delegation.

# **Materials and Methods**

### Study area

Bembla is one of the 13 delegations of the governorate of Monastir in Tunisia. The latest official estimates dated January 1, 2023 indicate that the Bembla delegation has 36,067 inhabitants, representing 6% of the entire population of the Monastir governorate (611,118 inhabitants) and a population density of 737.4/km² [1].

It is served by a local hospital and seven primary health centers, which are provided by five family doctors, three dentists, a gynecologist, a pulmonologist and a nephrologist associated with a part-time pediatrician and ophthalmologist.

In 2023, the overall number of consultations in the seven primary health centers was nearly 55,000, with a monthly average consultation of between 3,500 and 5,500. Our study focused on patients from all of the aforementioned structures.

Table 1. Distribution by age and sex of the study population.

## Study design

This is a statistical study carried out throughout 2023, including 197 participants of all ages who constitute all patients on psychotropic drugs treated in the seven health establishments.

#### **Data collection**

The data were collected from the care registers of psycho-mental patients treated on an outpatient basis and, more particularly, the patients' medical files.

## Statistical analysis

Data analysis was performed using SPSS version 29.0. Qualitative variables were expressed as numbers and percentages.

# **Results and Discussion**

We collected 197 patients on psychotropic drugs spread across the seven health establishments. A first analysis allows us to make the following observations:

- Patients only obtain medicines from health establishments.
- · There is no specific medical monitoring at the local level.
- The majority of patients are followed at the psychiatry and neurology consultation of the Monastir University Hospital center.

### Distribution by age and sex

The 197 patients were divided into four age groups, following the classification that is adopted by all health establishments nationally.

The analysis of the results reported in Table 1 allows us to draw the following conclusions:

- A little more than 41% of patients are women.
- The age of the patients varies between 3 and 82 years.
- Young people aged 15 to 29 only represent a little less than 16% of patients.
- The age group under 30 years old represents only a quarter of the 197 patients.
- The population most exposed to psychological disorders is those between 30 and 60 years old, i.e., 57.4%.

Age (years)	<15	15 to 29	30 to 60	>80	Total	Percentage (%)
Sex						
Female	6	10	49	17	82	41.62

Male	10	21	64	20	115	58.38
TOTAL	16	31	113	37	197	100
Percentage (%)	8.12	15.74	57.36	18.78	100	

#### **About prescribed medications**

The different psychotropic drugs prescribed: Several types of psychotropic drugs are usually prescribed, depending on the pathologies identified. They were classified into five classes (Figure 1).

Antidepressants and anxiolytics represent less than a quarter of all psychotropic drugs prescribed. For the other three, antiepileptics (33.33%) and neuroleptics (27.94%) are most often prescribed.

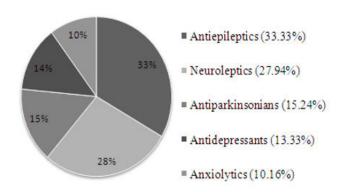


Figure 1. The different psychotropic drugs prescribed.

**Availability of medicines:** The availability of psychotropic drugs at the level of the seven health establishments in the Bembla delegation is evaluated by the ratio of the number of products prescribed to the number of products delivered, also called the "satisfaction rate," which is estimated at 100%, which denotes a real effort by the health authorities.

**Table 2.** Associated pathologies compared to all 197 patients.

**Number of products per prescription:** Figure 2 shows that almost 50% of patients take a single product and only 14.2%take three products or, very rarely, more.

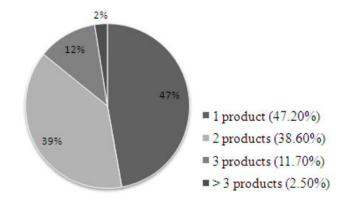


Figure 2. Number of products per prescription.

## **Associated pathologies**

Table 2 shows that about 22% of patients have at least one associated pathology; it is the diseases of high blood pressure and diabetes, which are the frequent ones. At this level, it is useful to mention that each patient has consulted at least once for acute illness, hence a significant risk of drug interactions.

Pathology	Number and (percentage) compared to the 197 patients
Heart diseases	08 (4.06%)
High blood pressure	14 (7.11%)
Diabetes	11 (5.58%)
Dyslipidemia	07 (3.55%)
Respiratory diseases	04 (2.03%)
Total	44 (22.33%)

## **Compliance with treatment**

"Compliance" with treatment is evaluated by respecting psychiatric and neurological consultation appointments and the regularity of drug supply. Thus, 50% of patients are either irregular in their treatment supply and appointments or completely lost to follow-up. Hence the need for specific, individualized and personalized medical monitoring at the delegation level and greater involvement of close family with the aim of:

- Monitoring side effects of psychotropic medications.
- Being aware of drug interactions.
- Providing health education for the patient and those around them to improve compliance with treatment.

The analysis of the data obtained shows that the population most exposed to psychological disorders is between 30 and 60 years old or 57.4%.

Kessler, et al., [2] also conducted a national survey, revealing a high prevalence of psychological disorders in this age group, with variability depending on the types of disorders and demographic characteristics. The survey found that psychological disorders were widespread in this age group. They found that almost half of the participants had experienced at least one psychological disorder at some point in their lives. The most common disorders in this population were anxiety disorders and mood disorders, with prevalence rates varying by age and sex.

Those under 30 years old represent only a quarter of patients. Already in 2017, more than 20% of the 549 Tunisian psychologists worked in schools, universities, university residences and institutions for vulnerable children and adolescents. The rate of psychologists per 100,000 inhabitants was above the world average. In 2017, Tunisia had 45 child psychiatrists, which is equivalent to a rate of 0.39 per 100,000 people. In comparison, the global average for child psychiatrists in low and middle-income countries is 0.02 [3].

However, the present study shows that the coordination between the different mental health actors can still be improved.

A previous study [4] carried out on 313 participants in the Bembla delegation showed that 32% of patients were anxious and 23% reported depressive responses with a HAD score (hospital anxiety and depression scale) greater than 11. The authors concluded that these data encourage us to systematically detect the psychological problems of our patients on the front lines, as this is a main pillar of preventive consultation.

Nearly 53% of patients take at least two medications and antiepileptics and neuroleptics alone represent approximately 61% of psychotropic medications prescribed. As each patient has consulted at least once for an acute illness, the risk of drug interactions is not negligible, especially since nearly 22% of patients have at least one associated pathology.

These results confirm those of Qato, et al. [5], who analyzed data from the National Drug Use Survey in the United States. Their study found that nearly 40% of older adults used five or more medications simultaneously and that this excessive use was associated with an increased risk of complications, drug interactions and adverse effects on the patient's health. Hovstadius and Petersson [6] also identified several factors contributing to excessive polypharmacy in patients taking psychotropic medications, highlighting the need for appropriate medication management to avoid associated risks.

Concerning the types of psychotropic drugs most prescribed (antiepileptics and neuroleptics), Moore, et al., [7] examined data on reports of violence associated with certain psychotropic medications, including neuroleptics. Their analysis revealed instances of violent behavior linked to the use of these drugs, although the exact prevalence of these incidents and direct causality to the drugs require further study. These findings highlight the continued importance of carefully monitoring psychotropic medication prescribing trends and their impact on patients' mental health.

The risk of drug interactions was also addressed by Becker, et al., [8] who examined the consequences of drug interactions, highlighting the risk of hospitalizations and emergency department visits due to these interactions and emphasizing the importance of considering drug interactions in the management of psychotropic treatments to optimize the safety and effectiveness of care and carefully monitor psychiatric medications to minimize the risks of potentially harmful interactions in patients.

Zolezzi, et al., [9] examined the prevalence of medical comorbidities in patients taking psychotropic medications, including disorders such as hypertension, diabetes, cardiovascular diseases, etc. The study provides valuable data on the clinical complexity of patients taking psychotropic drugs and highlights the importance of taking into account comorbidities that may complicate treatment when managing their treatment.

But, despite the availability of medicines in the health establishments of the Bembla delegation, half of the patients are either irregular in following treatment and respecting appointments, which can compromise their treatment or they are completely lost of sight. Hence the need to identify and understand the determinants of medication adherence, such as individual perceptions of mental illness, sociodemographic factors, treatment characteristics, side effects of medications, social support, interactions with health professionals, etc.

To develop effective interventions for patients under psychotropic treatment, personalized medical monitoring at the district level and greater involvement of close family can improve adherence to treatment, reduce the risk of patients being lost to follow-up, ensure continuity of care and improve clinical outcomes. Vrijens, et al., [10] proposed a new taxonomy to describe medication adherence, highlighting the importance of measuring both persistence (duration of drug use) and compliance (adherence to dosing instructions). Their model provides a framework for assessing and improving patient medication adherence, medical monitoring and treatment effectiveness.

# Conclusion

Of the 197 patients studied, the population most exposed to psychological disorders is those between 30 and 60 years old, i.e., 57.4%. About 22% of these patients have at least one associated pathology and almost half take a single medication. It is essentially antiepileptics (33.33%) and neuroleptics (27.94%) that are most often prescribed.

This work allowed us to reveal many failures in the care of patients on psychotropic drugs at the delegation level:

- The weak contribution of the general practitioner in the mental health system, the latter needing practical benchmarks to approach this type of pathology and means to harmonize his relationships with his corresponding psychiatrists.
- The lack of complementary therapies to psychotropic drugs such as supportive psychotherapy, psychoanalysis, behavioral therapy, family psychotherapy, etc.
- The exclusion of the responsibility of the patient's family in the approach to comprehensive care of patients.
- Lack of supervision by those responsible for the National Program.
  To remedy these failures, we offer the following solutions:
- Census of all patients who have purchased medicines in recent years
- Summoning defaulters with a member of their family.
- Responsibility of at least one member of the family to ensure that the patient takes their medications regularly and keeps their appointments, as for the national anti-tuberculosis program.
- Planning of medical consultations at the delegation level provided at least twice a month by a general practitioner from the delegation already trained within the framework of the national mental health program for the monitoring of these patients.
- Proposal for the adoption of a follow-up log for each patient (like the case of tuberculosis patients), issued from the first psychiatric consultation and containing personal, diagnostic and therapeutic information as well as appointments, etc.

# Conflict of Interest

The authors report no conflicts of interest in this work.

# **Ethical Considerations**

The study was carried out under good clinical practice conditions and following ethical standards.

# References

- TUNISIA: Administrative Division/Governorates and Delegations. 2023.
- Kessler, Ronald C., Wai Tat Chiu, Olga Demler and Ellen E. Walters. "Prevalence, Severity and Comorbidity of 12-month DSM-IV Disorders in the National Comorbidity Survey Replication." Arch Gen Psychiatry 62 (2005): 617-627.
- de Uta O and Belhadj Ah., (2022), Adolescent Mental Health in the MENA Region: Spotlight on Tunisia, IEPA, Consulted on February 22, 2023.
- 4. Hellara OH, AS Belguith, S Ncibi and B Noura. "Personalized Preventive Plan in General Medicine." *J Gen Pract (Los Angel)* 5 (2017): 2.
- Qato, Dima M, G Caleb Alexander, Rena M. Conti and Michael Johnson, et al. "Use of Prescription and Over-the-Counter Medications and Dietary Supplements among Older Adults in the United States." JAMA 300 (2008): 2867-2878.
- Hovstadius, Bo and Göran Petersson. "Factors Leading to Excessive Polypharmacy." Clin Geriatr Med 28 (2012): 159-172.
- Moore, Thomas J, Joseph Glenmullen and Curt D. Furberg. "Prescription Drugs Associated with Reports of Violence towards Others." PloS One 5 (2010): e15337.
- Becker, Matthijs L, Marjon Kallewaard, Peter WJ Caspers and Loes E. Visser, et al. "Hospitalisations And Emergency Department Visits Due To Drug-Drug Interactions: A Literature Review." *Pharmacoepidemiol Drug Saf* 16 (2007): 641-651.
- Zolezzi, Monica, Sara Abdulrhim, Nour Isleem and Farah Zahrah, et al. "Medical Comorbidities in Patients with Serious Mental illness: a Retrospective Study of Mental Health Patients Attending an Outpatient Clinic in Qatar." Neuropsychiatr Dis Treat (2017): 2411-2418.
- 10. Vrijens, Bernard, Sabina De Geest, Dyfrig A. Hughes and Kardas Przemyslaw, et al. "A New Taxonomy for Describing and Defining Adherence to Medications." *Br J Clin Pharmacol* 73 (2012): 691-705.

**How to cite this article:** Brahem, Noura, Kaouther Bouzid and Haifa Taher. "Evaluation of the Management of Patients on Psychotropic Drugs in the Bembla Delegation Hospital." *J Gen Pract* 13 (2025): 607.