Background
Schizophrenia is a chronic, debilitating mental illness appearing in the young age. It alters significantly their sexuality and quality of life. In the literature the frequency of sexual dysfunction in patients suffering from schizophrenia varies from 50 to 85% [1,2].

Objective
The objective of this study was to evaluate the prevalence of sexual dysfunction in patients with schizophrenia and to study related factors according to gender.

Methods
This study was approved by the ethics committee of the Faculty of Medicine in Sousse. We have performed this study with one hundred first outpatients with a diagnosis of schizophrenia (DSM-IV TR criteria) from the outpatient psychiatric service of Farhat Hached Hospital in Sousse.

The study was held during three months. All patients meet the remission criterion developed by “The Working Group Remission in schizophrenia” and were taking antipsychotic medication at the time of assessment. Patients in remission have a score less than or equal to 90 at the Positive and Negative Syndrome Scale (PANSS) and had no history of hospitalization during the last six months.

We excluded schizophrenic patients with other comorbidity such as: mental retardation, personal history of depressive disorder, alcohol and/or substance abuse in the preceding six months. We administered to the one hundred outpatients record exploring demographic characteristics, the PANSS scale and Arizona Sexual Experience Scale (ASEX, 5 items) [3]. The ASEX scale was translated and validated in Arabic language. This scale allows rapid detection of sexual dysfunction. Sexual dysfunction was defined as : A total ASEX score of ≥ 19 or any one item with a score ≥ 5, or any three items with a score ≥ 4.

Comparison was established between men’s and women’s to determine related factors.

Results
The mean age of our sample was 37.6 years (SD = 10.2). 70% were male and 57% were single. Only 24% of them have professional activity.

The mean age of illness onset was 24.8 (SD = 6.1). 43% of them received second generation antipsychotics.

The mean ASEX total score was 17.7 (SD = 5.6) and the mean PANSS total score was 51.8 (SD = 12.8).

Sexual disorder prevalence
55% of outpatients with schizophrenia have sexual dysfunction.

Gender differences
The two groups was comparable in terms of age, early onset, duration of evolution of schizophrenia, mean scores of PANSS and treatment dosage.

Women’s had a worse ASEX total score than men’s (20.8 ± 5.9 versus 16.6 ± 5.1 (p = 0.002). Arousal disorders and orgasm were more affected in women (p = 0.005 and p = 0.001) (Tab 1).

Table 1: Comparison of sexual disorders between gender

<table>
<thead>
<tr>
<th>ASEX</th>
<th>Men</th>
<th>Women</th>
<th>p</th>
</tr>
</thead>
<tbody>
<tr>
<td>Desire</td>
<td>3.7 ± 1.1</td>
<td>4.2 ± 1.1</td>
<td>NS</td>
</tr>
<tr>
<td>Arousal</td>
<td>3.5 ± 1.2</td>
<td>4.2 ± 1.3</td>
<td>0.005</td>
</tr>
<tr>
<td>Orgasm</td>
<td>3.3 ± 1.1</td>
<td>3.7 ± 1.1</td>
<td>0.001</td>
</tr>
<tr>
<td>ASEX total</td>
<td>16.6 ± 5.1</td>
<td>20.8 ± 5.9</td>
<td>0.002</td>
</tr>
</tbody>
</table>

Related factors
There was a relationship between the ASEX total score and daily dose of treatment (r = 0.36, p = 0.001) and with the severity of symptoms (r = 0.31, p = 0.005).

Discussion
In our study, 55% of outpatients had one or more sexual dysfunction. In Tunisian study conducted in schizophrenic patients, Ben Mahmoud had found 93% of sexual dysfunctions [2]. In literature, prevalence was between 16 and 96% [4,5,6].

Many studies found that sexuality of female patients with schizophrenia were more impaired. Ben Mahmoud had found more decreased desire and arousal in women with schizophrenia [2].

Miclutia had reported the importance of relational component, sentimental and emotional sexuality in women compared to men [4].

In our study, significant correlation between the severity of symptoms in particular negative symptoms and severity of sexual dysfunction was found. It was observed in literature that deficit evolution of schizophrenia predict progressive deterioration of sexual function [4].

For the relation found between sexual disorder and antipsychotic daily intake, Devraux had reported no difference between first and second generation antipsychotics [7].

Many studies found a relation between these sexual disorders and blocking D2 receptors, hyperprolactinemia and decrease of serum testosterone [8,9].

Conclusion
More than half of our outpatients with schizophrenia had sexual dysfunction. Women had more sexual dysfunction, particularly arousal disorders and orgasm.

References