Sexual dysfunction in adults with diabetes

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Background
- Compared with the general population, the prevalence of sexual dysfunction (SD) is higher among both men and women with diabetes.
- However, little work has been done comparing the factors associated with SD by diabetes type and gender in the same sample.

Aims
- To examine the prevalence of diagnosed SD in Australian adults with diabetes.
- To examine factors associated with SD by diabetes type and gender.

Method
- Diabetes MILES – Australia was a national survey (conducted in 2011) of adults with diabetes which focused on psychosocial and behavioral issues. Methods are described in detail elsewhere.
- 3,338 eligible respondents took part:
  - 1,376 (41%) had type 1 diabetes (T1DM), including 825 (61%) women and 1,962 (59%) had type 2 diabetes (T2DM), including 953 (49%) women.
- The survey included study-specific items (e.g., diagnosed SD) and validated scales, e.g., PHQ-9 to measure depression, GAD-7 to measure anxiety, EQ-SD to measure general health.
- Factors associated with SD in men and women with T1DM or T2DM were entered into four logistic regression analyses (see Table 1).

Results
- 587 (17%) respondents reported a diagnosis of SD.
- Most common in men with T2DM.
- Older age was associated with SD for all groups except women with T1DM.
- Longer diabetes duration was associated with SD for men only.
- Poorer general health was associated with SD for all groups except men with T1DM.
- Depressive symptoms were associated with SD for women with T1DM only.
- Anxiety symptoms were not associated with SD for any group.
- Higher BMI was associated with SD for men with T1DM only.
- Having a partner was associated with SD for women with T2DM only.

Conclusions
- SD is common among adults with diabetes, particularly in men with T2DM.
- Actual prevalence may be higher than reported here, as it is likely to be under-diagnosed and under-reported.
- Factors associated with SD differ by diabetes type and gender.
- Consistent with previous research:
  - Emotional well-being and relationship status were most strongly associated with SD for women.
  - Clinical and demographic factors were most strongly associated with SD in men.
- These findings highlight the need for attention to be given to sexual function in diabetes care, and may inform tailored care for men and women with T1DM or T2DM.

Table 1. Factors associated with sexual dysfunction

<table>
<thead>
<tr>
<th>Sample</th>
<th>% with sexual dysfunction</th>
<th>Factor</th>
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</thead>
<tbody>
<tr>
<td>Women with T1DM</td>
<td>7.7%</td>
<td>Depressive symptoms (PHQ-9) 0.10 1.10 1.02-1.19</td>
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<tr>
<td></td>
<td></td>
<td>General health (EQ-SD) -0.02 0.98 0.96-0.99</td>
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<tr>
<td>Men with T1DM</td>
<td>20.5%</td>
<td>Age 0.07 1.07 1.05-1.10</td>
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<tr>
<td></td>
<td></td>
<td>Diabetes duration 0.03 1.03 1.01-1.05</td>
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<tr>
<td></td>
<td></td>
<td>BMI 0.07 1.07 1.01-1.13</td>
</tr>
<tr>
<td>Women with T2DM</td>
<td>8.0%</td>
<td>Age 0.05 1.05 1.02-1.09</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Relationship status 1.12 3.05 1.56-5.96</td>
</tr>
<tr>
<td></td>
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<td>General health (EQ-SD) -0.03 0.98 0.96-0.99</td>
</tr>
<tr>
<td>Men with T2DM</td>
<td>33.1%</td>
<td>Age 0.06 1.06 1.04-1.09</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Diabetes duration 0.03 1.03 1.01-1.06</td>
</tr>
<tr>
<td></td>
<td></td>
<td>General health (EQ-SD) -0.02 0.98 0.97-0.99</td>
</tr>
</tbody>
</table>

Notes:
- The following factors were entered into each model:
  - age, relationship status, diabetes duration, BMI, depression and anxiety symptoms, and general health.

References