THE INFLUENCE OF MATERNAL WEIGHT ON THE INSULINIZATION ON PATIENTS WITH GESTATIONAL DIABETES.


**Introduction**

- 60 to 70% of the patients with gestational diabetes are able to achieve glycemic control through diet and physical activity.
- However, some patients need insulinization and the adipose tissue seems to increase insulin resistance.

**Objective**

- To verify if the initial weigh influences the need of insulinization for the treatment of gestational diabetes.

**Methods**

- Analyze patients attended at University Hospital - UNIFESP-Brasil, with diagnosis of gestational diabetes according to the WHO criteria from 2007-12 and IADPSG criteria from 2012-15.
- Patients were classified by their initial body mass index according to the WHO criteria and the percentage of patients that needed insulinization in each group.

**Results**

- 484 patients with gestational diabetes were attended, 1 was underweight, 100 normal range, 162 overweight and 221 obese.
- Among the normal patients, 25 (25%) needed insulinization, the overweight patients and obese 64 (39,5%) and 104 (49,3%) needed insulinization, respectively.
- We used Anova and Pearson for statistical analysis.

**Baseline Characteristics**

<table>
<thead>
<tr>
<th></th>
<th>Age</th>
<th>BMI</th>
<th>Triglycerides</th>
</tr>
</thead>
<tbody>
<tr>
<td>Normal</td>
<td>33,5 ± 6,2</td>
<td>22,7 ± 1,1</td>
<td>164 ± 71</td>
</tr>
<tr>
<td>Overweight</td>
<td>32,9 ± 5,5</td>
<td>27,5 ± 1,5</td>
<td>189 ± 71</td>
</tr>
<tr>
<td>Obese</td>
<td>33,9 ± 9</td>
<td>35,1 ± 4,9</td>
<td>191 ± 70</td>
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</tbody>
</table>

*P<0,009 Anova

**Insulin Requirement**

- **Normal**
- **Overweight**
- **Obesity**

*P 0,08

**Conclusion**

- In this study, 79,1% of the patients diagnosed with gestational diabetes were overweight or obese.
- Among the patients with normal range, only 25% needed insulinization, for glycemic control, while 40-50% of the patients with overweight or obesity needed insulinization, determining a worst prognosis for mother and newborn.