COST MINIMIZATION STUDY: SWITCH VIAL TO PEN IN GERIATRICS

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BACKGROUND
Insulin glargine (original drug and biosimilar) is on the market in vial or pen presentations with different costs. The biosimilar drug is less expensive than original drug.

PURPOSE
- Evaluate the incremental cost for changing insulin glargine (IG) vial by (original and biosimilar IG) pen over a 1 year period
- Evaluate the nurses implementation acceptability in geriatric wards.

MATERIALS AND METHODS
Data was retrospectively collected over a one-year period in Geriatrics:
- IG prescription (number of UI per patient and IG vial consumption)
- Costs

Nurses answered a survey in each geriatric ward to make an inventory of practices and to assess the acceptability of replacing vials with pens.

Comparison of security and ease of use of vial and pen with scale (0 to 10)

RESULTS
- 353 patient were included with 108 vials prescription

Equivalent number and price of vials prescription in pen

<table>
<thead>
<tr>
<th>Price</th>
<th>Number</th>
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<tbody>
<tr>
<td>2700€</td>
<td>108</td>
</tr>
<tr>
<td>775€</td>
<td>408</td>
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On 18 responses to the survey, 6 nurses do not want to use the pens for various reasons:
- « too many pens in the ward »
- « waste »
- « no visibility on the quantity injected »

The pens have a best security assessment (mean score difference =1.94, p=0.014) and ease of use assessment (mean score difference =3.05, p=0.007) than vials.

55% of nurses think by mistake than pen is more expensive than vial.

CONCLUSION
- Using IG pens rather than vials and biosimilar prescription would be cost saving.
- Nurses are ready to accept replacing vials with pens.