Birth Type and Ewe Age on Milk Yield of Local sheep at Jonggol Animal Science Teaching and Research Unit

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Local sheep → Jonggol.

Local sheeps have many desirable characters adapted to low quality vegetation and to withstand seasonal shortages of food and water during dry season.
Many Researches → dairy sheep → milk yield.
Sheep used → local sheep (Jonggol).
Local sheep → milk yield → mortality → meat production
LEISA model → extensive management → was not very hard to raise in practices.
The Objective

The objective of the research is to study the effect of age and birth type on milk yield.

Purpose → data base and increase sheep production → meat production also.
Jonggol Animal Science Teaching and Research Unit / JASTRU (UP3J)

fillType:

- Jonggol area ➔ 169 ha ➔ dry condition, low quality vegetation
Material

- The Local Sheep (Jonggol) → Thin Tail Javanese Sheep X Garut Sheep (natural).
- The total number ewe = 92 head
- 78 single births (I₁ = 9 heads, I₂ = 18 heads, I₃ = 16 heads, I₄ = 35 heads).
- 14 twins (I₁ = 3 heads, I₂ = 3 heads, I₃ = 1 head, I₄ = 7 heads).
Method

- Lamb suckling weight differences → calculate milk yield.
- Lamb → fasting treatment → 6 hours
- Time Schedule → 05.00 am, 11.00 am, 05.00 pm and at 11.00 pm
- Data analysis → Factorial design 2 x 2 → t-student
### Results & Discussion

#### Local Sheep (n = 92 ewes) vs Priangan

<table>
<thead>
<tr>
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</thead>
<tbody>
<tr>
<td>Litter Size</td>
<td>1.15</td>
<td>1.28</td>
<td>1.40</td>
</tr>
<tr>
<td>Average Milk Yield (kg/ewe/day)</td>
<td>1.42 ± 0.29</td>
<td>0.65 ± 0.03</td>
<td>1.42 ± 0.53</td>
</tr>
<tr>
<td>Declining Rate (%)</td>
<td>4.89</td>
<td>-</td>
<td>-</td>
</tr>
</tbody>
</table>
Results & Discussion

Milk Yield (g/ewe/6h) vs. Days of Postpartum

$y = -4.23x + 482.30$
Results & Discussion

<table>
<thead>
<tr>
<th>Birth Type</th>
<th>Average of Milk Yield (kg/ewe/day)</th>
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</thead>
<tbody>
<tr>
<td>Single</td>
<td>1.38 ± 0.26^a</td>
</tr>
<tr>
<td>Twin</td>
<td>1.66 ± 0.51^b</td>
</tr>
</tbody>
</table>
Results & Discussion

The graph illustrates the milk yield (g/ewe/6h) over the days of postpartum for single and twin births.

- **Single**: The milk yield decreases gradually over the days of postpartum, with a slight fluctuation in the middle range.
- **Twin**: The milk yield also decreases over the days, with a more pronounced drop compared to single births, especially in the later days.

The graph shows that twin births have a lower milk yield compared to single births, especially as the days of postpartum increase.
## Results & Discussion

<table>
<thead>
<tr>
<th>Age</th>
<th>Average of Milk Yield (kg/ewe/day)</th>
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</thead>
<tbody>
<tr>
<td>$I_1$</td>
<td>$1.02 \pm 0.19^a$</td>
</tr>
<tr>
<td>$I_2$</td>
<td>$1.29 \pm 0.22^{ab}$</td>
</tr>
<tr>
<td>$I_3$</td>
<td>$1.77 \pm 0.41^c$</td>
</tr>
<tr>
<td>$I_4$</td>
<td>$1.45 \pm 0.34^b$</td>
</tr>
</tbody>
</table>
Results & Discussion

![Graph showing milk yield over days of postpartum](image)

- **Milk Yield (g/ewe/6h)**
- **Days of Postpartum**

Legend:
- I1
- I2
- I3
- I4
Age of ewe and birth type have a real effect on milk yield.

Raising under extensive management → model LEISA → not sufficient feed but quiet high on milk yield.
Thanks For Your Attention