THE UNITED REPUBLIC OF TANZANIA MINISTRY OF LIVESTOCK AND FISHERIES

DEPARTMENT OF GRAZING LAND AND ANIMAL FEED RESOURCES
VIKUGE PASTURE SEED FARM

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About the Farm

- It is in Vikuge village, 5km from Soga station (SGR) and 6km from Kongowe mainroad, Kibaha District in Coast region
- The farm is 515Ha big, 325Ha on production, 15Ha office buildings and other infrastructure
- 175Ha is an area which is potential for expansion

Objectives of the Farm

- To produce and sell pasture seeds to livestock farmers
- To produce and sell animal feed (hay) to livestock keepers
- To train farmers and other livestock stakeholders on establishment and management of pasture farms in order to avoid conflict between livestock keepers and other land users

Juncao grass

One of fodder grass introduced at Vikuge pasture seed farm

- We received about 1,114pcs Juncao cuttings in different time from 10th May 2021
- Out of the 400pcs cuttings received in the first batch 100pcs were planted to be studied in comparison with Napier
- All cuttings were planted on the land of about 0.06acre at 1*1 spacing
- Irrigation was inevitable as it was during the dry season
- Germination started at about 1 week
- At 3 week the germination was 78% (22 cuttings died)
- On the other hand we planted 100pcs of Napier cuttings. In 3 weeks the germination was 83% (17 cuttings died)

Planting techn

■ Material used

cuttings

■ Fertilizer

Plant origin

Spøcing

1M*1M

Irrigation

Tape water

Juncao vs Napier after planting, two aspects used to compare the grass **Physical aspect**

Napier

- Germination at three weeks 83%
- Low growth rage
- Narrow leaves with rough surface
- Less leaves per stem
- Grow vertical curved

Juncao

- Germination at three weeks 78%
- High growth rate
- Wider and smooth leave surface
- More leaves per stem
- Grow straight vertically

Growth rate

Napier

Seven weeks Napier



Juncao

Seven weeks Juncao



Number of tillers

Napier (9months 10 tillers)



Juncao (9months, 19 tillers)



Amount and shape of leaves

Napier



Juncao



Juncao vs Napier Chemical aspect

Napier vs Juncao (at 2months age)

| Nutrient | Napier | Juncao |
|----------------------|-----------------|-----------------|
| Crude protein | 1.8% | 2.6% |
| Dry matter | 20.4% | 22% |
| Crude fiber | 7.1% | 8.3% |
| Metabolisable energy | 11.8MJ/ KgDM | 11.9MJ/Kg DM |

Napier vs Juncao (at 5months

| Nutrient | Napier | Juncao |
|----------------------|--------|-----------------|
| Crude protein | | 7.4% |
| Dry matter | | 95.7% |
| Crude fiber | | 44.3% |
| Metabolisable energy | | 12.9MJ/Kg DM |

Juncao vs Napier (at 9 months)

| Nutrient | Napier | Juncao |
|----------------------|--------|--------|
| Crude protein | 6.5% | 6.7% |
| Dry matter | 95.4% | 95.6% |
| Crude fiber | 46.3% | 46.7 |
| Metabolisable energy | | |

Seed production (cuttings)

By march 2022 we have already harvested 212 Kg of seed and distributed to 8 farmers around Coast region, Dar es salaam and Dodoma.