Grasses

*Paspalum atratum*

Recommended variety:
‘Terenos’

- tall grass for cutting
- grows well on infertile, acid soil
- wet tropics with short or no dry season
- can tolerate some waterlogging
- very leafy

*but*

- not suited to long dry seasons

‘Terenos’ is a tall bunch grass with broad leaves. It is very leafy and palatable when growing in good conditions. ‘Terenos’ can become coarse and unpalatable during dry periods. It produces large quantities of seed in most areas except those close to the equator.

It is a good choice for moderately fertile and infertile soils in the wet tropics. It is particularly useful for soils that are occasionally waterlogged. ‘Terenos’ can survive in areas with a long dry season but will not grow well. It grows well in cooler areas (eg. high elevation) where it tolerates some dry periods.
Farmers often like 'Terenos' because it is easy to cut and has fast regrowth. It can also be grazed.

It can be planted from seed, but is also easily propagated using rooted tillers.

Note: A related species is Paspalum guenoarum 'Bela Vista' (see 'Other potentially useful forages').
Grasses

Pennisetum purpureum and hybrids

Recommended varieties:
‘Napier’
(local varieties of *P. purpureum*)
‘Mott’
(*P. purpureum* cv. Mott)
‘King’
(*P. purpureum* x *P. glaucum* hybrid)

* • very tall grasses for cut & carry
• highest yielding species with high soil fertility and irrigation
• high quality feed

*but*

* • will not persist without fertilising
• not suited to long dry seasons
• becomes stemmy if not cut frequently

*Pennisetum purpureum* and the hybrid (*P. purpureum* x *P. glaucum*) are very tall grasses which are well suited to cutting. ‘King’ is taller, leafier and more productive than ‘Napier’ or ‘Mott’ in soils of high fertility, but is less robust and persistent under declining fertility or during dry periods.

‘Mott’ (sometimes called ‘dwarf napier’) has many more tillers and is leafier than ‘Napier’. ‘Mott’ is better suited to planting in hedgerows than other *Pennisetum* varieties, although all *Pennisetum* varieties need a lot of nutrients and tend to compete with nearby crops.
Pennisetum species are potentially the most productive grasses available, but do not tolerate low fertility or dry conditions. They are best suited to fertile soils in areas with high rainfall and only a short dry season.

Fertiliser or manure must be added regularly to maintain productivity. Many farmers grow these species close to the animal shed to make it easier to apply manure.

They must be cut frequently to remain leafy. If the plants are allowed to grow tall, they produce a lot of unpalatable stem.

They can easily be planted from stem cuttings.

1. ‘King’ grass in the early dry season in Indonesia (JH)
2. ‘Napier’ grass for cut & carry in Thailand (JH)
3. Pennisetum varieties can be leafy when cut often (JH)
4. They have very high yields but get very stemmy if not cut frequently (JH)
5. Using ‘King’ grass as a fence around a chicken pen in Indonesia (WS)
6. Pennisetum varieties need manure or fertiliser for good growth (JH)
Grasses

*Setaria sphacelata*

Recommended varieties:
‘Lampung’
(*S. sphacelata var. splendida*)
‘Solander’
(cv. Solander)

- erect grass for cutting
- soft and palatable leaves
- can survive in poor soils
- can tolerate waterlogging for short periods
- grows well in cool areas

*but*

- needs good moisture and soil fertility for high production
- some leaf disease in the humid tropics
- should not be fed to horses

*Setaria sphacelata* is an erect, perennial grass of medium height. It has soft, palatable leaves and young stems. It can be recognized by the grey-green colour of its leaves. It is suitable for cutting, although it can be lightly grazed.

‘Lampung’ does not produce seed and has to be propagated vegetatively. ‘Lampung’ is best suited to the wet tropics with a short dry season. Leaf diseases can occur in very wet conditions.

‘Solander’ produces seed and is better suited to cooler conditions (eg. high elevations) than ‘Lampung’. Although both varieties will survive in infertile soils, they need moderately fertile soils for good growth. They are able to withstand several days of waterlogging.
Setaria should not be fed to horses (see Section 3, Special Considerations).

Both varieties are easily propagated by rooted tillers.

Note:
‘Kazungula’ (*S. sphacelata* cv. Kazungula in Australia) is another variety of this species which can sometimes be found in Southeast Asia. It is lower growing than ‘Lampung’ or ‘Solander’ and is more suited to grazing. ‘Splenda’ (*S. sphacelata* cv. Splenda in Australia) is a seed-producing variety similar to ‘Lampung’.

1. ‘Splendida’ used for hedgerows in the Philippines (WS)
2. Setaria varieties have a flattened stem at the base and blue-green leaves (JH)
3. ‘Solander’ produces seed while ‘Splendida’ does not (JH)
4. ‘Splendida’ is easy to cut (WS)
5. They are easy to plant from rooted cuttings (JH)