

Viand^ϕ growing guide

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Viand^ϕ is a semi-dwarf medium grain variety that is shorter in growth duration than our current medium grain varieties.

Yield potential

The yield potential of Viand^ϕ is 95% of Reiziq^ϕ.

Table 1. Grain yield of Viand^ϕ from research experiments and commercial fields

Variety	2 year experiment average yields (t/ha)	2 year grower average yields (t/ha)	Top 20% of growers 2 year average yield (t/ha)
Viand ^ϕ	11.3	9.5	11.9

Establishment vigour

Experiments show Viand^ϕ to have strong establishment vigour.

Sowing method and date

It is recommended that Viand^ϕ be drill sown. Aerial and dry broadcast crops are more prone to lodging than drill-sown crops (see Primefact 1561: Lodging in rice).

Viand^ϕ is 10 days earlier to flower than Reiziq^ϕ and therefore needs to be sown later (Table 2) for microspore to occur during the period with the highest probability of warm temperatures.

Viand^ϕ is not recommended for December sowing, delayed maturity will result in a late harvest. Do not delay permanent water if sowing later than the recommended sowing window as this will slow crop development and increase the risk of a late harvest.

Table 2. Target first flush dates for Viand^ϕ across different management methods and regions

Variety	MIA/CIA - Ideal sow/first flush time		Murray Valley – Ideal sow/first flush time	
	Drill	Delayed permanent water	Drill	Delayed permanent water
	Viand ^ϕ	5 to 25 Nov	1 to 20 Nov	1 to 20 Nov

Sowing rate

It is recommended that Viand[Ⓛ] be sown between 110 and 130 kg/ha. The lower rate can be used in reliable establishment conditions without compromising yield.

Cold tolerance

Viand[Ⓛ] has a moderately high tolerance to cold stress during the reproductive period.

Plant height

Viand[Ⓛ] is 4 cm taller than Reiziq[Ⓛ].

Lodging potential

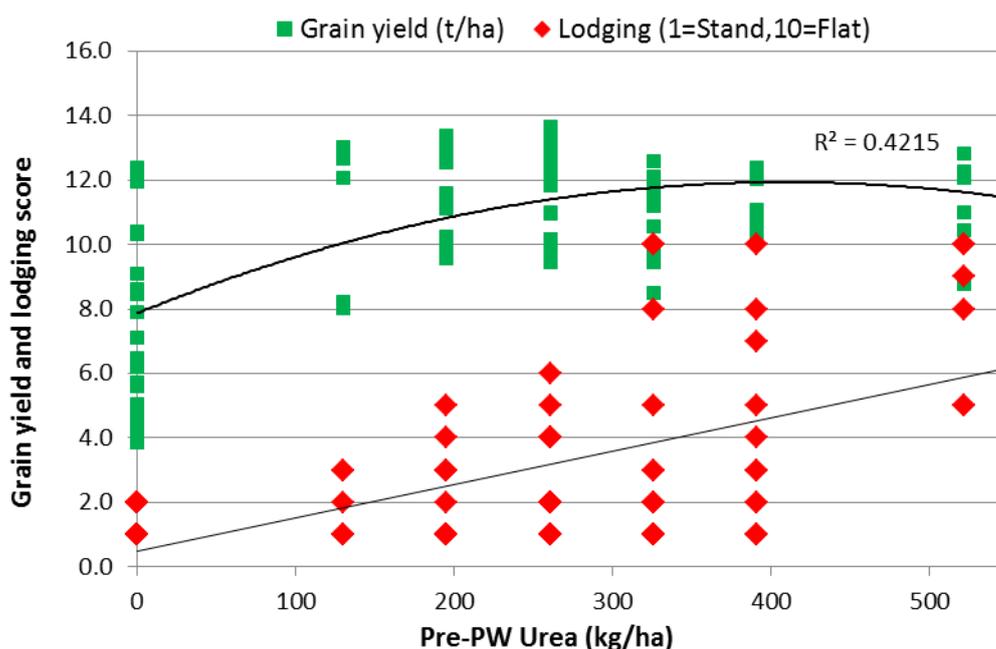
Viand[Ⓛ] is moderately susceptible to lodging.

Nitrogen management

Viand[Ⓛ] has similar nitrogen requirements to Reiziq[Ⓛ] to reach its maximum yield potential, however it requires different timing of the nitrogen inputs. Applying more nitrogen than is needed by the crop, either prior to permanent water (PW) (Figure 1) or at panicle initiation (PI), will increase lodging and delay harvest.

It is recommended to only apply between **150 and 250 kg/ha urea** to Viand[Ⓛ] pre-PW to reduce lodging potential. Some fields with a history of legumes may require less nitrogen pre-PW and some continuous crop fields with heavy clay soils may require more nitrogen.

Figure 1. Grain yield and lodging score results for pre-PW nitrogen application rates. Results from 149 plots in 10 experiments conducted over 3 seasons and a range of soil types and fertility levels.



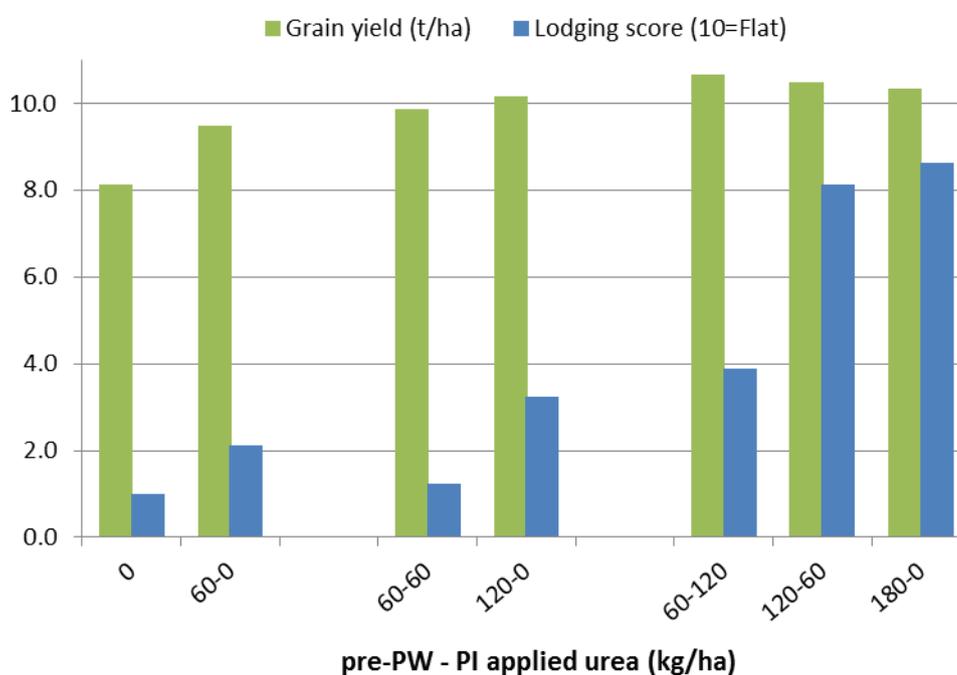
Panicle initiation nitrogen

Viand[®] produces a high grain yield with less lodging when nitrogen is split between pre-PW and PI. An experiment at Jerilderie in 2017/18 season showed the 60-60, 120-0 and 60-120 kg/ha urea treatments all produced a high grain yield with minimal lodging (Figure 2).

Viand[®] nitrogen applications should be **split 70:30 between pre-PW and PI** to reduce lodging risk. Viand[®] produces a high grain yield with less lodging and reduced cold susceptibility when nitrogen is split between pre-PW and PI.

For maximum grain yield with reduced lodging it is important to use the NIR Tissue Test to determine PI topdressing rates, as high rates of nitrogen at PI can also increase lodging.

Figure 2. Grain yield and lodging score results from Viand[®] nitrogen rate by timing experiment conducted at Jerilderie in 2017/18. The green bars are grain yield (t/ha @ 14%) and the blue bars are the lodging score (1=standing, 10=flat) for the range on nitrogen treatments applied pre-PW and at PI.



Harvest

Be prepared to commence harvest as soon as the grain moisture drops to 22%. Delaying harvest will increase the risk of lodging which can cause difficult harvesting conditions.

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