



SOJABOON KULTIVARAANBEVELINGS SOYBEAN CULTIVAR RECOMMENDATIONS

2017/2018

AS de Beer & L Bronkhorst

LNR-Graangewasse, Potchefstroom

ARC-Grain Crops, Potchefstroom

Hoewel sojabone 'n gewas is wat bykans wêreldwyd verbou word, het individuele kultivars 'n beperkte gebiedsaanpassing. Gevolglik sal die kultivar wat die beste aangepas is vir 'n gegewe lokaliteit, dié een wees wat oor 'n aantal jare die hoogste opbrengs en saadkwaliteit lewer. Onder vergelykbare omgewingstoestande en produksiepraktyke kan 'n seleksie uit kultivars gemaak word wat 'n hoë opbrengs en 'n bo gemiddelde opbrengswaarskynlikheid het. Die Nasionale Sojaboontkultivarproewe van die LNR-Graangewasse en verskeie medewerkers lewer in die opsig waardevolle inligting ten opsigte van verskillende produksie areas in Suid-Afrika.

BELANGRIKE INLIGTING VIR KULTIVARKEUSE

Die belangrikste inligting wat in ag geneem moet word ten opsigte van kultivarkeuse by sojabone, is **lengte van groeiseisoen**. Anders as by die meeste algemeen verboude gewasse, is sojabone gevoelig vir daglengte en sal 'n gegewe kultivar al hoe later ryp word

Although soybeans as a crop are grown worldwide, individual cultivars demonstrates a limited adaptation to specific geographical areas. The best adapted cultivar is therefore the one that will, in the long term, give the best yield and quality for a specific locality within a specific geographical area. A selection can be made of cultivars with high yield and above average yield probability under comparable environmental conditions as well as production practises. The National Soybean Cultivar Trials conducted by the ARC-Grain Crops and several collaborators render a valuable service in identifying such cultivars for different production areas in South Africa.

IMPORTANT INFORMATION FOR CULTIVAR CHOICE

The **length of the growing season** is the most important characteristic to take into consideration in terms of cultivar choice for soybean. Unlike the other most commonly cultivated crops, soybean are sensitive to day length and a given cultivar will ripen later and result in a longer growing season the further

hoe verder suid dit in Suider Afrika geplant word. Vir dieselfde rede sal plantdatum ook die lengte van die groeiseisoen beïnvloed en sal 'n gegewe kultivar heelwat gouer blom by 'n later plantdatum. Heersende temperatuur (veral nag-temperatuur) het ook 'n invloed en sojabone groei heelwat stadiger op die hoëveld, vergeleke met die warmer laeveld. Tabel 1 illustreer die invloed wat die lengte van groeiseisoene het ten opsigte van die verskillende kultivars asook vir 'n spesifieke kultivar in verskillende produksiegebiede. Dit is belangrik om te onthou dat vroeë en later plantdatums binne dieselfde gebied ook die groeiseisoenlengte van 'n kultivar beïnvloed.

Vir produsente met ondervinding van sojaboonproduksie kan die gevoeligheid vir daglengte en die genetiese variasie vir relatiewe groeiseisoenlengte, met vrug gebruik word vir byvoorbeeld hooiproduksie (gebruik van lang groeiseisoen kultivars), stroopskedulering (plant kultivars met verskillende rypword datums) en vir droogte-ontwyking of noodaanplantings (kultivars met 'n relatief kort groeiseisoen). Vir produsente wat nie ondervinding het van sojaboonproduksie nie, kan dié eienskap ook by wyse van verkeerde kultivarkeuse tot gevolg hê dat die sojabone, a) nie wil ryp word nie in die geval van waar 'n kultivar met 'n te lang groeiseisoen in die gebied aangeplant is, b) reeds oesgereed is terwyl reën en hoë temperature stroop bemoeilik en kwaliteit benadeel waar 'n kultivar met 'n te kort groeiseisoen vir 'n gebied gekies is en c) onstroopbaar is as gevolg van 'n te lae peulhoogte.

Prosedure vir kultivarkeuse op grond van groeiseisoenlengte is dan as volg: Die lokaliteite waar sojaboonkultivarproewe uitgevoer is, is gegroepeer om warm-, matig- en koel gebiede aan te dui (Tabel 2). Wanneer daar 'n kultivar keuse gemaak word is dit belangrik om die gebied te identifiseer wat dieselfde klimaatstoestand het en dan die tabelle te gebruik wat dieselfde klimaatstreek verteenwoordig. Risiko kan geminimaliseer word wanneer Tabel 1 en 3 gebruik word. As algemene reël word aanvaar dat kultivars met 'n langer groeiseisoen die beste sal doen in gebiede met 'n warmer klimaat, medium

south it is planted in Southern Africa. Planting dates will therefore also influence the length of the growing season and a given cultivar will flower much earlier should it be planted at a later planting date. Prevailing temperature also has an effect, with soybean growing much slower on the Highveld compared to the warmer Lowveld. Table 1 illustrates the substantial variation for length of growing season among cultivars as well as for the different production areas.

Producers well experienced in soybean cultivation can utilize the photoperiod sensitivity of soybean, along with the genetic variation for relative length of the growing season with great success, for example, for hay production (a long growing season cultivar can be used), for scheduling of harvesting (plant cultivars with different ripening dates) and for drought avoidance or emergency planting (use relatively short growing season cultivars). For producers with little or no experience in soybean cultivation, this characteristic could prove to be hazardous when the wrong cultivar choice is made and optimal yield is not realised because a) the cultivar does not ripen where a too long grower has been planted for the area, b) is ready for harvesting while rain and high temperatures hamper harvesting and adversely affect quality where a too short grower has been planted for the area, and c) the cultivar is unable to be harvested because of a too low pod height.

Procedure for Cultivar choice using length of growing season: Localities where soybean trials were conducted during the past season were divided into warm-, moderate- and cool production areas (Table 2). When cultivar selections is been done it is important to establish which localities has the same climate conditions and to use these Tables representing the same region. Risk can be minimised if Tables 1 and 3 are utilised. It is generally accepted that cultivars with a longer growing season will perform better in the warmer growing areas, cultivars with a medium growing season in the moderate growing areas and cultivars with a shorter growing season in the cooler production areas. There are however exceptions to the rule and it is therefore recommended to also

groeiseisoen kultivars in gebiede met 'n gematigde klimaat en korter groeiseisoen kultivars in gebiede met 'n koeler klimaat. Dit is egter belangrik om te onthou dat daar ook uitsonderings op die reël is en daarom word aanbeveel dat sowel opbrengs en aanpassingsvermoë van kultivars soos aangedui in Tabela 4, 5, 6, 7, 8 and 9 saam met groeiseisoenlengte gebruik sal word om 'n meer akkurate kultivarkeuse vir 'n spesifieke gebied te maak.

Plantdatum beïnvloed sojabone se aanpassing en gevolglik kultivarkeuse. Die optimale plantdatum is vanaf mid Oktober en November. In warmer gebiede kan produsente egter tot Desember nog plant, maar dan word nouer rywydte, hoër plantpopulasie en 'n vinniger-groeiende kultivar aanbeveel. Waar grond- en lugtemperatuur aanvaarbare vlakke vroeg in die seisoen bereik, word 'n Oktober plantdatum, veral op die hoërliggende gebiede aanbeveel. Dit is belangrik om te onthou dat 'n vroeër of 'n later plantdatum in al die produksiegebiede kultivarkeuse kan beïnvloed.

Peul- en planthoogte beïnvloed die stroopbaarheid en die staanvermoë van sojabone en is faktore wat in ag geneem moet word by kultivarkeuse. Oor die algemeen is daar 'n verband tussen peul- en planthoogte en relatiewe lengte van die groeiseisoen. Relatief kort groeiseisoenkultivars het gewoonlik 'n laer peul- en planthoogte as langgroeiseisoenkultivars onder vergelykbare toestande. Beide eienskappe word egter ook deur produksiepraktyke beïnvloed. 'n Nouer tussenry- en binnery spasiering sal peulhoogte betekenisvol verhoog. In die Nasionale Kultivarproewe word by gestandaardiseerde toestande vir peulhoogte geëvalueer en kan kultivars met aanvaarbare peulhoogtes gekies word. Peulhoogte word aangedui in Tabel 3.

Staanvermoë kan beïnvloed word deur die aantal bewolkte dae wat tydens die seisoen voorkom. Dit kan tot gevolg hê dat kultivars wat normaalweg goed staan, hoër groei en dus word die risiko van omval verhoog.

Groeiwyse onderskei tussen bepaalde en onbepaalde groeiers. Kultivars met 'n bepaalde groeiwyse word verkieslik onder be-

use yield performance and cultivar adaptation presented in Tables 4, 5, 6, 7, 8 and 9 in combination with length of growing season during cultivar selection for a specific area.

Planting date influences the adaptation of soybean cultivars and therefore also cultivar choice. The optimum planting date is from mid October and November. In warmer areas though, soybean can be planted until December. With later planting dates narrow rows, higher plant populations and shorter growing season cultivars are recommended. A planting date during October, especially in areas with a higher altitude, will be recommended where soil and air temperatures reach acceptable levels early in the growing season. Planting at an earlier or later planting date will affect cultivar choice.

Pod- and plant height have an impact on the ability to harvest the crop, and are characteristics that should be taken into account during deciding on what cultivar to plant. A relationship exists between pod- and plant height and relative length of the growing season. Cultivars with a shorter growing season tend to have lower plant- and pod heights compared to longer growing season cultivars under similar growing conditions. Both characteristics are also influenced by production practices. More narrow inter- and intra-row spacing will increase pod height significantly. Pod clearance for the cultivars evaluated is reported in Table 3.

Standability is influenced by the number of overcast days experienced during the growing season. Plant height tends to increase when overcast weather occurs and could result in a higher lodging percentage of plants.

Growth habit distinguishes between determinate and indeterminate genotypes. Cultivars with a determinate growth habit are preferably planted under irrigation, while indeterminate cultivars (that do not stop vertical growth during flowering) are preferred under dry land conditions. Growth habit for registered cultivars is indicated in Table 3.

Row width will also influence cultivar selection, since a significant relation exists

sproeiing geplant, terwyl kultivars met 'n onbepaalde groeiwyse (wat nie lengtegroei tydens blom staak nie) onder droëland-toestande verkies word. Die groeiwyse van die kultivars word in Tabel 3 aangedui.

Rywydte kan ook kultivarkeuse beïnvloed aangesien 'n betekenisvolle interaksie tussen die twee bestaan. Kultivars wat geneig is tot sytakvorming en 'n digte blaredak het, is beter aangepas in wye rye, terwyl kultivars met 'n oop blaredak en min sytakke, beter aangepas is by relatief nouer rywydtes.

Weerstand teen oopspring van peule kan 'n belangrike rol speel tydens ongunstige toestande gedurende die oes van sojabone

Volgens inligting uit die Nasionale Kultivarproewe is dit duidelik dat relatief kort groeiseisoenkultivars die grootste risiko vir oopspring het, terwyl relatief lang groeiseisoenkultivars die minste daardeur geraak word. 'n Aanduiding ten opsigte van genetiese weerstand tussen kultivars van dieselfde groeiseisoenlengte wat oopspring aanbetref, kon egter nie verkry word nie. Kultivars word geëvalueer op 'n skaal van 1 (goed) tot 5 (swak) wat oopspring aanbetref en die resultate word in Tabel 3 aangebied.

Gevoeligheid vir onkruidodder kan in sommige gevalle kultivarkeuse beïnvloed. Geen sojaboonkultivar is bestand teen atrasien-tipe onkruidodders nie en die volle wagperiode moet nagekom word voordat die plant van sojabone oorweeg word. Sojabone is ook sensitief vir onkruidodders in die Triketone groep en wagperiodes moet streng nagevolg word. In alle gevalle moet seker gemaak word dat aanwysings op die onkruidodderetiket voorsiening maak vir die kultivar wat aangeplant gaan word.

Saadgrootte, hilumkleur, proteïengehalte en GMO-status is eienskappe waarop 'n premieprys moontlik betaal kan word. Saadgrootte is geneties, maar word sterk beïnvloed deur omgewingstoestande. Gunstige toestande tydens die saadvulperiode sal saadgrootte positief beïnvloed.

Proteïeninhoud van die saad is ook geneties maar kan nadelig beïnvloed word deur

between cultivars and row width. Cultivars with more side branches and leaves are better adapted to wider rows, while cultivars with less side branches and leaves are better adapted to more narrow rows.

Resistance against seed shattering can play an important role during unfavourable harvesting conditions. Information obtained during the National Soybean Cultivar Trials indicates that cultivars with a relative short growing period tend to shatter more than cultivars with a longer growing period.

Rating of cultivars in terms of their susceptibility to shattering are done on a scale from 1 (good) to 5 (poor) and are presented in Table 3.

Sensitivity to herbicides can, in some cases, influence the choice of a cultivar. No soybean is resistant to atrazine type herbicides and the full waiting period have to be maintained before the planting of soybean can be considered. Soybean is also sensitive to herbicides in the Triketone group and waiting periods should be strictly adhere to. Ensure, in any case, that the herbicide can be used with the selected cultivar as indicated on the herbicide label.

Seed size, hilum colour, protein qualities and GMO status are characteristics that can possibly earn a premium price. Seed size is genetically regulated, but is greatly influenced by the environmental conditions. Favourable conditions during the seed filling period will positively influence seed size. The protein content of soybean seed is also genetically regulated and can be adversely affected by environmental conditions (rainfall, temperature, stress) and crops management (poor or no nodulating, acidic soil and low soil fertility). Protein contents of soybean seed below 36% are unsatisfactory, while that above 40%, on a moisture free basis, is regarded as excellent.

The oil – and protein content is usually negatively correlated. An oil content of more than 18% can be regarded as satisfactory.

Seed yield indicates the genetic adaptation and suitability of a cultivar to be planted in a

omgewingstoestande (reënval, temperatuur en stremming) en bestuur (swak of geen nodulering, suur grond en lae grondvrugbaarheid). Proteïeninhoud (vogvrye basis) onder 36% is onbevredigend en bokant 40% is uitstekend wat sojabone aanbetref.

Die olie- en proteïeninhoud is gewoonlik negatief gekorreleer. 'n Olie-inhoud van bo 18% kan as aanvaarbaar beskou word.

Saadopbrengs gee 'n aanduiding van 'n kultivar se genetiese aanpassing en geskiktheid vir 'n bepaalde gebied. Vir die 2016/2017 seisoen is 32 kultivars geplant en geëvalueer en was die data van 17 proewe aanvaarbaar vir statistiese analises. Tabelle 5, 7 en 9 bevat inligting aangaande die opbrengs van die kultivars vir die 2015/2016 en 2016/2017 produksieseisoen op die onderskeie lokaliteite. Gebruik die opbrengsdata saam met die opbrengswaarskynlikheidstabelle om u kultivarkeuse te maak.

Kultivarbeplanning - 'n Waardevolle hulpmiddel by kultivarbeplanning is die opbrengswaarskynlikheid waardes.

Die prosedure wat gevolg word vir die maak van kultivaraanbevelings is kortliks as volg: Eerstens moet vasgestel word vir watter opbrengspotensiaal aanbevelings gemaak word. Die produsent moet homself vergewis van die potensiaal wat ter sprake is. Die tweede stap is om die opbrengswaarskynlikheidstabel te raadpleeg by die vasgestelde potensiaal. Selekteer by die gekose potensiaal daardie kultivars met die bogemiddelde opbrengswaarskynlikheid. Die kultivars met die bogemiddelde waardes behoort vir u die beste kans op 'n stabiele, suksesvolle opbrengs verseker.

Opbrengswaarskynlikheid

Die opbrengswaarskynlikheid van 'n kultivar is die kans om 'n bogemiddelde opbrengs by 'n bepaalde opbrengspotensiaal te behaal. Indien die opbrengswaarskynlikheid van 'n kultivar by 'n bepaalde opbrengspotensiaal byvoorbeeld 60% is, dui dit op 'n 60% kans om 'n bogemiddelde opbrengs te behaal en 'n 40% kans om ondergemiddeld te presteer.

specific area. During the 2016/2017 season 32 cultivars were included in the National Soybean Cultivar Trials, while data of 17 localities were acceptable for statistical analyses. Yield of the cultivars at the different localities for the 2015/2016 and 2016/2017 growing season is presented in Tables 5, 7 and 9.

It is recommended to use the yield results with the yield probability values for a more accurate cultivar choice.

Cultivar planning - A valuable aid in cultivar planning is to also consider the yield probability values.

The procedure to be followed in the making of cultivar recommendations is briefly as follows: Determine for which yield potential recommendations must be made. This must be done by the producer (farmer). The next step is to consult the yield probability table at the determined yield potential. Select at the chosen yield potential those cultivars with the above average probability yield values. The cultivars with the above average values should provide one with the best chance for a stable, successful yield.

Yield probability

The yield probability of a cultivar is the chance to get an above average yield at a particular yield potential. For instance, if the yield probability of a cultivar, at a particular yield potential equals 60%, the chance to get a yield above the mean of all cultivars is 60% with a 40% chance of obtaining a yield below the mean.

Yield probability values of the 18 cultivars for the three production areas (warm, moderate and cool) are presented in Tables 4 & 6 and 8. Tables 4, 6 and 8 contain information regarding cultivars included in the trials for three years. It is also important to use the information provided in Table 2 to determine whether the area to be planted corresponds with the warm, moderate or cool localities. Use the selected yield probability table (warm, moderate or cool) to select cultivars for the yield potential of the specific farm.

Since new cultivars are introduced and some

Die opbrengswaarskynlikheid van die 18 kultivars vir die drie verbouingsgebiede (warm, matig en koud) word in Tabela 4 & 6 en 8 aangebied. Tabela 4, 6 en 8 bevat inligting oor kultivars wat vir onderskeidelik drie jaar in dié proewe ingesluit was. Dit is belangrik dat u die verdeling van lokaliteite in Tabel 2 gebruik om te bepaal in watter gebied u plaas geleë is. Vergelyk dan die kultivars in die opbrengswaarskynlikheid tabel wat u gekies het met mekaar by die realistiese opbrengsmikpunt vir u plaas.

Weens die jaarlikse toevoeging en onttrekking van kultivars, is 'n meerjarige opbrengswaarskynlikheid op slegs 'n beperkte aantal kultivars moontlik.

Tabelle 4, 6 & 8 kan gebruik word om 'n kern seleksie van kultivars te maak. Hierdie kern kan aangevul word met kultivars uit Tabela 5, 7 & 9. Dit is altyd raadsaam om meer as een kultivar te plant en om nuwe kultivars slegs op 'n beperkte skaal in te sluit

removed annually, a multi season yield probability is only possible for a limited number of cultivars.

Tables 4, 6 & 8 can be used to select a core of cultivars. This selection can be expanded with cultivars selected from Tables 5, 7 & 9. It is advisable to grow more than one cultivar and to include new cultivars on a limited scale only.

Variëteitslys verslag November 2016 / Variety list report November 2016

Konvensioneel/Conventional:

Amstel No. 1 (305)	* LS 677 (484)	* PAN 1800 (1412)
Dumela (305)	* LS 678 (484)	* PAN 1867 (1412)
* Dundee (254-3)	Marula (150)	* S 722/6/1E (1137)
* Egret (254-3)	Mopanie (489)	* SC Sorcerer (1526)
* Heron (254-3)	Mukwa (489)	SC Stanza (1526)
* Ibis 2000 (254-3)	* NED 11-91 (65)	Sonop (150)
* Jimmy (254-3)	* Nqutu (254-3)	* Stork (254-3)
Kiaat (489)	NSO-15 (1637)	Tambotie (489)
Knap (150)	Octa (1412)	Wenner (369)
* LS 555 (484)	PAN 1595 (1412)	

Vegetable soybean:

VegsoyBIB105 (1574)	VegSoyYeCo069 (1574)	VegSoyYGP077 (1574)
VegSoyBrBr082 (1574)	VegSoyYeCo070 (1574)	VegSoyYGP083 (1574)

GMO:

* 5302RSF (1708)	* AGC 58007 R (1076)	* LS 6444 R (484)	* PAN 1555 R (1412)	* RA 565 (1670)
---DM 5302RSF	* AGC 64107 R (1076)	* LS 6452 R (484)	* PAN 1583 R (1412)	RA568 (1670)
5351RSF (1708)	* AS 4801 R (1076)	* LS 6453 R (484)	* PAN 1614 R (1412)	RA626 (1670)
---DM 5351RSF	* Don Mario 4670 (1708)	* LS 6466 R (484)	PAN 1616 R (1412)	* RA660 (1670)
* 5609RSF (1708)	* Don Mario 5.1i (1708)	* LS 6851 R (484)	* PAN 1623 R (1412)	* RJS 45002 (411)
---DM 5609RSF	* Don Mario 6.2i (1708)	* LS 6860 R (484)	# PAN 1644 R (1412)	* RJS 46003 (411)
* 5901RSF (1708)	* Don Mario 6.8i (1708)	* LS 6868 (484)	* PAN 1653 R (1412)	* RJS 48006 (411)
---DM 5901RSF	* FN 5.25 (1573)	NS 5009 RG (1421)	* PAN 1664 R (1412)	* RJS 49006 (411)
* 5953RSF (1708)	--- Y 525F	NS 5258 R (1421)	* PAN 1666 R (1412)	* RJS 49012 (411)
* 6.15 F (1573)	* FN 5.75 (1573)	NS 5909 RG (1421)	* PAN 1729 R (1412)	* RJS 50001 (411)
--- Y 615F	--- Y575F	NS 6267 R (1421)	# PAN 1747 R (1412)	* RJS 53001 (411)
6402RSF (1708)	LDC 5.3 (1778)	NS 6448 R (1421)	* PHB 94Y80 R (411)	* RJS 57002 (411)
---DM 6402RSF	LDC 5.9 (1778)	NS 7211 R (1421)	* PHB 95B53 R (411)	* RJS 59001 (411)
* 6663RSF (1708)	LDC 6.0 (1778)	NS 8004 R (1421)	* PHB 95Y01 R (411)	* RM 5500 (1573)
---DM 6663RSF	* LS 6050 R (484)	NS 8009 R (1421)	* PHB 95Y20 R (411)	--- Y 550
* 6968RSF (1708)	* LS 6146 R (484)	* P61T38 R (1412)	* PHB 95Y40 R (411)	RM 5700 (1573)
---DM 6968RSF	* LS 6150 R (484)	* P64T39 R (1412)	* PHB 95Y41 R (411)	RM 6001 (1573)
* 95Y61 (411)	* LS 6161 R (484)	PAN 535 RR (1412)	* PHB 96T06 R (411)	SRM 5200 (1573)
* 95Y80 (411)	* LS 6162 R (484)	* PAN 737 RR (1412)	* RA437 (1670)	* SSS 4945 (tuc) (24)
* A 5409 RG (80)	* LS 6164 R (484)	* PAN 1450 R (1412)	RA516 (1670)	* SSS 5052 (tuc) (24)
*AGC 4134A4R (1076)	* LS 6240 R (484)	* PAN 1454 R (1412)	RA518 (1670)	* SSS 5449 (tuc) (24)
*AGC 5028A4R (1076)	* LS 6248 R (484)	* PAN 1500 R (1412)	* RA556 (1670)	* SSS 5755 (tuc) (24)
*AGC 5028B4R (1076)	* LS 6256(2) R (484)	* PAN 1521 R (1412)	* RA560 (1670)	* SSS 6560 (tuc) (24)
*AGC 5028C4R (1076)	* LS 6261 R (484)	* PAN 1532 R (1412)	* RA563 (1670)	Y 605 (1573)

= Planttelersregte aangevra/Plant Breeders Rights applied for * = Planttelersregte toegeken/Plant Breeders Rights granted
--- Sinoniem/Synonym

Adres lysAddress list:

24 Sensako
65 Adams & Adams
80 Monsanto
150 Buhrman, G
254-3 ARC GCI
305 Vreken, H
369 Borman, G.J.J.

411 Pioneer Hi-Bred RSA
484 Link Seed
489 New Crop
1076 Agriocare
1137 Seed-Co (Pty) Ltd.
1412 Pannar Seed
1421 Klein Karoo Seed Marketing Ltd

1526 Seed Co SA (Pty) Ltd
1573 Southern Hemisphere Seeds
1574 Newlands Mashu
1670 Van Staden Derick
1708 GDM Seeds SA (Pty) Ltd
1778 Louis Dreyfus Commodities SA

2017 / 2018
SOJABOON KULTIVARAANBEVELINGS • SOYBEAN CULTIVAR RECOMMENDATIONS

Tabel 1. Gemiddelde aantal dae tot 50% blom en oesrypheid van kultivars gedurende die 2016/17 groeiseisoen vir warm, matig en koue produksiegebiede.

Table 1. Average number of days to 50 % flowering and harvesting of cultivars during the 2016/17 growing season for warm, moderate and cool production areas.

Kultivar/ Cultivar	Dae tot 50% blom/Days to 50% flowering			Dae tot oes/Days to harvest		
	Warm/Warm ¹	Matig/Moderat ²	Koel/Cool ³	Warm/Warm ⁴	Matig/Moderat ⁵	Koel/Cool ⁶
LS 6240 R	39	45	57	119	135	141
PAN 1454 R	41	44	50	123	136	147
SSS 4945 (tuc)	36	45	53	118	133	144
LS 6146 R	36	45	50	119	132	144
PHB 94 Y 80 R	43	47	52	125	133	144
LS 6248 R	47	57	66	125	141	158
SSS 5449 (tuc)	48	58	69	119	139	157
PHB 95 Y 20 R	47	56	78	129	147	167
DM 5953 RSF	41	48	54	121	132	144
PAN 1532 R	43	58	77	123	142	161
SSS 5052 (tuc)	48	61	76	131	151	169
5609 RSF	46	60	71	126	147	162
PAN 1521 R	46	61	75	128	143	160
5302 RSF	47	58	71	122	138	157
LS 6261 R	48	58	71	124	143	164
SSS 5755 (tuc)	50	62	75	130	149	172
NS 5909 R	50	65	76	132	157	173
LDC 5.9	50	60	77	139	151	173
PHB 96 T 06 R	50	61	86	132	152	169
LDC 6.0	49	63	78	131	151	172
PAN 1623 R	48	61	76	126	145	169
LS 6161 R	48	61	74	130	146	164
P61T38 R	46	63	73	132	154	166
SSS 6560 (tuc)	50	64	75	140	155	171
6663 RSF	53	67	79	133	162	175
LS 6164 R	49	64	74	131	151	166
PAN 1614 R	50	65	78	125	154	171
NS 6448 R	54	66	75	129	150	167
P64T39 R	50	62	77	136	152	174
DM 6.8i RR	51	67	78	142	161	175
6968 RSF	52	64	80	138	161	177
NS 7211 R	49	64	77	132	156	170

¹ - Gemiddeld van 2 lokaliteite / average of 2 localities

³ - Gemiddeld van 6 lokaliteite / average of 6 localities

⁵ - Gemiddeld van 8 lokaliteite / average of 8 localities

² - Gemiddeld van 8 lokaliteite / average of 8 localities

⁴ - Gemiddeld van 2 lokaliteite / average of 2 localities

⁶ - Gemiddeld van 6 lokaliteite / average of 6 localities

Dae tot blom - Gemiddeld 50% van die plante het een blom/Days to flowering – Average of 50% of plants with one flower

Dae tot oes – Gemiddeld van alle peule is volwasse, bros en droog/Days to harvest – Average of pods is mature, brittle and dry

Tabel 2. Groepering van lokaliteite volgens warm, matige en koue produksiegebiede gedurende die 2016/17 groeiseisoen.

Table 2. Grouping of localities according to warm, moderate and cool production areas during the 2016/17 growing season.

Warm/Warm	Matig/Moderate	Koel/Cool
Brits K2 (B/I) NW	Cedara (D) KZN	Bethlehem (B/I)FS
Brits (B/I)NW	Dundee (D) KZN	Clarens (D) FS
	Greytown (D) KZN	Clocolan (D) FS
	Greytown Kranskop (D)KZN	Delmas (D)MP
	Kroonstad (D) FS	Kinross (D)MP
	Potchefstroom (B/I)NW	Middelburg (D)MP
	Potchefstroom(D)NW	
	Stoffberg (D) MP	
	Verkeerdevlei(B/I)FS	

B – Besproeing / I - Irrigation D – Droëland / Dry land

Sleutel/Key: NW– Noordwes/North West FS–Vrystaat/Free state L–Limpopo NC–Noord Kaap/North Cape MP–Mpumalanga KZN–Kwazulu Natal

Tabel 3. Algemene inligting ten opsigte van geregistreerde sojaboonkultivars wat tydens die 2016/17 groeiseisoen geëvalueer is.
Table 3. General information on registered soybean cultivars that were evaluated during the 2016/17 growing season.

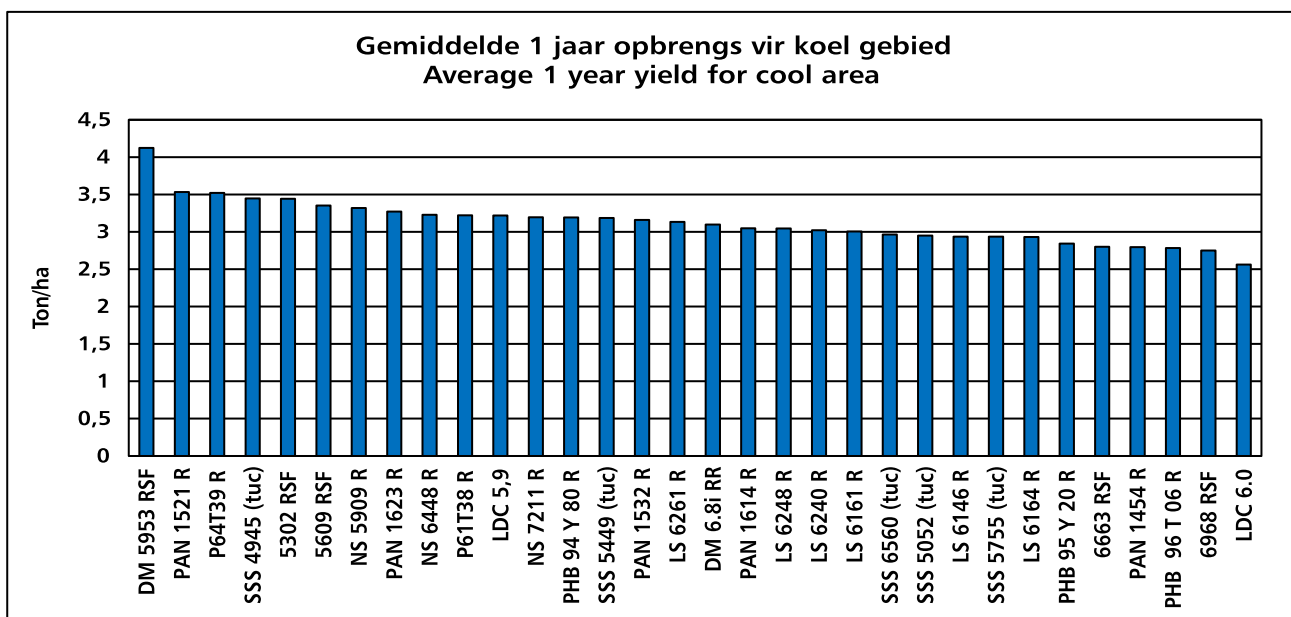
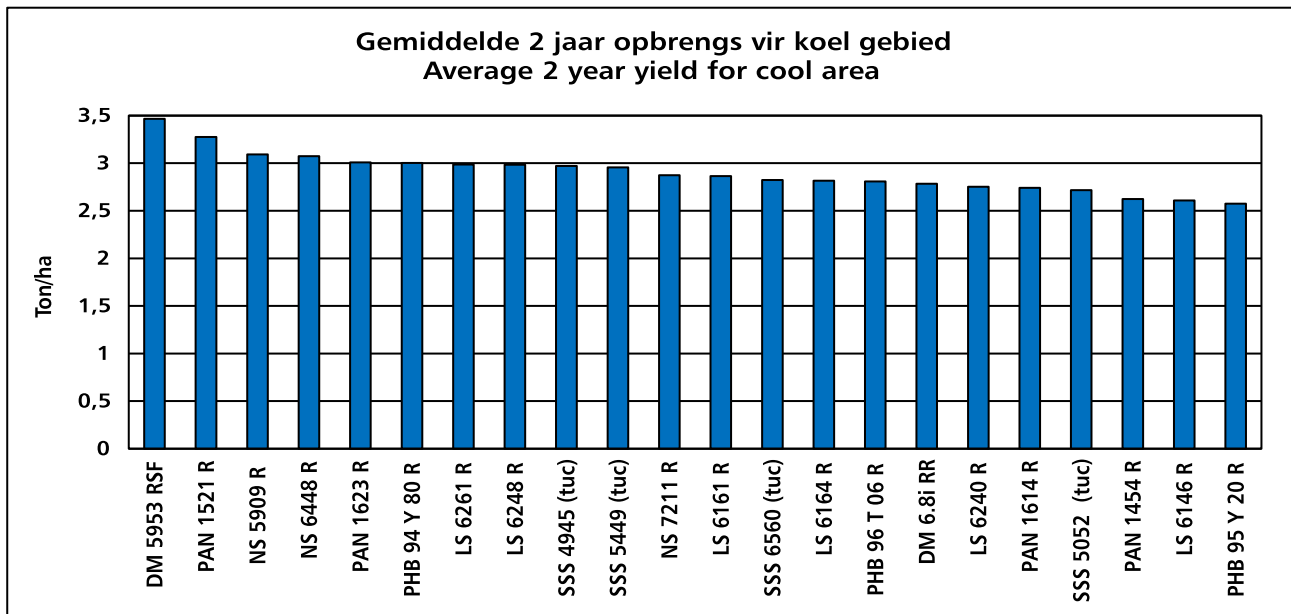
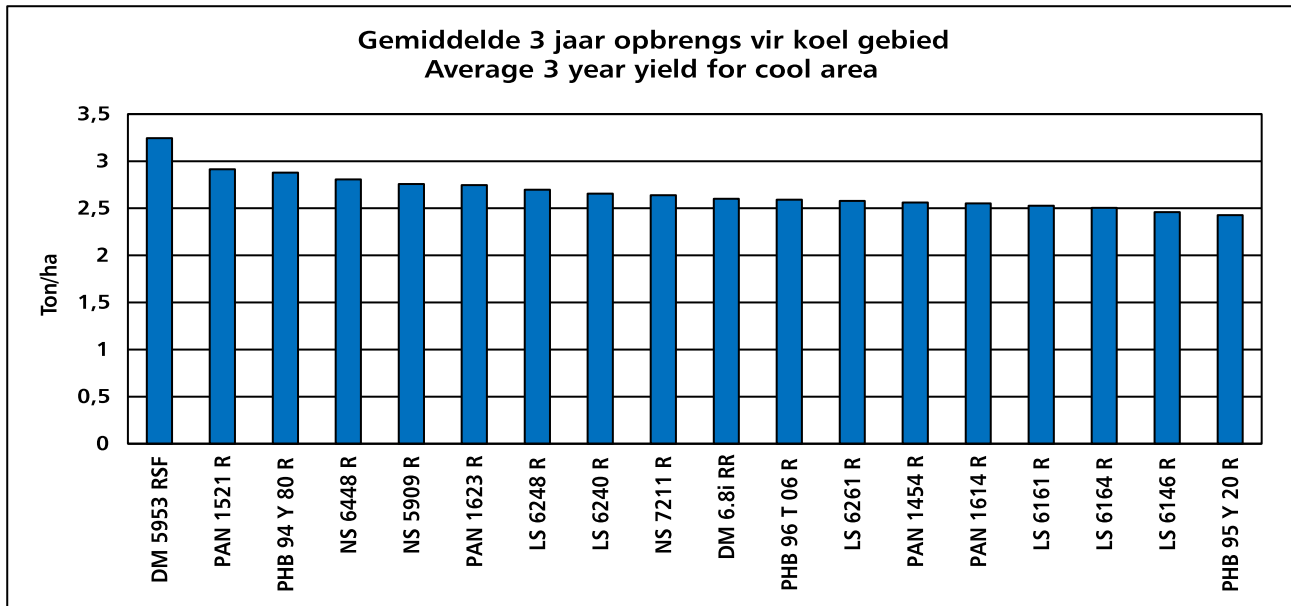
Kultivar/ Cultivar	Volwassen- heidsgroe- -pering/ Maturity -Group	Groei- wyse/ Growth habit ¹	Hilum kleur/ Hilum colour ²	Oliepersentasie/Oil percentage (%)			Proteïenpersentasie/ Protein percentage (%)			Peulhoogte/Pod height			Opspring/Shattering			Verskaffer/ Supplier
				Koel	Matig	Warm	Koel	Matig	Warm	Koel	Matig	Warm	Koel	Matig	Warm	
LS 6240 R	4.0	SD	BL	13.47	13.35	12.90	33.92	34.75	35.67	6	9	6	2.39	1.29	3.00	Link Seed
PAN 1454 R	4.4	I	BL	13.37	12.76	13.45	33.38	34.77	35.46	7	11	7	2.17	1.14	4.00	Pannar
SSS 4945 (tuc)	4.5	SD	-	12.34	12.91	12.35	35.07	35.31	36.31	6	8	5	3.67	1.38	4.00	Sensako
LS 6146 R	4.6	I	BL	11.48	11.03	10.90	34.75	35.75	36.74	7	10	6	2.61	1.57	3.50	Link Seed
PHB 94 Y 80 R	4.8	I	BL	14.37	13.38	11.78	33.39	34.45	36.37	4	8	5	3.17	1.57	4.00	Pioneer
LS 6248 R	4.8	SD	BL	12.52	13.60	13.77	32.88	34.01	35.57	10	15	8	2.28	1.71	4.00	Link Seed
SSS 5449 (tuc)	4.9	I	-	13.35	12.36	12.95	33.83	35.22	36.39	8	13	5	2.28	1.57	4.50	Sensako
PHB 95 Y 20 R	5.2	D	BL	15.23	14.67	13.45	32.23	33.57	35.38	9	15	9	2.00	1.43	3.50	Pioneer
DM 5953 RSF	4.8	I	IB	12.19	11.62	11.66	33.95	35.20	35.78	6	10	8	2.33	1.29	3.00	Agricol
PAN 1532 R	5.3	I	LB	12.58	12.59	14.40	33.86	35.20	34.74	9	10	5	1.17	1.29	2.00	Pannar
SSS 5052 (tuc)	5.5	I	-	13.88	11.96	13.15	33.51	35.06	35.57	11	14	8	1.56	1.57	1.50	Sensako
5609 RSF	5.6	-	-	12.78	11.70	12.53	32.94	34.86	36.11	7	10	5	2.11	1.43	3.50	Agricol
PAN 1521 R	5.7	I	IB	13.37	12.89	13.33	32.45	33.94	35.01	11	14	9	1.72	1.43	1.50	Pannar
5302 RSF	5.7	-	-	15.72	14.25	15.16	32.53	34.22	35.15	7	11	5	2.44	1.43	3.50	Agricol
LS 6261 R	5.8	SD	BL	13.47	13.34	13.38	33.06	34.64	35.37	10	13	8	2.06	1.00	4.50	Link Seed
SSS 5755 (tuc)	5.8	-	-	12.24	11.99	14.00	32.83	34.24	34.55	9	13	6	1.67	1.43	2.00	Sensako
NS 5909 R	5.9	I	IB	13.69	12.69	13.90	33.41	35.24	35.94	11	18	7	2.28	1.43	2.00	K2
LDC 5.9	5.9	-	-	14.13	13.20	12.83	32.64	34.44	35.26	9	14	8	1.50	1.14	1.00	Louis Dreyfus
PHB 96 T 06 R	6.1	I	KL	12.42	11.61	15.64	34.11	35.36	34.16	10	14	6	1.22	1.29	2.00	Pioneer
LDC 6.0	6.0	-	-	15.40	13.10	15.01	31.74	34.17	34.79	6	11	6	1.78	1.43	2.00	Louis Dreyfus
PAN 1623 R	6.1	I	KL	14.50	14.37	14.11	33.25	34.51	35.45	9	14	6	1.56	1.00	1.50	Pannar
LS 6161 R	6.1	D	IB	12.95	12.28	15.53	33.40	34.75	34.13	10	15	9	2.28	2.33	4.00	Link Seed
P61T38 R	6.1	D	KL	14.10	13.79	15.08	33.28	34.44	34.75	9	16	9	1.28	1.14	1.50	Pioneer
SSS 6560 (tuc)	6.2	I	-	13.02	12.85	14.93	33.29	34.21	34.49	10	13	7	1.64	1.57	2.00	Sensako
6663 RSF	6.3	-	-	14.40	13.25	16.00	32.35	33.61	32.41	9	15	7	1.28	1.29	2.50	Agricol
LS 6164 R	6.4	D	LB	14.03	12.98	15.21	32.73	34.76	34.20	9	18	9	2.28	1.38	3.50	Link Seed
PAN 1614 R	6.4	I	LB	15.05	13.54	14.21	32.86	34.02	33.32	11	17	9	1.33	1.29	2.00	Pannar
NS 6448 R	6.4	SD	LB	13.82	12.95	16.25	33.75	34.85	33.80	10	15	9	2.83	1.29	4.50	K2
P64T39 R	6.4	I	KL	13.77	13.33	14.19	32.82	34.28	34.45	10	14	9	1.39	1.14	1.00	Pioneer
DM 6.8i RR	6.8	I	B	12.04	12.35	13.04	32.64	33.35	34.32	10	18	10	1.44	1.29	1.50	Agricol
6968 RSF	6.9	-	-	14.11	14.22	14.76	32.55	33.55	34.73	13	17	9	1.50	1.00	1.50	Agricol
NS 7211 R	7.2	D	LB	14.46	13.59	15.72	31.78	33.60	33.58	9	14	6	2.50	1.00	4.00	K2

¹ D - Bepaald/Determinate; I - Onbepaald/Indeterminate; SD - Semi-Bepaald/Semi Determinate

² BL- Swart/Black; IB - Onvolledig swart/Imperfect black; B - Bruin/Brown; LB - Ligbruin/Buf; G - Grys/Grey; KL - Kleurloos/Buf

³ Peulhoogte in cm/Pod height in cm

⁴ Geneigtheid tot opspring geëvalueer op 'n skaal van 1-5, waar 1 = min en 5 = baie/Tendency to shatter evaluated on a scale from 1-5, where 1 = few and 5 = numerous



2017 / 2018
SOJABOON KULTIVARAANBEVELINGS • SOYBEAN CULTIVAR RECOMMENDATIONS

Tabel 4 Opbrengswaarskynlikheid (%) van kultivars geëvalueer in 2014/15, 2015/16 en 2016/17 vir die koeler produksiegebiede by verskillende opbrengspotensiaal.

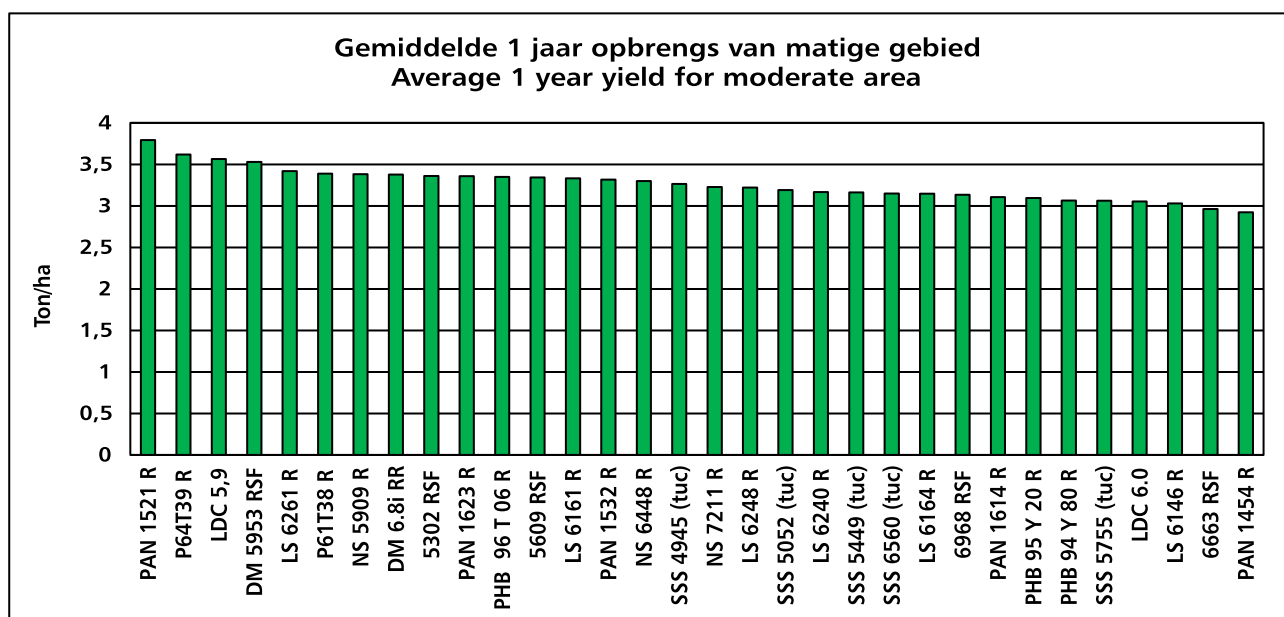
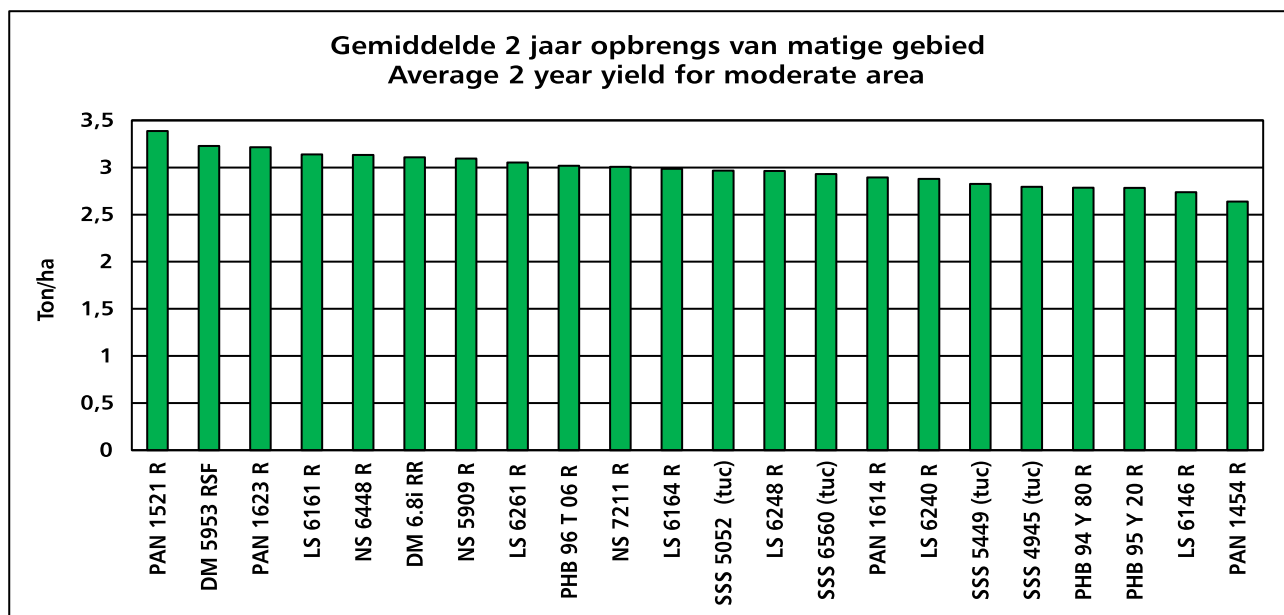
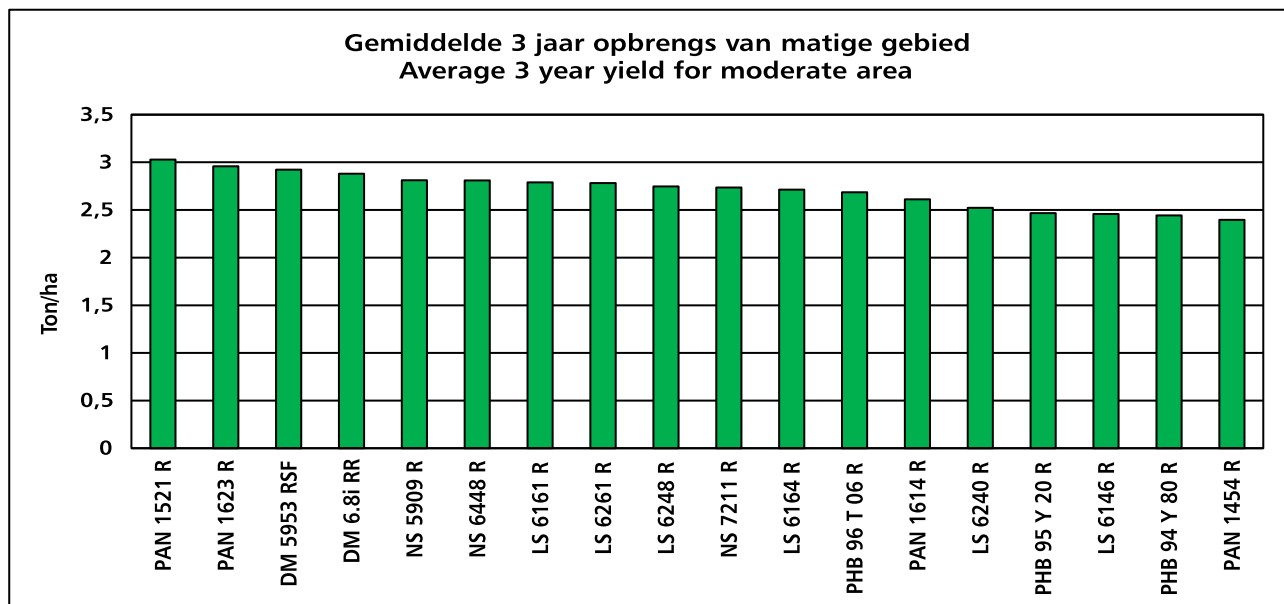
Table 4 Yield probability (%) of cultivars evaluated in 2014/15, 2015/16 and 2016/17 for the cooler production areas at different yield potentials

Kultivar Cultivar	Opbrengspotensiaal/Yield potential (t/ha)							
	1.0	1.5	2.0	2.5	3.0	3.5	4.0	4.5
PAN 1454 R	56	53	49	46	42	39	35	33
LS 6146 R	71	65	57	48	38	30	24	19
LS 6248 R	47	49	52	55	57	60	62	64
PHB 95 Y 20 R	13	11	10	10	10	10	11	12
LS 6164 R	48	43	38	34	29	26	23	21
LS 6161 R	50	46	41	36	31	28	25	23
LS 6261 R	48	47	45	44	42	41	39	39
PAN 1614 R	26	27	29	32	34	38	41	45
LS 6240 R	54	54	53	52	52	51	50	49
PHB 94 Y 80 R	58	60	61	63	64	65	65	65
PAN 1521 R	54	58	63	68	72	75	78	80
PHB 96 T 06 R	55	49	43	37	31	26	22	19
PAN 1623 R	79	76	71	65	57	50	42	37
DM 5953 RSF	51	64	76	86	92	96	98	99
NS 5909 R	18	26	35	47	59	71	79	86
NS 6448 R	43	46	50	54	59	63	66	68
DM 6.8i RR	53	49	45	41	37	33	30	28
NS 7211 R	40	40	40	41	41	42	43	44

Tabel 5 Saadopbrengs (t ha⁻¹) van kultivars gedurende die 2015/16 en 2016/17 groeiseisoene ten opsigte van die verskillende lokaliteite wat in die koeler produksiegebiede geleë is

Table 5 Seed yield (t ha⁻¹) of cultivars during the 2015/16 and 2016/17 growing season for the various localities situated in the cooler production areas

Kultivar Cultivar	2015/16						2016/17						
	Bethlehem	Clarens	Delmas	Kinross	Kokstad	Gem/Mean	Bethlehem	Clarens	Clocolan	Delmas	Kinross	Middelburg	Gem/Mean
LS 6240 R	2.3	1.7	3.9	2.0	2.3	2.4	2.6	2.4	2.8	4.0	3.4	2.9	3.0
PAN 1454 R	2.4	1.5	4.0	2.1	2.1	2.4	2.8	2.9	2.2	2.7	3.4	2.8	2.8
SSS 4945 (tuc)	2.5	1.7	3.8	2.2	1.8	2.4	3.3	3.1	3.0	3.3	4.7	3.3	3.4
LS 6146 R	2.2	1.8	3.6	1.9	1.6	2.2	2.7	3.1	3.3	3.5	2.1	2.8	2.9
PHB 94 Y 80 R	2.8	2.4	4.6	2.4	1.7	2.8	3.2	3.8	2.8	3.3	2.9	3.2	3.2
LS 6248 R	3.6	2.0	4.8	1.7	2.4	2.9	3.9	2.7	2.5	3.2	3.6	2.4	3.0
SSS 5449(tuc)	3.5	1.4	4.2	2.0	2.4	2.7	4.1	2.9	2.5	3.6	3.6	2.5	3.2
NS 5009 R	3.2	2.2	4.3	1.7	1.7	2.6	-	-	-	-	-	-	-
DM 5.1i RR	2.3	1.8	3.8	1.4	1.8	2.2	-	-	-	-	-	-	-
PHB 95 Y 20 R	2.1	1.4	3.8	1.7	2.2	2.3	2.9	2.3	2.1	3.4	3.4	2.9	2.8
DM 5953 RSF	2.9	1.8	4.6	1.9	2.2	2.7	4.7	3.6	3.4	4.5	5.4	3.1	4.1
SSS 5052 (tuc)	2.8	1.2	3.8	2.1	2.2	2.4	3.3	2.4	2.6	3.3	3.7	2.4	2.9
PAN 1521 R	3.9	1.5	4.3	2.1	3.1	3.0	4.4	2.5	3.3	3.8	4.2	3.1	3.5
PAN 1500 R	3.3	1.6	4.0	2.0	2.9	2.8	-	-	-	-	-	-	-
NS 5909 R	3.0	1.6	4.8	2.3	2.5	2.8	3.7	2.5	2.6	3.5	4.1	3.5	3.3
LS 6261 R	3.4	1.8	4.2	2.2	2.5	2.8	3.5	2.1	3.3	3.5	3.4	2.9	3.1
PHB 96 T 06 R	3.1	2.1	3.9	2.5	2.7	2.8	2.7	2.3	1.9	3.8	3.2	2.8	2.8
PAN 1623 R	3.6	1.4	3.6	2.0	2.7	2.7	3.7	2.5	3.1	3.6	3.6	3.1	3.3
LS 6161 R	3.0	1.7	3.7	2.1	3.0	2.7	2.9	2.1	2.8	4.1	3.2	2.9	3.0
DM 6.2i RR	2.5	1.5	4.4	1.9	2.0	2.5	-	-	-	-	-	-	-
SSS 6560 (tuc)	3.6	1.5	4.0	2.1	2.1	2.7	3.1	2.5	2.3	3.5	3.5	3.0	3.0
LS 6164 R	2.7	2.0	3.9	2.1	2.7	2.7	3.4	2.7	1.8	2.8	4.0	2.9	2.9
PAN 1614 R	2.9	1.7	3.2	1.9	2.1	2.4	3.3	2.3	3.2	3.2	3.7	2.6	3.0
NS 6448 R	3.0	1.8	4.6	2.6	2.5	2.9	3.5	3.0	3.0	3.9	3.1	2.9	3.2
DM 6.8i RR	2.5	1.4	3.4	2.2	2.4	2.4	3.4	3.0	2.3	3.4	3.8	2.7	3.1
NS 7211 R	2.8	1.5	3.8	2.2	2.1	2.5	3.0	2.8	2.9	3.7	4.1	2.7	3.2
PAN 1532 R	-	-	-	-	-	-	3.8	2.6	2.7	3.9	3.3	2.7	3.2
5609 RSF	-	-	-	-	-	-	4.0	2.7	3.0	3.8	3.8	2.8	3.4
5302 RSF	-	-	-	-	-	-	4.0	2.6	3.5	3.8	4.3	2.6	3.4
SSS 5755 (tuc)	-	-	-	-	-	-	3.2	2.6	2.2	3.5	3.4	2.7	2.9
LDC 5,9	-	-	-	-	-	-	4.1	2.0	2.6	3.8	3.8	3.0	3.2
LDC 6.0	-	-	-	-	-	-	3.1	0.6	1.9	3.8	3.6	2.4	2.6
P61T38 R	-	-	-	-	-	-	3.3	2.4	2.9	4.2	3.9	2.6	3.2
6663 RSF	-	-	-	-	-	-	3.9	1.6	2.3	2.8	3.6	2.6	2.8
P64T39 R	-	-	-	-	-	-	3.6	2.4	2.9	3.9	5.1	3.3	3.5
6968 RSF	-	-	-	-	-	-	3.2	1.5	2.8	2.8	2.9	3.2	2.8
Gem/Mean	2.9	1.7	4.0	2.0	2.3	2.6	3.4	2.5	2.7	3.6	3.7	2.9	3.1



2017 / 2018
SOJABOON KULTIVARAANBEVELINGS • SOYBEAN CULTIVAR RECOMMENDATIONS

Tabel 6 Opbrengswaarskynlikheid (%) van kultivars geëvalueer in 2014/15, 2015/16 en 2016/17 vir die matige produksiegebiede by verskillende opbrengspotensiaal

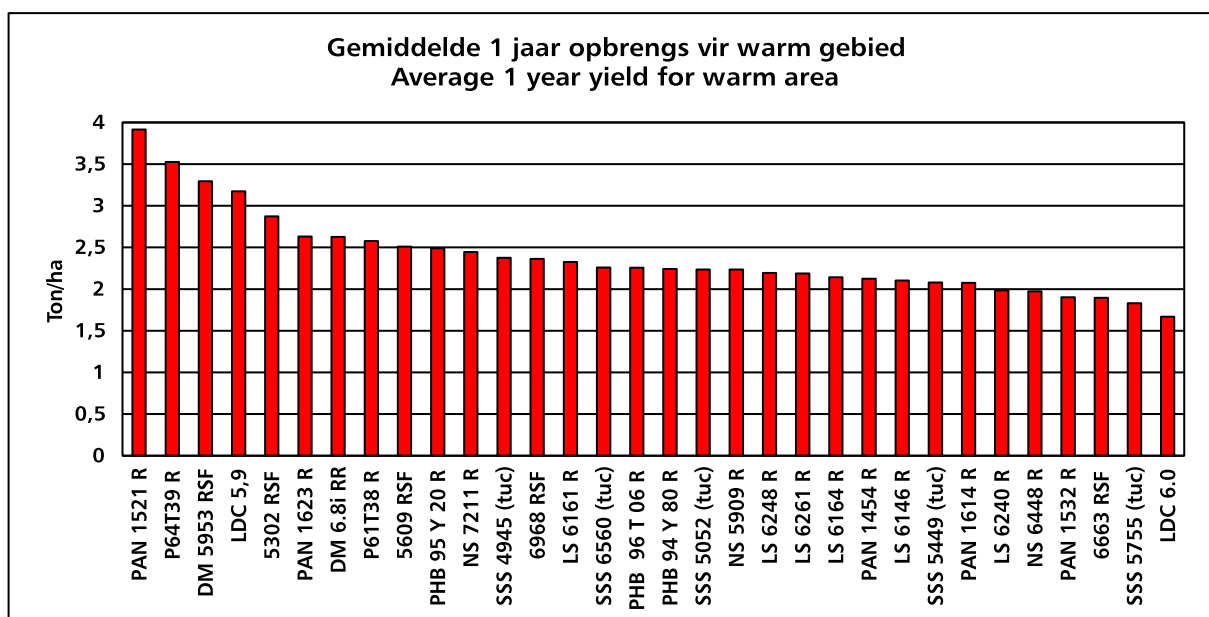
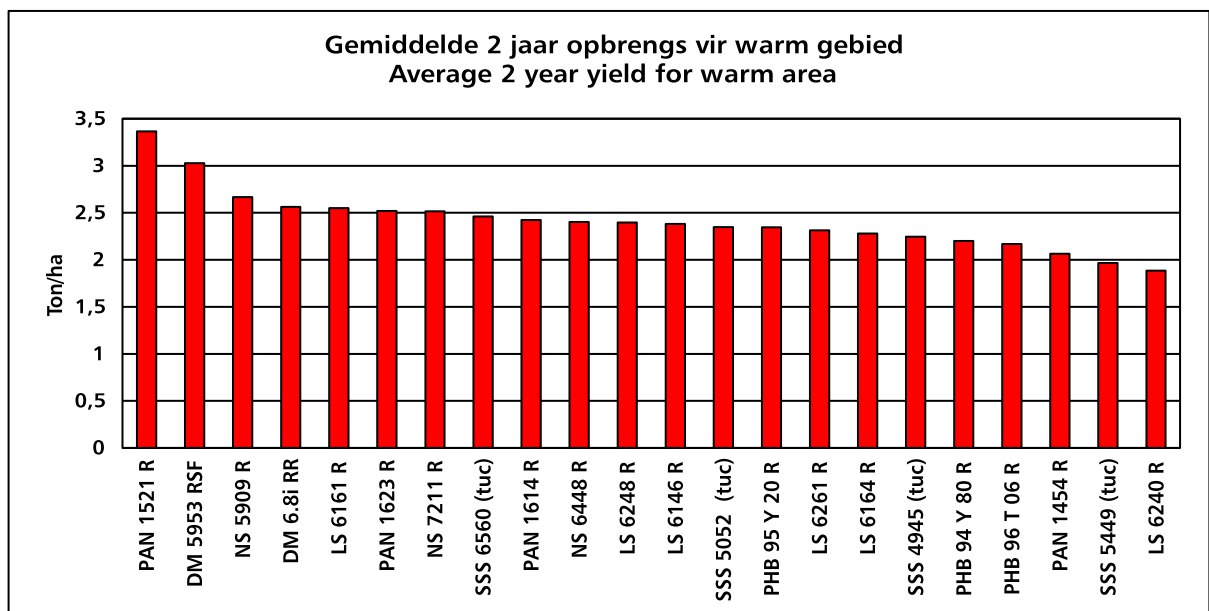
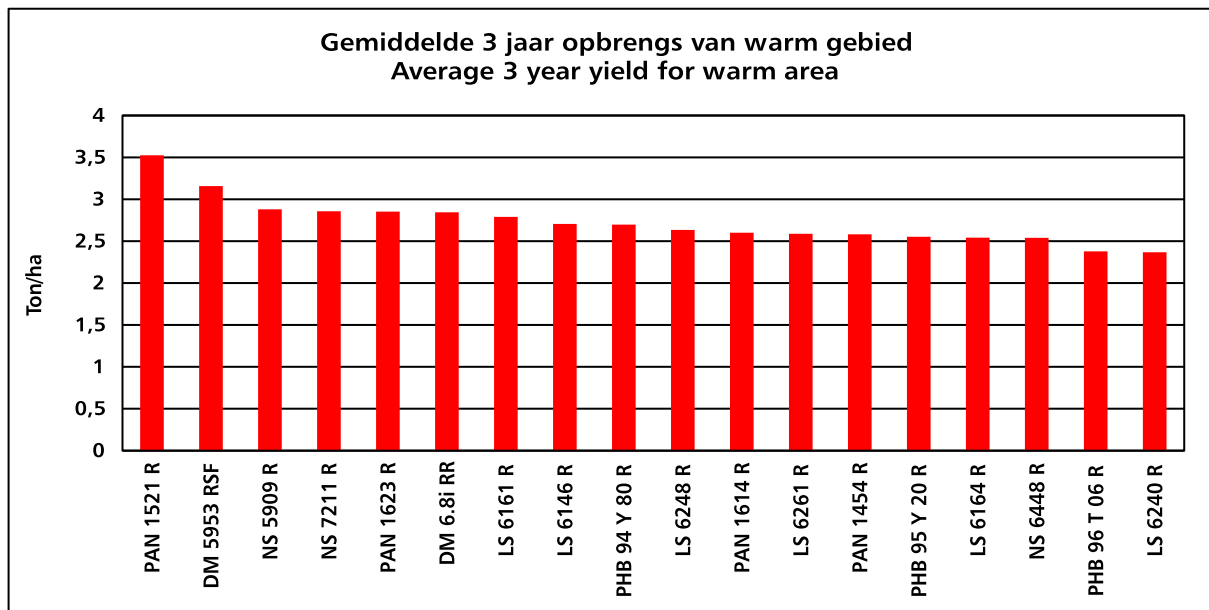
Table 6 Yield probability (%) of cultivars evaluated in 2014/15, 2015/16 and 2016/17 for the moderate production areas at different yield potentials

Kultivar Cultivar	Opbrengspotensiaal/Yield potential (t/ha)							
	1.0	1.5	2.0	2.5	3.0	3.5	4.0	4.5
PAN1454R	25	23	22	21	20	19	19	20
LS6146R	36	34	30	28	25	23	22	21
LS6248R	61	60	57	56	53	51	49	47
PHB95Y20R	51	41	31	22	15	10	7	4
LS6164R	61	57	53	49	45	40	37	33
LS6161R	65	63	61	58	55	52	49	46
LS6261R	61	60	58	57	54	52	50	48
PAN1614R	51	49	44	41	37	34	31	29
LS6240R	30	33	36	40	43	48	51	55
PHB94Y80R	21	24	27	31	35	39	44	49
PAN1521R	53	64	74	82	88	93	95	97
PHB96T06R	48	48	48	48	48	48	48	48
PAN1623R	87	85	82	79	75	69	64	58
DM5953RSF	39	46	53	62	69	75	80	84
NS5909R	66	65	63	62	60	57	55	53
NS6448R	57	57	58	58	58	58	57	57
DM6.8iRR	60	60	61	61	61	61	60	60
NS7211R	51	52	52	53	53	54	54	55

Tabel 7 Saadopbrengs (t ha⁻¹) van kultivars gedurende die 2015/16 en 2016/17 groeiseisoen ten opsigte van die verskillende lokaliteite wat in die matige produksiegebiede geleë is

Table 7 Seed yield (t ha⁻¹) of cultivars during the 2015/16 and 2016/17 growing season for the various localities situated in the moderate production areas

Kultivar Cultivar	2015/16							2016/17									
	Bergville	Cedara	Glen	Greytown	Greytown Kranskop	Kroonstad	Gem/Mean	Cedara	Dundee	Greytown	Greytown Kranskop	Kroonstad	Potchefstroom Besproei	Potchefstroom Droog	Stoffberg	Verkeerdelei	Gem/Mean
LS 6240 R	3.6	2.4	2.3	2.0	3.0	1.3	2.4	4.5	3.4	3.0	3.6	3.6	3.6	2.8	1.4	2.6	3.2
PAN 1454 R	3.0	2.5	1.8	2.2	2.7	1.0	2.2	4.3	2.9	3.0	3.1	3.0	3.0	2.6	1.9	2.6	2.9
SSS 4945 (tuc)	2.3	2.2	2.6	1.9	2.6	1.0	2.1	4.4	3.5	2.7	3.1	4.0	3.7	3.3	1.7	3.0	3.3
LS 6146 R	3.3	2.1	2.0	1.9	3.1	1.3	2.3	4.0	2.9	3.4	3.4	3.6	2.8	3.0	1.5	2.6	3.0
PHB 94 Y 80 R	3.8	2.7	1.9	1.9	2.8	1.1	2.4	4.3	3.1	3.5	3.0	3.0	3.4	3.0	1.7	2.6	3.1
LS 6248 R	3.3	2.6	2.5	2.3	3.6	1.2	2.6	4.3	2.9	3.0	3.4	3.1	3.8	2.9	3.2	2.4	3.2
SSS 5449 (tuc)	2.7	2.3	2.5	2.3	3.1	1.1	2.3	4.1	2.6	3.7	3.2	3.8	3.6	2.9	2.2	2.3	3.2
NS 5009 R	3.8	2.6	2.5	2.0	2.8	1.5	2.5	-	-	-	-	-	-	-	-	-	-
DM 5.1i RR	3.2	2.2	2.4	2.1	3.0	1.0	2.3	-	-	-	-	-	-	-	-	-	-
PHB 95 Y 20 R	2.8	2.6	2.3	2.4	2.8	1.0	2.3	4.1	3.2	2.7	3.4	3.4	3.4	2.6	3.0	2.2	3.1
DM 5953 RSF	3.5	2.8	4.0	2.1	3.3	0.9	2.8	4.7	3.4	3.5	4.1	4.2	3.6	3.2	2.2	2.9	3.5
SSS 5052 (tuc)	3.7	3.0	2.0	2.6	3.1	1.3	2.6	3.9	3.0	2.9	2.6	4.2	3.3	3.3	3.3	2.3	3.2
PAN 1521 R	4.0	2.9	2.8	2.5	3.4	1.1	2.8	4.3	3.3	3.3	3.7	4.5	4.5	3.9	3.7	2.9	3.8
PAN 1500 R	3.2	2.7	1.7	2.5	2.6	1.0	2.3	-	-	-	-	-	-	-	-	-	-
NS 5909 R	2.9	3.1	2.8	3.1	3.0	1.1	2.7	3.9	2.8	3.2	4.0	4.0	3.7	3.3	3.7	1.8	3.4
LS 6261 R	2.6	2.7	2.4	2.3	3.9	1.2	2.5	3.8	3.0	4.7	3.3	4.0	3.3	2.8	3.1	2.7	3.4
PHB 96 T 06 R	2.9	2.8	1.8	2.9	3.6	1.1	2.5	4.3	2.8	3.5	3.6	3.5	3.5	3.9	3.3	1.8	3.3
PAN 1623 R	3.6	3.4	2.9	3.1	3.8	1.2	3.0	4.0	3.1	3.6	2.8	3.7	3.2	3.5	4.0	2.3	3.4
LS 6161 R	2.3	3.0	4.0	3.2	3.1	1.4	2.8	4.2	3.2	3.2	3.0	3.7	3.5	3.8	3.0	2.4	3.3
DM 6.2i RR	2.3	2.9	1.7	3.1	3.6	1.1	2.5	-	-	-	-	-	-	-	-	-	-
SSS 6560 (tuc)	2.7	2.7	2.6	2.7	3.6	1.3	2.6	3.8	3.0	2.8	4.1	3.7	3.1	2.9	3.3	1.7	3.1
LS 6164 R	3.1	3.0	2.3	2.7	4.1	1.3	2.7	4.0	2.3	3.1	3.7	3.4	3.1	3.6	3.0	2.3	3.1
PAN 1614 R	3.4	2.8	2.0	2.7	3.5	1.1	2.6	3.7	2.7	2.8	3.6	3.8	3.2	3.4	3.0	1.7	3.1
NS 6448 R	3.6	2.9	2.6	3.0	4.0	1.2	2.9	3.8	3.0	3.3	3.6	4.3	3.4	3.9	2.8	1.5	3.3
DM 6.8i RR	2.8	3.0	2.7	3.2	3.5	1.1	2.7	4.4	3.0	3.2	4.1	3.3	3.3	3.0	4.7	1.3	3.4
NS 7211 R	3.7	2.9	2.2	3.0	3.1	1.2	2.7	4.2	2.5	2.7	3.8	3.9	2.9	3.6	3.8	1.7	3.2
PAN 1532 R	-	-	-	-	-	-	-	4.0	3.3	3.1	3.2	3.7	4.2	3.3	2.9	2.1	3.3
5609 RSF	-	-	-	-	-	-	-	4.6	2.9	2.7	3.8	4.1	4.0	2.7	3.9	1.4	3.3
5302 RSF	-	-	-	-	-	-	-	4.5	2.7	3.4	3.5	3.9	3.7	3.0	3.0	2.5	3.4
SSS 5755 (tuc)	-	-	-	-	-	-	-	3.9	2.8	3.0	3.0	4.1	2.8	3.2	2.8	1.8	3.1
LDC 5.9	-	-	-	-	-	-	-	4.5	2.9	3.1	4.2	4.0	3.5	3.6	3.4	2.7	3.6
LDC 6.0	-	-	-	-	-	-	-	4.2	2.6	2.2	3.4	4.2	3.6	3.1	2.0	2.2	3.1
P61T38 R	-	-	-	-	-	-	-	4.1	3.2	2.9	4.3	3.8	3.2	3.2	3.9	1.9	3.4
6663 RSF	-	-	-	-	-	-	-	4.0	2.9	2.7	2.9	4.0	2.3	2.3	4.1	1.4	3.0
P64T39 R	-	-	-	-	-	-	-	3.9	2.9	3.2	4.0	4.2	4.2	4.0	3.8	2.2	3.6
6968 RSF	-	-	-	-	-	-	-	4.0	2.9	2.5	3.9	3.7	3.1	2.6	3.9	1.6	3.1
Gem/Mean	3.2	2.7	2.4	2.5	3.3	1.2	2.5	4.1	3.0	3.1	3.5	3.8	3.4	3.2	3.0	2.2	3.3



2017 / 2018
SOJABOON KULTIVARAANBEVELINGS • SOYBEAN CULTIVAR RECOMMENDATIONS

Tabel 8 Opbrengswaarskynlikheid (%) van kultivars geëvalueer in 2014/15, 2015/16 en 2016/17 vir die warm produksiegebiede by verskillende opbrengspotensiaal

Table 8 Yield probability (%) of cultivars evaluated in 2014/15, 2015/16 and 2016/17 for the warm production areas at different yield potentials

Kultivar Cultivar	Opbrengspotensiaal/Yield potential (t/ha)						
	1.5	2.0	2.5	3.0	3.5	4.0	4.5
PAN1454R	50	46	41	37	33	31	29
LS6146R	18	26	38	51	65	75	82
LS6248R	25	30	36	44	52	59	64
PHB95Y20R	22	22	24	26	29	32	35
LS6164R	48	29	15	6	3	1	1
LS6161R	70	64	58	50	43	36	31
LS6261R	11	17	27	40	54	66	76
PAN1614R	36	34	34	32	33	33	34
LS6240R	30	26	23	21	19	19	19
PHB94Y80R	29	37	46	56	65	73	78
PAN1521R	88	89	90	89	88	87	85
PHB96T06R	48	38	29	21	16	12	10
PAN1623R	74	71	69	64	61	56	53
DM5953RSF	87	85	82	76	71	64	57
NS5909R	44	51	58	65	70	75	78
NS6448R	49	51	53	55	56	58	59
DM6.8iRR	90	84	76	64	50	37	28
NS7211R	71	72	71	70	69	67	65

Tabel 9 Saadopbrengs (t ha⁻¹) van kultivars gedurende die 2015/16 en 2016/17 groeiseisoen ten opsigte van die verskillende lokaliteite wat in die warm produksiegebiede geleë is

Table 9 Seed yield (t ha⁻¹) of cultivars during the 2015/16 and 2016/17 growing season for the various localities situated in the warm production areas

Kultivar Cultivar	2015/16				2016/17		
	Atlanta	Brits	Groblersdal	Gem/Mean	Brits	Brits K2	Gem/Mean
LS 6240 R	1.6	1.4	2.4	1.8	1.6	2.4	2.0
PAN 1454 R	1.7	1.9	2.5	2.0	1.7	2.6	2.1
SSS 4945 (tuc)	1.2	1.4	3.9	2.2	2.1	2.7	2.4
LS 6146 R	1.8	1.8	4.1	2.6	1.7	2.5	2.1
PHB 94 Y 80 R	1.6	1.5	3.5	2.2	1.8	2.7	2.2
LS 6248 R	1.5	1.7	4.4	2.5	1.5	2.9	2.2
SSS 5449 (tuc)	1.3	1.7	2.7	1.9	1.9	2.2	2.1
NS 5009 R	2.1	1.8	3.3	2.4	-	-	-
DM 5.1i RR	1.4	1.8	3.7	2.3	-	-	-
PHB 95 Y 20 R	1.6	1.3	3.9	2.2	2.4	2.6	2.5
DM 5953 RSF	1.7	2.6	4.3	2.8	2.9	3.7	3.3
SSS 5052 (tuc)	2.0	1.7	3.5	2.4	1.9	2.6	2.2
PAN 1521 R	2.2	1.9	4.9	3.0	3.7	4.2	3.9
PAN 1500 R	2.1	1.7	3.8	2.5	-	-	-
NS 5909 R	2.2	1.9	4.8	3.0	2.1	2.4	2.2
LS 6261 R	1.2	1.8	4.1	2.4	1.7	2.6	2.2
PHB 96 T 06 R	1.9	1.5	2.9	2.1	2.4	2.2	2.3
PAN 1623 R	2.3	1.7	3.4	2.4	2.4	2.9	2.6
LS 6161 R	2.3	1.7	4.1	2.7	2.2	2.4	2.3
DM 6.2i RR	2.2	1.9	4.6	2.9	-	-	-
SSS 6560 (tuc)	2.2	2.1	3.5	2.6	2.3	2.2	2.3
LS 6164 R	2.1	1.6	3.4	2.4	1.9	2.4	2.1
PAN 1614 R	2.2	1.7	4.0	2.7	1.9	2.3	2.1
NS 6448 R	2.3	1.6	4.1	2.7	1.9	2.0	2.0
DM 6.8i RR	2.1	1.8	3.7	2.5	2.6	2.7	2.6
NS 7211 R	2.6	1.6	3.5	2.6	2.3	2.6	2.4
PAN 1532 R	-	-	-	-	1.9	1.9	1.9
5609 RSF	-	-	-	-	2.2	2.8	2.5
5302 RSF	-	-	-	-	2.6	3.1	2.9
SSS 5755 (tuc)	-	-	-	-	1.7	2.0	1.8
LDC 5.9	-	-	-	-	2.9	3.4	3.2
LDC 6.0	-	-	-	-	1.4	1.9	1.7
P61T38 R	-	-	-	-	2.4	2.7	2.6
6663 RSF	-	-	-	-	1.8	1.9	1.9
P64T39 R	-	-	-	-	4.2	2.8	3.5
6968 RSF	-	-	-	-	2.6	2.1	2.4
Gem/Mean	1.9	1.7	3.7	2.5	2.2	2.6	2.4

Notas / Notes

[illegible]

Notas / Notes

[illegible]

Notas / Notes

[illegible]

Notas / Notes

[illegible]

VERDERE INLIGTING



Volledige inligting oor die Nasionale Sojaboon Kultivarproewe en 'n nuttige bron van inligting oor sojaboonproduksie naamlik "Sojaboon produksiehandleiding" is beskikbaar by:

LNR-Graangewasse
Privaatsak X1251, Chris Hani Straat 114, Potchefstroom 2520
Tel.: (018) 299 6100 • Faks: (018) 294 7146

* Kultivars wat in die verslag opgeneem is, is die enigste kultivars wat deur die LNR getoets en aanbeveel word.

ERKENNING

Die uitvoer van die proewe is moontlik gemaak deur die finansiële ondersteuning van die Landbounavorsingsraad, Olie-Proteïen Ontwikkelings Trust (OPOT), verskeie Saadmaatskappye en 'n groot aantal medewerkers wat proewe uitgevoer het. Tegniese ondersteuning is verleen deur Me. Heila Vermeulen, die data ontleding deur Nicolene Thiebaut en publikasie deur Mary James.

FURTHER INFORMATION



Information on the National Soybean Cultivar Trials and a useful guide on soybean production, namely the "Soybean Production Manual" is available at:

ARC-Grain Crops
Private Bag X1251, Chris Hani Street 114, Potchefstroom 2520
Tel.: (018) 299 6100 • Fax: (018) 294 7146

* Cultivars that are discussed in this report are the only cultivars evaluated and recommended by the ARC.

ACKNOWLEDGEMENT

Execution of these trials were made possible through the financial support of the Agricultural Research Council, Oil and protein seeds Development Trust (OPDT), Seed Companies and a large number of co-operators who conducted trials. Mrs. Heila Vermeulen provided technical assistance, Mrs Nicolene Thiebaut the data analyses and Mary James for her assistance with this publication.