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SILIMELA
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Ukuchuba umbona nokuwuhlela kungayiphucula ingeniso



Ukuchuba umbona kubhekiselele eku-khutshweni kweenkoko zombona esikhwebini kanti ngokuphathelele kubalimi abalimela ukuziphilisa oku kwe-nziwa ngesandla emva kokukha izikhwebu ngesandla kwizityalo zombona ezivuthiweyo ngexesha lokuvuna.

Imisebenzi emikhulu yorhwebo nayo yenza le misebenzi kodwa ngokusebenzisa oomatshini bokuvuna banamhla. Aba ngoomatshini abakhulu abanobuxhakaxhaka abaqhutywa emasimini amakhulu ukuze bakhe umbona, bawuhlube amakhasi, bawucoce ukuze bagcine izitha zawo okwethutyana kumgqomo wesixhobo sokuvuna esingumatshini oqhutywa kwintsimi yombona iphelele.

Ukuvuna kwabalimi abalimela ukuziphilisa

Abalimi abalimela ukuziphilisa bakholisa ukulimela ukufumana ukutya kwabo kodwa bayakuthengisa ukutya abangenakukusebenzisa ngonyaka wesivuno esihle. Imfundo noqeqesho oluphucukileyo malunga neendlela zanamhla zokulima ngokusebenzisa imihlanganisela yombona eyimixube ehlangahlengiswe ngokwemfuza ngokunjalo nolwazi ngeendlela ezixhasanayo zokutshabalalisa ukhula, yimiba ekwazileyo ukwandisa izivuno ukususela kwi 0,5 yeetoni ngehektare ukuya kwiitoni ezi-6 ngehektare. Esi sivuno sande ngamandla kwaye oko kuthetha ubukho bomsebenzi othe chatha nokwenziwa kwezicwangciso zokuvuna ithuba liselihle.

Olu phuhliso lwenze ukuba abalimi abalimela ukuziphilisa babe nemveliso ethe chatha

Imagazini yakwaGrain SA
yophuhliso lwabavelisi

Bala Moteng:

- 04 | Nqanda ukhukuliseko lomhlaba ongaphezulu ngokungawuphethuli umhlaba
- 08 | Iinzuzo zokugalela ikalika
- 11 | Ulawulo lwemingcipheko kwimijikelo yobomi bezityalo ezilinyelwa inzuzo yemali eyikheshi





UMAKHULU UJANE UTHI...

Bufikile ubusika, nto leyo ethetha ukuba abalimi baseKoloni balima izityalo zabo zasebusika logama abanye bezinye iindawo bevuna izityalo zabo zasehlotyeni. Ngethamsanqa, besinexesha elingummangaliso lokulima kuba phantse bonke abalimi baza kufumana isivuno esihle. Enyanisweni kuyonwabisa kakhulu ukubona ubuhle bezityalo ezinokufumaneka xa abalimi banokuzisebenzisa zonke iindlela ezilungileyo nezisisiseko sokulima – ukulungisa umhlaba, ukutshabalalisa ukhula, ukuba namanani aphezulu esityalo kunye nokufaka isichumiso.

Kwinkqubo yethu yethuba elizayo, siza kugqalisela ekufikeleleni kwabalimi kwiimali-mboleko zokulima. Kwiminyaka embalwa edlulileyo, besinethemba lokuba iSebe loPhuhliso lwamaPhandle, iSebe lokuBuyiselwa kweMihlaba ngokunjalo neSebe lezoLimo aya kuqhuba ngokuncedisa abalimi ngeenkxaso zegranti. Ngelishwa, sifumanise ukuba oku akunakuthenjwa kwaye abanye abalimi abakwazanga kuqhubela phambili xa bekusalindwe inkxaso-mali karhulumente. Xa iimali-mboleko bezinokufumaneka kwangethuba, abalimi baya kukwazi ukuqalisa ukusebenza emasimini abo kuselithuba. Ukuba banokuba nethamsanqa ngokwaneleyo lokufumana iigranti, le mali iya kuhlawula iimali-mboleko. Ngale ndlela, sinako ukunceda abalimi ngokusebenza ngendlela efanelekileyo xa belima izityalo zabo.

Sivela kwiveki yesiVuno eNAMPO ebine-mpumelelo enkulu. Kundivuyisile ukubona abalimi abakuphuhliso bewuzimase ngobuninzi lo msitho – kuhle ukubona ukuba yonke impahla neenkonzoz ziyakwazi ukufikelela kwicandelo lezolino. Njengomlimi kubalulekile ukuqhagamshelana nabantu abaneendima ezibalulekileyo kwishishini – aba ngabantu abanikela ngazo zonke iinkonzoz nempahla oza kuyidinga njengomlimi – mawungqongwe ngabantu abakuthakazelelayo ukukuncedisa ngeenkxaso nangeengecebiso.

Wanga ungaqhuba kakuhle ngexesha lokuvuna – akwaba izivuno zakho bezinokuthi kratya kwezo ubuzilindele. 🍀

Ukuchuba umbona nokuwuhlela kungayiphucula ingeniso

kuneyezidingo zabo ngokunjalo bayakwazi nokulima ezinye izityalo ezinjengeembotyi okanye imifuno. Umzi ke ngoko, unako ukwenza izicwangciso zokulima ngokulungelelanisa afake nezinye izityalo ezikukutya okuphambili. Ngokwenza njalo, usapho lunako ukwenza izicwangciso zokulima ezinye izityalo. Ngolo hlobo usapho lonwabela izidlo ezinezondlo ezilungeleleneyo kunyaka olandelayo.

Umbona uvunwa ngesandla ngokukha izikhwebu kwisityalo zize zifakwe ezingxoweni bade abalimi bafike ekupheleni komqolo ngamnye. Ukuba iingwelo ezitsalwa ziinkabi okanye ziidonki zikhona zinako ukusetyenziselwa ukuqokelela iimfumba okanye iingxowa zezikhwebu ezivuniweyo ezingumthwalo osiwa kwiindawo zolondolozo.

Inkqubo yokuvuna

Ukuvuna kufanele ukuqalisa xa izikhwebu ziqala ukujinga aze amagqabi aqale ukubona. Ukuvuna makuqaliswe xa inkoliso yamagqabi amakhasi ombona ejika eba tyheli naxa ingani imvula. Ngeemini zemvula, kwiindawo ezifumana imvula ethile ngexesha lokuvuna, xa isivuno sezikhwebu singenakuqokelelwa yaphula isikhondo ngezantsi kwesikhwebu kancinane ukuze sijingele ezantsi.

Kwezinye iindawo kuvunwa zonke izityalo zombona zizonke zize zicukaniselwe njengoonxantathu abagqwethiweyo, abaziwa

ngokuba zizitha nezishiywa emasimini nokuba ziintsuku ezimbini phambi kokuvunwa kwezi-khwebu. Iintsalela zezityalo zinako ukusetyenziswa njengesondlo semfuyo emva koko.

Kwezinye iindawo ngakumbi ngenxa yokusetyenziswa kwemihlanganisela yanamhla, izikhwebu zivuthwa msinyane ukuze ke ngoko zilungele ukuvunwa. Ngenxa yoko, akudingeki abasebenzi abaninzi njengoko izikhwebu zikhwiwa ngqo kwizityalo.

Ukomisa

Umbona usenokomiswa entsimini okanye ngokucukanisa izikhwebu emaqongeni okanye zigcinwe ezitorenini ezingena impepho kakuhle nezakhiwe ngeso sizathu ngokunjalo zibe nesigqumathelo esikhusela izikhwebu ezivuniweyo kuwo nawuphi umonakalo onokwenziwa yimvula.

Umlimi ngamnye okanye iqela labalimi lina-ko ukuthenga isixhobo esincinane esisebenza ngombane sokulinganisa ukufuma okanye xa bewazi ukufikelela kumnini-sisele okufutshane bathumele iisampulu zombona ukuze kulinganise isiquletho sokufuma sazo.

Akufuneki ukuba isiquletho sombona sibe ngaphezulu kwi 14% ukuze umbona ukufanele ukulondolozwa okanye ukuthengiswa. Umbona ukholisa ukuvunwa xa uphakathi kwe 18% ne 26% yokufuma ukuze womiswe kwangoko phambi kokulondolozwa ezitorenini okanye phambi kokuthengiswa. Iinkozoz zombona

Ukuchutywa kombona ngomatshini.





Ukuchutywa kombona ngezandla.

ezigcinwe kulo mgangatho wokufuma zikhawuleza zonakale. Ukomiswa kombona kwasekugqibeleni kunokwenziwa phezu kweplastikhi okanye kweeseyile ezomeleleyo zepplastikhi emva kokuwuchuba xa bekulinyelwa ukuziphilisa. Ungawandlali ngaphezu kobunzulu obufikelela eqatheni umbona phezu kweseyile. Kaloku isizathu kukuba umbona kufuneka ufunyanwe lilanga nangumoya. Iinkozo zinokuzanya-zanyiswa kumaxesha ngamaxesha ukuze neenkozo ezingaphantsi zilifumane ithuba lokomiswa.

Ukuchuba

Umbona unako ukuchutywa ngeendlela ezahlukahlukileyo eziquka ukubhulwa kwezikhwebu ezisengxoweni, zisenokubhuqwa izikhwebu phezu kweqonga eliqoqiweyo apho iinkozo zombona zizishona khona nokuba kusematshinini wokuchuba. Xa izivuno ziqala ukudlula iitoni eziyi 3,5 ngehektare nganye abalimi abalimela ukuziphilisa okanye abalima ngokwamaqela, bafanele ukuthenga umatshini wokuchuba osebenza ngenjini encinane. Ngokuya

kusanda imveliso phakathi kwabahlali ngokubanzi ngokunjalo naxa lusiya ngokuphucuka ulawulo lwezityalo, kungasetyenziswa udidi lukamatshini oluhlela noluhlaza iinkozo ngokwemgangatho eyahluka-hlukileyo logama uguzula amaqhekeza aqhekekileyo.

Ukuthengisa ukutya okungaphaya kokunokusetyenziswa

Iinkozo ezomileyo nezicocekileyo zinokulondolozelwa ukondla usapho okanye zigcinelwe ukuthengiswa ngabalimi abalimela ukuziphilisa kubamelwane okanye kumashishini asaqaqalayo ukurhweba abafana nabasili beenkozo bendawo leyo abathenga umbona omhlophe nokuba ngabalimi besondlo semfuyo abakholisa ukuthenga umbona otyheli kuba unesondlo sekharothini esiyilungeleyo imfuyo.

Ukuba uza kuthengiswa umbona kufuneka uthobele imimiselo yesizwe yokuhlela neyokubekelela. Isampulu yakho yombona iya kuhlolwa malunga nokuba ingaba yimihlanganisela

etyheli okanye yemhlophe na, ubukho bezinto ezingafunekiyo okanye inkunkuma, iipete okanye iinkozo eziqhelekileyo, iinkozo ezonakaliswe zizitshabalalisi-zityalo, iinkozo ezibolileyo nezinesifo, isiqulatho sokufuma se 14% kunye nokuvavanywa kwamazinga etyhefu ye-aflotoxin.

Iinkcukacha ezipheleleyo zemigangatho yokuhlelwa kombona zinokufumaneka kwi-intanethi kanti ziqukiwe kumthetho omiselweyo wemigangatho yemveliso yezolimo, ngo-1990 (iNombolo yoMthetho we-119 wango-1990).

Ukwanda kwemveliso okunokwenzeka ngenxa yeendlela zanamhla zokulima ezinokukhokelela kwintengiso yemveliso ethe kratya yombona owomisiweyo, owahlukaniswe wahlelwa ngokufanelekileyo kunako ukwandisa ingeniso yamakhaya ngokwenza njalo kuphuhle ubomi babalimi abalimela ukuziphilisa kwixesha elizayo.

Inqaku linikelwe ngumlimi okumhlala-phantsi.

Nqanda ukhukuliseko lomhlaba ongaphezulu ngokungawuphethuli umhlaba



1

Umhlaba ongaphezulu yimpahla exabiseke kakhulu kumlimi. Nguwo omnika iqonga lazo zonke izinto afuna ukuzenza kwezolimo. Sisiseko seshishini lakhe. Umhlaba unika imbewu ithuba lokuntshula, elokukhula nelokunika imveliso.

Ngelishwa silahlekelwa ngumhlaba ongaphezulu ngesantya esididekisyayo. Ngonyaka ngamnye silahlekelwa zizigidi zeetoni zomhlaba ongaphezulu, ubukhulu becala ngenxa yokhukuliseko olwenziwa ngumoya nemvula. Njengomlimi oku yinyaniso eyothusayo njengoko ubomi bethu bufanele ukugcinwa ngumhlaba. Kufuneka sisoloko sikhangelale iindlela zokunciphisa le lahleko. Eli nqaku liza kuchaza izezo zokungawuphethuli umhlaba nokuba zinceda njani kulondolozo lomhlaba ongaphezulu.

Yintoni ukungaphethuli umhlaba?

Ngamazwi alula, ukungaphethuli umhlaba kwenzeka xa umlimi etyala ngqo emhlabeni kwaye kungaphindi kubekho okanye ukuphethula umhlaba. Oku kuthetha ukuba akwenziwa malungiselelo phambi kokutyala ngamakhuba, amakhuba ezikotile, izikrazuli okanye naziphi izixhobo ezizezinye ezigqobhozayo. Uluvo oluphambili malunga nokungahlakuli kukuba



3

Umatshini olungileyo wokuvuna nokubhula owandlala umququ ngokulungelelana ubaluleke kakhulu ukuze kungabikho zigaqa zentsalela ezihamba zicukana entsimini.

umhlaba ongaphezulu awuphazanyiswa kukuphethulwa ngenxa yoko kugcinwa iintsalela zezityalo zamaxesha angaphambili. Ziliqela izinto eziluncedo malunga nale ndlela yokulima. Olona ncedo luphambili kukunciphisa ukhukuliseko ngamandla ngenxa yeentsalela neengcanjana ezisala emhlabeni zinjengokuba zinjalo kwaye zibumba umhlaba ongaphezulu ukuba udibane ukuze ungakhukuliswa ngamanzi.



4

Awuphethulwa umhlaba eMthatha.

Ezinye iinkalo eziluncedo ziquka:

- Ukwanda kwezinto ezivela kwindalo ephilayo emhlabeni ekuthiwa sisigcina-kufuma; oku kugqibela ngokuba sisichumiso esinempilo somhlaba.
- Izinto eziphilayo nazo ziphucula amanani endalo ephilayo njengemisundulu kanti oko kuneziphumo ezininzi ezinenzuzo.
- Isakhono somhlaba sokugcina amazi



2

nezondlo siyanda; ngoko ke kubakho ithuba lemveliso ephucukileyo yemveliso.

- Kukho ukucutheka kwigalelo lokucutha igesi ezingabulungelanga ubume obu- siNgqongileyo, ngakumbi isile (*carbon dioxide*) eyonakalisa umoya osingqongileyo.
- Kukho indlela ephucukileyo yokutshabalalisa ukhula njengoko umncinane umhlaba ophazamisekayo ngoko ke anciphe amathuba okuntshula kokhula.
- Ukungaphethuli umhlaba kudlala indima esentloko ekucutheni i-carbon, oku kuthetha ukuba umhlaba ukufanela phucukileyo ukugcina i-carbon evela emoyeni.

Isitshixo sobuchule sokuphumeza indlela yokungaphethuli umhlaba kukuba uyiqonde le ndlela kangangoko kunokwenzeka phambi kokuqalisa ifama yakho. Ngokuqinisekileyo, uya kufunda banzi ude uyifumanise into ekusebenzelayo kubume obungqonge indawo yakho nendlela ekulungeleyo ofanele ukusebenza ngayo. Kananjalo uyacetyiswa ukuba uqalise kwintsimi encinane ude uyiqonde indlela eqhuba ngayo neendlela zokusebenza eziyifaneleyo. Kukho imibandela embalwa ebalulekileyo kwimpumezo enempumelelo yenkqubo yokungawuphethuli umhlaba.

1. Udinga isixhobo sokutyala esingalimiyo. Oku kubaluleke kakhulu njengoko

senzelwe ukuzisika izigqobhoze iintsalela ezi-se-mhlabeni ukuze imbewu igqobhoze umhlaba ingaphawuphazamisi kakhulu umhlaba oyi-ngqo-ngileyo.

2. Kufuneka ube nesitshizi esoluliweyo. Ukuba phambi koko ubulutshabalalise phambi kwexesha lokulima ukhula ngeendlela zokulima zesiqhelo, ngoku uza kusebenzisa umchiza 'wokulutshisa- tshi' ukuze lonke ukhula lutshatyalaliswe phambi kokutyala. Kufuneka isitshizi sisebenze endaweni yekhuba, ikhuba lezikotile nesikofolo.
3. Kufuneka ube nesixhobo esenzelwe ukusasaza imququ neentsalela ngokulungelelana kuyo yonke intsimi. Oku kuyanceda ngexesha lokutyala njengoko isixhobo sokutyala sinako ukugqobhoza umhlaba ongaphezulu lula ukuze kungabikho zigaga zentsalela ezicukene ndawonye.

Ukungaphethuli mhlaba sesinye sezixhobo sokunqanda ingxaki yokhukuliseko lomhlaba ongaphezulu. Zikhona ezinye izenzo esinokuzenza thina balimi kwiifama zethu ukucutha ukulahleka komhlaba. Ezi ndlela ziqalisa

Photo 1: Kubalulekile ukusebenzisa isixhobo sokutyala ngaphandle kokuhlakula kodwa sigqobhozele ngaphaya kwentsalela yonyaka odlulileyo, apha sizekelisa ngengqolowa.
Photo 2: Umzekelo womaleko wentsalela elungileyo, oza kunceda ulondolozo lwamanzi ngokunjalo nokhukuliseko lomhlaba ongaphezulu olunciphileyo.

kwiindlela zokulima emasimini ezityalo ukuya kwiikampu zamadlelo emfuyo. Njengoko umba wokhukuliseko lomhlaba usiya ngokucaca, kuyakhuthaza ukubona uninzi lwabalimi lubugqala ubume obungqonge umsebenzi wabo ngokusebenzisa iindlela ezifanelekileyo zokulima.

Inqaku linikelwe nguGavin Mathews, onesiDanga kuLawulo loBume obusi-Ngqongileyo. Ngolwazi oluthe vetshe thumela i-imeyili apha: gavmat@gmail.com.

UKUSEBENZISA ITEKHNOLLOJI BANZI – xa umculo utshintsha, umxhentso nawo mawutshintshe

Olunye udlwabevu lwentetho kwiintetho ezenziwe kwiNkomfa yeGrain SA kulo nyaka lwenziwe nguRob Dunlop, ummi waseMzantsi Afrika ohlala eMelika nosebenzela abakwaMonsanto njengentloko yetekhnoloji yombona eYurophu, eMiddle East, eAfrika naseAsia.

Unike ulwazi olunika ithemba ngezinto ezintsha malunga nokudalwa kwezityalo ezitsha ngokunjalo nophuhliso oluvuyisayo ngenxa yetekhnoloji yesizukulwana esizayo. Mhlawumbi bekufuneka ukuba umntu ahambe ehlohle iindlebe zakhe ukuze angayiva yonke into ethethwa ngamaphepha-ndaba ngembewu enemfuza ehlelwa-hlengisiweyo, ngoko ke kubalulekile kuthi balimi ukuba sifumane ulwazi olufanelekileyo ukuze sikuqonde kakuhle esikunikwa yitekhnoloji yendalo ephilayo yesizukulwana esitsha. Njengoko etshilo uDunlop ukuba naxa kungathethwa kakuhle kumaphepha-ndaba kude kubekho nobuphakuphaku kuqhagamshelwano losasazo lwasentlalweni, ezi ngcali zingabo asikuko ukuba zizama ukuphuhlisa nakuphi ukutya okungekuko “iFrankenstein foods” kodwa bazondelele ukufuna iindlela ezintsha zokondla amanani abantu akhulayo emhlabeni phofu ngomhlaba ongengako nakwiimeko ezimbi.

Phakathi kweemeko ezinefuthe elikhulu ezikhokelela kwisidingo seetekhnoloji zesizukulwana esizayo, yimeko yokwanda okungxamileyo kwabantu (kaloku bayi-200 000 abantu abongezelelwa kumanani abantu behlabathi ngosuku ngalunye), ukuguquka kwemozulu, isidingo seshishini sezivuthisi zendalo ephilayo, isidingo sokutya okuthengekayo, uxinzelelo olwandayo kubukho bamanzi nobukho bokutya okwaneleyo ehlabathini. Nangona ikhona yonke le mingeni amaqela asebenza ngokudala izityalo ezitsha anochulumanco ngesakhono esiziswa yitekhnoloji ephuphumayo yendalo ephilayo kwaye uDunlop uthi kanti zisekhona izinto ezivus’ umxhelo ngakumbi eziseza kuza neziza kuvumela abalimi ukukhetha kwizixhobo ezibanzi

zokusebenza eziza kubanceda kumashishini abo okufama.

Ngoko ke yintoni equlethwe kubunjinieli kwimfuza yezityalo?

Kufuneka siqale sizame ukuqonda amanye amagama aluncedo:

Itekhnoloji yendalo ephilayo – Yiseti yenkqubo eziphathelele kwindalo ephilayo ngokusebenzisa iDNA nokuzidibanisa ngokweendlela ezintsha.

I-Bacillus thuringiensis (iBt) – Le yintsho-longwane ehlala emhlabeni kwaye ikwaphila ngokwendalo kummizo wemibungu, kuvivingane nakumabhabhathane ngokunjalo kwimiphazulu yamagqabi nakwezinye izinambuzane nakwiindawo ezingqongwe ngamanzi. Iintlobo ezininzi zale Bt zivelisa iiprotheyini ezizikristale nezineempawu zemichiza ebulala izinambuzane ezitshabalalisa izityalo ngoko ke isetyenziswa njengesitshabalalisi-zinambuzane sendalo ngokunjalo nakwizityalo ezinemfuza ehlelwa-hlengisiweyo.

I-Bt Corn – Yona ichaza umbona otshintshwe ngesiqalelo semfuza yeBt kwaye iyamelana nempehla egqobhoza isikhondo yaseYurophu.

I-DNA – Sonke siyazi ukuba iindlovu zizala iindlovu ezincinane, iindlulamthi zifumana iindlulamthi njalo njalo malunga nohlobo ngalunye lwesidalwa esiphilayo. Kodwa kutheni kunjalo? Impendulo ikwisiqalelo semoletyuli ekuthiwa yi-deoxyribonucleic acid (iDNA), equlethe imiyalelo yendalo ephilayo eyenza uhlobo ngalunye lwesidalwa lufane lodwa. I-DNA iqulethe imiyalelo edingekayo ukuze isidalwa sohlobo oluthile siphuhle, siphile kwaye sikwazi ukuzandisa ngenzala.

Ubunjinieli kwimfuza – Le yinkqubo ebandakanya ukufakwa kwesiqalelo semfuza (i-gene) sasemzini kwizicwili zemfuza (i-genome) yesidalwa esahlukileyo kwisidalwa sasemzini.

Izicwili zemfuza – Kwizifundo zanamhla ngeemoletyuli zendalo ephilayo nangemfuza, izicwili zemfuza zifumaneka kwisidalwa. Umzimba



UBUNJINELI KWIMFUZA YEZITYALO

wakho wenziwe ngezigid, ngezididi ezingamakhulu eeseli. Iseli nganye ineseti yayo epheleleyo yemiyalelo ngeendlela ezifanele ukwenziwa ngayo iiseli zakho, iziquqatho zazo neziqulatho zeziqulatho zazo. Le seti yemiyalelo zizicwili zakho zemfuza. Zonke izidalwa eziphilayo zinezicwili zemfuza. Ibhungane ngalinye linezicwili zemfuza yebhungane, eziyiseti epheleleyo yemiyalelo yokwenza ibhungane. Amakhaphetshu anezicwili zemfuza yamakhaphetshu kanti iintsholongwane zinezicwili zemfuza yentsholongwane.

I-Roundup® – Lo ngumchiza otshabalalisa zonke iintlobo zokhula, njengoluvela ngonyaka ngamnye nolonyaka wonke. I-Roundup ingazonakalisa nezityalo, ezifana nombona kunye neemboty zesoza ngenxa yokuba zingakwazi kuMelana neRoundup. I-Glyphosate sesona sithako sisebenzayo kuyo.

I-Roundup Ready® – Ligama lokurhweba elinikwa iintlobo ezithile zombona, zeemboty zesoza, umqhaphu, okanye icanola ezidalwa ngokwemfuza entsha ukuze zikwazi ukumelana nomchiza we-Roundup.

UbuNjineli kwiMfuza yeziTyalo – inkqubo

Inkqubo yobunjineli kwizityalo ibandakanya ukuthathwa kwesiqalelo esinye semfuza nokuba zingaphezu koko kodwa sithathwe kolunye uhlobo ukuze sifakwe kwisakhelo semfuza yesinye isityalo. Kuthathwa iDNA kwesinye isityalo, umzekelo intsholongwane ukuze eso siqalelo semfuza sisuswe kwezinye sandule ukufakwa kwiiseli zesityalo esingumamkeli. Eso siqalelo semfuza (i-gene) siyaguqu-guqulwa size sifakwe ngompu wesiqalelo semfuza kwesinye isityalo kuba kusetyenzwa ngemicu emincinana engabonakaliyo ngeliso lenyama. Eso sityalo ke sibizwa ngokuba sisidalwa esinemfuza ehlanga-hlengisiweyo (*genetically modified organism* – iGMO).

Obu bunjineli kwimfuza yezityalo luhlobo lwetekhnoloji eyenziwa kwindalo ephilayo njengoko isetyenziselwa ukudala imbewu eneempawu ezizodwa nezingqaliswayo. Izityalo zokuqala ezadalwa ngetekhnoloji yobunjineli bemfuza kwakusenzelwa ukuba zikwazi ukumelana nemichiza yokutshabalalisa ukhula okanye ukuba kubekho imichiza yokutshabalalisa izinambuzane kuzo. Imizekelo eyaziwa kakhulu yezi zityalo zimbotyi zesoza ze-Roundup Ready kunye nombona weBt.

I-Roundup kunye nezityalo zeRoundup Ready

I-Roundup ngumchiza onamandla kakhulu yokutshabalalisa ukhula kwaye ubulala uluhlu olubanzi lokhula ngokunjalo lwaziwa njengomchiza woluhlu olubanzi. Iimboty zesoza zeRoundup Ready zizityalo ezinemfuza ehlanga-hlengisiweyo kwaye zidalwe ngendlela yokuba zimelane neRoundup ukuze ibe lukhula oluzingqongileyo kuphela olutshabalalayo ingabi sisityalo. Phambi kokuba letekhnoloji yendalo ephilayo ibe khona

indlela yokutshabalalisa ukhula kwiimboty zesoza yayikukulima phakathi kwemiqolo okanye ukutshiza ngononophelo olukhulu phakathi kwemiqolo kanti ngokwenza njalo bekubekwa esinye isityalo esichengeni sokufa. Zithe zakufumaneka iimboty zesoza zeRoundup Ready baqala abalimi ukulima imbewu enyamezelayo nokutshiza intsimi iphelele ngeRoundup ukuze xa lusifa ukhula, sisale sona isityalo singachaphazelekanga.

Umbona we-Bt

Le ntsholongwane efumaneka ngendalo ikhupha iprotheyini yeekristale ekwaziyo ukubulala ezinye izinambuzane. Ukuba isinambuzane sitya iprotheyini yeBt ihlasela umjelo waso wokucolwa kokutya ukuze zinyanzeleke ukuba ziyeke ukusitya, zigqibela ngokufa kusuku olu-1 ukuya kwezi-5. Zithe iingcali zenzululwazi zakukufumanisa oku ngeminyaka yoo-1950 baqala benza umchiza otshizwayo kwathi kufika iminyaka yoo-1990 zabe iingcali zenzululwazi sezisenza izityalo zemihlanganisela yokuqala yombona we-Bt ngokusebenzisa ubunjineli bemfuza. Bafunxa iiprotheyini ezinetyhefu zeBt baze bayifaka kwisityalo sombona ukuze isityalo sombona weGMO sivelise kwayona le protheyini yetyhefu. Impehla yaseYurophu egqobhoza isikhondo sombona sisonakalisi esibi emboneni kanti xa umbungu uqalisa ukutya isityalo sombona utya netyhefu ehlasela umjelo wokucolwa ukutya zide zife. Ngokusebenzisa obu bunjineli bemfuza kugcineka izigidi zeerandi ebeziza kuba yinzuzo elahlekayo.

Izityalo zesizukulwana sokuqala setekhnoloji yendalo ephilayo ezinemichiza yokutshabalalisa izinambuzane nokhula zisetyenziswa kakhulu namhla kanti iiGMO zinendima ebalulekileyo kwinkqubo yokutya enika isondlo semfuyo nokutya okusetyenziswa ngabantu. URob Dunlop ukholelwa ekubeni njengoko inzululwazi iqhubela phambili kuya kugqibela ngokuba kubekho uphuhliso olutsha noluncomekayo lwezityalo ezidalweyo xa kuphuhliswa imbewu yesizukulwana sesi-3 neyesi-4. Ukuguquka kwemozulu nokunqaba kwamanzi kuya kucutha izivuno kulo lonke ihlabathi ngoko ke iMonsanto seyinomhlanganisela omtsha wombona obizwa ngokuba yiDroughtGard ebalula ukuncomeka kobukho bamanzi kunye nokunyamezela imbalela. Uthe ubukho bokutya okwaneleyo nezivuno ezandileyo buya kufumaneka ngokubalaseleyo xa kusetyenziswa umnqamlezo wobuchule bemfuza, ukudalwa iintlobo ezintsha naxa kukutshwa iinkcukacha zokunceda umlimi ukuba enze ezona zigqibo zilungileyo kulo lonke ixesha lokulima lonyaka kungakhathaliseki ukuba umsebenzi wokufama mkhulu okanye mncinane kangakanani. Kwinyanga ezayo siza kundwendwela abalimi abasebenzisa itekhnoloji yendalo ephilayo kwiinkqubo zabo zokulima. 🌱

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Inzuzo zokugalela ikalika

Umhlaba bubutyebi bendalo obungummangaliso, enyanisweni ukuba besingenabo obu butyebi ngekungekho bomi kweli hlabathi. Umhlaba usigcina siphila! Umhlaba uyaphila, uyaphefumla kwaye usoloko uneenguquko. Xa kukho isityalo esikhula kuwo, eso sityalo sifunxa izondlo neetyuwa emhlabeni, ngoko ke uyaguquka.

Kwezolimo apho kusoloko kulinywa uhlobo olunye lwemveliso nalapho kusetyenziswa khona ezinye iindlela zesiqhelo zokuwusebenzisa ukuze ngenxa yoko umhlaba ungafane ufumane thuba lokuphumla, kubalulekile ukuba siyiqonde ingcombolo yomhlaba nezidingo zawo. Asinakusoloko siqhube ngokufumana inzuzo yezondlo zezityalo zethu emhlabeni kodwa thina sibe singabuyiseli nto kuwo.

Iintlobo zomhlaba nolwakhiwo lawo zihluka ngokweendawo ukusuka kwindawo ethile ukuya kwelandelayo. Zintlanu iintlobo ezahluka-hlukileyo zomhlaba esikholisa ukuzifumana eMzantsi Afrika.

- **Iimhlaba yesanti** – ayiwagcini kakuhle amanzi, kodwa uthande ukufudumala kwaye kulula ukuwusebenza xa kukho ukufuma okukhoyo.
- **Iimhlaba yodongwe** – iwagcina kakuhle amanzi kwaye ichumile ngezondlo, kodwa kusenokuba nzima ukusebenza ngawo nokuwulima.
- **Iimhlaba eyintlenga** – ikulungele ukugcina amanzi, kodwa ayikulungelanga kakhulu ukugcina izondlo.
- **Iimhlaba enezinto ezaziphila** – ichumile ngezinto ezifana nemithi nezityalo ezivundileyo kwaye iyakwazi ukugcina amanzi amaninzi.
- **Iimhlaba ebutyuwa** – inemhlaba enesiquatho esiphezulu setyuwa ngenxa yoko izityalo zikhula kade kulo mhlaba.

Owona mhlaba ulungileyo ngoxuba ezi ntlobo zintathu (oyintlenga, oyisanti noludonwe) obizwa kukuba ngumhlaba oluvunduvundu. Umhlaba oluvunduvundu ukholisa ukuba sabumnyama ngebala kwaye unesiquatho esilungeleleneyo. Uwagcina kakuhle amanzi ngokunjalo nezondlo. Oku akuthethi ukuba uya kuhlala uchume zizondlo unaphakade! Apho bekulinywe khona izityalo, izondlo zisetyenziswa phantse zonke.

Yiloo nto kubalulekile ukuthatha iisampulu zomhlaba phambi kwexesha ngalinye lokulima.

Kufuneka sikubuyisele ebesikuthathe kuwo ukuze siqhube ngokufumana izivuno ezihle. Enye yeendlela zokulungisa ezinokwenziwa rhoqo kukufakwa kwekalika. Oku kuya kuxhomekeka kwisiquatho seasidi esemhlabeni okanye iPh. Ikalika isetyenziselwa ukudodobalalisa isiquatho seasidi emhlabeni. Ukuba umhlaba usoloko uneasidi ethe kratya, kuya kuba yimigudu ukufumaneka kwezondlo emhlabeni. Ngoko ke, xa sifaka isichumiso esininzi, kodwa ube uneasidi eninzi umhlaba wethu, izityalo azisayi kufumana nzuzo ipheleleyo kwisichumiso esigalelweyo.

Izondlo ezahluka-hlukileyo zifuna amazinga ahlukahlukileyo obuqalalayini: nangona kunjalo, izityalo ezininzi ziphumelela ekuthatheni izondlo xa iPh yomhlaba iphakathi kuka 4,5 no 6. Izityalo ezahluka-hlukileyo ziqhuba ngeendlela ezahluka-hlukileyo phantsi kwemeko yomhlaba oneasidi eninzi. Iimbotyi zesoya nojongilanga bayakwazi noko ukunyamezela imihlaba eneasidi eninzi xa kuthelekiswa nezityalo ezifana nombona. Oku kuthetha ukuba zisenako ukunika izivuno ezilungileyo phantsi kweemeko ezinamazinga aphantsi ePh. Kwelinye icala umbona, ngenxa yokuba wona udinga izixa ezikhulu zeNitrogen, ufuna imihlaba enePh ephantsi. Ngoko ke kusoloko kufuneka ikalika ethe kratya xa kulinywa umbona ukuze incedise ukufunxwa kweNitrogen kunye nezinye izondlo ezibalulekileyo emhlabeni.

Ndingayifumana phi ikalika kwaye kufuneka ndiyigalele njani?

Iinyathelo lokuqala elibalulekileyo ekufuneka ulithathe phambi kokuthenga ikalika kukuvavanya iziphumo zeesampulu zomhlaba wakho ngononophelo. Oku kuya kubonisa ukuba loluphi uhlobo lwekalika ofanele ukulusebenzisa ngokweemfuneko zomhlaba. Iintlobo zekalika ezimbini oza kuzisebenzisa zingaba yiCalcitic okanye iDolomitic. Ukuba iziphumo zohlalutyo lweesampulu zomhlaba wakho zibonisa ukuba kukho unqongophalo lweMagnesium ngoko ke kufuneka ufake ikalika yeDolomitic. Kodwa ukuba iziphumo zeesampulu zomhlaba zibonisa ukuxhaphaka kweMagnesium, kodwa iCalcium ibe incinane kufuneka usebenzise ikalika yeCalcitic. Oku kubalulekile kuba xa seyanele iMagnesium emhlabeni akukho mfuneko yokongeza



enye njengoko oku kuya kuphazamisa ukufunxeka kwezinye izondlo ezibalulekileyo.

Ngethamsanqa ikalika kulula noko ukuyifumana kwaye inokuthengwa kubathengisi abahluka-hlukileyo abazimeleyo oya kuba nako ukubafumanisa ngokubuza ummeli wendawo yakho wezichumiso. Ikalika kanti nayo inexabiso eliphantsi; umba ophambili onokwandisa iindleko zekalika luthutho. Ikalika ikholisa ukufuneka ngezixa eziphezulu, ngoko ke kuya kufuneka uthutho lwezixa ezikhulu. Kucetyiswa ukuba ubonise nabalimi abakufutshane kuwe ukuze nizame ukwabelana ngeendleko zothutho.

Kaninzi iimfuneko zekalika azisiwa so ngenxa yenkxamleko yayo. Abalimi abaninzi bakholelwa ekubeni banako ukuphumelela nokuba abayigalelanga ikalika, kodwa isityalo asinakuqhuba kakuhle kangokuba bekuya kuba njalo ukuba besifumene izondlo ezichanekileyo. Ngoko ke kulungile ukuzixhamla ngokugalela ikalika. Oku kunokwenziwa ngeekhontraktha ezinoomatshini abalungileyo ukuze kongiwe ixesha. Kusoloko kucetyiswa ukuba kuthathwe ingqalelo yazo zonke iziphumo zohlalutyo lweesampulu zomhlaba njengoko uninzi lwezondlo lusebenzisana ukuze isityalo sibe nako ukuzisebenzisa ngokuchanekileyo. 🌱

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ICANOLA

– imiba ebalulekileyo efanele ukuqwalaselwa ngenyanga kaJuni



Amasimi ecanola aseNtshona Koloni.



Amasimi ecanola aseNtshona Koloni.

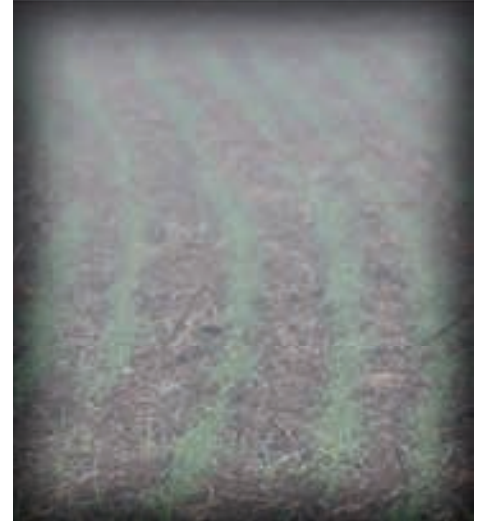
Icanola ifanele ukulinywa phakathi kuEpreli ukuya ekuqaleni kukaMeyi. Khumbula ukuba ngeveki nganye ukukhula kwembewu yecanola kuyabambezeleka emva kwaphakathi kuEpreli, isityalo silahlekelwa sisakhono sokufunyanwa kwezivuno ezizezona ziphucukileyo. Ngenyanga kaJuni, kubalulekile ukucinga ngokufaka umaleko wangaphezulu wokuqala wenitrogen kanti sinokuba khona nesidingo sokufakwa kwezitshalalisi zokhula emva kokuhluma.

Umaleko wokuqala wangaphezulu ufakwa kwiintsuku eziyi-30 ukuya kweziyi-40 emva kokuhluma kwaye esi sixhomekeke ekubeni ingakanani initrogen (N) ebifakwe ngokubekutyalwa. Kukholisa ukufakwa malunga ne-40 kg ngehektare ukuya kwi-60 kg ngehektare efakwayo yomaleko ongaphezulu. Kuxhomekeke kwixesha lokulima lonyaka, kusenokulandeliswa ngomnye kwiintsuku eziyi-60 ukuya kweziyi-70 emva kokuhluma. Kumaxesha onyaka embalela,

ukwaleka kwesibini kusenokungenziwa. Khumbula ukuhlanganisa nesulphur kumaleko ongaphezulu njengoko isulphur ibaluleke kakhulu kuphuhliso nakwisivuno secanola.

Malunga nokutshatyalaliswa kokhula emva kokuhluma, oko kuxhomekeke kuhlobo lweecanola ebityaliwe. Ukuba bekutyalwe umhlanganisela we-CL, umntu unokusebenzisa iCysure ukutshalalalisa ukhula lwamagqabi abanzi olukhula ebudeni bonyaka okanye ngenye yemichiza elandelayo: iLontrel, iLomex, iGallant Super, iAgil, iCo-Pilot, iPantera okanye iAramo. Ukuba ngumhlanganisela we-TT, unako ukusebenzisa iAtrazine okanye iSimazine ekutshalaliseni ukhula, kodwa ezi mveliso zimbini zinokusebenziswa kwimihlanganisela ye-TT kuphela. Kwimihlanganisela yesiqhelo, kunokusebenziswa nawuphi umchiza wokutshalalalisa ingca okanye ukhula lwamagqabi abanzi obhaliselwe icanola.

Kubalulekile ukukhumbula okulandelayo xa kufakwa imichiza yokutshalalalisa ukhula:



Icanola eselula. Ifoto kaGq Johann Strauss.

- limveliso ezitshintshanayo ukuze kuthintelwe ukumelana kwazo nemichiza.
 - Xa kutshizwe izithole eziselula zokhula, ukutshalalalisa ukhula kufanele ukuba bhetele.
 - Khumbula ukusicoca ngononophelo isixhobo sokutshiza emva kokufaka umchiza wokutshalalalisa ukhula kwizityalo eziziinkozo, ezifana nengqolowa, phambi kokutshiza icanola, ngakumbi emva kokusebenzisa imichiza yeSU.
 - Qiniseka ukuba isixhobo sokutshiza sinemihlanganiselo echanekileyo.
 - Qiniseka ukuba akutshizi xa umoya uvuthuzwa ngamandla, njengoko ukuphaphatheka komchiza kunokutshalalalisa ezinye izityalo ezikufutshane.
 - Khumbula ukuba isakhono seemveliso siyetha xa ukhula lucinezelekile (yingqele, imbalala okanye ubushushu) naxa lungakhuli ngokwesiqhelo.
- Ndikunqwenelela ithamsanqa kwixesha lakho lokulima icanola kanti khumbula oku; Silawule ngobunono isityalo sakho ukuze uqiniseke ngesityalo esihle nangengeniso elondolozekayo.

Inqaku linikelwe nguGq Johann Strauss, Ingcali kwezenzulwazi: linkqubo zokuLima okuLondolozekayo, ISebe lezoLimo leNtshona Koloni. Ngolwazi oluthe vetshe, thumela i-imeyili apha: JohannSt@elsenburg.com.

I-Grain SA kudliwano-ndlebe...noJafta Taso

UJafta Taso wesithili saseSenekal kwiPhondo laseFree State akangomlimi osebenza nzima kuphela, nothembekileyo kodwa ukwazile ukuba ne-sivuno esiphinda-phindwe kabini kwiminyaka emibini edlulileyo. UJohan Kriel ubambe udlwano-ndlebe noJafta ukwenzela eli nqaku lePula Imvula.

Uwuqhuba phi umsebenzi wokufama kwaye ngehektare ezingaphi? Ulima ntoni?

Ndilima kwisithili saseSenekal eFree State. Lilonke ndilima ihektare eziyi-1 630 zomhlaba. Ndilima umbona, ojongilanga neemboty zesoya kwaye ndineenkomo zenyama.

Zinto zini ezikukhuthazayo?

Ukusebenza nzima, ngokuthembekileyo kuyandikhuthaza. Ndifuna ukuqhubela phambili ebomini ndiziphucule. Ndifuna ukuqiniseka ukuba abantwana bam banekamva kweli lizwe.

Chaza imiba onamandla kuyo nobuthathaka kuyo

Amandla ndiwafumana kwinkxaso enamandla endiyifumanayo. NdineGrain SA, umcebisi wam, u-Oom Flip du Preez, nabalimi endisebenzisana nabo, abarhwebayo nabasaphuhlayo, abandincedisa ngokundikhokela nangamacebiso afanelekileyo. Kodwa ndisenabo ubuthathaka kuba izixhobo zam zindala kanti nemali eyinkunzi akululanga ukuyifumana. Kanti ndikhe ndibe nomsindwana okhawulezayo. Uyandicaphukisa umsebenzi ongacoselelwanga.

Sasingakanani isivuno sesityalo sakho ngoko wawuqalisa ukufama? Singakanani ngoku malunga nezo zityalo?

Into endinokuyithetha kukuba isivuno sam sezityalo singaphezu kwesiphinda-phindwe kabini kwiminyaka emibini edlulileyo. Isivuno sam sojongilanga sande ngeetoni eziyi-1,5/ ngehektare nganye ukuya kwi-1,9 yeetoni ngehektare nganye kanti isivuno sombona wam sande safikelela kwiitoni ezi-4 ngehektare nganye.

Ucinga ukuba yintoni eyonanto ebinogalelo kwinkqubela nakwimpumelelo yakho?

Ukuba ungumntu omamelayo xa icebiso lilungile, kwaye ufumana uqeqesho olufanelekileyo ngokunjalo notyelelo olwenziwa rhoqo efama nenkxaso yabantu abalungileyo iya kuphucuka ngokuphucuka imeko yakho. INkqubo yoPhuhliso lwabaLimi yaseGrain SA ikunika ezo zinto. Kodwa ufanele ukuyenza into oyifundileyo kungenjalo ayinakukunceda nganto.

Hlobo luni loqeqesho osowulufumene kude kube ngoku iloluphi uqeqesho osalunqwenelayo?

Ndiphumelele izifundo ezilandelayo: Intshayelelo ngoMbona nooJongilanga, esezikwiBanga eliPhambili ngoMbona, uLawulo noCwangciselelo lweFama, uLondolozo lwaPhakathi eFama neeNdibano zokuBonisana ngeZakhono zobuChule. Ndinga uqeqesho oluthe chatha kuLawulo lweMali nakubuDlanelane babaSebenzi.

Uzibona undawoni kwiminyaka emihlanu ezayo? Ngaba unqwenela ukuzuzana ntoni?

Kwiminyaka emihlanu, ndifuna ukufikelela eku-kwazini ukuzimela, ndingabi natyala. Ndifuna ukuba ngumlimi ophucukileyo nomntu oqhubela phambili kunokuba ndinjalo ngoku. Emva koko kuya kulandela impumelelo.

Ungabacebisa uthini abalimi abasaqalayo abanomnqweno wempumelelo?

Musa ukulinda ukuncedwa nguRhulumente. Yenza into yakho. Qinisekisa inkxaso yakho ujonge kwaye ufunde. Buza, bamamele abanye, sebenzisana nabanye abalimi usebenze nabo.

Inqaku linikelwe nguJohan Kriel, uMququzeleli woPhuhliso kwiNkqubo yoPhuhliso lwamaFama lwaseGrain SA. Ngolwazi oluthe vetshe, thumela i-imeyili apha johank@grainsa.co.za.

Ulawulo lwemingcipheko kwimijikelo yobomi bezityalo ezilinyelwa inzuzo yemali eyikheshi



Ngokubanzi ulawulo lwemingcipheko lunokuchazwa njengokuchonga, ukufumanisa ubungakanani nokuhlola nakuphi ukuthandabuza malunga nawuphi umba wenkqubo yokulungiswa kwemveliso okanye owenkqubo yoqoqosho eya kuchaphazela isiphumo seenjongo ezichazwe ngendlela elungileyo okanye engalunganga. Yakuba ichongiwe imiba yemingcipheko eyahluka-hlukileyo, okulandelayo kukunciphisa, kukubek' esweni nokuthintela amathandabuzo anokuba nefuthe elinokuchaphazela isiphumo semveliso okanye esoqoqosho.

Ukulima izityalo

Ukulima izityalo kubalimi abasebenza kwiimeko zaseMzantsi Afrika, ngaphandle kwabo basoloko benamanzi, lishishini elinzima kakhulu ngenxa yemiba emininzi eyimingcipheko kunye namathandabuzo ekwezoqoqosho efanele ukuchongwa.

Umlimi ufanele ukuba nezakhono zobuchule kwiinkalo eziliqela zolwazi ezifana nezifundo ngendalo ephilayo, ezenzululwazi ngomhlaba, ulwazi lokukhanda oomatshini, ulawulo lwabasebenzi, ukulinywa kwezityalo, ukulondolozwa kwemfuyo, ukuthengisa noqoqosho, xa sibala ezimbalwa, ukuze akwazi

ukwakha ishishini lokufama elinempumelelo. Zonke ezi zakhono zobuchule zisetyenziswa emisebenzini emininzi neyahluka-hlukileyo yokulima ebandakanyeka kwimveliso yezi-tyalo yamaxesha athile onyaka kulo lonke ixesha lonyaka. Imibandela yemingcipheko enokubakho echongiweyo mayisoloko ikhunjulwa ngamathuba asentloko okwenziwa kwezicwangciso zonyaka ngamnye.

Xa uvuna izityalo zakho zangoku elo lithuba elihle lokucinga ngazo naziphi izifundo ozifumene kumava akho exesha elidlulileyo lokulima ukuze kuncitshiswe nawuphi umngcipheko wokulima ochongiweyo okanye okhankanywe emsebenzini wakho wokulima.

Umnqweno ofanele ukuba nefuthe emsebenzini wakho wokulima okunempumelelo kukwenza izicwangciso zokufumana eyona nzuzo iphezulu kwiimeko zomngcipheko ongonwona mncinane nokuthintela nayiphi intsilelo enokubakho ekufumaneni izivuno ebezicwangciselwe nengeniso yaphambi kokuba kuxhuzulwe imali kuyo.

Izityalo ezisentloko kwezilinywayo eziziinkozo eMzantsi Afrika

Igalelo elililo nepesenti yazo zonke izityalo ezisentloko ezilinywa eMzantsi Afrika liboniswa **kwiTheyibhile 1**. Iinkcukacha zihlanganiselwe ngokweengqikelelo zezityalo zokugqibela ze-SAGIS.

Njengoko kubonakala kwiTheyibhile 1, kuyacaca ukuba ukwetha okwenzeka kwimihlaba eyomileyo ekulinywa ingqolowa kuyo kwingingqi yezityalo zasehlotyeni kubangele

Itheyibhile 1: Igalelo elililo nepesenti yezityalo eziphambili ezilinywa eMzantsi Afrika.

Izityalo	Izixha zemveliso ngeetoni ngo-2013	
	litoni	Igalelo ngokwe %
Izityalo zasehlotyeni		85,19%
Umbona	11,690,000	77,03%
Imbewu kajongilanga	557,000	3,67%
limbotyi zesoya	516,500	3,40%
Amandongomane	46,900	0,31%
Amazimba	62,620	0,41%
limbotyi ezomisiweyo	55,820	0,37%
Izityalo zasebusika		14,81%
Ingqolowa	1,870,000	12,32%
Ibhali evundileyo	298,000	1,96%
Imbewu yeoyile yecanola	79,000	0,52%
Isixa esipheleleyo	15,175,840	100,00%

Iqela labahleli

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isiXhosa,

IsiNgesi, IsiBhulu, iSeTswana,
iSesotho, iSesotho sa Leboa nesi IsiZulu.

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Ulawulo lwemingcipheko kwimijikelo yobomi bezityalo ezilinyelwa inzuzo yemali eyikheshi

ukuguqukela okukhulu kwemveliso yesizwe sethu kwimveliso yeenkozo zasehlotyeni. Imveliso yezityalo zasehlotyeni ngoku ifikelela kwi 85% yemveliso yeenkozo iphelele xa kuthelekiswa ne 15% yemveliso yasebusika yeenkozo.

Ukugqwesa kwemveliso yombona kangange-77% yemveliso yeenkozo iyonke bubungqina obukhulu.

Eminye imiba ephambili yemingcipheko

Imiba yokulima ephambili nefanele ukuthathelwa ingqalelo xa kusenziwa izicwangciso zokunciphisa imingcipheko ekulinyweni kwezityalo kwimimandla yembalela, inokushwankathelwa ngale ndlela ilandelayo:

- Imozulu exhaphake kwingingqi owenza kuyo umsebenzi wakho wokufama.
- Imvula efumaneka kwithuba elide kunye neendlela ena ngazo imvula ziya kuyichaphazela ifama okanye iifama zakho kwimisebenzi emininzi yokulima.
- Uhlobo lomhlaba nobunzulu obufumanekayo beengcambu.
- Ukusetyenziswa kobutyebi bomhlaba nako konke okusefama ngendlela encomekayo nelungeleleneyo.
- Iindlela zokulima kubandakanywa ukulima ngendlela yesiqhelo, indlela yolondolozo neyokuhlakala okukokona kuncinane.
- Ukukhetha imihlanganisela.
- Ubude bexesha lokulima ukuze lilingane kangangoko ithuba lokutyala.
- Umgangatho wokusetyenziswa koomatshini kunye nokuqukwa okufanelekileyo kweetrekara kunye nezixhobo zokusebenza ukuze ukulinywa kwezityalo kwenzeke ngexesha kwaye kuncomeke.
- Umgangatho wobuchule kwinkqubo emanyanisiweyo yokutshabalalisa izinambuzane nokhula.
- Ukusetyenziswa kweinshorensi yezityalo ukuze kulawulwe okanye kuthintelwe intlekele enkulu enokwenziwa zizichotho.
- Ukudityaniswa kwezityalo zohlobo lwasebusika nezasehlotyeni ezilinywa kwinkqubo ecwangciselweyo yokujikeleziswa kwezityalo ukuze kulawulwe imingcipheko echaphazela imveliso neyemali.
- Isakhono sokwenza izicwangciso kuse-lithuba ukuze sikwazi ukuqikelela izivuno zemveliso ukuqinisekisa ukuthengiseka kwesityalo ngamaxabiso angawona alungileyo kummandla wentengiso welo xesha lonyaka.

Eminye imibandela yemingcipheko engangqalanga ngoku ekulimeni iquka isakhono sokulawula, umgangatho wolwazi lwemicimbi yemali ukuze ukwazi ukuqikelela imida eyahluka-hlukileyo ngezinto ngezinto malunga nemisebenzi yokulinywa kwezityalo eziziinkozo kunye nesakhono sokulawula abasebenzi abafunekayo bokwenza umsebenzi omkhulu wokufama.

Isakhono sokukwazi ukuqikelela imfuno yexesha elizayo kunye nemikhwa yamaxabiso esityalo ngasinye esinokulinywa kwifama yakho, ngokuthathela ingqalelo kwimozulu nakwisakhono somhlaba, siya kubaluleka kakhulu kwimpumelelo yakho kwimiba yemali kwixesha elizayo.

Umba wemingcipheko ongasentla ngamnye mawuqatshelwe uwodwa kwaye kujongwe ukuba ungaphuculwa phi kwaye njani kunangonyaka odlulileyo. Umlimi ngamnye uya kuzazi iinkalo afanele ukuziphucula. Kungenzeka ukuba udinge amacebiso eengcali malunga nombala ngamnye ukuze ukwazi ukuhlalutya umba ngamnye ngokweenkcukacha zawo.

Ukwenza izicwangciso ngokujikeleziswa kwezityalo

Iziqhelu zokuna kwemvula ebezikho kwixesha lokulima elidlulileyo ziyawubonakalisa lo mba njenqoqwalaselo olubaluleke kakhulu lohlahutyo oluchanekileyo nolunentsingiselo kucwangciselwa lwethuba elide lokulinywa kwezityalo ukuze kufumaneki inzuzo yemali eyikheshi.

Njengoko kubonakala kwithebyhile 1, abo balimi bakwindawo zezityalo zasehlotyeni nabangakwaziyo ukuquka ingqolowa ekujikelezisweni kwezityalo bakhulisa ukulima umdibaniso wombona, imbewu kajongilanga, iimboty zesooya, okanye amandongomane. Ukuba imizi-mveliso eyenzelwa izicwangciselwa malunga nezivuthisi eziyindalo zininokuhlakala ukuze kungenzeka ukuba kuphinde kulinywe amazimba.

Ukuba ingqolowa iyahlawuleka kwindawo yakho inako ukuqukwa ekujikelezisweni kwezityalo namadlelo ukuze kuncitshiswe ithuba elide lemingcipheko enokubakho.

Isiphetho

Uhlalutyo lwemingcipheko oluqinisekisa ngezonophelo kumba ngamnye obalulekileyo kunye nokulinywa kwezityalo ezahluka-hlukileyo ekujikelezisweni kwezityalo zasehlotyeni nezasebusika luya kwenza ukuba wena njengomlimi ukwazi ukulawula imingcipheko onokuyifumana kwaye uqinisekisa ukusindisa imali yakho kwithuba elide.

Inqaku linikelwe ngumlimi okumhlala-phantsi.