# Monthly report on livestock disease trends as informally reported by veterinarians belonging to the Ruminant Veterinary Association of South Africa (RuVASA), a group of the South African Veterinary Association

# September 2018

(Previous disease reports can be seen on the RuVASA website www.ruvasa.co.za)

These reports include data from individual practices

#### **Click on Disease Reports**

#### The following practices and laboratories (113) submitted reports during September 2018:

#### Mpumalanga (10)

Balfour - Dr. Louis van Jaarsveld

Bethal – Dr. Hardus Pieters

Ermelo – Dr. Ben Potgieter

Grootvlei – Dr. Neels van Wyk

Karino – Dr. Silke Pfitzer

Middelburg – Drs. Erasmus, Malan and Bernitz

Nelspruit – Dr. André Beytel

Piet Retief - Drs. Niebuhr and Weber

Standerton - Dr. Kobie Kroon

Volksrust – Dr. Johan Blaauw

#### Gauteng (8)

Bapsfontein – Drs. Englbrecht and Olivier

Bronkhorstspruit - Dr. De Bruin, De Bruin and Labuschagne

Hammanskraal – Dr. Hentie Engelbrecht

Magaliesburg - Dr. Ryan Jeffery

Nigel - Dr. Cindy van der Westhuizen

Onderstepoort Veterinary Academic Hospital – Proff. Annandale, Shakespear, Holm, Pettey and Drs,

Fitte, Grobler, Hamman, Koeppel, Leask, Mabu, Marufu, Mokoele, O'Dell, Tshuma and Van der Leek

Pretoria – Dr. Hanneke Pienaar

Vanderbijlpark – Dr. Kobus Kok

#### Limpopo (7)

Bela-Bela – Dr. Nele Sabbe

Mokopane (Potgietersrust)- Dr. Henk Visser

Mokopane - Dr. Alwyn Venter (CCS)

Polokwane (Pietersburg) - Drs. Watson, Viljoen, Jansen van Vuuren, Van Rooyen, Snyman and Cremona

Tzaneen – ZZ2 Farm practice – Dr. Danie Odendaal

Vaalwater – Dr. Hampie van Staden

Vaalwater – Dr. Annemieke Müller

#### North West (9)

Brits - Dr. Boshoff and Coertze

Christiana - Dr. Pieter Nel

Klerksdorp – Drs. Geral, Theron, Van den Berg and Van den Berg

Klerksdorp – Drs. Coetzee and Venter

Leeudoringstad - Dr. Ian Jonker

Lichtenburg – Dr. Nelmarie -Krüger-Rall

Stella - Dr. Magdaleen Vosser

Ventersdorp/ Koster – Drs. Benadé and Van der Merwe

Vryburg – Dr. Jurie Kritzinger

#### Free State (17)

Bethlehem – Drs. Strydom and Strydom

Bloemfontein – Dr. Stephan Wessels

Clocolan – Drs. Wasserman and Basson

Dewetsdorp – Dr. Marike Badenhorst

Excelsior/Ladybrand – Drs. Dedré Nel

Ficksburg – Drs. Kotzé and Coetzer

Frankfort - Drs. Lessing, Cilliers and Janse van Rensburg

Hertzogville – Dr. Nico Hendrikz

Hoopstad – Dr. Kobus Pretorius

Kroonstad – Drs. Daffue, Eksteen, Van Zyl and Van der Walt

Memel – Drs. Nixon and Nixon

Philippolis – Dr. Stephan van Niekerk

Reitz - Dr. Murray Smith

Smithfield – Dr. Nienke van Hasselt

Viljoenskroon – Dr. Johan Kahts

Villiers – Drs. Hattingh and Hauptfleish

Wesselsbron – Dr. Johan Jacobs

Zastron – Drs. Troskie and Strauss

#### KwaZulu-Natal (11)

Bergville - Dr. Ariena Shepherd

Bergville – Dr. Jubie Muller

Camperdown – Dr. Anthony van Tonder

Dundee - Drs. Marais, Fynn and Reynolds

Estcourt – Drs. Turner, Tedder, Taylor, Tratschler, Van Rooyen and Alwar

Kokstad – Drs. Clowes and Shrives

Mtubatuba – Dr. Trever Viljoen

Pietermaritzburg – Dr. Phillip Kretzmann

Pongola – Dr. Heinz Kohrs

Underberg - Drs. Collins, King and Delaney

Vryheid – Drs.Theron and Theron

#### Eastern Cape (14)

Alexandria - Dr. Johan Olivier

Alexandria – Dr. Charlene Boy

Aliwal North – Drs. Troskie and Strauss

Bathurst - Dr. Jane Pistorius

Cofimvaba – Dr. Werner Wentzel

Cradock - Dr. Frans Erasmus

Graaff- Reinet - Dr. Roland Larson

Humansdorp – Drs. Van Niekerk, Jansen Van Vuuren and Davis

Middelburg/Steynsburg – Drs. Van Rooyen and Viljoen

Queenstown – Drs. Du Preez, Godley, Klopper, Jansen van Vuuren, De Klerk and Catherine

Somerset East – Drs. Farrel, Louw and Ross

Stutterheim - Dr. Dave Waterman

Uitenhage – Drs. Mulder and Krüger

Witelsbos - Dr. Elmien Kotze

#### Western Cape (22)

Beaufort West - Dr. Jaco Pienaar

Caledon – Drs. Retief, Coetzer and Janssen

Caledon – Drs. Louw and Viljoen

Ceres – Drs. Pieterse, Wium, De Villiers and Scheepers

Darling - Drs. Van der Merwe, Adam and Senekal

George – Drs. Strydom, Truter and Pettifer

Heidelberg – Dr. Albert van Zyl

Malmesbury – Dr. Otto Kriek

Malmesbury – Dr. Markus Fourie

Malmesbury – Dr. Andries Lesch

Malmesbury – Drs. Heyns and Zolner

Moorreesburg - Tygerbeg Animal Hospital

Oudtshoorn - Dr. Glen Carlisle

Oudtshoorn - Dr. Adriaan Olivier

Piketberg – Dr. André van der Merwe

Plettenberg Bay - Dr. André Reitz

Riversdale - Drs. Du Plessis, Taylor and De Bruyn

Stellenbosch - Dr. Alfred Kidd

Swellendam – Dr. Jacques Malan

Tulbagh/Ceres – Drs. Hamman, Wilson and Triegaardt

Vredenburg – Dr. Izak Rust

Wellington – Dr. Van Zyl and Louw

#### Northern Cape (7)

Calvinia – Dr. Bertus Nel

Colesberg – Drs. Rous and Rous

De Aar – Dr. Donald Anderson

Kathu - Dr. Jan Vorster

Kimberley - Drs. Van Heerden and Swart

Postmasburg – Dr. Boeta van der Merwe

Upington – Drs. Vorster and Visser

#### Feedlots (1)

Drs. Morris and Du Preez

#### Laboratory reports (7)

Dr. Marijke Henton - Vetdiagnostix, Johannesburg

Dr. Liza du Plessis – Idexx SA - Johannesburg

Dr. Last – Vetdiagnostix, Pietermaritzburg

Dr. Sophette Gers – Pathcare, Cape Town

Dr. Annelie Cloete - Stellenbosch

Queenstown Provincial Laboratory

Dr. Mark Chimes – Dairy Standards, George

# **Summary**

Farmers are looking forward to a prosperous spring and summer season. With good rainfall comes an increase in insect and tick populations. Midges, mosquitoes, biting flies and ticks transmit diseases and farmers should have vaccinated their animals against these diseases. Examples of these diseases are:

Insect transmitted diseases: Blue tongue, Rift Valley fever, Lumpy skin disease, Ephemeral fever (Three-day-stiff-sickness), Nagana, Anaplasmosis and African horse sickness.

Tick transmitted diseases: African and Asiatic red water, Anaplasmosis, Heart water and Corridor disease.

It is important that farmers discuss vaccination and treatment programmes with their veterinarian. Early clinical signs of these diseases should be recognized so that treatment can be started as soon as possible. There is no specific treatment for viral diseases, it is important that animals be vaccinated in time to prevent disease outbreaks!

The presence of Bovine brucellosis, *Brucella ovis* (Ram's disease), Trichomonosis, Vibriosis, Johne's disease in herds are of great concern. All animal owners and breeding societies together with private and State Veterinary services should work together to fight and eradicate diseases.

Diseases are stumbing blocks in the way of achieving our goal i.e. food security, food safety and economical stability of farmers.

#### THE CONSEQUENCES OF BOVINE BRUCELLOSIS FOR MY BEEF HERD

Brucellosis in a beef herd may be compared to a slow spreading cancer eroding your herd from internally. One may think that all is well until the reality suddenly dawns upon you. It is an erosion disease which one should never underestimate.

Brucellosis is one of the biggest threats to your herd in South Africa and to ignore this is equivalent to indirectly acknowledging that you are farming with livestock without the objective to derive a profit from them.

As a veterinarian and livestock farmer I decided from the onset that a stringent brucellosis management program had to be one of the most important priorities in my herd.

Brucellosis is an important zoonosis (disease transmitted from animals to man) and occupational disease hazard which may sometimes have serious consequences for humans.

Infected cows and heifers often remain permanent carriers of the bacteria and contamination of the environment takes place with huge numbers of organisms when they calf or abort. Hence it is of utmost importance that with good management practice and with the use of a good traceability system that ALL infected cows, and their progeny (calves) be immediately removed from your herd. Failing to do so and to implement this important culling step, will result in brucellosis remaining in the herd.

Stud breeders who market breeding bulls are rudely awakened when their bulls test positive for brucellosis shortly before an auction having been born from infected mothers. The costs to breed bulls and to raise them speak for themselves. The financial losses and accompanying loss of reputation to your stud name are huge.

Commercial beef producers have as much to lose in terms of profitability in the herd if brucellosis is ignored. A female animal usually only aborts once but she remains a constant source of infection in discharges when coming on heat or calving. Inter-calving periods may increase and reproduction management becomes difficult. Positive female animals have to be culled and financial losses escalate.

Written by: Dr. Santjie Pieterse, Greylingsrust, Bultfontein (<a href="mailto:santjie418@gmail.com">santjie418@gmail.com</a>)

# When buying cattle this Vendor declaration can help you to minimize risk!

#### **VENDOR DECLARATION BOVINE BRUCELLOSIS**

I hereby declare that I am the legal owner or authorised representative of the cattle on sale and am competent to make this declaration

1	The cattle for sale are clearly and permanently identified		Yes	No
2	The cattle for sale/slaughter were born on my farm		Yes	No
3	The farm has a closed herd policy i.e. I do not buy in cattle, rent out grazing or speculate with cattle		Yes	No
4	I practice bio-security on my farm to a level that is **	Poor	Moderate	Good
5	I vaccinate my heifer calves against Bovine Brucellosis once between the ages of 4 – 8 months		Yes	No
6	In addition, I vaccinate my cattle older than 8 months with RB51		Yes	No
7	I have all the cattle on my farm tested for Bovine Brucellosis		Yes (date)	No
8	My herd has been tested negative within the past year		Yes	No
9	I did not buy in cattle since my last negative brucellosis test		Yes	No
10	I/my vet investigates any abortions on my farm		Yes	No
11	To the best of my knowledge, my immediate neighbours and farms in my area are free of Bovine Brucellosis		Yes	No
12	I use a veterinarian to advise me on my cattle's herd health		Yes	No
13	The cattle handling facilities on my farm are	Poor	Average	Good

Note: Vaccination does not mean freedom from Bovine Brucellosis as cattle can still be carriers

#### Please attach the most recent Brucella blood test certificate

Owner or authorised representative:	
Signature:	
Date:	
** * Biosecurity Poor – speculates with cattle, does not vaccinate, poor fences, cattle come i with other cattle Medium – Vaccinates heifers, does not buy in cattle of unknown health status	contact

Good – closed herd/never buys in cattle, vaccinates heifers and no contact with other cattle, follows a herd health plan as advised by his veterinarian, does not allow transport trucks onto property, washes and disinfects truck after returning from the abattoir or auction grounds.

Compiled by: Dr. Sewellyn Davey, Chairman of the Brucellosis Steering committee of the National Animal Health Forum

### OVINE JOHNE'S DISEASE VENDOR DECLARATION

#### ON THE SALE OF SHEEP

(Updated Draft May 2015)

1.	I hereby declare that I am the owner or authorised representative of the sheep on sale and am competent to make this declaration.	YES	NO
2.	The sheep for sale are clearly identified in the accompanying description.	YES	NO
3.	The sheep for sale were born on my farm.	YES	NO
4.	The farm has a closed flock policy. (No live sheep are brought onto the farm from elsewhere)	YES	NO
5.	I know the signs of the disease and to the best of my knowledge, all of my properties are free of cases of Ovine Johne's Disease.	YES	NO
6.	I have actively looked for Ovine Johne's Disease and have had tests done for this.	YES	NO
7.	To the best of my knowledge, my immediate neighbours and farms in my magisterial district of my farm(s) are free of cases of Ovine Johne's Disease.	YES	NO
8.	The sheep on my properties have been vaccinated against Ovine Johne's Disease and are clearly marked with the approved ear tag.	YES	NO
9.	All lambs born are vaccinated	YES	NO
10	If vaccinated, the number of years that the vaccinations have been done is		years
NC	OTE: Vaccination does not mean freedom from OJD, vaccinated animals can still be carriers	S.	
Sta	atement 8 and 9 apply only to already infected flocks, and such sheep can only be sold to o	ther inf	ected
flo	cks by law.		
Bu	yers should consult their veterinary advisor before any purchases.		
Sig	nature Date	_	
	Farm:	_	
NA	ME		
_	District:	_	
	VNER OR AUTHORIZED PRESENTATIVE		

The use of this declaration is supported by the following organisations:













# In May there had been an outbreak of Rift Valley Fever in the Jacobsdal area of the Free State. Be prepared for the next outbreak in your area!!

Rift Valley Fever is a zoonotic disease.

"The symptoms are suggestive of influenza, have a rapid onset and consist of rigors, fever, headache and pain in muscles, back and joints. Many people recover uneventfully but a variable percentage may develop more severe symptoms, the liver may be affected and the patient is inclined to haemorrhage. Several other symptoms may also followinfection, including involvement of the eyes." (J H du Preez, et al, 2017)

Farmers are advised to vaccinate their animals against Rift Valley Fever. Live vaccines can only be used in non-pregnant animals as the live vaccine can cause abortions.

Only dead inactivated vacines must be used in pregnant animals.

Please take care when vaccines are administered after outbreaks have been detected. Use a sterile needle for each animal as the virus can be spread between animals if the animals are in the incubation period. Animals in the incubation period will have a virus infection but will not show symptoms of the disease yet.

# Bovine brucellosis control should continuously be on the mind of every cattle and game farmer!

Get involved in controlling Bovine Brucellosis – visit <u>www.nahf</u>, click on Information centre, click on Brucellosis.

# Why should I test my cattle for brucellosis?

- Brucellosis is a herd disease this means if you even have a single infected animal, it affects the status of your whole herd! An infected cow will rapidly infect the rest of your herd if not identified and slaughtered before calving.
- > Brucellosis causes reproduction and production losses in affected herds, which decreases financial turnover.
- > Brucellosis is a misleading disease as abortions may not always occur, abortions are not always noticed and affected cattle may appear visibly healthy. Only through testing can brucellosis be confirmed.

- The disease is a zoonosis which can infect you, your family and your workers. Infection may lead to chronic and debilitating disease.
- If you have recently bought in animals from an auction or a herd with no proof that the herd of origin was recently tested for bovine brucellosis (CA3 declaration), you could have bought in positive or latently positive animal(s).
- If neighbouring farms or farms you access for grazing are positive for brucellosis, your cattle could have contracted the disease.
- If you do not know your status and you are farming with brucellosis unknowingly, you are contributing to the brucellosis risk of our national cattle herd.

Always be aware of all possible ways how your herd can be become infected with the bacteria, *Brucella abortus*.

- Just one miss step may be the beginning of misery!
- Remember this is a herd disease!
- If one animal is tested positive, the herd is seen as positive until proved to be negative according to the brucellosis scheme!
- Brucellosis is a State controlled disease.
- Brucellosis is a zoonosis a disease transmitted from animals to humans

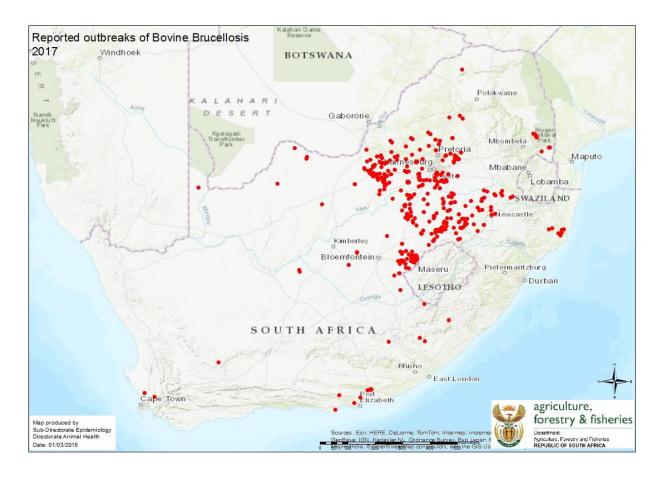
# A check list has been drawn up to help you calculate what the risk is of bringing the *Brucella* bacteria onto your farm.

Below is a map of new outbreaks of bovine brucellosis as supplied by DAFF.

It should be emphasized that all cases of State controlled and notifiable diseases have to be reported to the State Veterinary services!

http://nahf.co.za/controlled-and-notifiable-diseases/

It is with great concern that animals that have aborted are sold at auctions without the herd and specific animals are tested for bovine brucellosis! Brucellosis is a herd disease.



# **SOP** for the control of Bovine Brucellosis

Audit date:		 	
Authorised per	son:		

		Y/N	Comment
1	Fences and gates in good condition		
2	Gate control - log in		
3	Disinfection of vehicles coming onto the farm		
4	Protective clothing and boots given to people		
	visiting the farm (cattle area) coming from high		
	risk areas eg. veterinarians, nutritionists,		
	representatives, truck drivers, workers, etc.		
5	Sterilizing equipment coming in contact with cattle		
6	Run off water/ streams from neighbouring farms		
7	All animals identified with a brand mark and ear		
	tag		

8	Data base of all animals	
9	Closed herd	
10	When last were animals bought in or moved from	
	another farm?	
11	Only buy in animals from a farm which has a	
	recent negative tested brucellosis herd certificate	
12	Origin(s) of acquired cattle? Bought at an auction?	
13	Keep heifers separate from herd until they have	
	calved and tested negative for brucellosis	
14	Quarantine camp available	
15	Separate calving camps	
16	Were all heifers vaccinated between 4 and 8	
	months vaccinated with Strain 19 or RB51?	
17	Any cattle vaccinated with Strain 19 over 8 months	
	of age? History over last few years.	
18	Were there any abortions on the farm – samples	
	taken, diagnosis?	
19	All sexually mature cattle in herd tested for bovine	
	brucellosis (provide proof)	
20	Bovine brucellosis is a State controlled disease.	
	Positive cattle are branded with a C on the right	
	side of the neck.	
21	Isolation of infected animals & separate handling	
	facilities	
22	Prohibition of movement of animals off	
	quarantined property except under cover of a Red	
	cross permit for slaughter at an abattoir	
23	Prohibition of use and on-farm disposal of	
	unboiled, unpasteurised or unsterilised milk on	
24	quarantined property	
24	Disinfection of places where infection is a possibility.	
25		
25	Neighbours/ recent buyers informed of infected herd status	
26	Fly, crow and predator control	
27	Destruction of afterbirths/abortions in a	
	responsible manner	
28	Beware of livestock, game interface	
20	beware of investock, game interface	

Below are short and longer versions on using vaccines to help control brucellosis. Please spread tis information as wide as possible.

#### Brucellosis

#### Play your part in the war on brucellosis – don't wait until it's too late; vaccinate!

Bovine brucellosis, caused by *Brucella abortus*, is reported across all 9 provinces of South Africa especially in the central and Highveld regions. Bovine Brucellosis mainly causes abortion in cattle and can infect most other mammals, including humans.

Brucellosis may occur in persons who are exposed to infected animals, particularly through aborted and normal fetal material of infected cows, and through the consumption of unpasteurised milk. Symptoms in infected persons include profuse sweating mostly during the night, fever, extreme tiredness, aches in bones and joints, especially the lower back, hip or knee joints.

All female cattle between the ages of 4-8 months have to be vaccinated against brucellosis with a registered product to help protect the national cattle herd.\* Vaccination helps to decrease shedding of Brucella bacteria from infected animals – this helps to limit the spread of brucellosis within a herd and decreases the infection pressure. Always use vaccines according to the manufacturer's instructions. Contact your private veterinarian or state veterinary services for more information.

#### 5 keys to controlling brucellosis:

- Vaccination is one of the important tools used to control and prevent brucellosis. Vaccination of all heifers between 4-8 months is required. Do not vaccinate male cattle.
- Know your status test your cattle herd for brucellosis.
- Only buy cattle from recently tested, brucellosis negative herds.
- Don't share grazing with untested cattle and ensure that your fences are intact.
- If you have brucellosis in your herd, follow the advice of your state veterinarian to get rid of the infection as quickly as possible (branding, separation, vaccination and slaughter). Delays in action against the disease will increase losses and prolong quarantine.

Let's all play our part to protect each other – our cattle's health, our own health and our livelihoods.

\*Brucellosis is a controlled disease under the Animal Diseases Act, 1984 (Act No 35 of 1984).

#### Play your part in the war on brucellosis

- Don't wait until it's too late vaccinate! To protect the national cattle herd, all female cattle between the ages of 4-8 months have to be vaccinated against brucellosis with a registered product.\*
- Vaccination strengthens immunity against brucellosis and decreases bacterial shedding.
- \$19 vaccine for cattle (Reg. No. G0101. Act 36/1947) or RB51 (Reg. No. G 3056. Act 36/1947) can be used. Always use vaccines according to the manufacturer's instructions. Contact your private veterinarian or local state veterinary services for more information.

- Know your herd's status by testing. Know the status of herds that you buy or receive cattle from by requesting herd test results.
- Let's all play our part to protect each other our cattle's health, our own health and our livelihoods.

At the following link information needed to educate cattle owners and consumers of unpasteurised dairy products regarding brucellosis are available..

http://nahf.co.za/category/diseases/brucellosis/

Translations in the major languages regarding the 5 core facts on bovine brucellosis are available at the following link:

http://nahf.co.za/translations-for-bovine-brucellosis-5-core-facts-and-a-dozen-things/

Websites that are there to help you with information regarding animal health:

#### **National Animal Health Forum**

www.nahf.co.za

Read what the Forum is all about: http://nahf.co.za/about/

This website will become the information centre of animal health in Southern Africa. On the toolbar click on **Stakeholders** and you will find links to producer organizations and other organizations who are participating in the NAHF <a href="http://nahf.co.za/stakeholders/">http://nahf.co.za/stakeholders/</a>

Provincial Animal Health Forums have their own site – click on **Provinces** http://nahf.co.za/provinces/

Important is to study the Veterinary Strategy (2016 -2026) as it gives direction to where we are going with Animal Health in South Africa.

http://nahf.co.za/wp-content/uploads/Vet-strategy-final-signed.pdf

Click on **Info centre** for more information on the "war" we have against Bovine Brucellosis. Please be up to date on the role all have to play to control this zoonotic disease. <a href="http://nahf.co.za/category/diseases/brucellosis/">http://nahf.co.za/category/diseases/brucellosis/</a>

Information on other controlled diseases (Ovine Johne's Disease, Pest of small stock – PPR, and African Horse Sickness) is available.

<sup>\*</sup>Brucellosis is a controlled disease under the Animal Diseases Act, 1984 (Act No 35 of 1984).

This link will continuously be updated.

Information on **antibiotic resistance** is also available at this address: http://nahf.co.za/category/antibiotic-resistance/

#### **Rural Veterinary Association of South Africa**

#### www.ruvasa.co.za

Click on **Disease reporting** where maps and information can be sourced on the prevelance of diseases in all provinces. Abattoir reports are available. Use the information available to update management programmes

#### Landbouweekblad's webpage

www.landbou.com

**Vra vir Faffa** 

Click on: Indeks van antwoorde where more than 4 000 answers can be sourced on animal health.

Click on Beeste

Click on Siektes

Click on Brusellose

Stop Brusellose

Gevaar om Beesbrusellose (BBR) deur vendusies en skoue te versprei

Rapportering aan bure of ander eienaars oor die voorkoms van brusellose

Inligting oor brusellose op die NAHF se webblad

Kuddebestuur voor die dekseisoen

Bees Brusellose handleiding

Teenliggaamwaardes om beesbrusellose in koeie te bepaal

Veterinêre Strategie 2016 -2026

'n Dosyn dinge wat jy moet weet van beesbrusellose

Vyf kernfeite wat jy van beesbrusellose (Besmetlike misgeboorte – BM) behoort te weet

Veiligheid van vleis en biltong afkomstig van 'n bees met brusellose

Vervoer van diere uit 'n positiewe brusellose kudde

Beheer van brusellose in 'n beeskudde

Boerderypraktyke wat die gevaar van die voorkoms van brusellose verhoog

Pak brusellose by die horings

Brucellose kan jou lewe verwoes

Brusellose in wild

Bestuur van positiewe besmetlike misgeboorte beeste

Aankoop van beeste wat besmetlike misgeboorte het

Antwoorde oor brusellose

Behandeling van besmetlike misgeboorte

Besmetlike misgeboorte uitbreek in 'n kudde

Gevaar van brusellose onderskat

RB51-inenting teen brusellose in dragtige koeie

Alles oor Besmetlike Misgeboorte (BM)

Kompensasie vir BM en TB positiewe beeste?

Nóg vrae oor besmetlike misgeboorte

Koeie positief getoets vir besmetlike misgeboorte

Vrae, antwoorde oor besmetlike misgeboorte

Brucellose: Wat staan ons te doen?

#### Internal parasite control

www.wormx.info

# **Summary of disease report for September 2018**

113 Reports from veterinary practices and laboratories were received (Mpumalanga (MP) 10; Gauteng (G) 8; Limpopo (L) 7; Northwest (NW) 9; Free State (FS) 17; KwaZulu-Natal (KZN) 11; Eastern Cape (EC) 14; Western Cape (WC) 22: Northern Cape (NC) 7; Feedlots (FL) 1 and Laboratories (Lab) 7).

For the detailed report and previous reports go to www.ruvasa.co.za and click on Disease reporting

#### **Internal parasites**

The following reports were received from practices regarding internal parasite infestations:

Internal parasites	MP	G	L	NW	FS	KZN	EC	WC	NC
Roundworms	х	х	х	х	х	х	х	х	
Resistant roundworms	х				х		х	х	
Wireworm		х	х		х	х	х	х	х

							Х	
					х			
х	х			х	х		х	х
х	х		х		х	х	х	
х				х				
х			х				х	
х	х	х	х	х	х	х	х	х
			х		х		х	
	x x x	x x x x x	x x x x x	x x x x x x x x x x x x x x x x x x x	x x x x x x x x x x x x x x x x x x x	x     x       x <td>x x x x x x x x x x x x x x x x x x x</td> <td></td>	x x x x x x x x x x x x x x x x x x x	

Early rain fell in many parts of South Africa. Use the five point check to keep on top of what is happening in the flock. For further detail contact your local veterinarian.

http://hulp.landbou.com/kundiges/vra-vir-faffa/vyfpuntplan-en-famacha-stelsel-vir-inwendige-parasietbestuur-in-skape/

https://docs.wixstatic.com/ugd/aded98\_cb447e77eef6450f93a2b23cb0e6b9de.pdf

Wireworm infestations have been reported from 7 provinces. Check animals for bottle jaw and anaemia. As temperatures rise, be aware of early outbreaks of wireworm infestations. For worm eggs to hatch humidity, temperature above 15 degree Celsius and oxygen are needed.

It cannot be stressed enough that the basis of preventing cryptosporidiosis and pathogenic *E. coli* outbreaks is biosecurity and making sure that the mothers give the best possible colostrum quality to their offspring.

Cryptosporidiosis in combination with pathogenic *E. coli* is still causing huge problems for cattle, sheep and goat farmers. Young animals are extremely vulnerable. Biosecurity measures should be

kept at a high level at all times. The immunity of ewes and cows should be kept at the highest level so that colostrum (passive immunity) could protect their offspring.

It is important to contact your veterinarian to help you diagnose what the problem(s) on the farm is when young animals start dying. Samples are set away for diagnosis. *Cryptosporidia* and *E.coli* can be present in the water and food sources. Supply workers with protective clothing which have to be kept on the farm.

#### **Prevention of Cryptosporidiosis**

- Since there is no vaccine or registered treatment for Cryptosporidium, prevention is the best control method. Animals with a good immune system will generally easily overcome Cryptosporidium thus this must be the main aim in controlling Cryptosporidium.
- A consistent, vet approved and farm appropriate vaccination program for other diseases.
- Ensure no nutritional deficiencies especially vitamin A and Selenium
- Excellent bio-security
- Ensure clean water sources

#### **External parasites**

The following reports were received from practices regarding external parasite infestations:

External parasites	MP	G	L	NW	FS	KZN	EC	wc	NC
Blue ticks	х	х	х	х	х	х	х	х	х
Resistant blue ticks	х							х	
Heartwater ticks	х	х	х	х	х	х	х		
Brown ear-ticks						х			
Bont-legged ticks	х	х	х	х	х		х		х
Red-legged ticks	х	х		х	х	х	х		х
Paralysis ticks		х					х		
Tampans									
Biting lice				х	х	х	х		
Sucking lice				х	Х				Х

Itch mites							х	
Sheep scab				х		х		
Mange mites		х	х	х		х		
Nuisance flies	х				х		х	
Midges				х			х	
Mosquitoes			х	х			х	
Blowflies				х			х	
Screw-worm	х							
Gedoelstia (uitpeuloogsiekte)		х						
Nasal bot		х		Х				

Blue tick infestations were reported from all provinces. Blue ticks (African and Asiatic blue ticks) are able to transmit red water, anaplasmosis and lumpy skin disease.

Make sure to assess the blue tick resistance status on your farm before buying tickicides. Your veterinarian will be able to collect engorged blue ticks to be tested for resistance.

Actives to be tested for resistance are: organophosphates, pyrethroids, amidines, fipronil. Actives registered only for controlling blue ticks are: macrocyclic lactones, fluazuron (acaracide growth regulator).

Discuss your tick control programme with your veterinarian as controlling ticks early in spring can prevent large outbreaks of ticks in the summer.

Below is a list of diseases transmitted by ticks.

#### Tick borne diseases

The following tick-borne diseases were reported by practices in the provinces:

Tick borne diseases	MP	G	L	NW	FS	KZN	EC	wc	NC
African red water	х		х		х	х	х	х	
Asiatic red water	х	х	х		х	х	х	х	

Anaplasmosis	х	х		х	х	х	х	х	
Heartwater	х	х	х			х	х		
Lumpy skin disease						х			
Corridor disease									
Theileriosis									

Asiatic red water is spreading and is one of the deadliest diseases in cattle.

Numerous mortalities were reported!

The keyword is vaccinate your animals! Contact your veterinarian.

Anaplasmosis outbreaks were reported in 7 provinces. Biting flies are probably the main spreader of this disease!

The following tick toxicosis was reported by practices in the provinces:

Tick toxicosis	MP	G	L	NW	FS	KZN	EC	WC	NC
Sweating sickness				х	X			х	

This disease is caused by the toxin of the bont legged-tick.

#### **Insect transmittable diseases**

The following insect transmittable diseases were reported by practices in the provinces:

Insect transmittable diseases	MP	G	L	NW	FS	KZN	EC	WC	NC
Lumpy skin disease						х			
Ephemeral fever (Three day stiff sickness)				х					
Blue tongue	х			х				х	
Rift Valley Fever									
Wesselsbron									

Nagana			х		

As soon as insect populations increase with warmer weather conditions, unvaccinated animals with a lack of immunity to insect transmittable diseases, will be the target of these diseases.

#### Have you vaccinated your animals vaccinated against Rift Valley Fever?

Out of experience I can tell you that when outbreaks of diseases occur, vaccines will be difficult to acquire as many people will be ordering vaccines all at once.

#### **Venerial diseases**

The following venereal diseases were reported by practices in the provinces:

Venereal diseases	MP	G	L	NW	FS	KZN	EC	wc	NC
Trichomonosis	х	х	х	х	х	х	х	х	
Vibriosis			х	х	х	х		х	
Pizzle disease		х				х	х	х	х
Actinobacillus seminis				х					

New cases of **trichomonosis** are reported every month and this disease is out of control. Make sure to buy bulls from farmers where biosecurity measures are in place and bulls are tested for these diseases at regular intervals.

Make sure that fences are in tact and gates closed so that bulls cannot escape to neighbouring cows that may be infected with *Tritrichomonas* and become infected or infected neighbouring bulls are jumping fences.

Cattle study groups should discuss preventative and control measures with their veterinarians. **Be sure to test bulls regularly for these diseases**.

Beware when buying in or sharing bulls! Remember female animals may also be infected.

Study the Good management SOP's for cattle farmers on the RPO website

http://www.rpo.co.za/wp-content/uploads/2016/04/nuutRPO-NERPO-Code-Addendum.pdf

http://www.rpo.co.za/wp-content/uploads/2016/04/nuutRPO-NERPO-Code-Addendum-4-Good-management-practices-and-SOPs-for-cattle-farmers-1.pdf

Consider Trichomonosis as an area disease, farmers should work together to keep areas free from diseases such as trichomonosis, brucellosis and sheep scab.

### **Bacterial diseases**

The following bacterial diseases were reported by practices in the provinces:

Bacterial diseases	MP	G	L	NW	FS	KZN	EC	wc	NC
Anthrax									
Blackquarter	х		х	х	х	х	х	х	х
Botulism				х					х
Pulpy kidney	х	х			х	х	х	х	х
Lamb dysentery							х		х
Swelled head					х	х		х	
Red gut (cattle)	х	х			х				
Blood gut (sheep)	х			х	х	х	х	х	
Tetanus		х			х			х	х
Salmonellosis	х			х		х			
Bovine brucellosis		х		х	х	х	х		х
Brucella melitensis (goats)							х		
Ovine brucellosis (Ram's disease)					х	х		х	х
Bovine tuberculosis									
Johne's						х	х		
Leptospirosis								х	
Listeriosis									
Pseudomonas								х	
Fusibacterium necrophorum								х	
Septicaemia	х	х				х		х	

E. coli	х	х	х	х	х	х	х	х
Enzootic abortion	х	х		х		х	х	х
Lumpy wool						х		
Uterine gangrene				х				х
Bovine dermatophilosis (Senkobo disease)								
Wooden tongue							х	
Lumpy jaw								

Multiclostridial vaccines should be used if blackquarter outbreaks still occur when only using a vaccine containing *Clostridium chauvoei*. Remember to give a booster vaccine when using an inactivate vaccine for the first time. Read the packet insert!! Study the table above and determine the risk for animals on your farm. Get advice from your veterinarian on *Cryptosporidium/E. coli* outbreaks in your area and what to do to prevent losses in lambs and calves.

Enzootic abortion contributes to the disappearance of foetuses in sheep and goats scanned pregnant. Vaccinate replacement ewes with the live vaccine before putting them to the ram!

Pulpy kidney (*Clostridium perfringens* type D – epsilon toxin) is still the biggest killer of sheep. There are various factors that could lead to pulpy kidney such as: the intestinal tract stops functioning (stasis), sudden change from poor veld to lush artificial pastures; sudden change in diet; grazing of fodder crops such as Lucerne, green wheat and green oats, diet igh in protein, overeating of concentrates or fertile pastures, deworming and coccidiosis infection. Sudden changes in the weather and grazing in wilted pastures, may also play a predispositional role.

#### Viral diseases

The following viral diseases were reported by practices in the provinces:

Viral diseases	MP	G	L	NW	FS	KZN	EC	WC	NC
BMC (snotsiekte)			х	х	х		х		
Rabies (cattle)					х		х		
BVD		х		х			х		

IBR	х		х		х	х		
BRSV								
PI3								
Maedi visna virus								
Rotavirus / Coronavirus								
Enzootic bovine leucosis (EBL)				х			х	
Sheep leucosis								
Jaagsiekte						х		
Orf	х	х	х	х	х	х	х	х
Warts	х	х	х	Х	х		х	х

There is no treatment for viral diseases with the result that animals have to be protected by vaccinations if they are available.

Preventative vaccinations are the best way to protect animals against viruses and bacteria causing pneumonia.

Keep cattle and wildebeest well separated especially when wildebeest are under stress to prevent snotsiekte outbreaks! There is also a sheep associated form of the disease.

Discuss vaccination programmes and biosecurity measures with your veterinarian.

# **Fungal diseases**

The following fungal disease was reported by practices in the provinces:

Fungal diseases	MP	G	L	NW	FS	KZN	EC	WC	NC
Ringworm	х	х	х	х	х	х	х	х	

#### **Protozoal diseases**

Protozoal diseases	MP	G	L	NW	FS	KZN	EC	wc	NC

Besnoitiosis (olifantsvelsiekte)					

# **Toxicities**

The following toxicities were reported by practices in the provinces:

Toxicities	MP	G	L	NW	FS	KZN	EC	WC	NC
Cardiac glycoside					Х		х	х	
Slangkop									
Crotolaria									
Gifblaar		х							
Gousiekte									
Cestrum (ink berry)		х					х		
Tulip	х	х		х	х	х	х	х	
Cynanchum (bobbejaantou)							х	х	
Facial eczema							х		
Lantana	х					х			
Prussic acid							х	х	
Senecio							х		
Cotula nigellifolia (stagger wood)									
Geeldikkop (duwweltjies) and dikoor					х			х	
Vermeersiekte									
Hertia pallens (Nenta, krimpsiekte)									
Chrysocoma ciliata (bitterbos)									
Solanum incanum (maldronksiekte)									
Gomphocarpus (Asclepias) fruticosus (milkweed)									

	1	1		l	I	I	1
Bracken fern							
January bush (Gnidia polycephalatus)							
Chinkerinchee							
Ceylons rose							
Eucalyptus (bloekom) bark							
Kikuyu							
Ryegrass							
Ganskweek							
Paspalum staggers							
Phalaris aquaticum (Phalaris staggers)							
Photosensitivity (Turknael, Erodium moschatum)						х	
Photosensitivity (Stellenbosch)						х	
Lusern							
Mycotoxicosis						х	
Aflatoxin							
Diplodiosis			х				
Lupins							
Harpuisbos							
Syringa berries							
Acorn							
Cycad							
Kraalbos, Geelbos (Galenia africana)							
Radish							
Carrot poisoning							

Bracken fern	Onion poisoning							
Water contamination         x	Bracken fern							
Nitrate         Image: Control of the control of	Pollen beetle ( Astylus atromaculatus)							
Tannins         X </td <td>Water contamination</td> <td></td> <td>х</td> <td>х</td> <td></td> <td></td> <td></td> <td></td>	Water contamination		х	х				
Urea         x x x         x<	Nitrate							
Salt  Wet carcase syndrome  Snake bite  Moth cocoons (impaction)  Blue green algae  Copper  Selenium  Zinc  Fluoride  Lead  Paraquat  Phosamine  Aldicarb  Organophosphate  Zinc phosphide  Pyrethroid	Tannins						х	
Wet carcase syndrome x x  Snake bite x x  Moth cocoons (impaction) x x x  Blue green algae x x x  Selenium x x  Selenium x x  Fluoride x x x  Paraquat x x  Phosamine x x x  Aldicarb x x x  Copper x x x x   Copper x x x x x x x x x x  Copper x x x x x x x x x x x x x x x x x x x	Urea		х	х		х		
Snake bite  Moth cocoons (impaction)  Blue green algae  Copper  Selenium  Zinc  Fluoride  Lead  Paraquat  Phosamine  Aldicarb  Organophosphate  Zinc phosphide  Pyrethroid	Salt							
Moth cocoons (impaction)  Blue green algae  Copper  X X X  Selenium  Zinc  Fluoride  Lead  Paraquat  Phosamine  Aldicarb  Organophosphate  Zinc phosphide  Pyrethroid	Wet carcase syndrome							х
Blue green algae  Copper  Selenium  Zinc  Fluoride  Lead  Paraquat  Phosamine  Aldicarb  Organophosphate  Zinc phosphide  Pyrethroid	Snake bite							
Copper X X X Selenium  Zinc Fluoride Lead Paraquat Phosamine Aldicarb Organophosphate Zinc phosphide Pyrethroid	Moth cocoons (impaction)							
Selenium  Zinc  Fluoride  Lead  Paraquat  Phosamine  Aldicarb  Organophosphate  Zinc phosphide  Pyrethroid	Blue green algae							
Zinc  Fluoride  Lead  Paraquat  Phosamine  Aldicarb  Organophosphate  Zinc phosphide  Pyrethroid	Copper						х	х
Fluoride  Lead  Paraquat  Phosamine  Aldicarb  Organophosphate  Zinc phosphide  Pyrethroid	Selenium							
Lead Paraquat Phosamine Aldicarb Organophosphate Zinc phosphide Pyrethroid	Zinc							
Paraquat  Phosamine  Aldicarb  Organophosphate  Zinc phosphide  Pyrethroid	Fluoride							
Phosamine  Aldicarb  Organophosphate  Zinc phosphide  Pyrethroid	Lead							
Aldicarb  Organophosphate  Zinc phosphide  Pyrethroid	Paraquat							
Organophosphate  Zinc phosphide  Pyrethroid	Phosamine							
Zinc phosphide Pyrethroid	Aldicarb							
Pyrethroid	Organophosphate							
	Zinc phosphide							
Amitraz	Pyrethroid							
	Amitraz							

Levamisole					
Ivermectin					
Moxidectin				х	
Oxytetracycline				х	
Tilmicosin					
Bromoxynil nitrate					
Ionophor					
Monensin					
Нуро					
Diazinon					
Chicken litter					

Beware when buying in animals or moving them into rested grazing camps as they are the animals which usually eat toxic plants such as tulp and ink berries (*Cestrum*).

Do have activated charcoal on the farm as the antidote for tulip poisoning! Seven provinces reported tulip toxicity!

Toxic plants are sometimes eaten by young animals that do not know these plants. Be aware of this situation and know where these plants are growing on the farm.

For further information on treatment of tulp and other toxicities visit:

#### www.landbou.com

Vra vir Faffa

Klik op Indeks van antwoorde

Klik op Beeste of Skape

Klik op Vergiftigings

Klik op die Opskrifte

Every month there are reports of urea poisoning. Be aware when feeding this product that the correct concentration is used and that the lick does not get wet!

#### A few cases of Lantana-poisoning were reported.

#### Research are being done to control Lantana:

We would like to investigate involvement of your readers and yourself in the development of a National Programme for Management of Lantana similar to the attached National Programme for Management of Parthenium. Our focus would be on the biological control of the species, however, farmers, landowners and communities would be interested in an integrated approach to the management of the species. Please do bear in mind that the rust-fungus will unfortunately not be a 'silver-bullet' as it is likely to impact some subspecies more than others and work better in some micro-climates than others...

Please can we consider how your readers would be able to contribute to the development of a National Programme? One element would be accurate mapping of the distribution of Lantana. If readers could be encouraged to report locations of Lantana then a more comprehensive map of its distribution would be feasible (we need to make sure that this is done in a co-ordinated fashion and using technology that allows for accuracy and ease of data collection (smart phone application to geographically referenced database – which would need to be set up and managed).

Encouraging readers to give input into a National Programme would result in greater support for its implementation. We would need to make sure that this is not too tedious a process.

Encouraging readers to be aware of the biological control agents that are out there already would also be useful. Again this could be reported using photographs and submitting these to a central database.

It would also be good if we could have landowners who would be willing to have 'biological control reserves' on their property. This would mean setting aside land that is infested by Lantana and ensuring that it is not cleared for any reason. The biological control agents would then be allowed to multiply in this area under the 'protection' of the landowner.

I write on behalf of Biological Control researchers at the Agricultural Research Council – Plant Protection Research Institute and at the Centre for Biological Control at Rhodes University.

http://www.ru.ac.za/centreforbiologicalcontrol/

Philip Ivey [mailto:P.Ivey@ru.ac.za]

#### **Nutritional deficiencies**

The following nutritional deficiencies were reported by practices in the provinces:

Deficiencies	MP	G	L	NW	FS	KZN	EC	wc	NC
									ł

Energy	х	х	х	х	х	х	х	х
Protein	х	х		х	х	х	х	
Phosphate			х					х
Calcium	х		х	х		х	х	

Nutritional deficiencies were reported. It is important that Ewes and cows receive sufficient supplementation so as to have optimal colostrum quality for their offspring!

#### Micro-nutritional and vitamin deficiencies

The following micro-nutritional deficiencies and vitamins were reported by practices in the provinces:

Deficiencies	MP	G	L	NW	FS	KZN	EC	wc	NC
Iodine									
Copper								х	
Zinc								х	
Selenium				х		х	х		х
Magnesium									
Manganese									
Vitamin A				х					
Vitamin B 1							Х		

There are antagonists such as calcium, iron and sulphur which hamper the uptake of micro-minerals. Have water and soil samples analysed to see what the levels of these antagonists are. Arrange with your veterinarian to have liver samples analysed to determine the status of these micro-minerals in your herd or flock.

Selenium is a powerful anti-oxidant and necessary for immunity. Check the status of the herd.

Beware of fluoride poisoning as borehole water levels drop.

Supplement animals with vitamin A during winter and drought conditions.

#### Multifactorial diseases and other conditions

# The following conditions were reported by practices in the provinces

Multifactorial diseases and other conditions	MP	G	L	NW	FS	KZN	EC	wc	NC
Abortions	х	х	х	х	х	х	х	х	х
Stillbirths		х			х	х	х	х	
Abscesses	х	х	х	х	х	х	х	х	
Intestinal ulcers									
Bladder stones –urolithiasis		х			х	х		х	
Blindness	х	х			х			х	х
Bloat			х		х	х	х	х	х
Blue udder	х	х	х		х	х	х	х	
Diarrhoea	х	х		х	х	х	х	х	х
Epididymitis					х				
Eye cancer					х		х	х	
Eye infections	х	х		х	х	х	х	х	х
Joint ill	х	х		х		х		х	
Lameness/foot problems		х	х	х	х	х	х	х	
Lung infection	х	х	х	х	х	х	х	х	х
Mastitis	х	х	х	х	х	х	х	х	
Navel ill	х				х	х	х		
Umbilical hernia									
Red gut (sheep, torsion of gut)					х			х	
Rectal prolaps		х							
Swelsiekte									
Traumatic reticulo-pericarditis				х					

Trauma		х				х	х	
Teeth wear								
Plastic bags (ingestion)								
Downer	х	х	х	х	х	х	х	х
Anaphylactic shock								
Vestibular syndrome (middle ear infection)								

Discuss the origin, treatment and prevention of these diseases with your veterinarian.

The cause of abortions should be established: brucellosis, enzootic abortion, Q-fever, leptospirosis, etc. The necessary preventative measures can then be taken.

Pneumonia and lameness (foot conditions) are wide spread.

#### **Metabolic diseases**

The following diseases were reported by practices in the provinces:

Metabolic diseases	MP	G	L	NW	FS	KZN	EC	wc	NC
Acidosis	х				х	х	х	х	
Displaced abomasum		х						х	
Ketosis (Domsiekte)					х	х	х	х	
Milk fever					х	х		х	

Make sure that you adapt animals to feed containing concentrates as more and more cases of acidosis are reported when grazing animals on harvested maize fields.

Discuss the etiology, treatment and prevention of these diseases with your veterinarian.

### **Reproductive diseases**

Reproductive diseases	MP	G	L	NW	FS	KZN	EC	wc	NC
Dystocia (difficult births)	х	х	х	х	х	х	х	х	х

Endometritis					х	X	х	х	
Hydrops									
Metritis	х			х	х	х	х	х	
Poor conception	х				х			х	х
Retained afterbirth	х	х	х	х	х	х		х	
Sheath prolaps					х	х			
Uterine prolaps	х	х	х	х	х	х	х	х	х
Vaginal prolaps	х	х	х	х	х	х	х	х	
Penis injury									
Orchitis									

A poor conception rate on many farms is a huge issue. Visit your veterinarian to rectify this problem.

### **Environmental conditions**

	MP	G	L	NW	FS	KZN	EC	WC	NC
Exposure to cold						х		х	
Frozen to death							х	х	
Heat stress									
Lightning	х				х			х	
Electrocution									
Drought							х		

# **Other conditions**

	MP	G	L	NW	FS	KZN	EC	wc	NC

Drug residues (milk, meat, liver, kidney etc)								
Preditors			х	х	х	х		
Theft			х	х	х		х	
Trauma (fractures etc)		х	х	х	х		х	
Trauma (veldfires)	х			Х				

In the CODE OF CONDUCT of the RPO the following standard operating procedures are documented. The local veterinarian should be your partner to help you achieve the necessary standards. http://www.rpo.co.za/BestPractices/English.aspx

#### PRECAUTIONARY MEASURES TO SUPPORT BIO-SECURITY.

Precautionary measures are required to protect the herd against diseases acquired because of external contact. The following categories are of concern:

#### 1. DIRECT LIVESTOCK PURCHASES (and own animals returning):

The following should be *verified* before importing new animals into the herd:

How long animals have resided at the purchase or previous location?

Have there been any recent disease outbreaks in the location?

Do brand marks clearly confirm ownership?

Was a vaccination program followed (need paper or veterinarian proof). What are the local prevalent external parasites and the routinely implemented control program?

Is a veterinarian supported control program against transmittable diseases followed?

Dates and sufficient number of tests for reproductive diseases of both male and female

Dates and tests for zoonotic diseases

The above should also be verified with the purchaser's own veterinarian.

#### 2. PURCHASES FROM SALES OR SPECULATORS

Purchase only in areas which are not in close proximity to scheduled areas Visually inspect the animals before purchasing for:

- \* brand marks
- \* parasite infestation

#### 3. TRANSPORT TO THE FARM

Use only reputable transporters

Has the truck been cleaned and disinfected?

Truck to follow the shortest uninterrupted route

Truck to take the shortest route to the handling facilities

Do not allow the truck personnel to get in contact with the farm herd

#### 4. ARRIVAL ON THE FARM

Off-load the livestock to limit stress and to be visually evaluated for any unnatural

conditions.

Isolate them from the farm herd and shared facilities for at least 21 days (quarantine) Retest for diseases of concern if needed, before mixing with the rest of the herd Process new arrivals within 24 hrs after arrival (unique ID tag brand, dip, dose, vaccinate) Inspect regularly

#### **5. FEED PURCHASES**

Ensure bales of hay are sourced from areas that are not bordering scheduled areas Purchase feed from reputable dealers only

Avoid buying feed in second hand bags

Ensure feed trucks are also disinfected and cleaned, especially if also used to transport animals to abattoirs

#### 6. VISITORS

Do not allow strangers or their vehicles amongst the livestock Ensure fences are well maintained and preferably jackal and warthog proof

#### 7. EMPLOYEES

Do not allow the employees to eat in feed stores

Supply employees with sufficient ablution facilities

Regularly arrange to let employees be medicated for tape worm and have health check-ups

Keep record of all employee livestock on the property

Treat employee livestock with separate but dedicated health programs

Ensure employees understand the reason behind the implemented bio-security measures to help ensure compliance.

#### GENERAL AND REPRODUCTION MANAGEMENT

Record keeping: All animals are individually identified and recorded.

To prove ownership: All animals are marked with the registered brand mark according to the Animal Identification Act, No 6 of 2002.

A defined breeding season is the basis of effective management: The breeding season coincides with the rainy season, i.e. the period when nutritive value of the pasture is at its best.

Sufficient energy reserves in the herd as measured by condition scoring are vital, especially for effective breeding, and when inadequate the herd is supplemented in consultation with a nutritionist: Condition scoring of bulls and cows are regularly done, particularly at the onset of the breeding season and supplemented if necessary.

Bull - cow ratios are maintained: A ratio of 1 to 25 is maintained in every separate herd.

Fertility of breeding bulls: All breeding bulls are tested for mating ability and semen quality before the breeding season.

Sexually transferable diseases: Sheath washes or scrapes on bulls are performed annually.

Diseases that can cause poor conception, abortion or weak calves: Cows are vaccinated against such diseases in consultation with the veterinarian.

Breeding success monitored by a veterinarian: Rectal pregnancy or scan diagnosis is done by the veterinarian 8 weeks after the breeding season.

Twenty percent of cows or more not pregnant: Further tests are done to determine cause of low pregnancy rate.

Culling of non-pregnant cows: Non-pregnant cows are removed from the herd and considered a necessary bonus to supporting herd income.

#### HERD HEALTH AND BIO-SECURITY

Maintenance of herd health is key to a successful enterprise: A veterinarian should visit the farm biannually at least.

Calf mortality before 3 months of age is an important reason for poor weaning percentage: Good management practices are applied to limit early calf deaths.

Some diseases and parasites (internal and external) are more often encountered in specific areas: Annual vaccinations and a parasite control program should be applied according to regional requirements and in liaison with the veterinarian.

Farmers selling weaned calves to feedlots may want to have a market advantage compared to others: A specific vaccination program is applied before weaning for that purpose.

Herds may be at risk of being exposed to CA and TB: The herd is tested annually for CA and all heifers are vaccinated against CA between 4 and 8 months of age with an efficient, approved remedy. The herd is tested at least every 5 years for TB

Precautionary measures are required to prevent diseases being imported into the herd: A quarantine program to keep incoming animals separate is followed. All incoming animals have a suitable certificate of negative test results or are of a certified clean, closed herd.

Stock remedies and medicines should be registered, correctly stored and used before the transpire date: All medicines and stock remedies are registered, stored and applied according to prescription.

Prescribed medicines with a specific application are under the control of the veterinary profession: All prescription medicines are obtained and applied under prescription from a veterinarian.

# Practices that had nothing to report

Cape Town - Sophette Gers

Bathurst - Dr. Jane Pistorius

Cradock – Dr. Frans Erasmus

Mokopane – Dr. Alwyn Venter (SV)

Nigel – dr. Cindy vd Westhuizen

Plettenberg Bay – Dr. André Reitz

Stellenbosch – Dr. Annelie Cloete

Tulbagh – Dr. Dirk Trigaardt

Vaalwater - Dr. Annemieke Müller

Vanderbijlpark – Dr. Kobus Kok

#### **Ostriches**

# **Western Cape**

#### Oudtshoorn

Avian influenza – 3 High prevalence of wild bird interactions following short good rains – pastures mostly. Spurwing geese, Egyption geese and blue cranes. Not H5 or H7. Seems like a H6 and H9. Cold weather with stress increases susceptablity.

Red gut – 3 Changing weather results in over eating after bad spell causing clostridial overgrowth.

*E. coli* diarrhoea - Starts with overgrowth of normal bacteria following a trigger stress situation. If treated too late or with hard antibiotics rapidly develop chronic diarrhoea due to resistant *E coli*. Prognosis poor.

Yolk sac infection - Start of the new season, acute mortalities (low insidence). Septicaemia/toxaemia, *E. coli* 

Selenium deficiency – 1

Lungs – 2 Cold stress weather/ wind, dust confinement to protect birds from poor weather results in air sacculitis and conjunctivitis (with low vit A and E during winter contributes)

Eyes – 2 Cold stress weather/ wind, dust confinement to protect birds from poor weather results in air sacculitis and conjunctivitis (with low vit A and E during winter contributes)

Cold exposure – 3

# **Equines**

# Mpumalanga Middelburg

Tetanus - 2

#### Limpopo Bela-Bela

Trauma- Horses fought

#### Game

# Mpumalanga

**Volksrust** 

Bovine malignant catharra fever – Buffalo

# Gauteng

#### **Pretoria**

Brown ear-tick – 2
Bont-legged tick – 2
Sweating sickness – 1
Opthalmia – 2
Abscess - 2

#### Limpopo Bela-bela

Lameness – 1 Nyala, infection in the hoof. Sable infection of the hoof, recovered Lameness – Sable got caught up in the fence and injured achilles tendon Trauma – buffalo – fighting between two bulls, one bull had wound caused by horn Balance problem – 1 King cheetah, anorexia, comatous, euthanazed Trauma – 1 Buffalo cow, horn penetration by other buffalo Ringworm – 3 Buffaloes Bont legged-ticks - 3

#### North West Klerksdorp Red legged-ticks – 2 Zebra Protein deficiency – game fed pellets

#### Swine

Eastern Cape Humansdorp Pneumonia - 1

# **Alpaca**

**Gauteng Pretoria**Selenium deficiency - 1

# Monthly report on Livestock and Wildlife isolations for September 2018 from Vetdiagnostix – Microbiology Laboratory, supplied by dr. Marijke Henton (henton@vetdx.co.za)

September 2018

Very chronic mastitis problems in cows yielded opportunists resistant to antibiotics, which were *Pseudomonas aeruginosa*, MRSA *Staphylococcus aureus*, *E. coli* and the yeast, *Candida albicans*. *Trueperella pyogenes* was also isolated, which, although not resistant to antibiotics, is refractory to treatment. Lipophilic antibiotics, such as doxycycline and fluroquinolones penetrate granulomas formed by coryneform bacteria better than water soluble antibiotics, which could be considered in such cases. These results were a good demonstration of the fact that when antibiotics are regularly used, environmental opportunists take over the damaged tissues, and exacerbate the problem.

Blue udder in sheep yielded both *Mannheimia haemolytica* and *Staphylococcus aureus* on one farm. The OBP Blue Udder vaccine contains strains of both, and should therefore control it on the farm.

Enteritis in sheep was due to *E. coli* in two cases. One of the isolates was positive for the toxins STaP and STb [Heat Stable toxins a and b] which cause enteritis in animals from about 2 weeks to 2 months. An autogenous vaccine prepared from such an isolate should be effective in controlling the disease. *Cryptosporidium* was only detected in one case.

In calves, enteritis was due to *E. coli* in 9 cases, and *Cryptosporidium* in 2 cases. Three of the *E. coli* isolates were resistant to all the penicillins and cephalosporins, as well as most other antibiotics tested.

Enteritis in a goat herd was due to *Salmonella* Typhimurium, which is a rare finding. A foal yielded *Salmonella* Typhimurium from multiple joints.

Two cases of abortion in one herd yielded *Campylobacter fetus* from one and *Trueperella pyogenes* from a second foetus. *T. pyogenes* also caused arthritis in a bovine.

Feedlot respiratory tract samples yielded *Mannheimia haemolytica* [11], *Pasteurella multocida* [11], *Histophilus somni* [6], *Mycoplasma* [8], and *Mannheimia* species [4].

Pneumonia in pigs was caused by a variety of pathogens; *Actinobacillus pleuropneumoniae*, *Bordetella bronchiseptica*, *Streptococcus suis* and *S. canis*, also known as group G [one each].

E. coli in pigs was responsible for septicaemia [2], enteritis [1] and vaginitis [1]. Another case of vaginitis was caused by Streptococcus dysgalactiae [equisimilis].

An infected rhino wound yielded an ESBL positive *E. coli*, which was resistant to most antibiotics that were tested, and two cheetahs, one with enteritis and one with meningitis also yielded ESBL *E. coli* isolates. [ESBL stands for extended spectrum beta lactamases]

# Feedlot report received from Drs. Shaun Morris and Eben du Preez for September 2018 (<a href="mailto:edupreez1@telkomsa.net">edupreez1@telkomsa.net</a>)

Condition	Comments and Specie
Anaplasmosis	B 2
Red water – Red urine at abattoir	B 1
Besnoitiosis - Guiyani	B 1
Red gut	В 3
Blackquarter -backgrounding	B 2
Botulism -backgrounding	B 2

Lumpy skin disease seen at abattoir	B 2
Pneumonia	В 3
Vitamin B 1 deficiency	B 2

# Monthly report for September 2018 from Dr R D Last (BVSc; M.Med.Vet(Path); MRCVS)

### Specialist Veterinary Pathologist, Vetdiagnostix - Veterinary Pathology Services

LIVESTOCK DISEASE SURVEILANCE							
LIVESTOCK SPECIES	DISEASE AGENT	NO. CASES	LOCATION				
Bovine, Adult cow	Lumpy skin disease	1	Dundee, KZN				
Ovine, Lambs	Escherichia coli septicaemia	1	Beauford West, S.Cape				
Bovine, Calves	Cryptosporidiosis with rumen indigestion	1	Bethlehem, Free State				
Bovine, calf 3 weeks	Cryptosporidiosis with rumen indigestion	1	Underberg, KZN				
Bovine, Beef Heifers	Oak poisoning	1	Kokstad, East Griqualand				
Bovine, Calf 2 months	Cryptosporidiosis	1	Kokstad, East Griqualand				
Bovine, Aborted Fetus	Campylobacter abortion	1	Polokwane, Limpopo				

WILDLIFE DISEASE SURVEILANCE							
WILDLIFE SPECIES	DISEASE AGENT	NO. CASES	LOCATION				
Meerkat, Adult Female	Protozoal myocarditis (Suspect sarcosporidiosis)	1	Grahamstown, Eastern Cape				
Sable antelope, Adult + Sub	Toxic cardiomyopathy	1	Port Alfred, E. Cape				
Nyala Antelope, Adult Bull	Osteochondroma (multiple cartilaginous exostoses)	1	Thabazimbi, Limpopo				

Monthly report on Livestock and Wildlife isolations for September 2018 from IDEXX Laboratories supplied by dr. Liza du Plessis (<u>Liza-DuPlessis@idexx.com</u>)

Condition	Comments and Specie
Tapeworms	C 1
Blue ticks	E 2
Coccidiosis	C 1
Lumpy skin disease	B 1
Enzootic abortion	C 1
Brucellosis	B 3
Bacterial enteritis (diarrhoea)	O,C 2
Johne's disease	01
Mycoplasmosis	B 1
Bovine malignant catharr (snotsiekte)	B 1
Jaagsiekte	01
Orf	C 1
Equine sarcoid	E 1
Protein and Energy deficiency	B, G 1
Lungs	B 1
Abortion	B,O,C 2



Section of Pathology Department of Paraclinical Sciences Faculty of Veterinary Science

# Monthly report: Faculty of Veterinary Science cases Cases sent to referring veterinarians between 5th September and 2nd October 2018

Cases from State vet Skukuza or Orpen

Cases imported with master permit (none)

PMDate	Species	Final	Histo No
23-Aug-18	African Buffalo	Normal lung and lymph node (TB monitoring)	S907-18
23-Aug-18	African Elephant	Normal lymph nodes	S2909-18
23-Aug-18	African Buffalo	Suspected paucibacillary tuberculosis	S2906-18
10-Sep-18	Cheetah	Grade 3 gastritis	S03086-18

Kind regards,

Mily Mitchell

Prof. Emily Mitchell