Our capture procedure

INTRODUCTION

Chemical immobilization of wildlife is an expensive and high-risk procedure that requires good preparation and awareness. Wild animals in a stressful situation will fight



for their lives. In order to gain control of these animals and to minimise both stress and injury, we use highly potent drugs that are deadly for humans.

Human as well as animal safety is of utmost importance to us and we thus ask that you please familiarize yourself with this text and the procedure before the day of capture.

PREPARATION FOR THE CAPTURE

What is your goal of the immobilization? Moving young bulls out of a breeding camp, catching animals that were sold? Health check? Measuring horns? Once an animal is immobilised think about procedures you may want performed e.g.:

- Horn measurements
- Microchips
- Ear tags (or ear tag removal)
- DNA-sampling

- Hoof cutting/grinding
- Pregnancy tests
- Photos for studbook, auction
- purposes etc.

Let us know beforehand what you need and want, and we make sure we have all our equipment ready.

As mentioned earlier, dart work is expensive and high-risk work. You can contribute a lot to minimise both the expense as well as the risk factors involved by having the ground team well briefed and organised **before** the capture starts by:

Organise suitable recovery vehicle(s) to pick up darted animals in the field. Depending on the number of animals to be darted and the size of the area in which the animals are to be darted, it may be advisable to have a number of vehicles and recovery teams available. This will drastically reduce the time needed to complete

Figure 1 We will bring face masks, carrying mats etc with. Please inform us on forehand what you need and want, and we will bring it with.

the capture (you will literally save 1000's of N\$ on chopper time alone). Recovery vehicles should:

- be cleared of items that clutter the loading surface and could potentially hurt an immobilized animal BUT have water for drinking and cooling animals as well as spare tyres.
- have sufficient space for both the animals to be loaded as well as the individuals that will handle it.
- wherever possible, the tailgate trallies should be removed, to allow for easy loading.



Organise a ground team(s) of handlers to restrain and load animals in the field. As a rule, a minimum of 5 physically able, strong and fit men are needed to load an adult Oryx/Sable bull. To take full advantage of multiple recovery vehicles in the field there must be a full ground team for each recovery vehicle.

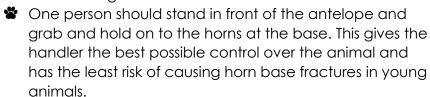
We will inform all people of the ground team of the procedure as well as the correct way to behave around wildlife.

Organise plastic pipes when animals with horns need to be darted. When the antelope is immobilized, these pipes must be placed over the horns. Some antelopes will try and stab backwards, thereby it can seriously kill or injure a person.

HANDLING AN IMMOBILIZED WILD ANIMAL

Remember that an immobilized animal can still see and hear thus:

- Please keep loud noises to a minimum and do not use cell phones when handling the animals.
- When applicable, place plastic pipes cut to the correct length over the horns when handling the animal.
- Place the face mask over the eyes (Figure 2).
- Focus on the animal so that the handling time is kept as short as possible.
- NEVER approach an antelope form behind and/or stand behind an animal if the animals head has not already been properly restrained as described above. Especially Sable, Roan and Oryx have a nasty habit of lifting their heads, thus stabbing backwards!!!
- All antelope species must be placed and restrained on their chest at all times (sternal position). The head is to be held up and the nose pointing to the ground (Figure 3). This is to avoid potential regurgitated material going into the lungs.



The handler firmly holds the animals head (by the horn base) between his legs, covering the eyes (if no face mask is available). This gives a single handler maximum control over the animal while minimising the risk of people being stabbed. In addition, the head will be kept in the correct position (nose down) (Figure 3).



Figure 2 Oryx with face mask



Figure 3 The correct way of holding an antelope. When there are no horns, or the horns are too small, the handler must hold the ears. The horns of young antelopes can easily break, and it is thus better to hold the



If the dart is still in the animal, please **do not take it out**. The darts contain drugs dangerous to humans and it is very important to handle and dispose of the darts correctly. We appreciate that you inform us that the dart is still in, and we will gladly remove and safely dispose it.



Figure 4 The immobilization drugs we use can be deadly for humans!

The <u>drugs</u> we use to immobilize animals is highly potent, and <u>very dangerous</u> (=deadly!) for humans. Not even regular vets may use it, these drugs may only be handled by registered wildlife veterinarians. It is about 600x stronger than morphine.

THE CAPTURE

Darting is done either from a helicopter or from the ground. Once the animal is darted it must be observed closely.

Most darted antelope species usually start to show signs of being affected within 2 minutes and are "down" within 3-4 minutes (spiral horned antelope take longer). Once the animal is down, the ground team must approach the animal carefully and quietly from the front, seize it by the horns or ears and place it on its chest with its head up and nose down. DON'T rush in (on foot or by car) on an animal if it has not gone down yet! Doing this, will stimulate the animal to get up and start running again and may lead to injury and/or death of the animal.

The animal is then placed on a carrying mat, with front legs inside the pocket. The back end of the mat is folded over the back of the animal, which may then be lifted onto a recovery vehicle or trailer.

While the animal is being transported, the head must still be held up with the nose down. By lying on its chest with legs tucked under the body, the animal has the least chance of kicking and thereby injuring either itself or the people around it. Breathing of the antelope must be checked regularly (my assistant will monitor the antelope closely)





TREATMENT

When the animal is still too strong to handle, a top-up dose with e.g. Ketamine® may be given to make it more asleep. In case the animal needs to be transported, or moved to another camp, my assistant will inject a long-acting tranquilizer in the vein. Now we can place ear tags, microchips, measure horns etc.

Depending on your wishes and the health and condition of the antelope, we usually advice to give:

- Kyroligo supplement of multivitamins, amino acids and minerals.
- B Co-Bolic supplement of Phosphor, Selenium and Vitamin B, to boost the metabolism. Very advisable to give when an antelope has been running for a long time, as Selenium helps to break down the acids that have been build up in the muscles.



Figure 5 Supplemental drugs

- Ivomec treatment against internal and external parasites, such as gastrointestinal roundworms, lungworms, grubs, lice and mites.
- Decaspot Pour-on against ticks, stable flies, horn flies, cattle house flies and nuisance flies (safe for oxpeckers!)
- Vaccinations (depending on the area, risks of getting a disease and species) such as:4
 - o Rabies; prevention of rabies, especially important for kudus and eland
 - Anthrax; prevention of anthrax
 - Rhinovax; prevention of anthrax and clostridial diseases
 - o Covexin; prevention of clostridial diseases
 - o Pasteurella; prevention of pasteurellosis
 - One Shot Ultra 7; prevention of clostridial diseases and pasteurellosis



Figure 6 Vaccinations

Figure 7 Other supporting drugs we always carry with

Besides the above drugs we also carry other important drugs which we use when needed, such as different types of antibiotics, painkillers, corticosteroids etc.



RELEASE

Upon arrival to either a truck or a new camp, the animal is loaded off the vehicle with the aid of the carrying mat. Once the animal is in place, the carry mat is pulled out (on a truck) or opened up (in the field). When in the field, the antelope is offloaded nearby water, and turned in such a way that it faces an open space.

The animal will now be given an antidote to reverse the effect of the immobilising drugs. If given intramuscularly, the animal should wake up slowly and be on its feet within a few minutes. This is the preferred method when the animal is on a truck, so that it will not wake up with a jump and injure itself. If the animal is reversed in the veld, the antidote may be given intravenously which usually gives a fully conscious animal within half a minute.

Once reversed, the animals may show different reactions to their new surroundings. This could be by jumping up and running away, walking quietly and curiously around, or even by



Figure 8 Several types of antidote

charging. It is thus important that all members of the ground crew are in safety (on a vehicle and a respectful distance away) and that disturbances (noise, cars revving, people smoking etc.) are kept to a minimum.



Figure 9 Waking up a kudu and a roan. Simply said, the immobilizing drugs will sit on a receptor in the nerves, and this makes the animals 'asleep'. When the antidote is given, the antidote will 'kick out' the immobilizing drugs from that receptor and sits in its place: the animal is awake again. The animal cannot be darted again for about 24h as the antidote keeps that receptor occupied; the immobilizing drugs cannot get in.



RISK

Even though we take every precaution and pride ourselves in a very low mortality or injury rate, we can never guarantee a positive outcome of every game capture operation. Before such an operation is started, the buyer and seller must agree on who will carry the risk of possible losses and at what stage the risk is transferred from buyer to seller.

CONCLUSION

The farmer/buyer/seller and their assisting ground team(s) have a very considerable influence on both the cost (chopper hours and time needed to complete a capture) as well as the eventual outcome (survival, injury and mortality rate) of a capture operation. It thus makes sense to optimise things in your favour and be properly prepared!