BIRD CARE & CONSERVATION SOCIETY

CARING FOR WILD BIRDS IN CAPTIVITY SERIES (ADELAIDE AND ENVIRONS)

COMMON AVIAN DISEASES

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There are many diseases to which bird rehabilitators need to be alerted. On the basis that people don't rescue healthy birds - every bird that comes in, is potentially dangerous. Therefore, we need to minimize that potential as much as possible.

1. Quarantine and Hygiene

- **a.** The first and best thing to do is to keep the bird in quarantine. All new intakes need to be isolated and maintained in a place where there is no chance of other resident birds catching a communicable disease. This may be easier said than done but the fact is that any newly rescued bird must be considered to be contagious until proved otherwise.
 - Many birds harbour some sort of disease, they probably don't show or do any damage to the bird, but when that bird is subject to stress, it is likely to develop the disease and they may well create dangerously contagious situations.
- **b.** You should clean cages, aviaries, bowls and other accessories at least every day. Clean and disinfect them thoroughly.
- **c.** Avoid mixing feed and water dishes amongst the various cages on your property. It will pay you to mark bowls so that you can always identify where they belong, and thus prevent infections being passed through shared food dishes.
- **d.** Remember if you provide heat to help a bird recover, you are also providing an ideal growth medium for bacteria and other microorganisms.
- **e.** Wash your hands between birds and cages, It is a fact that owners can spread more diseases than birds do.
- **f.** Worm all new intakes on spec. Birds are worm prone. Particularly sea birds, and the stress of injury and capture is very likely to cause the birds normal burden of worms to multiply, and other birds can be infected.
- **g.** Cages must be separated with solid dividers. Don't let diseased birds cough, sneeze or defecate on each other don't even let them see each other.
- **h.** Don't take on more than you can handle. If you can't control the risk of disease spreading on your premises, you are inviting disaster if you compound the problem by adding to those risks
- i. Don't over crowd. Not only are you risking the spread of disease, you will almost certainly be stressing your patients and thus weakening resistance. It is a fact that most native birds don't like other birds even when it is the same species from another colony.
- **j.** Give serious thought to euthanasing "sick" birds as distinct from "injured" birds. With injuries you probably know what you are up against, but what do you really know about potentially contagious illnesses? To euthanase early rather than late is the preferred option.

Other ways to reduce the spread of disease, and care for sick birds:

- Stainless steel cages much easier to clean and keep sterile.
- Below floor cage bottoms droppings fall through the cage floor to a removable base.
- Heat the room not the cage. Commercially available hospital cages can prevent air flow and in some cases kill the bird.
- Joined cages with removable dividers allow extra flying room as the bird's health improves.
- Wooden cages are almost impossible to disinfect.
- Be prepared to improvise if you haven't got exactly the right facilities you think you need, use those you have got! E.g. If you've got a penguin, let it have a splash around in your bath (you can clean it later), but don't leave it there it will drown.

2. How to look for signs of disease

Veterinary surgeons look for stains (droppings) - in cartons, on newspapers, wherever the bird may have left them in whatever they are presented. An experienced eye can tell many things. Stains can even tell or warn the less experienced observer that something is wrong. Green droppings for example will tell you that the bird is not well, but it needs a closer examination to tell you why.

Staining a slide with faeces or any other exudate and examination under a microscope will confirm the veterinarian's suspicions. This can be done in the surgery and is much cheaper than laboratory analysis.

The other tool that should be used is an accurate set of scales with which the bird should be weighed at regular intervals to gauge whether the bird is gaining or losing weight.

Any bird that stays "fluffed up" is displaying a general symptom of sickness. It doesn't tell you what is wrong - merely that something is wrong.

Strangely, when a top bill is hooked inside the lower bill, there is a strong likelihood of the bird suffering from a respiratory disorder.

Other respiratory problems can be detected from gurgling and crackling sounds.

Weeping around the eye is a sign of trouble in the sinuses.

Pea-green droppings can mean Chlamydia, and will mean veterinary attention and, perhaps medical attention for you the carer. Of course, the pea-green droppings may mean many other things too, and the actual shade of green will mean something different - certainly to an experienced bird vet.

3. Bacterial Infections

Chlamydia psittaci:

(Was originally called Psittacosis (meaning parrots), then Ornithosis (birds in general), and is caused by the rickettsia *Chlamydia psittaci*).

A bacterial disease common in the parrot and cockatoo family but can occur in any bird. In birds, it usually presents as a respiratory disease with watery eyes nasal discharge and moist respiratory noises. Sneezing and coughing is also a feature.

Pea green urates are often observed. This disease will spread to other birds and to humans and any bird that is suspected of having Chlamydia should be quarantined. Veterinary attention is essential.

Stress plays a big part in the establishment of this disease as the organism is found in healthy birds. Birds rescued may not be suffering from this disease at the time of rescue but may develop it subsequently. To reduce this possibility good hygiene is essential, as is avoidance of stressing the birds any more than is necessary.

Faecal testing is necessary for definitive diagnosis but this can result in false positives and negatives (uncertain results).

Any member of the family showing 'flu' symptoms should always be checked for Chlamydia. This disease can cause death in humans.

Salmonella:

This bacterium is not uncommon in birds but gallinaceous species (akin to domestic fowl) and seagulls seem more prone. Although it is possible for them to be carriers with no visible symptoms, it is more common for them to be unwell.

Profuse diarrhoea and rapid deterioration are the usual symptoms. Again, this disease will spread to other birds and to humans. Attention to hygiene is essential when dealing with ill birds.

Veterinary attention is essential and euthanasia may be the best alternative Due to the potential of developing carriers. Faecal cultures are needed for definitive diagnosis, but gram stains can be indicative.

Humans may suffer flu like symptoms or severe abdominal cramps and diarrhoea.

E coli:

Another bacterial disease which will spread to other birds and people. Symptoms are similar to salmonella. Gram stains are indicative but culture is needed for definitive identification. Veterinary attention is required.

Mycobacterium:

This causes avian tuberculosis. Fairly rare but a concern as it can, although unlikely, spread to humans. Birds often show no symptoms other than depression.

Other bacterial diseases:

Pasteurella is the usual contaminant from cat bites, and will often be fatal even with treatment.

There is an enormous array of bacteria that can affect birds. Symptoms are not easily diagnosed and gram stain or cultures are often required. Antibiotics are required and this will mean a visit to a veterinary surgeon.

Bumblefoot:

Swelling on the pads of the toes - is bacterial in origin and it is very common in heavy birds like swans ducks and birds of prey that sit on wrong size or dirty perches. Bacterium gets in microscopic cracks in the skin. Frequent changes of natural branches rather than doweling is recommended. Bumblefoot is very hard to cure.

The above diseases are the most common of those around, but there are others.

5. Fungal Infections

Aspergillus:

Usually as a result of being in captivity rather than a reason for rescue but can affect penguins, swans, raptors and parrots. The bird may show respiratory signs including gagging, coughing, choking and wheezing. Depression and weakness is often all you will see. Very hard to treat.

In your aviary situations you will need to get rid of straw or wood shavings or anything at all which soaks up (absorbs) moisture. When you create that wonderful natural look of leaves and forest floor you are also creating a good environment for breeding fungi. If you buy bulk seed, watch for signs of mould! It may be better to buy smaller quantities more frequently.

Candida (commonly called thrush):

Common in young, hand reared cockatoos and parrots. Usually as a result of over feeding, too frequent feeding, and not allowing the crop to empty between feeds, dirty feeding utensils or not mixing fresh food each time you feed the bird. Correction of the underlying reason as well as anti-fungal medication is necessary. Sometimes these birds will also need surgery to empty their digestive tracts.

Protozoan Infections (These are single cell organisms):

Coccidia:

Seen more in gallinaceous (akin to domestic fowl) and poultry species, but can occur in parrots, lorikeets and finches. Usually presents as sudden death or bloody diarrhoea. It will spread to other birds readily. Difficult to treat due to speed of death but controllable in an outbreak.

Trichomoniasis (canker, frounce):

Seen in pigeons, budgies and raptors, especially boobook Owls. Occasionally found in members of the corvid family (crows and allies). Characterized by large cheesy masses in the upper and lower oesophagus. Wild birds are usually near death before found making this disease difficult to treat.

6. Viral infections

Pox virus:

Cheesy lumps in the back of the throat. Also evident around the eyes, beak and feeti.e., it has external symptoms. It looks like canker. Most common in magpies, ravens etc.

PBFD- Pscittacine Beak and Feather Disease:

This is believed to be a viral disease. Research has produced a vaccine and hopefully it is very close to being available for use. The virus itself appears not to be very infectious, in fact transmission appears to take place in the nesting place and other birds only have a low risk of contracting it.

Entero virus:

Young cockatoos are the high risk species

Newcastle disease:

An especially virulent strain - so far not found in Australia - we think. There are many other strains -It is not uncommon to find dead waterbirds around a contaminated pond - the cause could be anything, but it may relate to the first of the dead bodies contaminating the water and killing the others.

7. Internal Parasites

Round worm:

Common in parrots and many other species. Not always evident as diarrhoea, or poor condition. When no other reason for rescue found consider worming. Treat with Combantrin in the ratio 1-ml per kilogram of body weight.

Sea birds have a variety of worms. Treat them with Panacur.

Threadworms:

Less common but can be pathogenic. A stronger wormer is usually required and it does present as intestinal disease.

Tapeworm:

Can be found in insectivorous birds. The cycle starts when insects eat the eggs of tapeworms, and of course, the bird eats the insect.... In limiting the spread to insectivorous birds, don't forget that many species, even parrots and lorikeets, are opportunistic insect eaters - lerps for instance. Harder to treat but causes less disease problems.

Filaroid nematodes:

Seen in raptors. Usually presents as a normal bird that can not fly. Hard to diagnose and difficult to treat due to their position in the air sac.

Throat worm:

Seen mainly in juvenile magpies but also boobook owls, currawong, butcherbirds, black face cuckoo shrikes and Murray magpies. This will cause extreme difficulty in swallowing for some birds. Some birds respond to a variety of treatments and others do not. The only consistent treatment is to physically remove them.

8. External Parasites

Cnemodicoptes (Scaly leg mite and scaly face mite):

Seen in many "rescued" budgies. Also seen in parrots, finches and corvids (crows, and allies), magpies and canaries. Causes either leg or face lesions but occasionally generalized lesions can be found. Characteristic honeycomb around the face or excess scale development on the feet. Easy to treat via injection.

Harpyrhynchus (Granulomatous mite)

A mite that causes large cheesy-like growths in the skin of birds. Usually seen in musk lorikeets but it also occurs in rainbow lorikeets. The birds seen with this disease also have concurrent beak and feather disease and should be isolated or euthanased. Does not respond well to treatment.

Hippoboscid mite:

Commonly called "flat fly". These are blood-sucking parasites common on many species of birds. Apart from local irritation and blood loss, they may also be involved in carrying diseases from bird to bird.

Feather lice:

Although very common and a nuisance due to their habit of crawling on humans these generally do no harm to the birds.

10. Items for your medicine cabinet

- Pyrethrin Spray for treatment of lice
- Combantrin (dose rate .1ml per 100 gram)
- A pair of blunt tweezers and scissors.
- Friar's Balsam, or ferric chloride to apply to stop bleeding
- Saline solution for cleaning open wounds, prior to using antiseptic
- Micropore dressing for strapping wings an, (if it is necessary to use Elastoplast use micropore underneath to protect feathers).
- Sterilizing solution for all implements and feeding bowls etc.
- Anti-bacterial solution for hand-washing
- · Rubber Gloves and face mask
- Eye dropper
- Glucose powder or syrup