

## Sarcoid treatment information sheet.

### What are sarcoids?

Sarcoids are skin tumours that occur commonly in horses, ponies and donkeys: around 10% of these species develop sarcoids at some stage during their lifetime in the United Kingdom. As a form of skin cancer, they need to be treated both promptly and aggressively; this minimises the risk of them returning at the site(s) which have been treated and also reduces the risk of them developing elsewhere.

### The treatments that we use are:

- **Carbon dioxide laser surgery:** Developed for human cancer patients, carbon dioxide laser surgery offers extremely high efficacy rates of over 92% at the site of surgery. The surgical sites are not sutured, as this allows us to use additional, topical treatments at the site(s); moreover, suturing does not speed healing at the site(s) and increases the risk of complications. Generally, patients heal quickly and unproblematically with laser surgery alone and less than 5% develop post-operative complications. It is worth noting, however, that some sites are associated with rather longer healing times and these are generally “high movement” areas such as the axilla (armpit). Although somewhat site-dependent, after-care usually involves short, oral courses of painkilling anti-inflammatory drugs and, if required, antibiotics, together with restricted turn-out into a small paddock. As the laser cuts at over 90°C, some of the tissue both around and at the base of the surgical site will slough away after a week to ten days; this is perfectly normal and, indeed, desirable, as it gives a wider margin around the treated tumour site.
- **5% acyclovir:** This white cream is an anti-viral drug which is used commonly after carbon dioxide surgery, as there is compelling evidence for a viral component to the development of sarcoids. The cream is non-caustic and is extremely well-tolerated by equine patients; it can be applied by the owner to the surgical sites and is generally used for the first five days after surgery. Complications and/or adverse effects are not reported.
- **Mitomycin gel:** Mitomycin is an anti-tumour antibiotic, which was developed originally for use in human cancer patients. In horses, ponies and donkeys it is used as an additional treatment in those cases in which it is deemed that carbon dioxide laser surgery alone may not be curative. This may be considered with particularly aggressive sarcoids types: these are determined either prior to surgery, given the tumour’s appearance, or after laboratory analysis of the sarcoid subsequent to its removal. Mitomycin gel is not used after all surgeries as it can only be applied by a veterinary surgeon or veterinary nurse (usually in the clinic over a five-day period) and therefore increases the cost of treatment; in addition, it slows the healing time for the patient as it results additional tissue necrosis (tissue damage).
- **Bleomycin gel:** Like mitomycin, bleomycin is another anti-tumour antibiotic developed for use in human oncology. Again, its use is reserved for more problematic sarcoids and, in particular, is used as an additional treatment after carbon dioxide laser surgery for lesions that are close to the eye. Its effect on healing times is less pronounced than mitomycin but, again, can only be applied by a veterinary surgeon or veterinary nurse and is more expensive than mitomycin.

## When might I need to call the vet after treatment?

We would recommend that animals that have been treated are seen a week after surgery and/or any other treatment to check that everything is progressing correctly. Otherwise, although complications are relatively rare, we would ask you to call the practice if you are concerned in any way and/or if you notice any of the following specific signs:

- **Excessive amounts of swelling:** Generally, carbon dioxide laser surgery is associated with less swelling than many other forms of surgery, so excessive swelling would be an indication to contact the practice.
- **Signs of inappropriate discomfort:** If the patient seems unduly uncomfortable after treatment, then please contact the practice. It may be necessary to prolong, increase the pain killers being used or to prescribe a further course of them.
- **Unpleasant discharges from the treated sites:** Some clear or urine-type fluid (serous fluid) will discharge from the treated sites as a matter of course in the days after surgery: this is perfectly normal. However, any thick, custard-like and/or foul-smelling discharges would be abnormal and may require a reassessment of the patient's antibiotic needs.