

# Practice Tips

Dr. Jerome Harness, *Presiding*

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## Tibial Neurectomy for the Correction of Spastic Paresis in Calves

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The conventional treatment of spastic paresis by gastrocnemius and partial superficial flexor tenotomy or tenectomy is often disappointing due to recurrence of the clinical signs of an overextended hock joint some weeks later as a result of a fibrous union. Tibial neurectomy gives considerably better results. Surgery is performed either under a tranquilizer (xylazine) and epidural block, or under general anesthesia. The surgical approach is made laterally between the two heads of the biceps femoris muscle. In the standing patient the groove between the two muscle bellies may be advantageously outlined by a marking pen. Then, with the calf in lateral recumbency and using aseptic technique, the tibial and peroneal nerves are bound by blunt dissection to lie between the muscle masses adjacent and

cranial to the popliteal lymph node. The tibial nerve is identified by mechanical or electrical stimulation, e.g. cattle goad with suitably small fine electrodes. Tibial nerve stimulation results in hock extension and fetlock flexion. A 1-2 cm section of the nerve is removed at its most proximal accessible point, before the nerve gives off 5-7 branches which supply the gastrocnemius and superficial digital flexor muscles. The muscle is reapposed with chromic catgut and the skin closed routinely. Recurrence of clinical signs has not been seen in 30 calves less than 6 months old operated for spastic paresis by total tibial neurectomy. Evidence of hereditary predisposition implies that surgery should not be done on cattle intended for breeding.

## Chain Hoists in Veterinary Medicine

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Chain hoists can take much of the back work out of dairy practice. At our hospital we have mounted two chain hoists to an overhead beam about 15 feet apart. Additionally we use portable rubber mats on the floor directly beneath the chain hoists. The hoists are extremely useful in putting a 1500 lb. holstein cow into dorsal recumbency.

We usually cast the animal onto the rubber mats laying her on her right side. We use soft ropes to tie the legs together and attach these to the chain hoists. The hoists can then be used to roll the cow up into the desired position for many surgical procedures. The hoists are very easy to adjust allowing for repositioning of an animal during a surgical procedure.

In our practice area we have been able to convince

dairymen to haul cattle for surgical procedures into our hospital. We convince them with: 1. better facilities, 2. better outcome, 3. lower cost.

We use the chain hoists for a variety of procedures:

1. Abomasal displacement correction
2. Ventral celiotomy
3. Midline caesarian
4. Teat surgery
5. Laceration repair
6. Aligning long bone fractures for cast application.

The chain hoists allow us to position large Holstein cows in lateral or dorsal recumbency safely and easily.