Pubic Symphysiotomy

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With your indulgence, I will refer to this subject as "pelvis splitting." This procedure is done obviously to relieve dystocia in heifers.

We use this primarily in cases where we have an oversized calf, and I should preface this by saying primarily in beef cattle. We have used this technique in some dairy cattle but we mostly reserve it for beef animals. I am in an almost exclusively beef practice. We also use it when the heifer has a particularly narrow pelvis. It is of little or no value for the really fat young heifer with a normal pelvis. This procedure is absolutely of no value in a case of limited dilatation of the cervix.

We try to limit the procedure for heifers not over 26 months of age. In many instances I have done them at an older age, including a registered heifer that turned out to be about 36 months old.

Basically, the procedure is as follows. I do not like to perform this in a squeeze chute. I like to get them on the end of a lasso rope, rig up a halter, and tie them to a corner of the corral. We give them an epidural—6-8 ccs of 2% xylocaine solution. We try not to give them enough to put them down. This is where my technique varies from others recorded in the literature. Incise the skin, using a 1"-11/2" incision about 1" below the ventral commissure of the vulva, in the midline. If you miss the midline, you will probably cut the perineal blood vessel (you better have some forceps and cat-gut available!) Stay on the midline, then go through the fascia with your knife down to the point where you can actually feel the symphysis of the pelvis underneath the blade of your knife. Then locate the symphysis. Now, this is a critical part of this procedure. You've got to stay in the center line. When you start to chisel, remember that the posterior aspect of the symphysis is rather thick. We have tried four or five kinds of chisels and now use a wide chisel with a handle and a guard. They are relatively inexpensive and my recollection is that the whole unit costs about \$7.50 or \$8.00.

The only other piece of equipment you need is a "two-by-four" and the way we do it is that we get about a two-foot piece of

"two-by-four." Some people use automobile or fender and door rubber hammers. Most farmers, when they call you out and want you to deliver a calf, forget that it took Mother Nature nine months to build this little creature, and they want to get it out of there right now! So, if you hand them something that is convenient to swing, they want to try to drive spikes with it, and really drive them in a hurry! A two-by-four is hard to swing and hard to hang on to, it rattles around in their hand and hurts a little bit, so they go a little slower. I think it is a good idea!

In this operation, insert the left hand into the vagina and palpate the floor of the pelvis. Have the right hand on the chisel (standing on the right hand side of the chisel) as the farmer drives it through with a hammer or a "two-by-four."

The posterior tuberosity is pretty hard. As you get into the central part of the symphysis, the chisel will go along very easily, particularly in the younger heifer.

As the chisel goes through, you follow its progress until it reaches the anterior aspect of the symphysis which is rather thick. You will probably have to go through the anterior aspect of the symphysis and back up a little bit and put the chisel a little lower. Go through again, or you will not split the whole pubis, then you have defeated your purpose. You've got to get the whole pubis split. Withdraw the chisel to the posterior aspect and again push it through with your hip to clean out all the fibrous attachments you might have missed. I think this is a critical part; you have to clean out all of those little fibrous attachments. From then on, it is just like delivering any other calf.

As you begin to put traction on the calf puller, you usually find that the heifer will want to lie down on her side. I would encourage you to let her do so at this stage. You will find that if the heifer stands up she has a tendency to hold the symphysis together with her hind legs. If you let her lie down the symphysis will "pop up," frequently about four inches, and you can actually place your hand right down between the two halves of the pubis. Go ahead and deliver the calf as you would in any other instance. In some cases you may want to use a lubricant in addition to the other materials. After the calf is delivered, we use the after-care. including an injection of penicillin dihydrostreptomycin. We usually give about 20 ccs. We do not sew up the incision in the skin below the vulva. We usually insert some uterine boluses and in the summertime we use a fly spray on the perineal area.

There is one limitation that I feel is critical in these cases; namely: these heifers should be confined by themselves for at least two to three days. My primary failures with "Pubic Symphysiotomy" were due to another heifer coming along and mounting the heifer before the pelvis had completely healed. The heifer will stumble and fall and break a leg, which really has nothing to do with the splitting of the pelvis. Usually you have to destroy these animals but you cannot eat them!

The advantages of this procedure are the following. As you develop this technique, you will find that you will spend only about twenty minutes to complete the operation. This should give you a

chance to examine the heifer, split the pelvis, deliver the calf, take care of the "after-care," and clean up. You can thus charge a relatively minimal fee and there is very little trauma. The after-care is minimal, the one day and the confinement—I mean the one group of injections and the confinement. These heifers, in our experience, can be re-bred just as easily as any other first-calf heifer.

The disadvantages are obvious—the need to isolate the individual, the age limit (under 26 months of age), and then the first time around you have a sales job! When you go in and tell somebody, "I am going in here to separate the hindquarter of this heifer," the first thing he does is start to shudder and shake. As near as I have been able to ascertain, this technique was first developed by an M.D. for use on very young girls in Peru and other areas in South America. I proceed to tell the fellows, "If it's good enough for some little girl in Peru, it's good enough for your heifer!" so they will buy it the first time and after that they'll let us go ahead and do it (laughter)! We've done these now on approximately 1400 heifers with almost no bad effects except one or two broken legs. I have deviated to the side; made a mistake by not staying in the symphysis, and a couple of these do not breed very well, or they do not deliver very well the next time around because they end up with a great big calcium deposit on the symphysis. The only other suggestion that I'd make here is that we have tried this on yearling ewes on several occasions. We run into a tremendous number of kids with 4-H sheep and caesareans in a 4-H kid's sheep project just do not go over very well as far as I am concerned! The first of these happened to be on my own boy's sheep. I split all their ewe lambs one year because we couldn't deliver any when we crossed a Hampshire ram with a Southdown ewe. We had beautiful lambs; they did real well at the fairs, but they all came with split pelvises! That was the only way we could get the job done, either this or a C-section. It's kind of hard on a 4-H kid's pocketbook to have to buy a casearean section in a ewe lamb!

I should mention that occasionally you may end up with an abscess. These are easily handled. We usually instruct the rancher to lance and drain them.