

Table IV.—The Losses from Pulpy Kidney up to 30th November, 1936, in Lambs from Ewes in Table III.

Farm.	Vaccinated Group.	Lamb Deaths from Pulpy Kidney.	Control Group.	Lamb Deaths from Pulpy Kidney.	Remarks.
M ..	377	5	1,473	69	Owing to being unable to procure the vaccine in time the ewes were vaccinated closer to lambing than desirable.
N ..	182	1	182	4	Previous losses on farm about 5 per cent.
O ..	186	3	186	4	Previous losses on farm about 5 per cent.
P ..	396	13	434	7	The vaccinated ewes were four and five years old, whereas the majority of the controls were two-tooths.
Totals	1,141	22	2,275	84	

In the vaccinated group of ewes the pulpy kidney losses among lambs were 22 = 1.92 per cent.

In the control group of ewes the pulpy kidney losses among lambs were 84 = 3.68 per cent.

TECHNIQUE OF VACCINATION.

The most suitable place to handle the ewes for vaccination is in a drafting-race, into which the ewes are run, filling the race without unnecessarily crushing the sheep. Vaccination is then commenced, and the operator and his assistant work along the whole race, leaning over from outside the race.

The site of injection found suitable is behind the shoulder; this allows the minimum of handling, the ewes standing on all four limbs practically unrestrained. The wool behind the shoulder and the site of injection is thus exposed for the operator; this is quickly cleansed with a swab of cotton-wool soaked in methylated spirit. A 20 c.c. Record hypodermic syringe is used for the injection, and the needle is inserted obliquely, keeping the barrel of the syringe more or less parallel to the body of the ewe, through the skin and the subcutaneous fascia, then the required dose is introduced subcutaneously by pressure on the plunger of the syringe.

At the commencement of the work the syringe is sterilized by boiling. It is important to remove the plunger from the barrel of the syringe. The portions are then placed in the cold water, which is brought to the boil and retained so for ten minutes. The needles are kept handy in a suitable vessel containing methylated spirit.

The vaccine is kept in its original container, the cork being removed and a piece of sterilized rubber tied over the opening; through this the needle of the syringe is inserted to draw off the vaccine. The surface of this rubber top can be kept clean by wiping with a cotton-wool swab soaked in methylated spirit prior to each refill. By this procedure the vaccine is maintained free of extraneous contamination during the course of the operation.