The Deer Industry Association of Australia

FACT SHEET

## LUNGWORM

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This is the most important parasitic disease of Fallow, Red Deer and Elk. It is caused by the lungworm known as *Dictyocaulus viviparus* and may be a different strain to the worm in cattle.

The most susceptible are the young deer that are kept in intensive situations. Stress will make the disease worse.

## Life Cycle

*Dictyocaulus viviparus* has a direct life cycle. The adult worms in the lungs lay eggs which hatch in the lungs as larvae. These larvae and eggs are coughed up and swallowed.

The larvae are passed in the faeces and continue to develop on the pasture at  $18^{\circ}$  to  $21^{\circ}$  C and are infective in 3 to 7 days. They are eaten and are laying fertile eggs again in about 20 days. They can overwinter at temperatures of  $4.5^{\circ}$ C for up to a year.

The infective larvae are inactive and don't travel far from the faeces; however they are spread by fungi for a distance of up to 3 metres. The fungi may also protect the larvae from drying out.

Larvae are shed for about 10 months when the deer become resistant to them. Calves and fawns older than two months shed more larvae than their mothers.

## **Clinical Signs**

The principal clinical sign is a cough particularly when forced to move. However calves and fawns will show a decreased appetite, loss of weight and retarded growth rate.

The coats may be roughened (resembling copper insufficiency) and deaths will occur over several weeks.

The number of worms in the lungs has NO relationship to the severity of the condition. As few as 20 worms may cause death from asphyxiation.

## **Treatment and Control**

The drug of choice today is Cydectin <sup>®</sup>. Worm the females before calving/fawning and then worm the calves monthly until 12 months of age. If possible put treated animals onto a fresh paddock.