Introduction

This is a condition of late pregnancy and early lactation most commonly occurring in the last six weeks
of gestation in does with multiple fetuses and in the first 4 weeks in heavily lactating does. Pregnancy
toxaemia is a more common condition than ketosis in goats. Through recognition of early signs and
symptoms and avoidance of the predisposing factors, it can be reduced to a sporadic condition.

Predisposing Factors:

Factors that predispose does to develop pregnancy toxaemia can be divided into two types: inadequate
nutrition (they are not offered the correct quantity or quality of the required ration) and adequate nutritional
offerings but external or animal factors (e.g. disease) affecting intake.

Inadequate nutrition:

Does carrying multiple fetuses require a much higher level of energy than does carrying singles. These
increased needs are compounded by a decreased capacity to consume. When offered ad lib balanced
feeds, does in late pregnancy will voluntarily increase energy consumption but expanded uterine contents
limit dry matter intake, putting fecund does at even greater risk of developing pregnancy toxaemia. To
counteract this, the producer must offer a ration that is more energy and protein dense, e.g. 35% grain to
65% forage. Prolific does on pasture may have difficulty meeting their energy needs through grazing.

Factors affecting intake:

External factors:

Healthy, well fed goats may tolerate many external factors but does chronically underfed are not able to
compensate. Inclement weather (e.g. rain or snow storms or extreme heat) may interrupt intakes. Feeder
space may have been calculated for non-gravid does and may be inadequate for heavily pregnant does.
When hand feeding, the producer should be warned to watch for excessive competition. Restricted water
intake or poor quality water will reduce dry matter intakes. Rapid feed changes, transport may all
temporarily reduce intakes. Poor quality forage that is too woody may also reduce dry matter intake.
Preventive treatments such as vaccinating, etc. performed in late gestation may reduce intakes,
particularly if they are held off feed for the procedure. Exercise has been shown to increase voluntary
intake.

Animal factors :

Factors that will reduce intakes include dental disease, old age, smaller body size than group (see feeder
space), and other concomitant disease such as hypocalcaemia, lameness (e.g. CAE arthritis),
gastrointestinal parasitism, Johne's disease, etc. The body condition score of the doe entering into late
gestation is important. Does that are very thin (< 2.5) have little fat or muscle reserves to draw upon and
are then at increased risk despite a good ration. Very fat does (> 4.0) will readily use body fat reserves in
late gestation but also experience decreased voluntary intakes, thus predisposing them to formation of
ketone bodies that further suppress appetite.

Clinical Picture:

The course of the disease varies but generally develops over three to ten days. A more sudden onset is
usually associated with a sudden stress or poor producer observation. Does will start to decrease grain
intake, followed by silage and then forage. They separate from the herd, lag behind, and become
depressed and gaunt. Other signs of predisposing disease may also be present. Producers that are
vigilant when hand feeding does will easily recognize these animals. If missed, the doe may go on to