



## Administration

TRANSITION™ Calcium Boluses

- 176 gram (44 g Ca)

**TRANSITION™ Calcium Boluses are to be administered immediately after calving, and again 12 hours after calving.**

<b>176 g Bolus</b>	
Immediately after calving	1 bolus
12 hours after first administration	1 bolus

All TRANSITION™ Calcium Boluses are packed in individual inserts.

**Please use product immediately after insert removal.**

1. Insert flat end of the bolus snugly into an appropriate bolus gun (V-Grip™ Bolus Gun from Genesis Instruments recommended)
2. Point rounded end toward the cow
3. Insert bolus gun into the back of cow's mouth and deposit the bolus, allowing the animal to swallow
4. After administration, allow water access



**Do not administer with excessive force, nor administer to cows that are lying down, aggressive cows or cows without a normal swallowing reflex.**

1.



2.



3.



4.



FRESHEN. REBOUND.



# TRANSITION™ Calcium Bolus

Oral Supplement For Dairy Cows

*Transition cows demand both immediate and sustained calcium for metabolic support during freshening. You demand a quick solution that is easy to administer and has no withholding period.*



**SEMEX®**  
Genetics for Life®  
07 889 1572  
www.semex.co.nz  
E: info@semex.co.nz



# TRANSITION™ Calcium Bolus


Oral Supplement For Dairy Cows



**Choose the calcium supplement specifically formulated for transition dairy cows. Choose TRANSITION™ Calcium Boluses.**

TRANSITION™ Calcium Boluses are the first product in a line of nutritional supplements for close up and transition dairy cows. TRANSITION™ Calcium Boluses are easy to administer, safe for the animal and help prepare cows to enter the milking herd in a normal time frame.

TRANSITION™ Calcium Boluses include three proven sources of calcium for immediate and sustained release:

 Calcium chloride

 Calcium carbonate

Vitamin D3 is also introduced to help the absorption and metabolism of calcium.

## Cutting-Edge Bolus Technology

**TRANSITION™** Calcium Boluses feature revolutionary technology that offers significant advantages when compared to other supplements. Using a patented process, high concentrations of nutrients are liquefied, hardened and compressed into a single, quick dissolution bolus.

### **TRANSITION™** Calcium Bolus application advantages

- No sharp edges or surfaces
- No palatability issues that are common with drenches or pastes
- No withholding period



## Proven Calcium Benefits

When it comes to high-risk transition cows, preventing complications is far more manageable and cost effective than treatment.

**TRANSITION™** Calcium Boluses contain both immediate and sustained release calcium to help support normal nutritional levels. This means cows receive supplemental calcium when they need it the most.

**TRANSITION™** Calcium Boluses include proven sources of calcium

- Calcium chloride
- Calcium carbonate

Vitamin D3 is also introduced to help the absorption and metabolism of calcium.

**TRANSITION™** Calcium Boluses are easy to administer, safe for the animal and help prepare cows to enter the milking herd in a normal time frame.

## Immediate & Sustained Delivery

When considering oral calcium supplements to help maintain normal blood calcium concentrations, it is critical to have a form that will be absorbed quickly enough to raise blood calcium to counteract the hypocalcemia that occurs in most cows at freshening.

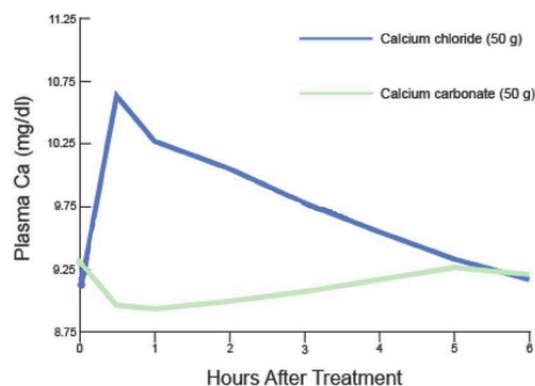
The calcium chloride in Transition boluses is very soluble in water, providing calcium ions that will be quickly absorbed across the rumen wall within 3 hours following administration. Calcium carbonate is poorly soluble in water—it only becomes available for absorption after reaching the hydrochloric acid within the abomasum. It can supply calcium for absorption in the small intestine over the next 16-36 hrs.

Figure 1 demonstrates how calcium chloride, but not calcium carbonate can increase blood calcium within a few hours of administration. It is also important to use a bolus that is coated with fat to lubricate the passage of the bolus down the esophagus.

- Calcium chloride: Offers an immediate release, but levels drop over time.
- Calcium carbonate: Offers a low immediate release, but calcium levels increase over time.

This is how **TRANSITION™** Calcium Boluses are able to deliver more available calcium than other sources – transition cows receive a high level of calcium that goes to work immediately upon release and sustains its performance over a long period of time.

Immediate and sustained effects of orally-administered calcium on transition cows



1993, J.P. Goff & R.L. Horst, "Oral Administration of Calcium Bolus for Treatment of Hypocalcemia in Cattle," USDA Agriculture Research Service.