

# CALVING EASE

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## NEWBORN NAVEL CARE

To be technically correct, this issue is about caring for the newborn calf's umbilical cord. We usually call this care, "navel dipping." Umbilical cords come in all lengths and diameters. Unfortunately, some get liberally doused with manure shortly after birth. There are lots of challenges to providing quality care.

### Why Newborn Navel Care

The umbilical cord is a hollow tube. Pathogens travelling up the cord's interior have easy access to the calf's circulatory system by way of the liver. Bacteria that invade the liver enter the blood. They are circulated throughout the body. Septicemia and "joint ill" are common names for diseases that result from this contamination. Even when pathogens travel only partway up the cord we may find localized navel infections. Careful and consistent umbilical cord care that we usually call "navel dipping" substantially decreases calf mortality.

### Objectives of Navel Dipping

First, is the umbilical cord contaminated? Is the exterior, especially the open end, covered with MUD (that stands for Manure, Urine and Dirt)? Perhaps MUD has entered the open cord end. We want to wash off the MUD.

Second, once the cord is cleaned off it will still be covered with residual pathogens too small to see without magnification. We want to kill as many of these as we can.

Third, the cord on a newborn is still open to invading pathogens. It's a pipe going directly to the liver. How long a pipe? On the average calf it's about eight inches long (four inches outside the body and the same length inside). We want to close the external cord to prevent pathogen invasion.

### How To Do Newborn Navel Care

One, start with clean calving conditions. It's hard to overcome poor calving conditions with post calving care.

Two, use the correct navel dip product. The most common dairy farm practice we have observed is to use one product for all three jobs; cleaning, sanitizing and drying. **Tincture of iodine** is nearly universally recommended for these tasks. When used liberally it does a good job of washing off MUD. The seven-percent iodine concentration is strong enough to kill most pathogens with a short contact time. The tincture of iodine is an alcohol solution. The alcohol acts to dry out the cord tissue. This speeds up the rate of closure.

If tincture of iodine is unavailable, we have had better success using rubbing alcohol than iodine teat dip. Teat dip washes okay but its iodine concentration is too low to give us the same rate of bacteria kill as the seven-percent iodine navel dip. Also, the teat dip water base works against us by slowing drying of the cord. But, plain alcohol doesn't have as good a bacteria kill as the navel dip solution.

Third, use enough navel dip to accomplish all three objectives. Wash off contaminants. Kill pathogens by coating the cord from tip all the way to the calf's belly. Dry the cord by using plenty of navel dip over all the exposed cord.

### **Unusual Conditions**

Extreme exposure to pathogens. Calves born in MUD are at very high risk for systemic diseases. Before cleaning up the rest of the calf, flood the umbilical cord and attachment site with navel dip as soon as possible. Use the dip to wash off contaminants. If the navel is long enough we may be able to squeeze MUD out of the bottom inch or two as we are washing.

After the calf is cleaned up and dry it makes a lot of sense to re-coat the cord and attachment site to kill residual bacteria and promote rapid cord closure. We often re-dip these cords the next day, also.

Cord breaks off at belly. Oops, there is no external umbilical cord. Keeping these calves in well-bedded housing will reduce systemic infections. Repeated exposure to the alcohol navel dip for several days seems to encourage closure as the site scabs over.

Abnormally large diameter cord. Our challenge is to keep the cord clean long enough for it to dry down. That means preventing other calves from sucking on it. That means keeping the calf in well-bedded housing. That means dipping the enlarged cord repeatedly until it finally dries up. If the calf is observed carefully daily any local infection in the cord can be treated at an early stage with the antibiotic recommended by your veterinarian.

If you know of someone that doesn't currently receive **Calving Ease** but would like to, tell them to **WRITE** to Calving Ease, 11047 River Road, Pavilion, NY 14525 or to **CALL** either 716-591-2660 (Attica Vet Assoc. office) or 716-343-8128 (Offhaus Farms Office) or **FAX** (716-591-2898) or **e-mail** [sleadley@servtech.com](mailto:sleadley@servtech.com) . A limited number of back issues may be accessed on the Internet at [www.calfnotes.com](http://www.calfnotes.com) and clicking on the link, Calving Ease. PLEASE NOTE THE NEW WEB SITE ADDRESS FOR CALF NOTES!