**Feedyard Pen Surface Management (Outdoor)**

Feedyard pen surface management can have a significant impact on cattle health and performance. Excessive mud in the pen has been shown to decrease cattle ADG (25 to 37%), DMI (15 to 30%), and FE (20 to 33%)1,2. Respiratory problems occur more frequently and treatment costs increase under very dusty conditions. Thus, it often becomes a balancing act between conditions that are too wet and those that are too dry. Pens with excessive mud can be a challenge to both animal welfare and employee safety. Additionally, principle-based animal husbandry practices such as appropriately drained and maintained pens have been shown to reduce mud and/or dust on cattle sent to slaughter, which may reduce potential carcass contamination from the hide. Maintaining records of pen floor management activity can be a useful tool for feedyard management when making decisions on long term infrastructure improvement plans by identifying chronic problem areas.

General guidelines for pen floor management are:

* Mud depth should not consistently be deeper than the ankles of cattle in pens.
* Slopes of pens should be maintained to allow water to run off away from the feed bunks and not pool excessively in the pens.
* If slope is not sufficient to facilitate proper drainage, an elevated area may be constructed to allow cattle to have a place to lie down.
* All bunk aprons should be scraped/cleaned as needed so cattle do not have to stand in mud to eat from the bunk.
* The pen floor- bunk apron interface should be maintained so that cattle do not have an excessive step up to the apron.

**Protocol for Feedyard Pen Surface Management**

1. \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ will be responsible for ensuring that pen floor conditions are acceptable.

2. \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_will be responsible for ensuring that every pen is scraped/cleaned at least \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ per year, and if applicable each pen will be scraped/cleaned after each “turn” of cattle.

3. \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ will monitor the areas where the larger equipment cannot reach around the water tanks, bunks, shades and other structures to prevent excessive build-up of manure and dirt.

4. \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ will use to scrape/clean pens and they will not be used for feed handling unless thoroughly cleaned and disinfected prior to handling feed.

5. If pen surface management records are kept, \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ will be responsible for maintaining records.

**QUALIT**

**Y ASSURANCETM FEEDYARD ASSESSMENT**

*Management:*

*During periods of excessive snowfall will include:*

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*During periods of excessive rainfall will include:*

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*During periods of excessive heat will include:*

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*During periods of excessive cold will include:*

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*1Bond, T.E., W.N. Garrett, R.L. Givens and S.R. Morrison. 1970. Comparative effects of mud, wind and rain on beef cattle performance. Paper No. 70-406. Annu. Meeting A.S.A.E.*

*2National Research Council. 1981. Effect of environment on nutrient requirements of domestic animals. National Academy Press, Washington, DC.*