

citrus by reason of their nitrogen free extract (NFE) and fat content. Their value varies from 69% to 76% total digestible nutrients (TDN), depending upon the seed content. Citrus pulp is palatable to cattle and because of its bulkiness is helpful in minimizing digestive disturbances in animals on full feed. Citrus meal, because of its fineness, is not as palatable as pulp.)

Citrus Molasses

Citrus molasses has 60% to 70% dry matter made up largely of sugars. It furnishes energy nutrients in rations balanced as to roughage and protein.

Sweet Citrus Pulp

Citrus pulp and citrus molasses frequently are combined as a single energy feed known as sweet pulp. Analyses show it to be slightly lower in nutrients than citrus pulp.

Tangerine Pulp

A relatively limited amount of fresh tangerine pulp is processed along with large amounts of orange and grapefruit pulp. Tangerine pulp (?) was not as palatable as mixed pulp. Its value as the main energy feed in cattle rations is limited.

Fresh Citrus

Fresh grapefruit and oranges are considered watery energy feeds. Grapefruit are more palatable than oranges because of the lower essential oil content of the peel.

FEED VALUE OF CITRUS PRODUCTS IN CATTLE FINISHING RATIIONS

All rations contained adequate protein, roughage, and minerals, and at least the minimum requirement of vitamin A for animal needs, with energy nutrients from citrus and other feed products. The results of the 23 trials conducted at the RCES are summarized in Appendix Tables 2 and 3.

Ground Snapped Corn Versus Citrus Pulp

Cattle response from this first series of feeding trials (10) showed that citrus pulp had a feeding value similar to ground snapped corn in cattle finishing ration. Cattle fed pulp were superior to those fed ground snapped corn in conversion of ration nutrients to liveweight gains.