

# CATTLE FARMING

VI Sem B.Sc. Zoology - Elective Paper

Swapana Johny  
Assistant Professor  
Dept of Zoology

# COMMON FEEDS & FODDER

# ROUGHAGES

- ◉ FEEDS - LARGE AMOUNTS OF FIBRE OR NON-DIGESTIBLE MATERIAL - ROUGHAGES
- ◉ HAYS, SILAGE, FODDER AND OTHERS
- ◉ LEGUMES - PEAS, SOYABEAN, BEANS - EXCELLENT SOURCE OF PROTEINS, MINERALS AND VITAMINS
- ◉ CORN SILAGE - EXCELLENT SOURCE OF ENERGY



Hay



Maize



Barely



Lucerne



Millet





# SILAGE



# GRASSES

- ◉ GRASSES - NAPIER AND SUDAN - GOOD ROUGHAGES
- ◉ HAY - LOW ENERGY, PROTEIN, MINERAL AND VITAMIN CONTENT - GIVEN AS ADDITIONAL FIBRE



Napier grass



Sudan Grass

# CONCENTRATES

- ◉ MIXTURE COMPOSED OF GRAINS, PROTEIN SUPPLEMENTS, BY PRODUCTS, MINERAL, VITAMINS AND ADDITIVES
- ◉ CONCENTRATES - MAKE UP NUTRIENT DEFICIT



# GRAINS

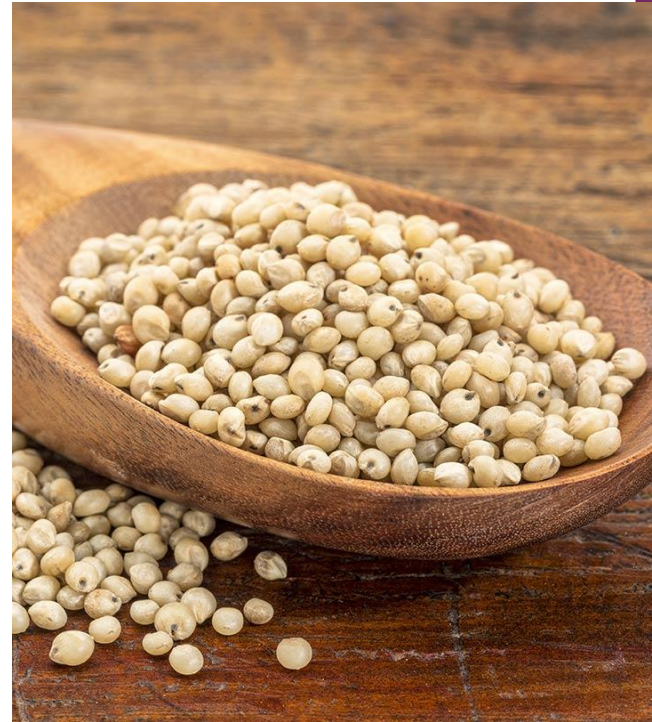
- ◉ BEST SOURCE OF ENERGY
- ◉ MAIZE, OATS, BARLEY AND JOWAR
- ◉ SHELLLED CORN - HIGHEST ENERGY GRAIN
- ◉ BARLEY ALSO SUBSTITUTED FOR CORN
- ◉ WHEAT AND RICE NOT USED - HIGH PRICE

# GRAINS

◉ Barley



◉ Jowar



# SHELLED CORN



# COTTON SEED CAKE



# PROTEIN SUPPLEMENTS

- ◉ ANY FEED WITH MORE THAN 20% OF PROTEIN - PROTEIN CONCENTRATE
- ◉ MIXED WITH GRAINS AND ROUGHAGES - INCREASE PROTEIN CONTENT
- ◉ SOYABEAN, LINSEED, COTTON SEED, GROUND NUT MEAL
- ◉ MEAT SCRAPS, FISH MEAL, DRIED SKIM MILK, DRIED BUTTER MILK



# ADDITIVES

- ◉ Do not contain nutrients - improve functions in other ways
- ◉ Increase appetite and improve feeding efficiency
- ◉ Antibiotic usage - drug residues in milk and development of resistant strains of bacteria
- ◉ Vitamin concentrates essential for young animals
- ◉ Fish liver oil - Vit A & D
- ◉ Wheat germ oil - Vit E

