

NATIONAL ORGANIC PROGRAM Dry Matter Demand Tables For Classes of Beef Cattle





Photo courtesy of USDA-NRCS

Adapted from: "Nutrient Requirement Tables," from Nutrient Requirements of Beef Cattle: Seventh Revised Edition: Update 2000, by Subcommittee on Beef Cattle Nutrition, Committee on Animal Nutrition, National Research Council, 1996, Washington, D.C.: National Academies Press. Copyright 1996 by National Academy of Sciences.

Table of Contents

BEEF CATTLE DRY MATTER INTAKE REQUIREMENTS

Beef Cows

Cows, Lactating

Table 2-1: Daily Dry Matter Demand (DMI) in Pounds (lb) and Percent (%) of Body Weight for Beef Cows of 1,000 - 1,400 lb Mature Body Weights and 10 - 30 lb of Milk Production/Day

Page 2

Replacement Heifers

Heifers, Pregnant

Table 2-2: Daily Dry Matter Demand (DMI) in Pounds (lb) and Percent (%) of Body Weight for Pregnant Replacement Heifers of 1,000 - 1,400 lb Mature Body Weights

Page 3

Growing and Finishing Cattle

Growing and Finishing Cattle, Steers and Heifers

Table 2-3: Daily Dry Matter Demand (DMI) in Pounds (lb) and Percent (%) of Body Weight for Growing and Finishing Cattle at Finishing (Slaughter Stock) or Maturity (Replacement Heifers)

Page 4

Table 2-1. Daily Dry Matter Demand Requirements in Pounds and Percent of Body Weight

Beef Cows

1,000 - 1,400 lb Mature Body Weights and 10 - 30 lb of Milk Production/Day

1,000 - 1	,	J-IVIGIO		.,	u			VI -1VIII	K I I O O		, – a y		
		Months Since Calving											
	1	2	3	4	5	6	7	8	9	10	11	12	Average
1,000 lb Mature Weight, 10 lb/d Peak Milk													
DMD, lb	21.60	22.10	23.00	22.50	22.10	21.70	21.10	21.00	20.90	20.80	21.00	21.40	21.60 lb
DMD as % Body Weight	2.16	2.21	2.30	2.25	2.21	2.17	2.11	2.10	2.09	2.08	2.10	2.14	2.16 % Body Weight
1,000 lb Mature Weight, 20 lb/d Peak Milk													
DMD, lb	24.00	25.00	25.40	24.40	23.50	22.70	21.10	21.00	20.90	20.80	21.00	21.40	22.60 lb
DMD as % Body Weight	2.40	2.50	2.54	2.44	2.35	2.27	2.11	2.10	2.09	2.08	2.10	2.14	2.26 % Body Weight
1,000 lb Mature Weight, 30 lb/d Peak Milk													
DMD, lb	26.40	27.80	27.80	26.40	24.90	23.70	21.10	21.00	20.90	20.80	21.00	21.40	23.60 lb
DMD as % Body Weight	2.64	2.78	2.78	2.64	2.49	2.37	2.11	2.10	2.09	2.08	2.10	2.14	2.36 % Body Weight
1,200 lb Mature Weight, 10 lb/d Peak Milk													•
DMD, lb	24.40	24.90	26.00	25.60	25.10	24.80	24.20	24.10	24.00	23.90	24.10	24.60	24.64 lb
DMD as % Body Weight	2.03	2.08	2.17	2.13	2.09	2.07	2.02	2.01	2.00	1.99	2.01	2.05	2.05 % Body Weight
1,200 lb Mature Weight, 20 lb/d Peak Milk													, ,
DMD, lb	26.80	27.80	28.40	27.40	26.50	25.70	24.20	24.10	24.00	23.90	24.10	24.60	25.63 lb
DMD as % Body Weight	2.23	2.32	2.37	2.28	2.21	2.14	2.02	2.01	2.00	1.99	2.01	2.05	2.14 % Body Weight
1,200 lb Mature Weight, 30 lb/d Peak Milk													
DMD, lb	29.20	30.60	30.80	29.40	27.90	26.70	24.20	24.10	24.00	23.90	24.10	24.60	26.63 lb
DMD as % Body Weight	2.43	2.55	2.57	2.45	2.33	2.23	2.02	2.01	2.00	1.99	2.01	2.05	2.22 % Body Weight
1,400 lb Mature Weight, 10 lb/d Peak Milk													
DMD, lb	27.10	27.60	28.90	28.50	28.00	27.70	27.20	27.00	26.90	26.80	27.00	27.60	27.53 lb
DMD as % Body Weight	1.94	1.97	2.06	2.04	2.00	1.98	1.94	1.93	1.92	1.91	1.93	1.97	1.97 % Body Weight
1,400 lb Mature Weight, 10 lb/d Peak Milk	1.5 .	1.57	2.00	2.0.	2.00	1.50	1.5 .	1.55	1.52	1.01	1.55	2107	2101 / 2004 110.6.10
DMD, lb	29.50	30.50	31.30	30.30	29.40	28.60	27.20	27.00	26.90	26.80	27.00	27.60	28.51 lb
DMD as % Body Weight	2.11	2.18	2.24	2.16	2.10	2.04	1.94	1.93	1.92	1.91	1.93	1.97	2.04 % Body Weight
1,400 lb Mature Weight, 10 lb/d Peak Milk		1							1	1			
DMD, lb	31.90	33.30	33.70	32.30	30.80	29.60	27.20	27.00	26.90	26.80	27.00	27.60	29.51 lb
DMD as % Body Weight	2.28	2.38	2.41	2.31	2.20	2.11	1.94	1.93	1.92	1.91	1.93	1.97	2.11 % Body Weight
Abbreviations used in table: DMD = Dry Matter Deman	d, kg = Kil	ogram, lb	= Pound,	d = day									<u>-</u>

Adapted from: "Tables 21, 22, and 23," from Nutrient Requirements of Beef Cattle: Seventh Revised Edition: Update 2000, by Subcommittee on Beef Cattle Nutrition, Committee on Animal Nutrition, National Research Council, 1996, Washington, D.C.: National Academies Press. Copyright 1996 by National Academy of Sciences.

Table 2-2. Daily Dry Matter Demand Requirements in Pounds and Percent of Body Weight Pregnant Replacement Heifers 1,000 - 1,400 lb Mature Body Weights

1										
		Months Since Conception								
	1	2	3	4	5	6	7	8	9	Average
1,000 lb Mature Weight		•	•							
DMD,	b 16.7	17.2	17.7	18.2	18.7	19.4	20.0	20.7	21.3	18.88 lb
DMD as % Body Weigl	nt 1.67	1.72	1.77	1.82	1.87	1.94	2.00	2.07	2.13	1.89 % Body Weight
1,100 lb Mature Weight	T									
<u> </u>	10.0	T 40.5	I 10.0	10.5	20.1	20.0	24.5	22.2	22.0	30.30 lb
DMD,		18.5	19.0	19.5	20.1	20.8	21.5	22.3	22.9	20.29 lb
DMD as % Body Weigl	nt 1.64	1.68	1.73	1.77	1.83	1.89	1.95	2.03	2.08	1.84 % Body Weight
1,200 lb Mature Weight	T									
DMD,	b 19.3	19.8	20.3	20.9	21.5	22.2	23.0	23.7	24.4	21.68 lb
DMD as % Body Weigl	nt 1.61	1.65	1.69	1.74	1.79	1.85	1.92	1.98	2.03	1.81 % Body Weight
1,300 lb Mature Weight										
DMD,	b 20.5	21.0	21.6	22.2	22.9	23.6	24.4	25.2	25.9	23.03 lb
DMD as % Body Weigl	_	1.62	1.66	1.71	1.76	1.82	1.88	1.94	1.99	1.77 % Body Weight
1,400 lb Mature Weight										
DMD,	b 21.7	22.3	22.9	23.5	24.2	24.9	25.8	26.6	27.4	24.37 lb
DMD as % Body Weigl	nt 1.55	1.59	1.64	1.68	1.73	1.78	1.84	1.90	1.96	1.74 % Body Weight
Abbreviations used in table: DMD = Dry Matter Demand	lb = Pounc	l								

Adapted from: "Table 20," from Nutrient Requirements of Beef Cattle: Seventh Revised Edition: Update 2000, by Subcommittee on Beef Cattle Nutrition, Committee on Animal Nutrition, National Research Council, 1996, Washington, D.C.: National Academies Press. Copyright 1996 by National Academy of Sciences.

Table 2-3. Daily Dry Matter Demand Requirements in Pounds and Percent of Body Weight

Growing and Finishing Beef Cattle

1,000 - 1,400 lb at Finishing (Slaughter Stock)

or Maturity (Replacement Heifers)

	Daily DMD						
Current Body Weight, Ib	lb	% Body Weight					
300	10.1	3.35					
350	11.3	3.23					
400	12.5	3.12					
450	13.6	3.03					
500	14.8	2.95					
550	15.9	2.89					
600	16.9	2.82					
650	17.9	2.76					
700	18.0	2.58					
750	18.9	2.53					
800	20.2	2.51					
850	21.0	2.47					
900	21.8	2.44					
950	22.6	2.39					
1,050	24.5	2.33					
1,150	26.1	2.27					
Abbreviations used in table: DMD = Dry Matter Demand, lb = Pound							

Adapted from: "Tables 15, 16, 17, 18, and 19," from Nutrient Requirements of Beef Cattle: Seventh Revised Edition: Update 2000, by Subcommittee on Beef Cattle Nutrition, Committee on Animal Nutrition, National Research Council, 1996, Washington, D.C.: National Academies Press. Copyright 1996 by National Academy of Sciences.