Beef Production & Annual Forages: EW Calves, Cows, & Yearlings

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March 28, 2012

Today's Objective

- Present alternative systems for beef production:

  Calf Early Weaning & Backgrounding
  Cow Residue Grazing
  Yearling Growing & Finishing

- Present economics for each system


IS THERE AN ADVANTAGE FOR WEANING CALVES EARLY??


If I wean calves early, can I eliminate daily feeding ?
What grazing crop will sustain calf gain deep into the fall?

Weaning Comparisons:

Early Weaned - Direct to Feedlot (Mid-August)
Early Weaned - Unharvested Standing Corn (Mid-August)

Normal Weaned Control - Direct to Feedlot (1st Wk November)
Normal Weaned - Unharvested Standing Corn (1st Wk November)

[*Calves held in feedlot for 7 to 14 days to recover from weaning before transfer to the corn fields*.]

Backgrounding Systems Economics

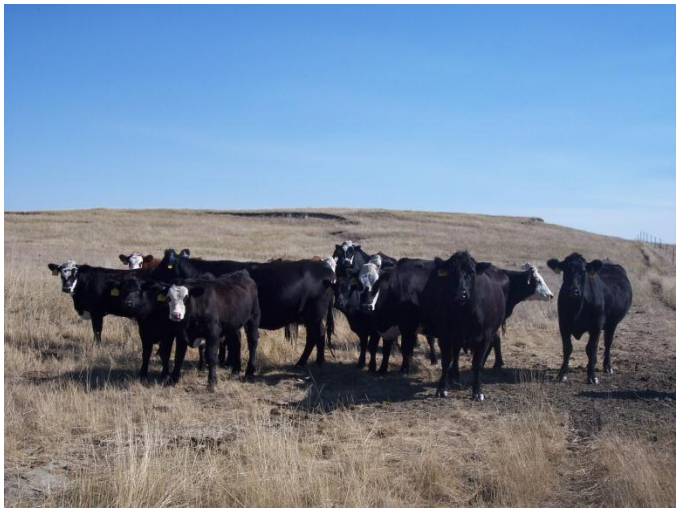
	Pasture Control (Feedlot)	Normal Wean–Nov (Corn)	Early Wean-Aug (Corn)	Early Wean (Feedlot)
System Days	80	38.5	81	86
End Wt	620	703	645	611
Gain	165	85.2	179	206
ADG	2.06	2.21	2.21	2.40
Net Ret/Hd	$87.50	-$5.82	$93.19	$69.56
Cost/Lb. Ga.	$0.59	$1.08	$0.52	$0.66

Steer Health, Pulls & Treatment Cost

	Pasture Control (Feedlot)	Normal Wean–Nov (Corn)	Early Wean-Aug (Corn)	Early Wean (Feedlot)
Pull 1, %	3.7	0.00	0.0	17.5
2, %				8.77
3, %				3.51
Ave Treatment Cost, $	$1.72	$0.00	$0.00	$9.92

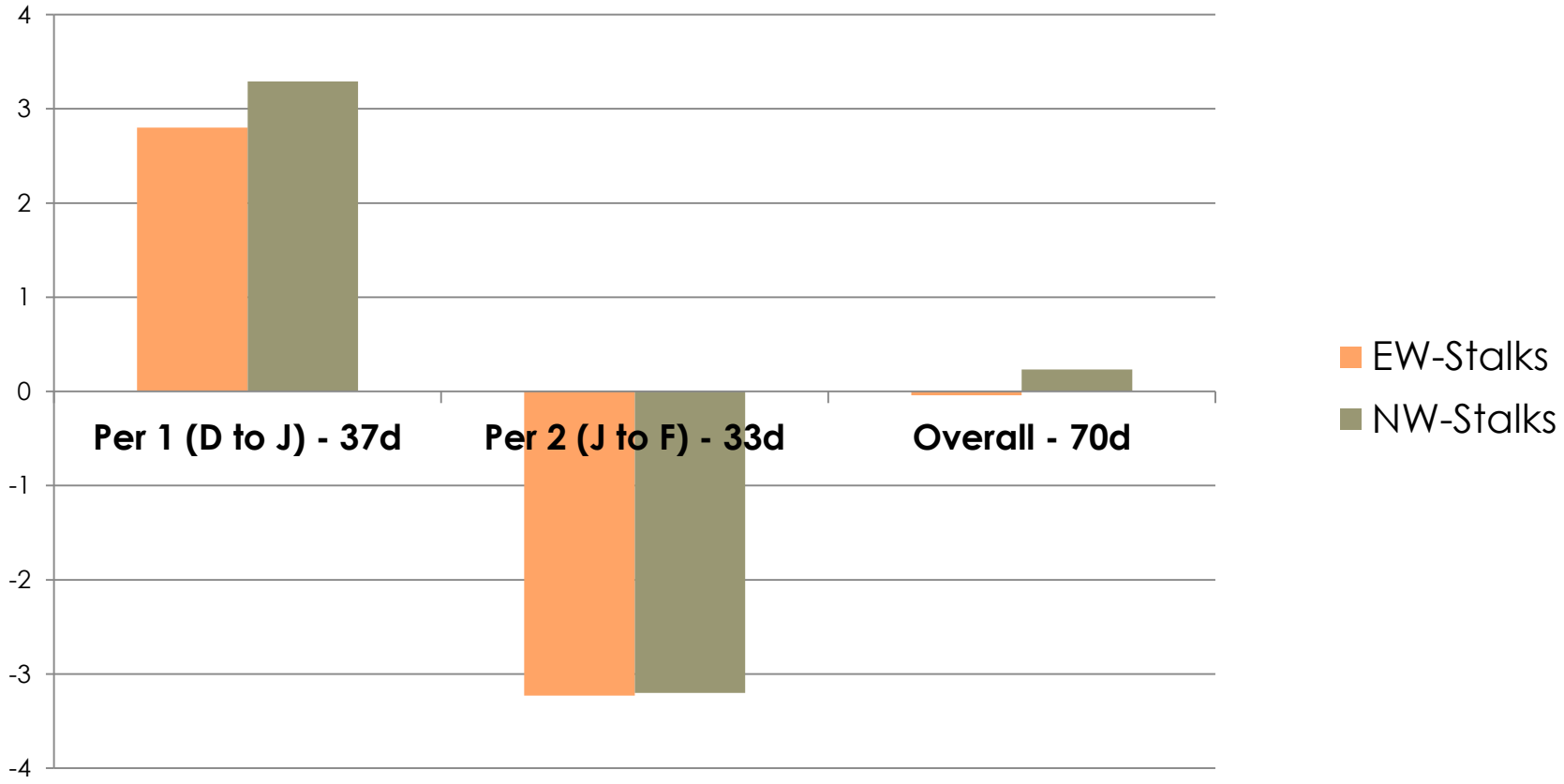
Effect of Early Weaning on Native Range & Cow Condition

- Native Range:
  - Reduces forage disappearance ~ 36%
  - Extends grazing season or inc. stocking 10-15%
- Cow Weight and Condition:
  - Increased cow weight & 0.80 BCS
  - Increases Young Cow Reproductive Performance
    - Cows < 5 Years of age
  - Increased condition may reduce residue grazing supplementation
  - Lower grazing and wintering cost




Cows Follow Calves
Graze Corn Stalk Residue

COW ADG: Corn Stalk Grazing (70 Days)



Corn Stalk Residue Value

Months Grazing/Cow	Range: 1.0 to 2.3 Months
Ac./Cow/Month	Range: 0.50 to 0.87 Ac.
Hay Value	$50.00/Ton
Hay Savings	0.50 Ton/Cow/Month
Winter Feed Cost Reduction	Range: $25 to $57/Cow

Yearling Steer Extended Grazing Research

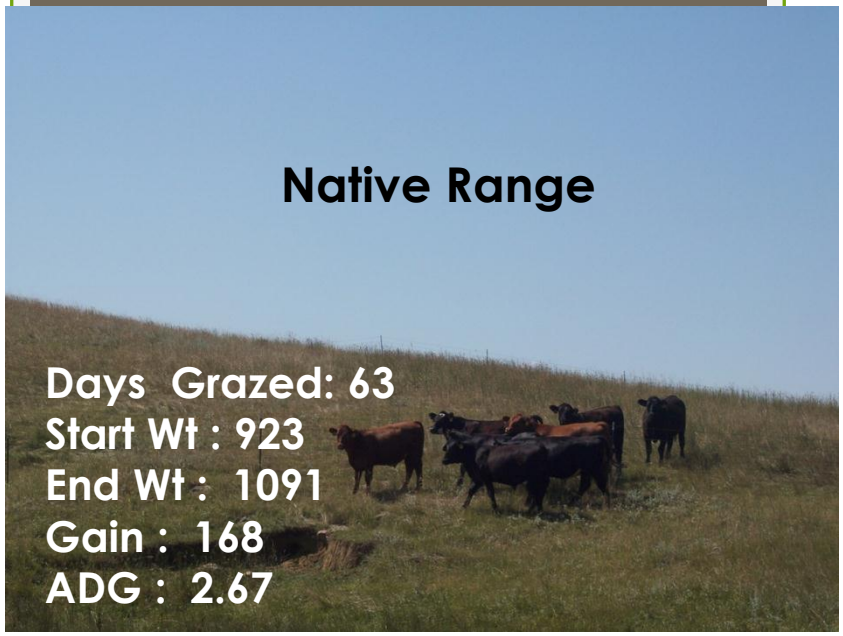
- Objectives:
  - Improve grazing carcass quality
  - Reduce feedlot DOF
  - Improve finishing profitability
  - Evaluate the effect of system on tenderness and eating quality

Five Rivers Feedlot
Greeley, Co

Comparisons

1. Feedlot Direct (May 2 – Sept 21)
2. All Grass (May 2 – October 26)
3. Grass plus Annual Forage Sequence


Crested Wheatgrass
Days Grazed : 44
Start Wt : 791
End Wt : 923
Gain : 132
ADG : 3.00


Native Range
Days Grazed: 63
Start Wt : 923
End Wt : 1091
Gain : 168
ADG : 2.67


Peas & Stockford Barley
Days Grazed: 21
Start Wt : 1091
End Wt : 1144
Gain : 53
ADG : 2.52


Unharvested Corn
Days Grazed: 48
Start Wt: 1144
End Wt : 1227
Gain : 83
ADG : 1.73

Yearling Systems Performance

	Grass Only	Grass + Ann Fge	Feedlot
Days Grazed	177	177	
Pasture Gain, lb	395	437	---
ADG, lb (P<0.01)	2.23	2.47	---
Grazing Cost/lb Gain	$0.3956	$0.5370	---
Feedlot DOF	90	69	133
Gain, lb (P<0.01)	372	294	559
ADG, lb	4.12	4.27	4.21
F:G, lb (P < 0.10)	7.08	6.47	5.99
Feed Cost/lb Gain	$0.9643	$0.9045	$0.9148
Pct. Choice or Better	75.0%	92.0%	44.0%

	Grass Only	Grass + Ann Fge	Feedlot
Str. Cost	998.78	1012.8	991.38
Grazing Cost	156.12	234.71	---
Feedlot Cost	356.79	265.03	505.60
Total Expense	1642.44	1637.86	1644.42
Gross Carcass Value	1747.48	1760.94	1376.87
System Net Return	**105.04**	**123.08**	**-267.55**

- Rob Maddock
- Tenderness (Shear Force) and Sensory Panel evaluation

System Limitations

No Water or Fencing on Cropland

No desire to Change Management

Questions


Days Grazed: 63
Start Wt : 923
End Wt : 1091
Gain : 168
ADG : 2.67

Field Pea-Stockford Barley


Days Grazed: 22
Start Wt : 1091
End Wt : 1144
Gain : 53
ADG : 2.41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