

# Indiana Beef Evaluation and Economics Feeding Program



## Objectives



- ❖ Evaluate breeding and management programs
- ❖ Enhance reputation of Indiana Cattle and establish database for Indiana produced cattle
- ❖ Compare sires within herds for feedlot performance and carcass merit
- ❖ Learn other segments of beef industry
- ❖ Provide for participation in Hoosier Beef Carcass Contest

## Program Sponsors



### A Joint Effort of:

- ❖ Indiana Beef Cattle Association (IBCA)
- ❖ Indiana Beef Evaluation Program (IBEP)
- ❖ Purdue University, Cooperative Extension Service
- ❖ Smoker Farm, Wanatah, Indiana
  - Jim and Greg Smoker

## Requirements



- ❖ Steers only
- ❖ Born January 1 - April 30
- ❖ 500 pounds by mid-November delivery
- ❖ Pre-weaned and vaccinated
- ❖ Minimum of 5 head
- ❖ Retained ownership
- ❖ Dam ID
- ❖ Sire Breed
- ❖ Calf Breed/Breed type
- ❖ Birthdate (optional)
- ❖ Calf ID

## Program Cost



- ❖ \$25 per head nomination
- ❖ Feed
- ❖ Health, processing, and medication
- ❖ Trucking
- ❖ Yardage \$0.25 daily per head

## What Cooperators Receive



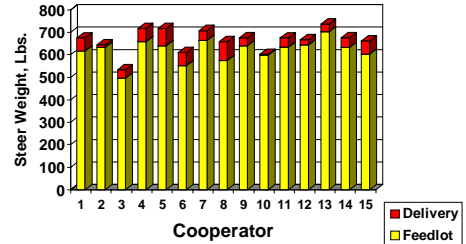
- ❖ Individual and group feedlot performance
- ❖ Feedlot cost of production
- ❖ Individual and group carcass quality and yield grade including marbling, REA, fat thickness, carcass weight, etc.
- ❖ Payment for steers when sold less feedlot costs

## 1997-1998 Participation In IBEEF

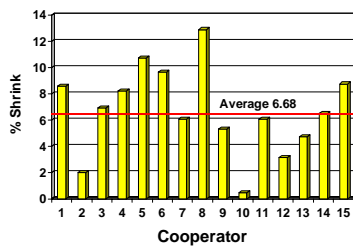


- ❖ 15 Cooperators from 11 counties
- ❖ 144 Steers
- ❖ Delivered Nov. 15, 1997 from 5 collection points
- ❖ Sires represented: Angus, Charolais, Chiangus, Gelbvieh, Limousin, Maine Anjou, Polled Hereford, and Simmental
- ❖ Color: Black/BWF 49%, Red/RWF 28%, White 12.5%, Smoke 10.5%
- ❖ 51% were sired by IBEP Test Station Bulls

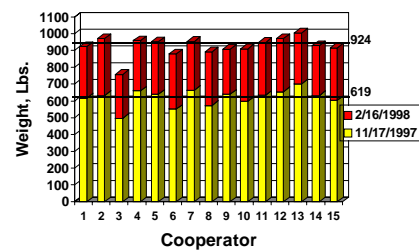
## Weight Change from Delivery Point to Feedlot



## Shrinkage of IBEEF Steers from Delivery Point to Feedlot

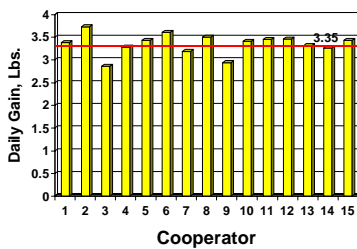


## IBEEF Steer Weights at Feedlot 11/17/97 and 2/16/98 by Cooperator



## Daily Gain of IBEEF Steers by Cooperator Through 2/16/98

Based on 4% Shrink



## Feed Intake and Feedlot Performance of 144 IBEEF Steers



Feedlot In Weight (11/17/97), lbs.	619
91-Day Weight (2/16/98, 4% shrink)	924
Daily Gain	3.35
Dry Matter Intake	19.26
Feed/Gain	5.75

### Cost of 144 IBEEF Steers



Daily Feed Cost	85.5 ¢
Daily Non-Feed Cost	41.8 ¢
Total Cost	\$1.27
Total Cost/lb. Gain	38.0 ¢

### Feedlot Performance (Coop. Avg.)



	<u>Avg.</u>	<u>Range</u>
❖ Feedlot in weight (11/17/97), lbs.	619	497-702
❖ Final Weight (4% shrink)	1293	1179-1385
❖ Days on Feed	208	179-227
❖ Daily Gain	3.25	3.00-3.48

### Carcass Information (Coop. Avg.)



	<u>Avg.</u>	<u>Range</u>
❖ Carcass Weight	844	778-902
❖ Dressing %	65.3	64.3-66.0
❖ REA	14.2	12.7-16.0
❖ Backfat	0.47	0.28-0.74
❖ Yield Grade	2.7	1.8-3.7
❖ % Choice/Prime	67.2	20.0-91.7
❖ Sale Value	\$836.50	\$767.73-\$889.88

### Feeding Cost (Coop. Avg.)



	<u>Avg.</u>	<u>Range</u>
	\$/hd.	
❖ Feed	\$221.06	\$183.24-\$251.85
❖ Medication	\$4.14	\$0.00-\$16.11
❖ Yardage	\$52.00	\$45.18-\$57.25
❖ Misc. (proc, truck, implants)	\$22.66	\$21.50-\$23.51
❖ Total	\$300.00	\$252.54-\$328.94

### The Bottom Line (Coop. Avg.)



	<u>Avg.</u>	<u>Range</u>
	\$/hd.	
❖ Total cost of gain, \$/cwt	\$45.03	\$43.55-\$47.40
❖ Profit/head (assumes \$75.00/cwt feeder calf)	\$37.31	(-\$22.85)-\$96.46
❖ Actual Feeder Calf Value, \$/cwt	\$80.90	\$71.59-\$90.06

### Profit Groups



	No. Steers	Avg./Hd.	Feeder Calf Value
1	36	\$103.86	\$91.25
2	36	\$57.28	\$83.63
3	36	\$23.92	\$78.61
4	36	-\$51.73	\$67.26
Avg.	144	\$33.33	\$80.19

### Differences between High and Low Profit Cattle



❖ % Shrink (del-fdlot)	5.10 vs. 9.81
❖ Start Weight	614 vs. 616
❖ Final Weight	1322 vs. 1252
❖ Feedlot Daily Gain	3.54 vs. 3.13
❖ Medication Cost	\$2.48 vs. \$9.98
❖ Total Feedlot Cost	\$300.00 vs. \$293.00
❖ Cost of Gain, \$/cwt	\$43.49 vs. \$46.58

### Differences between High and Low Profit Cattle, Continued



❖ Rib Eye Area	14.0 vs. 13.1
❖ Backfat	0.53 vs. 0.62
❖ % YG4	0.00 vs. 30.6
❖ % CH/PR	91.7 vs. 50.0
❖ Carcass Price, \$/lb.	\$1.02 vs \$0.93

### How Steers Were Sold

Aurora Packing Co., Aurora, IL



Sell Dates	Carcass Price Grid		
	Base	Select	YG4
April 30	\$1.04	\$1.02	\$0.87
June 11	\$1.03	\$1.00	\$0.86
July 2	\$1.00	\$0.93	\$0.83

Base = Choice or Higher; 550-950 lbs.; YG 1, 2, or 3.

### % of steers in each category which are in the 4 profit groups



Category	No. Steers	Profit Group			
		1	2	3	4
Breed					
Angus	68	33.8	14.7	17.6	33.8
Simmental	40	22.5	35.0	40.0	2.5
Other Breeds*	36	11.1	33.3	22.2	33.3

\*Other breeds include Charolais, Chiangus, Gelbvieh, Hereford, Limousin, and Maine Anjou

### % of steers in each category which are in the 4 profit groups



Category	No. Steers	Profit Group			
		1	2	3	4
Color					
Black	71	26.8	19.7	21.1	32.4
Other	73	23.3	30.1	28.8	17.8
IBEP Bull					
Yes	74	32.4	27.0	27.0	13.5
No	70	17.1	22.9	22.9	37.1
Sale Group					
1	38	23.7	15.8	28.9	31.6
2	43	41.9	27.9	16.3	14.0
3	63	14.3	28.6	28.6	28.6