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A.E. Res. 83-42

LIVESTOCK

COSTS AND RETURNS

FROM

FARM COST ACCOUNTS

28 FARMS-1982
NEW YORK STATE

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REPORTS
from
FARM COST ACCOUNTS

28 Farms, 1982

Enterprise data from the 1982 New York Farm Cost Account Project have been published in the following reports. Additional copies may be obtained from County Extension offices or directly from the Department of Agricultural Economics, Cornell University, Ithaca, New York 14853-0398.

Overhead Costs	A.E. Res. 83-41
Livestock Costs and Returns	A.E. Res. 83-42
Field Crops Costs and Returns	A.E. Res. 83-43
Fruit and Vegetable Crops Costs and Returns	A.E. Res. 83-44

LIVESTOCK COSTS AND RETURNS, A.E. Res. 83-42

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INTRODUCTION

The New York Farm Cost Account Project is a research project which serves as a means of obtaining primary cost data for enterprises common on New York farms. It provides data on labor requirements and costs, machinery costs, and production costs for crop and livestock enterprises. The data is published from detailed enterprise records kept by New York farmers in cooperation with the Department of Agricultural Economics at Cornell University. These publications provide College and field staff, as well as farmers and others interested in agriculture, with a continuous record of economic changes taking place on New York farms.

The farms are located in most of the farming areas of the State. They are generally well-managed, full-time, commercial farm businesses. They provide an indication of economic factors experienced by commercial farm businesses in New York.

The reports present the results of individual enterprises and the averages of the enterprise costs and returns for all farms. They show not only the averages of cost and returns but also indications of the variations and reasons for them. The factors for individual enterprises are arranged according to size of enterprise. The annual averages of the various factors are not averages of average costs but are weighted by the size of the enterprise.

Acknowledgements

The project was under the supervision of Darwin Snyder, who also did the field work necessary to complete the records. Editing and processing the data, closing the books, completing the analysis, and preparing these reports were done by Barbara Wilcox and Florence Blodgett with assistance from Mary Chaffee, Cynthia Farrell and Diana Atkinson.

The material on pages 2, 3, and 4 of this report was taken from A.E. Res. 83-32, Dairy Farm Management Business Summary, New York, 1982 by Stuart F. Smith and Linda D. Putnam.

Special acknowledgement is due the group of farmers who are willing to keep the detailed records so essential to such a system of enterprise cost accounting. Without their continuing efforts and willingness to provide this information, this important and accurate source of farm data would not exist.

Inflation, appreciation, supply and demand all have a direct affect on the inventory values on New York dairy farms. Machinery and real estate prices have risen steadily during the past six years with machinery prices increasing more rapidly. Dairy cow prices have changed most dramatically as the demand for replacements jumped in 1978 and 1979 and weakened in 1981 and 1982.

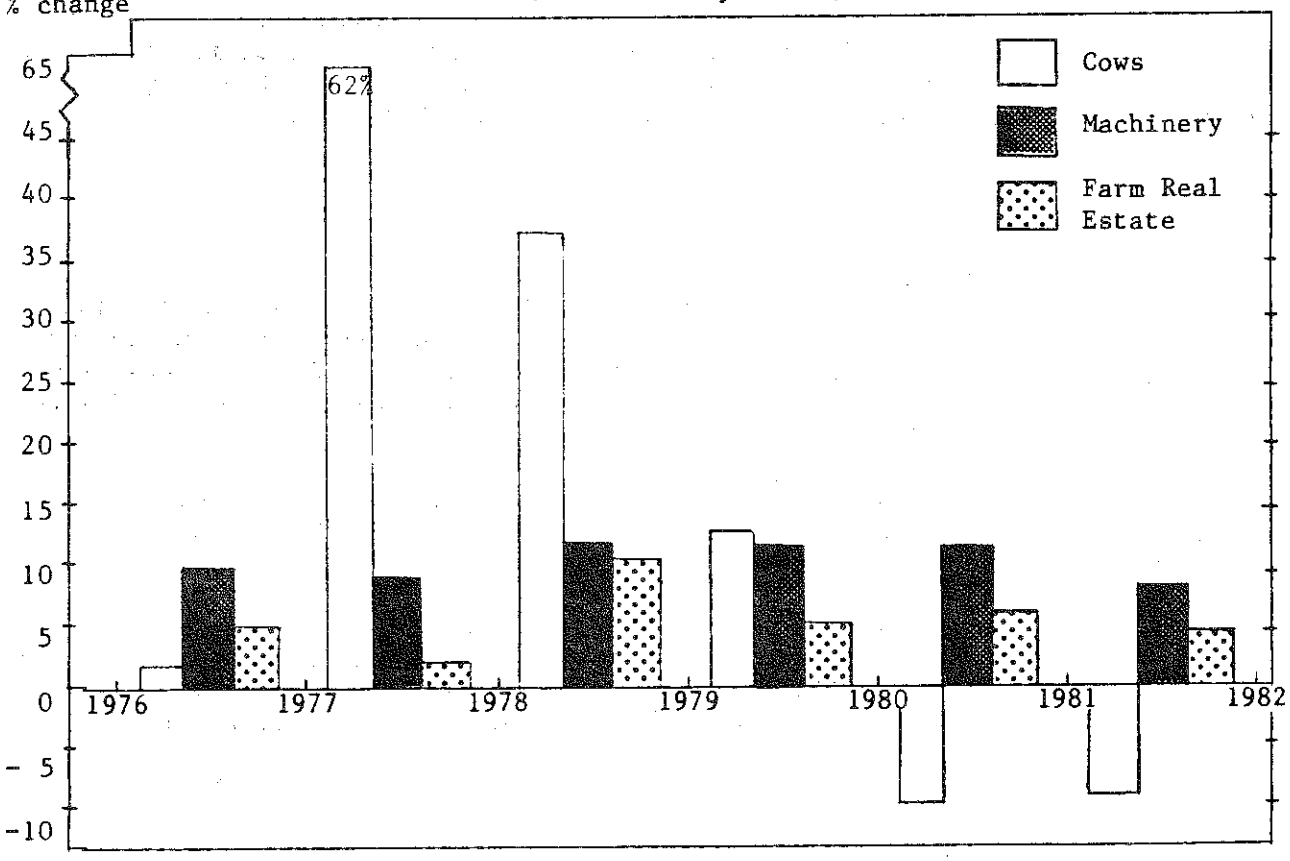
Table 1. UNIT VALUES OF NEW YORK DAIRY FARM INVENTORY ITEMS, 1976-1982

Year	New York Dairy Cows		Machinery*	N.Y. Farm Real Estate	
	Value/Head	1977=100	1977=100	Value/Acre	1977=100
1976	$ 485	98	91	$553	95
1977	495	100	100	587	100
1978	800	162	109	600	102
1979	1,105	223	122	670	113
1980	1,240	251	136	708	119
1981	1,120	226	152	749	126
1982	1,010	204	165	786	132

*Annual average for U.S.

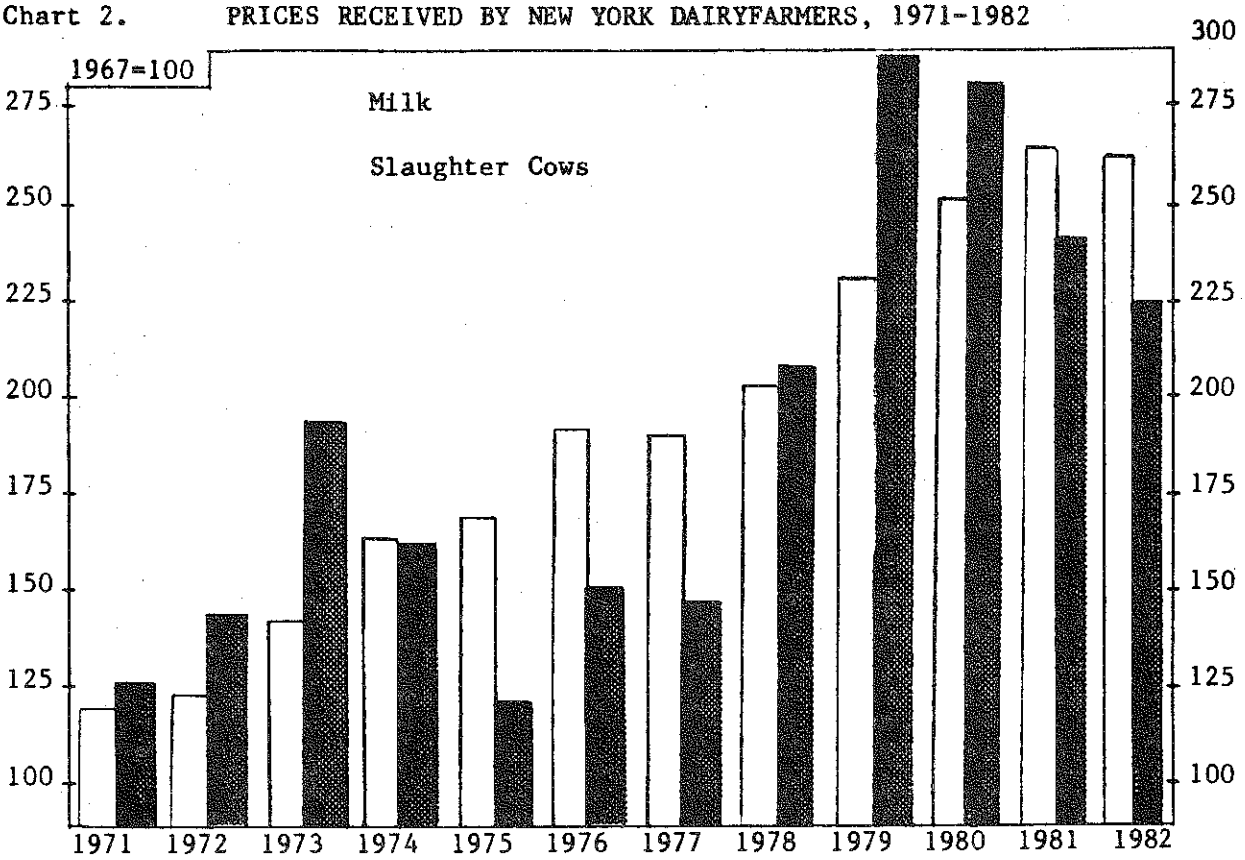
Table 1 shows New York year end (December) price received for dairy cows (replacements), an index of the same cow prices, an index of U.S. machinery prices, the average per acre value of New York farmland and buildings reported in April, and an index of the real estate prices.

Chart 1. ANNUAL CHANGES IN DAIRY COW, FARM MACHINERY, & FARM REAL ESTATE VALUES
New York Dairy Farms, 1976-1982



Source: USDA, Farm Real Estate Outlook & Situation Summary. USDA, Agricultural Prices.

Chart 2. PRICES RECEIVED BY NEW YORK DAIRYFARMERS, 1971-1982



The prices dairyfarmers receive for milk, cattle, and other commodities they sell have a major effect on dairy farm profits. Chart 2 shows what has happened to average milk and slaughter cow prices paid to New York farmers since 1971. Milk prices have increased at a more constant rate showing declines in 1977 and 1982. Slaughter cow prices have shown wide fluctuations over the period but have not moved in the same direction for more than four consecutive years; since 1979 prices have been declining.

Table 2. PRICES RECEIVED BY NEW YORK DAIRYFARMERS, 1970-1982

Year	All Milk (cwt.)	Slaughter Cows (cwt.)	Calves (cwt.)	Monthly Farm Price Per 100 Lbs. of Milk, 1982	
1970	$ 5.99	$20.70	$34.70	January	$13.80
1971	6.12	21.20	36.20	February	13.70
1972	6.33	24.50	44.80	March	13.50
1973	7.32	32.80	54.60	April	13.20
1974	8.35	27.10	40.80	May	12.90
				June	12.90
1975	8.71	20.60	26.20	July	13.30
1976	9.83	25.40	34.50	August	13.80
1977	9.75	25.00	37.50	September	14.00
1978	10.50	35.30	58.20	October	14.20
1979	11.90	49.80	88.80	November	14.20
				December	13.90
1980	13.00	46.30	78.00		
1981	13.80	41.30	66.20		
1982	13.70	38.60	58.80		

Source: USDA, Agricultural Prices Annual Summary.

Table 3. PRICES PAID BY FARMERS FOR SELECTED ITEMS, 1972-1982

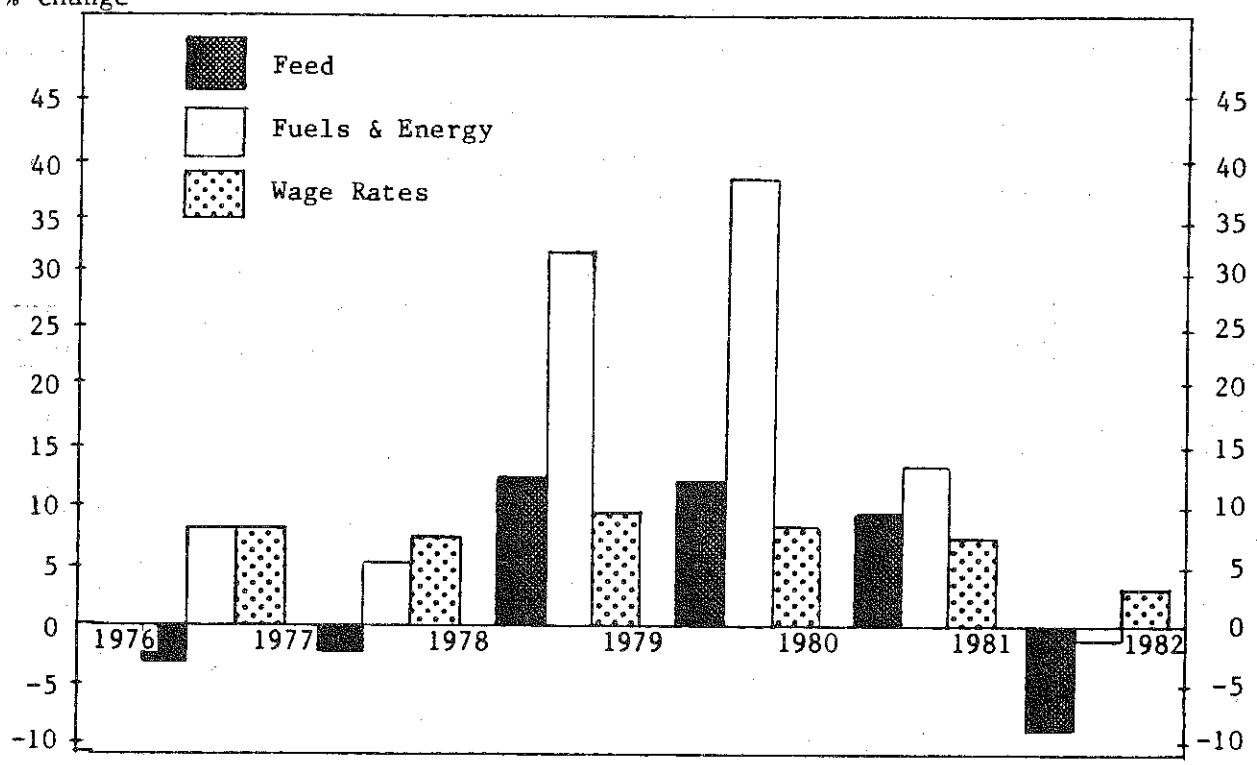
Year	Index 1977=100					
	Feed	Fert.	Fuel & Energy	Wage Rates	Taxes	Interest
1972	57	52	54	63	75	47
1973	86	56	57	69	77	55
1974	104	92	79	79	81	65
1975	100	120	88	85	87	77
1976	103	102	93	93	94	88
1977	100	100	100	100	100	100
1978	98	100	105	107	100	117
1979	110	108	137	117	107	143
1980	123	134	188	126	115	174
1981	134	144	213	137	123	211
1982	122	144	211	141	131	233

SOURCE: USDA Agricultural Prices

The prices dairyfarmers pay for a given quantity of goods and services has a major influence on farm production costs. The astute manager will keep close taps on unit costs and substitute the most economical goods and services for those that are too expensive.

Table 3 shows the unit cost indexes of selected goods and services used on New York dairy farms. The changes in feed prices, fuels and energy costs, and wage rates between years are illustrated in Chart 3.

Chart 3. ANNUAL CHANGES IN PRICES OF THREE MAJOR PRODUCTION ITEMS
U.S. Dairy Farms, 1976-1982



Fuel and energy costs have decreased for the first time in the last 10 years; feed costs decreased to below the 1980 level. Wage rates continue to increase.

Growing Conditions

Table 1. TEMPERATURE, PRECIPITATION, AND GROWING SEASON
Selected Stations, New York, 1941-70 and 1982

Station	Average temperature May - Sept.		Precipitation May - Sept.		Precipitation Total Annual		Length of growing season*	
	1941-70	1982	1941-70	1982	1941-70	1982	1947-67	1982
	degrees		inches				days	
Albany	65.7	63.7	15.4	14.9	33.4	32.1	---	165
Alfred	61.8	60.0	17.2	18.0	36.7	35.4	125	106
Batavia	64.1	63.5	15.3	15.8	32.6	34.7	154	171
Binghamton	63.3	63.4	17.9	17.7	37.4	35.1	154	177
Canton	63.0	61.5	16.5	16.8	34.5	35.8	127	153
Geneva	70.6	64.0	14.6	12.9	32.3	25.5	---	178
Glens Falls	-----	64.4	17.8	16.9	39.3	39.3	---	171
Ithaca	63.8	62.3	17.2	17.3	34.8	31.4	145	159
Lowville	62.5	60.2	16.5	16.7	38.5	36.9	123	116
Utica	63.5	64.3	18.1	15.6	40.6	36.5	157	160

* Days between the last temperature of 32 degrees in the spring and the first in the fall.

Source: Climatological Data, NOAA, Environmental Data Service, Annual Summary, New York, 1982, Vol. 94, No. 13.

Weather is a factor to be considered when studying a farm business for a specific year. The growing conditions have a marked effect on the crops for that year. It is for this reason that data are presented on the growing conditions for 1982 and for the period 1941-70.

Statewide, the 1982 crop season was characterized by a warm May and a wet June in an otherwise cool and dry season. In spite of generally unfavorable below average temperatures and rainfall, crop needs were apparently met at the right time in such a way that crop yields were quite normal for the year.

Table 2. GROWING SEASON RAINFALL
Selected Stations, New York, 1941-70 and 1982

	May		June		July		August		September	
	1941-70	1982	1941-70	1982	1941-70	1982	1941-70	1982	1941-70	1982
Albany	3.26	2.60	3.00	6.48	3.12	2.43	2.87	2.01	3.12	1.42
Alfred	3.76	3.46	3.76	6.67	3.73	3.35	3.00	1.49	2.93	3.04
Batavia	3.17	3.45	2.69	3.60	3.05	2.06	3.50	3.75	2.87	2.96
Binghamton	3.83	3.89	3.59	7.09	3.83	1.87	3.61	2.94	3.02	1.86
Canton	3.37	1.87	2.91	3.93	3.43	2.24	3.47	4.83	3.31	3.96
Geneva	3.02	2.09	3.10	4.74	3.06	2.64	2.82	0.74	2.59	2.68
Glens Falls	3.63	3.51	3.77	5.82	3.68	1.47	3.42	3.96	3.31	2.13
Ithaca	3.55	2.96	3.40	5.74	3.67	2.90	3.49	1.99	3.08	3.68
Lowville	3.42	2.06	2.94	3.50	3.26	2.60	3.58	3.96	3.31	4.58
Utica	3.52	2.72	3.55	5.81	4.17	3.11	3.54	1.71	3.32	2.20

Source: Climatological Data, NOAA, Environmental Data Service, Annual Summary, New York, 1982, Vol. 94, No. 13.

YIELDS FOR CROPS AND LIVESTOCK
New York State and Farm Cost Account Averages

Item	Unit	New York State*				Cost Account
		1957-61	1967-71	1977-81	1982	1982
Hay, Alfalfa mix.	tons	2.2	2.6	2.7	2.7	2.5
Corn Silage	tons	11	14	14	14	14
Corn grain	bu.	57	85	90	92	106
Oats	bu.	52	60	60	65	NA
Wheat	bu.	32	39	40	44	50
Milk per cow	lbs.	7,914	10,361	11,742	12,129	15,706

*Source: New York Agricultural Statistics, 1982; Crop Reporting Service, USDA.

FARM COST ACCOUNT SUMMARY, 1982
Crop Enterprises

Crop	Number of enter-prises	Average acres per enter-prise	Yield per acre	Hours of labor per acre*	Return per Hour of labor	Return per Dollar of cost	Profit per acre	Profit on enter-prise
Forage:								
Hay	19	80	2.5 tn	7	2.98	0.91	18-	1,449-
Hay crop silage	20	151	6.1 tn	4	2.20-	0.85	32-	4,812-
Corn silage	21	137	14.2 tn	5	3.38	0.96	15-	2,049-
Grain:								
Corn for grain	6	159	106 bu	4	5.14-	0.84	57-	9,076-
High moist. corn	19	137	3.8 tn	3	6.63-	0.86	42-	5,796-
Wheat, winter	7	152	50 bu	2	16.29-	0.77	51-	7,844-
Wheat, spring	6	78	45 bu	2	14.29-	0.77	53-	4,084-
Fruit:								
Apples	12	86	537 bu	105	4.50	0.83	281-	24,347-
Red tart cherries	6	37	7,313 lb	41	6.94	1.03	31	1,169

*To grow and harvest the crop.

ENTERPRISE RATES OF RETURN

FARM COST ACCOUNT RECORDS, 1979-82

Enterprise	Return per hour of labor				Return per dollar of cost			
	1979	1980	1981	1982	1979	1980	1981	1982
	$	$	$	$	$	$	$	$
Livestock:								
Dairy cows	10.77	10.64	7.89	8.65	1.15	1.11	1.04	1.07
Dairy heifers	3.97	5.94	0.25	1.49	0.96	0.99	0.87	0.91
Forage:								
Hay	0.90	0.02	1.70	2.98	0.84	0.81	0.86	0.91
Hay crop silage	0.39	5.82	2.79	2.20-	0.87	1.00	0.94	0.85
Corn silage	9.05	5.86	5.97	3.38	1.07	0.99	0.99	0.96
Grain:								
Corn for grain	5.12	23.76	12.79-	5.14-	1.00	1.28	0.77	0.84
High moisture corn	18.84	22.68	0.45	6.63-	1.22	1.23	0.92	0.86
Oats	18.35-	NA	NA	NA	0.63	NA	NA	NA
Wheat, winter	22.68	22.46	15.26	16.29-	1.26	1.21	1.10	0.77
Wheat, spring	NA	NA	NA	14.29-	NA	NA	NA	0.77
Fruits:								
Apples	7.39	5.52	8.97	4.50	1.07	0.91	1.13	0.83
Red tart cherries	33.16	17.29	13.76	6.94	2.80	1.62	1.35	1.03

Dairy Cows -

According to New York Crop Reporting Service figures, the value of an average dairy cow reached an all time high of $1,250 per cow in November 1980. From that point, cow values have steadily declined to $1,010 per cow at the end of 1982. Average values declined over $100 per cow for both 1981 and 1982.

Cull beef prices continued to decline during 1982 in spite of a mid year rally. The price reported for December 1982 was $35.50 per hundredweight - about a dollar less than December 1981. The average price for the year dropped $2.76 per hundredweight compared to 1981. Bob calf prices also continued to decline. The average price for 1982 was $59.32 per hundredweight. This was $7.49 per hundredweight lower than the average price for 1981.

These dairy enterprises represent commercial herds where herd dispersals are not a factor. Cow values are held at a constant, conservative level (except for changes in quality) for the year to prevent changing cow values from affecting enterprise profits. However, profits are affected by the decline in cull beef and bob calf prices as dairymen disposed of livestock in the normal conduct of their herd management practices.

DAIRY COWS, 1982
COSTS AND RETURNS PER DAIRY COW
3,704 COWS ON 23 COST ACCOUNT FARMS

ITEM	AVERAGE PER COW	
COSTS:		
DEPRECIATION		$ 184
FEED - 3,775 LBS OF DRY GRAIN	$ 371	
2.2 TONS OF HIGH MOISTURE CORN	177	
0.6 TONS OF HAY	37	
4.6 TONS OF HAY CROP SILAGE	127	
7.5 TONS OF CORN SILAGE	163	
PASTURE AND ALL OTHER FEED	45	
TOTAL FEED COST PER COW		920
LABOR - 55 HOURS		336
TRACTOR, TRUCK	34	
EQUIPMENT	100	
BEDDING	19	
BREEDING	26	
VET AND MEDICINE	43	
MILK HAULING	73	
MILK TESTING	13	
SUPPLIES	34	
UTILITIES	35	
INSURANCE	6	
INTEREST ON VALUE OF COW	87	
BUILDING USE	82	
ALL OTHER	116	
TOTAL OTHER THAN DEPREC, FEED, LABOR		668
TOTAL COSTS		$2,108
RETURNS:		
15,653 POUNDS OF MILK SOLD	$2,139	
53 POUNDS OF MILK USED ON FARM	7	
CALVES	75	
OTHER RETURNS	25	
TOTAL RETURNS		$2,246
PROFIT:		$ 138

OTHER FACTORS - AVG PER CWT OF MILK:	ALL GRAIN COST	$ 3.49
	TOTAL FEED COST	5.86
	LABOR COST	2.14
	TOTAL COST	$12.79
	RETURNS	13.67
MILK PRODUCED PER HOUR OF LABOR		287 LB
RETURN PER HOUR OF LABOR		$ 8.65
RETURN PER DOLLAR OF COST		1.07

FACTORS FROM 24 DAIRY COW ENTERPRISES
23 COST ACCOUNT FARMS, 1982
(ARRANGED BY NUMBER OF COWS)

FARM NO	HERD SIZE	MILK PER COW	LABOR PER COW	MILK PER HR OF LABOR	FEED PER COW					VET MED COST/ COW
					DRY GRAIN	HIGH MSTR CORN	HAY	HAY CROP SILG	CORN SILG	
	NO	LB	HR	LB	LB	TN	TN	TN	TN	$
834	657	15,021	49	304	1,470	3.7		6.1	5.9	20
827	393	15,224	51	296	1,954	3.2	0.3	4.3	6.8	43
812	296	18,967	43	448	7,426			3.9	13.8	72
806	274	15,227	39	393	2,686	2.5	0.1	3.8	10.6	31
824	226	15,965	46	345	1,991	3.4	0.4	4.7	3.1	64
830	191	16,265	54	304	2,482	4.2	1.3	3.4	5.0	46
840	157	15,958	48	332	7,439		0.3	7.1	11.2	50
804	139	13,668	49	279	5,324		0.4	3.8	12.6	37
835	133	14,368	48	298	8,947	1.3	0.7	5.9	4.6	52
821	133	14,135	49	288	4,195	2.7	0.6	0.9	14.4	36
105*	125	13,552	61	222	3,136	4.9	1.3	3.5	4.7	62
112	114	16,910	57	295	4,263	2.6	0.7	3.9	5.3	31
105	111	16,166	87	185	6,667		0.5	4.7	8.1	65
111*	103	17,923	78	229	2,175	3.6	0.8	7.6	0.7	20
208*	103	14,912	61	246	5,845		0.2	5.2	7.4	45
203*	98	14,864	62	239	6,633		0.2	5.2	7.8	64
836	86	15,079	67	224	6,140		2.5		8.5	26
867*	71	20,092	81	249	3,577	4.2	2.3	2.6	3.9	63
153*	56	17,013	69	247	4,214	3.2	1.4	6.9	7.1	28
828*	53	16,174	76	212	868	5.3	1.1	5.8	2.8	107
146*	52	13,956	122	115	2,115	1.6	1.4	1.5	5.0	39
117*	50	14,918	73	204	880	3.4	2.4	8.6	6.5	42
127*	44	17,795	53	334	7,273		2.1	3.5	8.9	63
111*	39	14,997	79	190	2,667	3.2	0.6	1.2	9.0	22
1982 GROUP AVERAGES, ACCORDING TO NUMBER OF COWS:										
THIRDS										
HIGH	292	15,787	47	338	3,847	2.1	0.4	4.6	8.6	45
MED	115	15,354	63	250	5,233	1.9	0.6	4.6	6.6	47
LOW	56	16,253	78	222	3,467	2.6	1.7	3.8	6.5	49
ANNUAL AVERAGES, ALL ENTR. WEIGHTED BY NUMBER OF COWS:										
1982	154	15,706	55	287	3,775	2.4	0.5	4.6	7.5	43
1981	155	15,493	51	304	3,891	2.2	0.5	5.6	7.7	41
1980	155	15,894	51	311	3,686	2.2	0.6	4.3	7.2	34
1979	150	15,372	51	303	4,521	1.8	0.7	3.6	8.0	37
1978	142	15,051	50	300	4,357	1.5	0.6	3.6	7.8	33

* STANCHION BARNS

See note on page 8.

FACTORS FROM 24 DAIRY COW ENTERPRISES
23 COST ACCOUNT FARMS, 1982
(READ ACROSS BOTH PAGES)

AVG COST PER COW FOR FEED	AVG COST PER COW FOR LABOR	AVG PER CWT OF MILK COST	AVG PER CWT OF MILK RETURN	AVERAGE PER COW COST	AVERAGE PER COW RETURN	AVERAGE PER COW PROFIT	RETURN PER HOUR OF LABOR	RETURN PER $ OF COST	PROFIT ON ENTERPRISE	FARM NO
$	$	$	$	$	$	$	$	$	$	
866	286	11.23	13.56	1,807	2,157	350	12.85	1.19	229,448	834
827	433	13.60	13.62	2,185	2,189	4	8.52	1.00	1,705	827
1,052	393	11.63	13.25	2,356	2,663	307	16.53	1.13	90,909	812
934	284	13.01	14.82	2,051	2,328	277	14.47	1.13	75,716	806
762	266	11.31	12.59	1,888	2,092	204	10.14	1.11	46,051	824
1,019	294	12.81	13.63	2,194	2,328	134	7.99	1.06	25,523	830
1,090	313	12.84	13.56	2,125	2,240	115	8.91	1.05	18,123	840
899	356	14.26	14.72	2,004	2,068	64	8.58	1.03	8,859	804
1,021	239	13.27	13.32	2,037	2,044	7	5.11	1.00	1,018	835
1,024	250	14.13	14.26	2,063	2,082	19	5.49	1.01	2,481	821
960	329	15.55	14.05	2,156	1,954	202-	2.08	0.91	25,347-	105
930	255	11.88	13.23	2,091	2,318	227	8.40	1.11	25,902	112
954	443	15.99	13.40	2,775	2,356	419-	0.27	0.85	46,604-	105
829	466	11.26	14.29	2,087	2,631	544	12.91	1.26	55,987	111
898	288	14.53	14.52	2,245	2,244	1-	4.74	1.00	45-	208
975	281	15.96	14.60	2,445	2,243	202-	1.26	0.92	19,802-	203
710	555	13.06	12.90	2,078	2,055	23-	7.90	0.99	2,023-	836
1,131	360	12.04	13.40	2,429	2,713	274	7.85	1.11	19,424	867
1,088	355	12.66	12.51	2,192	2,167	25-	4.80	0.99	1,374-	153
776	352	11.51	13.21	2,006	2,281	275	8.20	1.14	14,553	828
579	482	13.62	12.95	1,973	1,880	93-	3.19	0.95	4,843-	146
957	374	13.86	13.56	2,139	2,094	45-	4.50	0.98	2,235-	117
1,180	288	14.41	14.42	2,709	2,711	2	5.44	1.00	90	127
849	466	14.63	14.36	2,254	2,214	40-	5.40	0.98	1,572-	111
1982 GROUP AVERAGES, ACCORDING TO NUMBER OF COWS:										THIRDS
931	328	12.59	13.72	2,076	2,258	182	11.00	1.09	62,042	HIGH
949	319	14.07	13.96	2,237	2,234	3-	5.03	1.01	801-	MED
909	404	13.22	13.41	2,224	2,264	41	5.91	1.02	2,753	LOW
ANNUAL AVERAGES, ALL ENTR. WEIGHTED BY NUMBER OF COWS:										
920	336	12.79	13.67	2,108	2,246	138	8.65	1.07	21,331	1982
1,001	323	13.38	13.89	2,158	2,237	79	7.89	1.04	12,346	1981
881	320	11.74	13.15	1,957	2,182	225	10.64	1.11	34,711	1980
796	281	10.47	12.19	1,713	1,978	265	10.77	1.15	39,786	1979
709	253	9.53	10.86	1,501	1,700	199	9.01	1.13	28,352	1978

STANCHION BARN HERDS
DAIRY COWS, 1982
COSTS AND RETURNS PER DAIRY COW
794 COWS ON 11 COST ACCOUNT FARMS

ITEM	AVERAGE PER COW	
COSTS:		
DEPRECIATION		$ 173
FEED - 3,756 LBS OF DRY GRAIN	$ 407	
2.7 TONS OF HIGH MOISTURE CORN	187	
1.1 TONS OF HAY	74	
4.9 TONS OF HAY CROP SILAGE	135	
5.5 TONS OF CORN SILAGE	119	
PASTURE AND ALL OTHER FEED	8	
TOTAL FEED COST PER COW		930
LABOR - 72 HOURS		359
TRACTOR, TRUCK	26	
EQUIPMENT	115	
BEDDING	23	
BREEDING	37	
VET AND MEDICINE	51	
MILK HAULING	89	
MILK TESTING	19	
SUPPLIES	39	
UTILITIES	44	
INSURANCE	5	
INTEREST ON VALUE OF COW	89	
BUILDING USE	100	
ALL OTHER	137	
TOTAL OTHER THAN DEPREC, FEED, LABOR		774
TOTAL COSTS		$2,236
RETURNS:		
15,795 POUNDS OF MILK SOLD	$2,197	
85 POUNDS OF MILK USED ON FARM	12	
CALVES	65	
OTHER RETURNS	5	
TOTAL RETURNS		$2,279
PROFIT:		$ 43

OTHER FACTORS - AVG PER CWT OF MILK:		
	ALL GRAIN COST	$ 3.74
	TOTAL FEED COST	5.86
	LABOR COST	2.26
	TOTAL COST	$13.63
	RETURNS	13.91
MILK PRODUCED PER HOUR OF LABOR		221 LB
RETURN PER HOUR OF LABOR		$ 5.61
RETURN PER DOLLAR OF COST		1.02

See note on page 8.

FREESTALL BARN HERDS
DAIRY COWS, 1982
COSTS AND RETURNS PER DAIRY COW
2,910 COWS ON 13 COST ACCOUNT FARMS

ITEM		AVERAGE PER COW
COSTS:		
DEPRECIATION		$ 188
FEED - 3,781 LBS OF DRY GRAIN	$ 361	
2.3 TONS OF HIGH MOISTURE CORN	174	
0.4 TONS OF HAY	27	
4.5 TONS OF HAY CROP SILAGE	126	
8.1 TONS OF CORN SILAGE	175	
PASTURE AND ALL OTHER FEED	55	
TOTAL FEED COST PER COW		918
LABOR - 50 HOURS		329
TRACTOR, TRUCK	36	
EQUIPMENT	97	
BEDDING	18	
BREEDING	23	
VET AND MEDICINE	41	
MILK HAULING	68	
MILK TESTING	12	
SUPPLIES	33	
UTILITIES	32	
INSURANCE	6	
INTEREST ON VALUE OF COW	86	
BUILDING USE	77	
ALL OTHER	110	
TOTAL OTHER THAN DEPREC, FEED, LABOR		639
TOTAL COSTS		$2,074
RETURNS:		
15,615 POUNDS OF MILK SOLD	$2,124	
44 POUNDS OF MILK USED ON FARM	6	
CALVES	78	
OTHER RETURNS	30	
TOTAL RETURNS		$2,238
PROFIT:		$ 164

OTHER FACTORS - AVG PER CWT OF MILK:	ALL GRAIN COST	$ 3.42
	TOTAL FEED COST	5.86
	LABOR COST	2.10
	TOTAL COST	$12.55
	RETURNS	13.60
MILK PRODUCED PER HOUR OF LABOR		313 LB
RETURN PER HOUR OF LABOR		$ 9.84
RETURN PER DOLLAR OF COST		1.08

See note on page 8.

FACTORS FROM 24 DAIRY COW ENTERPRISES
23 COST ACCOUNT FARMS, 1982
(ARRANGED BY NUMBER OF COWS)

FARM NO	HERD SIZE	MILK PER COW	LABOR PER COW	MILK PER HR OF LABOR	FEED PER COW					VET MED COST/ COW
					DRY GRAIN	HIGH MSTR CORN	HAY	HAY CROP SILG	CORN SILG	
	NO	LB	HR	LB	LB	TN	TN	TN	TN	$
11 STANCHION BARN HERDS										
105	125	13,552	61	222	3,136	4.9	1.3	3.5	4.7	62
111	103	17,923	78	229	2,175	3.6	0.8	7.6	0.7	20
208	103	14,912	61	246	5,845		0.2	5.2	7.4	45
203	98	14,864	62	239	6,633		0.2	5.2	7.8	64
867	71	20,092	81	249	3,577	4.2	2.3	2.6	3.9	63
153	56	17,013	69	247	4,214	3.2	1.4	6.9	7.1	28
828	53	16,174	76	212	868	5.3	1.1	5.8	2.8	107
146	52	13,956	122	115	2,115	1.6	1.4	1.5	5.0	39
117	50	14,918	73	204	880	3.4	2.4	8.6	6.5	42
127	44	17,795	53	334	7,273		2.1	3.5	8.9	63
111	39	14,997	79	190	2,667	3.2	0.6	1.2	9.0	22
ANNUAL AVERAGES, ALL ENTR. WEIGHTED BY NUMBER OF COWS:										
1982	72	15,880	72	221	3,756	2.7	1.1	4.9	5.5	51
1981	72	16,082	73	221	5,161	1.9	1.0	5.8	6.8	50
1980	56	15,094	79	191	3,582	2.2	1.3	4.7	7.3	28
1979	51	14,337	80	180	4,922	1.1	2.4	2.4	5.9	28
1978	51	14,178	89	160	3,741	1.4	1.7	3.6	4.4	30
13 FREESTALL BARN HERDS										
834	657	15,021	49	304	1,470	3.7		6.1	5.9	20
827	393	15,224	51	296	1,954	3.2	0.3	4.3	6.8	43
812	296	18,967	43	448	7,426			3.9	13.8	72
806	274	15,227	39	393	2,686	2.5	0.1	3.8	10.6	31
824	226	15,965	46	345	1,991	3.4	0.4	4.7	3.1	64
830	191	16,265	54	304	2,482	4.2	1.3	3.4	5.0	46
840	157	15,958	48	332	7,439		0.3	7.1	11.2	50
804	139	13,668	49	279	5,324		0.4	3.8	12.6	37
835	133	14,368	48	298	8,947	1.3	0.7	5.9	4.6	52
821	133	14,135	49	288	4,195	2.7	0.6	0.9	14.4	36
112	114	16,910	57	295	4,263	2.6	0.7	3.9	5.3	31
105	111	16,166	87	185	6,667		0.5	4.7	8.1	65
836	86	15,079	67	224	6,140		2.5		8.5	26
ANNUAL AVERAGES, ALL ENTR. WEIGHTED BY NUMBER OF COWS:										
1982	224	15,659	50	313	3,781	2.3	0.4	4.5	8.1	41
1981	219	15,345	45	337	3,570	2.3	0.4	5.6	7.9	38
1980	208	16,031	48	336	3,666	2.3	0.5	4.3	7.3	35
1979	208	15,521	47	333	4,463	1.8	0.4	3.8	8.3	38
1978	203	15,197	44	348	4,460	1.5	0.4	3.6	8.3	33

See note on page 8.

FACTORS FROM 24 DAIRY COW ENTERPRISES
23 COST ACCOUNT FARMS, 1982
(READ ACROSS BOTH PAGES)

AVG COST PER COW FOR		AVG PER CWT OF MILK		AVERAGE PER COW			RETURN PER HOUR	RETURN PER $	PROFIT ON	
					RE-	PRO-	OF	OF	ENTER-	FARM
FEED	LABOR	COST	RETURN	COST	TURN	FIT	LABOR	COST	PRISE	NO
$	$	$	$	$	$	$	$	$	$	
11 STANCHION BARN HERDS										
960	329	15.55	14.05	2,156	1,954	202-	2.08	0.91	25,347-	105
829	466	11.26	14.29	2,087	2,631	544	12.91	1.26	55,987	111
898	288	14.53	14.52	2,245	2,244	1-	4.74	1.00	45-	208
975	281	15.96	14.60	2,445	2,243	202-	1.26	0.92	19,802-	203
1,131	360	12.04	13.40	2,429	2,713	274	7.85	1.11	19,424	867
1,088	355	12.66	12.51	2,192	2,167	25-	4.80	0.99	1,374-	153
776	352	11.51	13.21	2,006	2,281	275	8.20	1.14	14,553	828
579	482	13.62	12.95	1,973	1,880	93-	3.19	0.95	4,843-	146
957	374	13.86	13.56	2,139	2,094	45-	4.50	0.98	2,235-	117
1,180	288	14.41	14.42	2,709	2,711	2	5.44	1.00	90	127
849	466	14.63	14.36	2,254	2,214	40-	5.40	0.98	1,572-	111
ANNUAL AVERAGES, ALL ENTR. WEIGHTED BY NUMBER OF COWS:										
930	359	13.63	13.91	2,236	2,279	43	5.61	1.02	3,167	1982
1,066	358	14.47	14.06	2,426	2,360	66-	4.01	0.97	4,761-	1981
868	384	12.81	13.35	2,026	2,109	83	5.88	1.04	4,589	1980
812	313	11.60	11.96	1,754	1,806	52	4.59	1.03	2,662	1979
669	310	10.25	10.47	1,519	1,550	31	3.83	1.02	1,566	1978
13 FREESTALL BARN HERDS										
866	286	11.23	13.56	1,807	2,157	350	12.85	1.19	229,448	834
827	433	13.60	13.62	2,185	2,189	4	8.52	1.00	1,705	827
1,052	393	11.63	13.25	2,356	2,663	307	16.53	1.13	90,909	812
934	284	13.01	14.82	2,051	2,328	277	14.47	1.13	75,716	806
762	266	11.31	12.59	1,888	2,092	204	10.14	1.11	46,051	824
1,019	294	12.81	13.63	2,194	2,328	134	7.99	1.06	25,523	830
1,090	313	12.84	13.56	2,125	2,240	115	8.91	1.05	18,123	840
899	356	14.26	14.72	2,004	2,068	64	8.58	1.03	8,859	804
1,021	239	13.27	13.32	2,037	2,044	7	5.11	1.00	1,018	835
1,024	250	14.13	14.26	2,063	2,082	19	5.49	1.01	2,481	821
930	255	11.88	13.23	2,091	2,318	227	8.40	1.11	25,902	112
954	443	15.99	13.40	2,775	2,356	419-	0.27	0.85	46,604-	105
710	555	13.06	12.90	2,078	2,055	23-	7.90	0.99	2,023-	836
ANNUAL AVERAGES, ALL ENTR. WEIGHTED BY NUMBER OF COWS:										
917	329	12.55	13.60	2,074	2,238	164	9.84	1.08	36,701	1982
985	314	13.09	13.85	2,090	2,206	116	9.46	1.06	25,507	1981
883	313	11.58	13.14	1,948	2,198	250	11.80	1.13	52,012	1980
793	277	10.32	12.22	1,707	2,003	296	12.29	1.17	61,442	1979
716	244	9.42	10.92	1,498	1,726	228	10.78	1.15	46,209	1978

HEIFERS, 1982
COSTS PER HEIFER EQUIVALENT
1,312 MATURE-HEIFER EQUIVALENTS ON
21 COST ACCOUNT FARMS*

ITEM		AVERAGE PER HEIFER RAISED TO 26.7 MONTHS
VALUE OF CALF AT BIRTH		$ 124
FEED - MILK AND MILK REPLACER	$ 15	
1,495 POUNDS OF DRY GRAIN	113	
0.4 TONS OF HIGH MOISTURE CORN	28	
1.2 TONS OF HAY	75	
2.4 TONS OF HAY CROP SILAGE	65	
6.4 TONS OF CORN SILAGE	138	
PASTURE AND ALL OTHER FEED	46	
TOTAL FEED COSTS		480
LABOR - 26 HOURS		156
TRACTOR, TRUCK	39	
EQUIPMENT	19	
BEDDING	14	
BREEDING	15	
VET AND MEDICINE	11	
UTILITIES	7	
INSURANCE	7	
INTEREST	102	
BUILDING USE	79	
ALL OTHER	62	
TOTAL OTHER THAN CALF, FEED, LABOR		355
TOTAL COSTS - TO RAISE A HEIFER TO 26.7 MONTHS OF AGE		$1,115

*THERE WERE A TOTAL OF 3,319 HEIFERS OF ALL AGES ON THESE FARMS FOR A PART OR ALL OF THE YEAR. THEY WERE FED A TOTAL OF 35,037 NET HEIFER-MONTHS, WHICH, DIVIDED BY 26.7 MONTHS OF AGE AT FRESHENING EQUALS 1,312 MATURE-HEIFER EQUIVALENTS. (HEIFERS RAISED ON CONTRACT ARE NOT INCLUDED.)

FACTORS FROM 21 HEIFER ENTERPRISES
21 COST ACCOUNT FARMS, 1982
(ARRANGED BY NUMBER OF HEIFERS)

FARM NO	NUMBER OF HEIFERS	LABOR PER HEIFER	AVERAGE AGE AT FRESH-ENING	NET COST* PER HEIFER MONTH	PER HEIFER AT FRESHENING		RETURN PER HOUR OF LABOR	RETURN PER $ OF COST
					COST	VALUE		
	NO	HR	MO	$	$	$	$	$
834	598	8	27	34	994	900	4.88	0.98
827	351	4	27	29	884	1,110	22.00	1.02
812	269	8	24	39	1,020	1,100	2.26	0.90
830	182	14	27	37	1,158	1,100	0.97	0.89
806	159	11	25	46	1,270	900	1.38-	0.85
824	150	22	26	45	1,295	1,000	0.89	0.84
840	149	12	30	42	1,380	1,200	0.45-	0.83
821	125	7	27	29	873	800	11.83-	0.71
835	123	11	25	36	1,012	1,000	1.95	0.93
111	120	23	26	46	1,324	1,100	0.97	0.81
804	105	9	25	31	884	900	2.45	0.88
112	99	10	27	39	1,166	1,000	0.73	0.92
105	96	21	24	40	1,035	1,000	6.21	1.03
105	85	16	27	42	1,494	1,600	7.53	1.07
836	77	18	30	39	1,257	850	0.91	0.69
867	55	19	24	54	1,436	1,000	8.48-	0.66
146	52	23	27	39	1,159	900	2.35-	0.72
153	44	20	29	45	1,342	800	1.45-	0.77
127	44	6	26	35	1,108	1,200	11.12	1.06
828	42	10	28	31	863	800	1.12	0.91
117	40	20	28	35	1,099	1,000	0.11-	0.79
1982 GROUP AVERAGES, ACCORDING TO NUMBER OF HEIFERS:								
THIRDS								
HIGH	265	9	27	39	1,143	1,044	4.17	0.90
MED	108	14	26	38	1,113	1,057	1.14	0.91
LOW	51	17	27	40	1,181	936	0.11	0.80
ANNUAL AVERAGES, ALL ENTR. WEIGHTED BY NUMBER OF HEIFERS:								
1982	158	10	27	37	1,115	1,001	1.49	0.91
1981	151	11	26	37	1,100	1,051	0.25	0.87
1980	139	11	26	35	1,042	1,105	5.94	0.99
1979	120	12	27	34	1,048	960	3.97	0.96
1978	124	12	27	29	862	789	2.23	0.92

* Value of calf excluded.