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**CASH OPERATING INCOME AND LIQUIDITY  
MANAGEMENT FOR FEEDER CATTLE OPERATIONS**

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**Summary**

Net cash flow measures the amount of cash remaining after all cash expense obligations are satisfied. This cash is available for additional farm investment, off-farm investment, family living, and additional debt repayment. A 5-year, average, monthly, cash-flow statement was used to determine net cash flow for 18 feeder cattle farms. Results indicate that excess cash was used primarily to invest in equipment, vehicles, and nonfarm assets. Investments in buildings increased moderately over the study period, while investment in land was minimal.

(Key Words: Cash Flow, Liquidity, Investment, Feeder Cattle.)

**Introduction**

Liquidity and cash-flow management tools are essential components used in the implementation of financial control. Liquidity refers to the ability of the farm business to meet financial obligations as they come due and typically is measured using a cash-flow statement. Monthly cash-flow statements provide information necessary to assess seasonal credit requirements. Long-term cash flow projections also can provide information pertaining to a firm's ability to repay intermediate and long-term loans.

The objective of this study was to determine how excess cash profits (if present) were used on feeder cattle farms in Kansas. Monthly sources and uses of funds are presented and discussed.

**Experimental Procedures**

Data on cash transactions, inventories, and production information for 18 feeder cattle operations were available from the Financial Plus program of the Kansas Farm Management Association. A vast majority of the livestock fed on these farms was purchased rather than raised. To be included in the analysis, a farm had to have data for 1988 through 1992.

A monthly cash-flow statement was constructed to determine the amount of excess cash available for investment and debt repayment. The net cash-flow measure included on-farm sources and uses of cash as well as nonfarm cash flows. Cash operating income, defined as the amount of cash income from the farm business, was used to measure both profitability and liquidity. This cash is used for discretionary purposes such as meeting scheduled principal payments, on- and off-farm investment, and family living. Net loans are calculated as loans received minus loans repaid and reflect the level of debt repayment or lack thereof. A negative value for net loans indicates that producers were paying down debt.

**Results and Discussion**

Table 1 presents a 5-year, average, monthly, cash-flow statement for the 18 feeder cattle farms. These farms were relatively profitable during the period, averaging \$50,921 of net farm income per year (accrual basis). Cash operating income was much lower, averaging \$33,462 per year. Net

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farm income includes the noncash items of inventory changes and depreciation expense, whereas cash operating income includes only the cash transactions. Net cash flow averaged -\$238 per month or -\$2,852 per year. When positive, this cash is available for new or unplanned investments. Using Table 1, we can analyze the seasonality of the various revenue and expense items as well as the summary variables in the lower portion of the Table. Cash operating income, on average, was positive in March through August. The largest positive, monthly, net, cash flows occurred in January and June. The largest monthly principal payment occurred in May. Feeder cattle farms took out the most loans in January, September, October, and December. Net loans were negative in April through August, corresponding to the positive cash operating incomes during that time. The data indicate that feeder cattle farms were accumulating about \$21,912 of debt per year during this study. Family living

expenses averaged \$16,736 per year; thus, about one-half of cash operating income was used for family living expenses.

Financing of intermediate assets occurred predominately from the use of new or existing debt. The farms in this study increased current inventories of farm assets and non-farm assets. Cash investment in vehicles and equipment was steady during the period. Cash expenditures on buildings increased sharply, growing by nearly 170% over the period. The value of owned land increased by about 7%. Intermediate loan balances increased by \$32,016 during the period.

Cash-flow management is an essential component of effective financial control. Cash planning alleviates last minute decisions that can be costly. Understanding the seasonality of cash sources and uses will allow producers to make better investment decisions.

Table 1. Monthly Cash Flow Statement for Feeder Cattle Farms, 1988-1992.

	Jan	Feb	Mar	Apr	May	June	July	Aug	Sept	Oct	Nov	Dec
Sources												
Livestock	94,178	74,120	92,773	95,761	121,049	106,011	97,907	109,777	90,117	79,036	93,781	85,372
Breeding stock	202	403	646	192	209	113	450	50	88	81	775	85
Crops	10,917	5,093	4,709	5,872	8,336	7,185	9,526	3,608	5,040	10,313	4,442	9,208
Miscellaneous	2,488	1,273	1,849	2,668	3,195	2,382	2,860	2,517	2,615	2,833	2,633	6,570
Asset Sales	61	219	111	288	172	213	30	146	1172	3058	376	237
Total Farm Sources	107,846	81,109	100,089	104,782	132,960	115,904	110,774	116,098	99,032	95,321	102,007	101,473
Non-farm	13,353	2,169	1,177	1,239	1,782	2,402	624	1,953	2,923	2,923	1,442	5,880
Total Sources	121,199	83,278	101,266	106,021	134,742	118,306	111,398	118,052	101,954	98,244	103,448	107,353
Uses												
Livestock purchases	78,507	62,382	69,354	48,304	44,658	35,343	41,011	65,113	86,726	85,443	82,451	55,360
Feed	12,971	10,264	11,614	15,251	17,782	16,286	17,232	15,153	18,216	15,959	16,301	37,460
Veterinary	803	902	1,085	1,092	667	416	508	625	968	1,689	1,649	2,405
Fert., Seed & Chem.	1,375	2,015	3,495	3,263	3,591	4,635	4,201	2,279	2,412	4,604	2,300	7,791
Machine Hire & Labor	3,186	2,463	2,728	3,101	2,993	3,397	4,047	4,038	3,611	3,290	3,734	6,992
Fuel and Repairs	1,900	2,158	2,935	2,809	3,226	3,530	4,152	3,842	3,568	3,856	3,535	4,780
Asset Purchases	2,641	2,596	3,808	2,189	4,025	2,960	3,189	3,762	4,727	4,520	1,273	1,925
Interest Paid	3,688	2,417	2,502	4,297	3,935	3,252	4,407	3,229	5,713	3,323	2,780	11,173
Miscellaneous	5,710	2,888	5,742	3,883	4,314	6,814	4,414	6,685	5,677	9,980	6,358	16,884
Total Farm Uses	110,780	88,085	103,264	84,189	85,190	76,634	83,162	104,726	131,617	132,663	120,382	144,770
Tot Non-farm Uses	23,053	6,952	3,115	3,472	2,931	3,868	2,073	2,071	4,709	4,181	2,557	5,582
Total Uses	133,833	95,037	106,379	87,661	88,121	80,502	85,235	106,796	136,326	136,845	122,939	150,352
Loans Received	122,110	107,702	86,253	90,983	74,456	59,843	71,708	92,022	114,324	128,156	99,391	125,854
Loan Payments	95,310	97,320	81,766	108,275	120,896	90,069	98,550	100,360	90,035	90,448	86,232	91,629
Net loans	26,800	10,382	4,487	(17,291)	(46,440)	(30,226)	(26,842)	(8,339)	24,289	37,708	13,159	34,225
Operating Income	(353)	(4,600)	522	22,493	51,623	42,018	30,772	14,987	(29,032)	(35,881)	(17,477)	(41,610)
Net Cash Flow	14,167	(1,376)	(626)	1,068	181	7,578	(679)	2,917	(10,082)	(893)	(6,332)	(8,775)