

FARM MANAGEMENT GUIDE

KSU Nursery Swine Budget

Current Prices

(as of Dec. 4th, 2017)

Production Efficiency Information

| | |
|-------------------------|-------|
| Nursery Mortality (%) | 4.58 |
| Feed to Gain Conversion | 1.53 |
| Entry Weight (lbs) | 13.90 |
| Exit Weight (lbs) | 51.50 |

| Revenue | Price | Unit | | Qty | Unit | | | Total per Year per Pig Sold |
|---|----------|----------|---|-------|-------|--------|---|--------------------------------|
| Feeder Pigs | \$ 66.83 | per hd | x | 51.50 | lbs | x 0.95 | = | \$ 63.77 |
| Less cost of Weaned Pigs | \$ 55.51 | per hd | x | 1 | hd | | = | \$ (55.51) |
| Manure Credit | | | | | | | | \$ 0.50 |
| Other revenue | | | | | | | | \$ - |
| Gross Income | | | | | | | | \$ 8.76 |
| Variable Costs | | | | | | | | |
| Nursery Feed | \$ 0.15 | per lb | x | 57.5 | lbs | | = | \$ 8.54 |
| Feed Processing | \$ 17.00 | per ton | x | 0.03 | ton | | = | \$ 0.49 |
| Labor | \$ 15.00 | per hour | x | 0.2 | hours | | = | \$ 3.00 |
| Vet Medicine/Drugs | | | | | | | | \$ 1.79 |
| Marketing, Bedding, and Misc | | | | | | | | \$ 0.18 |
| Utilities, Gas, Fuel, Oil | | | | | | | | \$ 0.66 |
| Machinery, Facility/Equip. Repairs | | | | | | | | \$ 0.48 |
| Other variable costs | | | | | | | | \$ - |
| Total Variable Costs | | | | | | | | \$ 15.14 |
| Fixed Costs | | | | | | | | |
| Machinery, Facilities, General Overhead | | | | | | | | \$ 5.61 |
| Taxes and Insurance | | | | | | | | \$ 0.34 |
| Legal, Accounting, etc. | | | | | | | | \$ 0.50 |
| Other fixed costs | | | | | | | | \$ - |
| Total Fixed Costs | | | | | | | | \$ 6.45 |
| Total Costs | | | | | | | | \$ 21.59 |
| Income Over Variable Costs | | | | | | | | \$ (6.38) |
| Income Over Total Costs | | | | | | | | \$ (12.83) |

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K-State's Agricultural Economics Department publishes *Farm Management Guides* to estimate the current profitability of different agricultural enterprises. This format for livestock enterprises allows the user to change certain key inputs to cater the budget to their production situation. Climate, genetics, local cash prices, and a variety of other factors makes budgeting to the entire state of Kansas difficult. While defaults in the spreadsheet are research-based estimates, users should enter their own performance, price and cost information using the cells in **blue**. Base input and output prices are currently updated quarterly. Users are encouraged to update prices to best reflect their specific situation.

Three different sets of price forecasts are available in the spreadsheet. By clicking the dropdown menu at the top of the budget, a user can select "Current Prices", "One Year Out Prices", or "Five Year Out Prices". All price assumptions can be viewed in the *Prices* tab.

Feed assumptions can be viewed in the *Feed* tab.

Base production/situation values are derived (except for sow replacement and mortality rates) from the most recent *U.S. Pork Industry Productivity Analysis* published by the National Pork Board and authored by Dr. Stalder, Iowa State University.

Most non-feed variable and fixed costs are derived from USDA ERS Cost of Production Estimates (provided in on \$/cwt gain units) last updated October 2, 2017.

Production Efficiency Measures

Nursery Mortality (%): Default value of 4.58%.

Feed-to-Gain Conversion (lbs): Default value of 1.513

Entry Weight (lbs): Default weaned pig placement weight of 13.9.

Exit Weight (lbs): Default feeder pig sales weight of 51.5.

Revenue

Feeder Pigs: Price is \$/hd and can be adjusted. Current Price is based upon the USDA NW_LS255 Report Report while One Year and Five Year Out Prices are derived from a regression ($63.72+0.93*\text{Market Hogs Price}-9.63*\text{Corn Prices}$) using expected Market Hog and Corn Prices.

Less cost of Weaned Pigs: Price is \$/hd and can be adjusted. Current Price is based upon the USDA NW_LS255 Report while One Year and Five Year Out Prices are derived from a regression ($71.04+0.11*\text{Market Hogs Price}-5.50*\text{Corn Price}$) using expected Market Hog and Corn Prices.

Manure Credit: Default value is set at \$0.50/pig sold.
Other Revenue: Placeholder for other revenue to be entered.

Variable Costs

Nursery Feed: See *Feed* tab for ration assumptions. Final feed volumes are calculated to reflect changes in feed conversion and entry/exit weights.

Feed Processing: Reflects \$17/ton feed hauling, grinding, etc.

Labor: Default of 0.2 hours/hog valued at \$15/hour.

Vet Medicine/Drugs: Reflects USDA ERS estimate of \$4.76/cwt produced.

Marketing, Bedding, Misc.: Reflects USDA ERS estimate of \$0.49/cwt produced.

Utilities, Gas, Fuel, Oil: Reflects USDA ERS estimate of \$1.75/cwt produced.

Machinery, Facility/Equip. Repairs: Reflects USDA ERS estimate of \$1.27/cwt produced.

Other Variable Costs: Placeholder for other variable costs to be entered.

Fixed Costs

Machinery, Facilities, and General Overhead: Reflects USDA ERS estimate of \$14.93/cwt produced.

Taxes and Insurance: Reflects USDA ERS estimate of 0.90/cwt produced.

Legal, Accounting, etc.: Reflects \$0.50 per pig sold, per year.

Other Fixed Costs: Placeholder for other fixed costs to be entered.

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Budget Assumptions

Feed Ration

| Ingredient | Qty | Unit |
|---------------------------------|-------|------|
| Corn, Yellow Dent | 28.49 | lbs |
| Soybean Meal, Dehull, Sol Extr | 14.96 | lbs |
| Calcium phosphate (monocalcium) | 0.32 | lbs |
| Limestone, ground | 0.47 | lbs |
| Sodium chloride | 0.20 | lbs |
| L-Lys-HCL | 0.17 | lbs |
| DL-Met | 0.03 | lbs |
| L-Thr | 0.04 | lbs |
| Vitamin premix with phytase | 0.10 | lbs |
| Trace mineral premix | 0.06 | lbs |
| Corn DDGS, 7.5% Oil | 5.25 | lbs |
| Denegard | 0.09 | lbs |
| CTC 50 | 0.21 | lbs |
| Complete nursery pellet | 3.00 | lbs |

Nursery Prices

| | Current | One Year Out | Five Years Out |
|---------------------------------------|-----------|--------------|----------------|
| Feeder Pig (\$/hd) | \$ 66.83 | \$ 72.21 | \$ 76.48 |
| Weaned Pig (\$/hd) | \$ 55.51 | \$ 55.70 | \$ 57.73 |
| Swine Feed processing (\$/ton) charge | \$ 17.00 | \$ 17.00 | \$ 17.00 |
| Nursery Feed (\$/lb) | \$ 0.15 | \$ 0.15 | \$ 0.15 |
| Corn (\$/bu) | \$ 3.30 | \$ 3.75 | \$ 3.40 |
| Soybean Meal (\$/ton) | \$ 314.00 | \$ 318.20 | \$ 339.00 |
| DDGS (\$/ton) | \$ 152.50 | \$ 173.30 | \$ 157.12 |
| Other Feed Ingredients | \$ 0.39 | \$ 0.39 | \$ 0.40 |

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The K-State Swine Team
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