

## CONVERSION from Commercial Mineral Mix to Individual Free-Choice Mineral Supplementation – Per Cow/Year, Maui County

### POSITIVE EFFECTS of CONVERSION (per cow/year):

#### Added Returns:

#### Reduced Costs:

1. Commercial mineral mix: \$34.66/head/year
2. Mineral labor: 104 hrs/year @ \$20/hr = \$2,080/500 cows=> \$4.16/cow/year
3. Other expenses: \$750/year=> \$750/500 cows=> \$1.50/cow/year

### NEGATIVE EFFECTS of CONVERSION (per cow/year):

#### Reduced Returns:

#### Increased Costs:

1. Free-choice mineral mix: \$16.69/cow/year
2. Mineral labor: 156 hrs/year @ \$20/hr = \$3,120/500 cows=> \$6.24/cow/year
3. Other expenses: \$1,000/year=> \$1,000/500 cows=> \$2/cow/year
4. Mineral bunks: 1 bunk/100 cows => 5 bunks @ \$1,000/bunk=> \$5,000/10 years=> \$500/year=> \$500/500 cows => \$1/cow/year
5. Opportunity interest (mineral bunks): \$500/year @ 7% interest=> \$35/year=> \$35/500 cows=> \$0.07/cow/year
6. Added management: 10 hrs/year @ \$50/hr = \$500/500 cows=> \$1.00/cow/year



## CONVERSION from Commercial Mineral Mix to Individual Free-Choice Mineral Supplementation – Total/Year, Maui County

### POSITIVE EFFECTS of CONVERSION (total per year):

#### Added Returns:

#### Reduced Costs:

1. Commercial mineral mix:  $\$34.66/\text{head}/\text{year} * 500 \text{ head} \Rightarrow \$17,330/\text{year}$
2. Mineral labor:  $104 \text{ hrs}/\text{year} @ \$20/\text{hr} = \$2,080/\text{year}$
3. Other expenses:  $\$750/\text{year} \Rightarrow \$750/\text{year}$

### NEGATIVE EFFECTS of CONVERSION (total per year):

#### Reduced Returns:

#### Increased Costs:

1. Free-choice mineral mix:  $\$16.69/\text{cow}/\text{year} * 500 \text{ head} \Rightarrow \$8,345/\text{year}$
2. Mineral labor:  $156 \text{ hrs}/\text{year} @ \$20/\text{hr} = \$3,120/\text{year}$
3. Other expenses:  $\$1,000/\text{year} \Rightarrow \$1,000/\text{year}$
4. Mineral bunks:  $1 \text{ bunk}/100 \text{ cows} \Rightarrow 5 \text{ bunks} @ \$1,000/\text{bunk} \Rightarrow \$5,000/10 \text{ years} \Rightarrow \$500/\text{year}$
5. Opportunity interest (mineral bunks):  $\$500/\text{year} @ 7\% \text{ interest} \Rightarrow \$35/\text{year}$
6. Added management:  $10 \text{ hrs}/\text{year} @ \$50/\text{hr} = \$500/\text{year}$

