AAE 320 Problem Set #6 **Due November 16, 2022** **Name____K EY__________**

Abby and Isaiah are married and file a joint income tax return each year. The following table shows the purchase price for items that were purchased, depreciation claimed, and fair market value (sale price) of their farm assets.

Asset	**Purchase Price**	**Depreciation Claimed**	**Fair Market Value (= Sale Price)**
Feed	$305,000	$0	$345,000
Feeder calves	(Raised)	$0	$185,000
Dairy heifers (under 24 months old)	(Raised)	$0	$85,000
Dairy cows	(Raised)	$0	$680,000
Machinery	$886,000	$506,000	$305,000
Buildings	$1,210,000	$755,000	$380,000
Land	$685,000	$0	$6,885,000
Total	**$3,086,000**	**$1,261,000**	**$8,865,000**

Abby and Isaiah are planning their transfer of the farm assets to their son, John. They have asked the following questions. Please answer them.

1. If they sold all the farm assets to John for their fair market value, how much gain would they have to report on their income tax return for each asset?
   FYI, Basis = Purchase Price – Depreciation or 0 if raised asset & **Gain = Sale Price – Basis**.

Asset	Sale Price	Purchase Price	Depreciation	Basis	Gain or Loss
Feed	$345,000	$305,000	$0	$305,000	$40,000
Feeder calves	$185,000	Raised	$0	$0	$185,000
Heifers	$85,000	Raised	$0	$0	$85,000
Cows	$680,000	Raised	$0	$0	$680,000
Machinery	$305,000	$886,000	$506,000	$380,000	-$75,000
Buildings	$380,000	$1,210,000	$755,000	$455,000	-$75,000
Land	$6,885,000	$685,000	$0	$685,000	$6,200,000
Total	$8,865,000	$3,086,000	$1,261,000	$1,825,000	$7,040,000

2. Note the character of the gain for each asset by entering how much of the gain is subject to ordinary income tax, self-employment tax, and/or capital gains tax in each column below.

	Ordinary Income or Loss	Self-Employment Income or Loss	Capital Gains
Feed	$40,000	$40,000	
Feeder calves	$185,000	$185,000	
Heifers	$85,000		
Cows			$680,000
Machinery	-$75,000		
Buildings			-$75,000
Land			$6,200,000
Sum Total	$235,000	$225,000	$6,805,000

The most useful notes and writing on this are the "Three categories of gain" on page 3 of Tax Considerations of Farm Transfers. In short, the feed and feeder calves get both ordinary income and SE treatment since they are sold in the ordinary course of business. The heifers are young breeding livestock and get only ordinary income treatment, which is the same as the machinery depreciation recapture. Finally, the cows get capital gains treatment as a working asset, as do the buildings and the land. The losses for the machinery and buildings are added into the totals for the Ordinary Income and Capital Gains.

3. Using the following Tax Table, calculate the income taxes Abby and Isaiah must pay on the sale of the assets that result in ordinary income. Assume that they have **$75,000** of taxable income from other sources in addition to the income from the sale of assets.

If taxable income is over:	but not over:	the ordinary income tax is:
$0,	$19,750	10% of the amount over $0
$19,751,	$80,250	$1,975 plus 12% of the amount over $19,750
$80,251,	$171,050	$9,235 plus 22% of the amount over $80,250
$171,051,	$326,600	$29,211 plus 24% of the amount over $171,050
$326,601,	$414,700	$66,543 plus 32% of the amount over $326,600
$414,701,	$622,050	$94,735 plus 35% of the amount over $414,700
$622,051,	no limit	$167,307.50 plus 37% of the amount over $622,050

Total Ordinary Income from Question 2 + 75,000 = __$310,000_____

Ordinary Income Tax Due = $29,211 + 0.24 x (310,000 – 171,051) = $62,559

4. Assume all the self-employment income is Abby's self-employment income. Using an effective self-employment tax rate of 15.3% on the first $132,900 of self-employment income and 2.9% on the self-employment income over $132,900, calculate Abby's self-employment tax liability from the sale of the assets.

Total Self-Employment Income from Question 2 = __$225,000____

Self-Employment Tax Due = $132,900 x 0.153 = $20,334 and (225,000 – 132,900) = $92,100 x 0.029 = $2,671. So, the total SE tax = $20,334 + $2,671 = $23,005

5. Using a 20% tax rate on capital gains, calculate Abby and Isaiah's tax on capital gains and losses from the sale of the assets.

Total Capital Gains from Question 2 = __$6,805,000_____

Capital Gains Tax Due = _$6,805,000 x 0.20 = $1,361,000

FYI, Summary of Q1-5

Sold farm assets to John for	***$8,865,000***
Income Tax owed	***$62,559***
SE Tax owed	***$23,005***

Capital Gains Tax owed	***$1,361,000***
Total Taxes paid	***1,446,563***
Total remaining after taxes	***$7,418,437***

6. If Abby and Isaiah gave the assets to John rather than sold them to him, what is John's income tax basis in each of the assets? [Hint: you cannot give someone a loss. If you have a loss, then the basis becomes the fair market value if you give someone the asset.]

Asset	John's Income Tax Basis
Feed	$305,000
Feeder calves	$0
Heifers	$0
Cows	$0
Machinery	$305,000
Buildings	$380,000
Land	$685,000

In general, the basis of an asset transfers if it is given as a gift, so the basis for each asset is the same as in Question 1, expect that you cannot gift someone a loss. Thus, the Buildings and the Machinery both have a basis equal to the Fair Market Value from the Facts, not the basis for Abby and Isaiah had in question 1.

7. If John sold the assets for their fair market value immediately after Abby and Isaiah gave them to him, what is his gain or loss on each of the assets?

Asset	John's Gain
Feed	$40,000
Feeder calves	$185,000
Heifers	$85,000
Cows	$680,000
Machinery	$0
Buildings	$0
Land	$6,200,000

Gain = Sale Price – Basis, *and so the Gain is the same as in question 2, except for the Buildings and Machinery, which have a basis equal to their fair market values. Thus, John's gain is now $0 for these assets, not -$75,000 for each as in question 2.*

8. Assume Abby and Isaiah owned all the assets as survivorship marital property and Abby died. If the assets had the fair market value listed above, what is Isaiah's income tax basis in each of the assets?

Asset	Isaiah's Income Tax Basis
Feed	$345,000
Feeder calves	$185,000
Heifers	$85,000
Cows	$680,000
Machinery	$305,000
Buildings	$380,000
Land	$6,885,000

When Abby dies, the basis for each asset updates to the date of death fair market value, which are the sale prices listed in Question 1.

9. If Abby died and then Isaiah sold all the assets to John immediately, what is Isaiah's gain or loss on each of the assets? What is John's income tax basis in each of the assets?

Because the basis for each asset updates to the date of death fair market value when Abby dies and Isaiah sells them for this same price, there is no gain: Isaiah has no gain. John's basis is the price he pays for the assets, the sale price listed in the answer to Question 1.

Asset	Isaiah's Gain	John's Income Tax Basis
Feed	$0	$345,000
Feeder calves	$0	$185,000
Heifers	$0	$85,000
Cows	$0	$680,000
Machinery	$0	$305,000
Buildings	$0	$380,000
Land	$0	$6,885,000