21st Century Employability Skills
Homework Packet
March 30th – April 3rd

Students, please complete this packet on days that we would normally have class (Monday and Thursday). Although school has been cancelled, I want to ensure that you are still getting the necessary work to keep your minds fresh and ready for when we return back to school.

Day #1
Quick Start:
Please complete Journal Entry #10 #21 #41.

Activity: Complete "Student Loans, Car Loans, & Mortgages" Worksheet

Reminder: Keep working on your final speech

Day #2
Quick Start:
Please complete Journal Entry #33 #39 #43.

Activity: Complete "Folded Paper Projects"
Career Exploration
Career Goal Setting
Job Skills

Reminder: Keep working on your final speech

Career Journal Entry Topics

Day #1

#10. How do you build a good relationship with co-workers?

#21. Explain how you should quit a job you don't like.

#41. Why might employers promote people who work well with others?

Day #2

#33. Finish this sentence and explain: "I'll feel successful when I..."

#39. Describe something career-related that you worry about.

#43. What is **"networking"** and why is it important?

Notes - Loans – Student Loans, Car Loans, & Mortgages

Goals	Become familiar with student loans, car loans, and mortgages.
	Compute monthly payments, total cost of a loan, and total interest paid.
	Compare repayment scenarios using Excel or an online calculator.
Terms	**Principal**
	Interest - money paid to a lender at a particular rate in exchange for borrowing a larger sum,
	Calculated as a percentage of the unpaid loan amount (principal).
	Fixed Rate – the interest rate _____ throughout the duration
	of the loan.
	Variable or Adjustable Rate -
	Annuity –
	Most mortgages, car loans, and student loans are annuities.
	With some annuities, you receive the payments instead of making them, such as
	retirement pensions or other insurance products.
Financial Aid for College	Financial aid helps students pay for college. Financial aid can cover a variety of educational expenses including tuition and fees, room and board, books, and supplies. Types of financial aid include grants and scholarships, loans, and work-study programs. You must apply for financial aid to qualify. Most colleges and universities require you to complete the FASFA by a specific deadline.
	Grants and Scholarships
	Money you don't have to pay back as long as you meet all the obligations.
	Work-study – paid, part-time work arranged by the college
	Student loans
	Any money borrowed must be paid back over time with interest.
Student Loans	Student loan payments vary depending on the _____ of the loan and the _____ of the loan. Many student loans offer _____ payment options which usually allows you to wait to begin repayment until after you graduate. Even if your payments are deferred until you graduate you will begin to accumulate interest the moment the loan money is paid to you. Typically, unpaid interest is added to your principal amount at the end of your deferment period which increases the amount you owe. Some student loans are subsidized; as long as you continue to meet the requirements of your loan the U. S. Department of Education will pay the interest for you until you graduate or until the grace period is over. Be sure you fully understand the terms of your loan before you accept it. One good source for information about student loans is Sallie Mae at https://www.salliemae.com/student-loans/.

The Loan Payment Formula (monthly payments)	$$PYMT = \frac{Principal \cdot \left(\frac{APR}{12}\right)}{\left[1 - \left(1 + \frac{APR}{12}\right)^{(-months)}\right]}$$	PYMT = monthly payment APR = annual percentage rate months = number of months to pay off the loan

1. A student receives a subsidized student loan for $10,000 with a 10-year repayment term and interest compounded monthly. Six months after she graduates from college, she will have to begin making payments. Find her monthly payment and total interest paid if the interest rate is:

   a) 5.5%

   b) 7.5%

2. If the loan term in the previous problem, part b, is increased to 20-years, how much would her monthly payment be? How much interest would she pay over the duration of the loan?

Auto Loans	Auto loans are installment loans, just like student loans, except that the vehicle acts as collateral – which means that the lender has the right to repossess the vehicle if you fail to repay the loan according to the agreement. Typical auto loans are for 4, 5, or 6 years, and interest rates are typically lower for new cars purchased from a dealership.

3. You need a $12,000 loan to buy a good used car. Your bank offers a 3-year loan and a 5-year loan with an APR of 8%. Find the monthly payment and total interest paid for each loan option.

   3-year loan at 5%

   5-year loan at 8%

Mortgages	A mortgage is a loan to help finance the purchase of a house. In a mortgage the house acts as the collateral – which means that the lender has the right to foreclose on the property if the borrower fails to repay the loan according to the agreement. Typical mortgages are for 15 or 30 years. Interest rates can be fixed or adjustable, and rates are typically lower for shorter term loans. There are a variety of additional costs and fees associated with mortgages. Be sure you understand them before you sign the papers.
	Down Payment – a payment required at closing

4. **Mortgages** – A couple applies for a mortgage on a $125,000 house. They plan to make a down payment of 20%. Find the monthly payment, total cost of the mortgage, and total interest paid for each scenario.

   1. 30-year mortgage at a fixed rate of 5.2%

   b) 15-year mortgage at a fixed rate of 4.5%

   c) For each scenario, determine what percent of the total paid is principal? Interest?

5. Your monthly payment will likely be more than just the cost of the mortgage. Lenders often require borrowers to pay one-twelfth of property taxes and homeowner's insurance each month. The lender holds these funds "in escrow" and makes the annual or semi-annual payments for you. If the property taxes are $600 per year and the insurance is $800 per year, find the actual monthly payment for the 30-year mortgage with taxes and insurance included.

6. Some experts suggest that your mortgage payment with taxes and insurance should be less than 25% of your net income (monthly take home pay) and your total debt should be less than 36% of your gross income. In order to afford the house in the previous examples, what is the minimum monthly net income the couple should have?

Homework - Loans

Name _____

Date _____ Period _____

Use the Loan Payment Formula, then check your results with an online calculator. Show work.

1. A student receives a subsidized student loan for $8,000 with interest compounded monthly. Six months after she graduates from college, she will have to begin making payments. Find her monthly payment and total interest paid if the interest rate is:

   a) 4.6% with a 10-year repayment term

   b) 7.2% with a 20-year repayment term

   c) What are the advantages and disadvantages of scenario (b) compared with (a) above?

2. Mary is planning to buy her first brand new car. Her bank approves a car loan for up to $30,000 for 60 months with a 5% interest rate. She plans to make a down payment of $2,500.00.

   Mary has narrowed it down to a compact hybrid card which costs $32,500 but gets 54 miles per gallon or a mid-size sporty sedan which costs $24,500 and gets 34 miles per gallon. If Mary drives 300 miles per week for 52 weeks with an average gas price of $3.00 per gallon which vehicle will be a better deal after 5 years? 10 years? Assume taxes, insurance, and maintenance will be the same for both cars. Organize your findings in a table.

3. David applies for a mortgage on a $80,000 house. He plans to make a down payment of 20%. Find the monthly payment, total cost of the mortgage, and total interest paid for each scenario.

a) 30-year mortgage at a fixed rate of 5.2%

b) 15-year mortgage at a fixed rate of 4.5%

c) For each scenario, what percent of the total paid is principal? Interest?

4. **Excel** – Create an Excel spreadsheet to calculate installment loan payments. Add a tab to your Personal Finance workbook and name the tab "Loan Calculator". The spreadsheet should be set up like the one below. The user should be able to enter the starting balance, the APR, and the length of the loan. The spreadsheet should calculate the fixed monthly payment and the amortization table for the length of the loan.

Use Excel's PMT function to calculate the Monthly Payment.
Monthly Payment = PMT(*monthly* interest rate, number of payments, amount being borrowed)

Loan Calculator

Enter new amounts in the highlighted area only. (40 years max)

These values are calculated.

Starting Principal	$ 100,000.00	Monthly Payment	$ 764.99
APR %	4.50%	Total paid	$ 137,698.80
Length of loan (years)	15	Total interest paid	$ 37,698.80

Amortization Schedule

Month	Payment	Interest	Principal	Balance
				$ 100,000.00
1	$ 764.99	$ 375.00	$ 389.99	$ 99,610.01
2	$ 764.99	$ 373.54	$ 391.46	$ 99,218.55
3	$ 764.99	$ 372.07	$ 392.92	$ 98,825.63

Amortization Schedule – details each payment of the loan and shows the amount of each payment applied towards the principal and interest.

Check your spreadsheet by comparing it to an online calculator. Use your spreadsheet to check your work on the previous problems.

Demonstrate your spreadsheet to your teacher or turn it in as instructed.

5. Explain why it is sometimes advantageous to refinance a loan at a lower interest rate and shorter term.

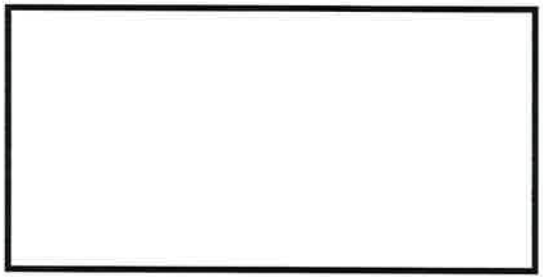
Name _____

Career Exploration
Folded Paper Project

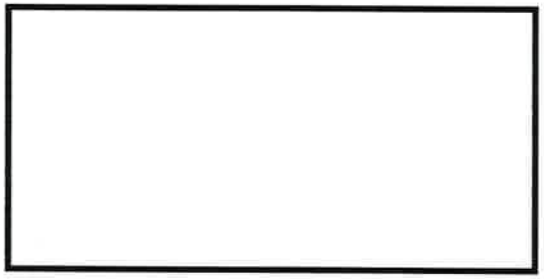
Directions:

- Fold this double-sided printed paper in half so this page is the back page. Write your name at the top.
- Turn it over and cut along the three **dashed** lines on page 1.
- On the solid lines on page 1, write the names of three careers that interest you. In each box, draw a symbol or sketch to represent the career.
- Open the folded paper to pages 2 and 3. Provide the requested information on the lines provided.

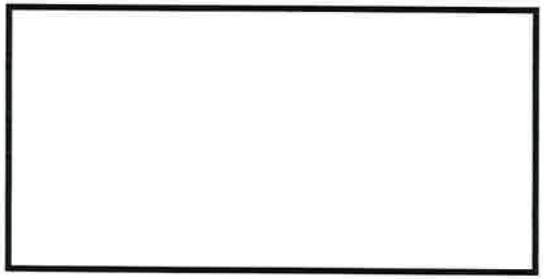
Career #1: _____



Career #2: _____



Career #3: _____



Why do I believe career #1 would be a good fit for me?

Two advantages of career #1:

Two disadvantages of career #1:

Why do I believe career #2 would be a good fit for me?

Two advantages of career #2:

Two disadvantages of career #2:

Why do I believe career #3 would be a good fit for me?

Two advantages of career #3:

Two disadvantages of career #3:

Name _____

Career Goal Setting
Folded Paper Project

Directions:

- Fold this double-sided printed paper in half so this page is the back page. Write your name at the top.
- Turn it over and cut along the three **dashed** lines on page 1.
- On the solid lines on page 1, write the career goals you want to achieve (for example, become a nurse, start your own business, help others, travel, etc.).
- Open the folded paper. Within each rectangle on page 2, draw a symbol or sketch to represent each goal (for example, the logo of the company you want to work for, a $ sign if want a large salary, an airplane if you want to join the Air Force, etc.).
- On the lines on page 3, explain what specific things you can do to help achieve each goal (for example, get good grades in school, earn a degree, gain experience by working or volunteering part-time, create a résumé, etc.).

My first career goal is to:

_____

_____

My second career goal is to:

_____

_____

My third career goal is to:

_____

_____

Symbol or sketch of my first goal:

What things can I do to achieve my first career goal?

Symbol or sketch of my second goal:

What things can I do to achieve my second career goal?

Symbol or sketch of my third goal:

What things can I do to achieve my third career goal?

Name _____

Period _____ Date _____

Job Skills Folded Paper Project

Directions:

- Fold this double-sided printed paper in half so this page is the back page.
- Cut along the four dashed lines on page 1.
- Open each section flap and read the description.
- Answer the questions on pages 2 and 3.
- Draw a symbol or sketch within each rectangle on page 1 to represent each job skill (for example, an ear for communication skills or a scale for critical thinking skills).

Communication Skills

Behavioral Skills

Technical Skills

Interpersonal Skills

Critical Thinking Skills

Communication skills allow a worker to exchange information effectively with others. Verbal, nonverbal, electronic, and written communication should be professional and error-free. Examples include listening well and answering work emails promptly.

My strongest **communication skill** is _____.

Which form of communication (verbal, nonverbal, electronic, or written) is most challenging to you, and how can you improve it?

_____

_____

Behavioral skills ensure that a worker's actions reflect his or her professionalism. Examples include using proper manners, arriving to work on time, completing all assigned tasks, helping others, following through on promises, and having a positive attitude.

My strongest **behavioral skill** is _____.

What types of behaviors during a job interview would help persuade an employer to hire you?

_____

_____

Technical skills enable a worker to perform required work tasks successfully. These skills demonstrate the worker's knowledge and abilities. Examples include a surgeon who has good hand-eye coordination and an accountant who has strong math skills.

My strongest **technical skill** is _____.

What career interests you most, and what technical skills does it likely require?

_____

_____

Interpersonal skills reflect how well a worker interacts with co-workers, supervisors, and customers. Examples include good leadership, empathy, negotiation, and team-building skills.

My strongest **interpersonal skill** is _____.

What types of work situations likely require good interpersonal skills?

_____

_____

Critical thinking skills require a worker to use a methodical thought process to evaluate information, make judgments, solve problems, and reach conclusions. Examples include good data analysis and problem-solving skills.

My strongest **critical thinking skill** is _____.

Why do employers seek workers who have strong critical thinking skills?

_____

_____