## National Standards for Financia <br> Literacy

## National Standards for Financial Literacy

## Writing Committee

Stephen Buckles, Vanderbilt University
Andrew Hill, Federal Reserve Bank of Philadelphia*
Bonnie Meszaros, University of Delaware
Michael Staten, University of Arizona
Mary Suiter, Federal Reserve Bank of St. Louis*
William Walstad, University of Nebraska - Lincoln
Economic and Financial Literacy Educators Review Committee
Brenda Cude, University of Georgia
Sharon M. Danes, University of Minnesota
Paul Grimes, Pittsburg State University
Jackie Morgan, Federal Reserve Bank of
Atlanta - Nashville Branch*
Mark Schug, University of Wisconsin - Milwaukee Michael Watts, Purdue University

## Review Committee

Jeanne Hogarth, Federal Reserve Board*
Annamaria Lusardi, The George Washington
University
Brigitte C. Madrian, Harvard University
Peter L. Rousseau, Vanderbilt University
Mark M. Zandi, Moody's Analytics
Educator Review Committee
Tommie Gillispie, Forest Hill High School, Jackson, Mississippi
Riza Laudin, Herricks High School, New Hyde Park, New York
Susan Lidholm, Rockbridge High School, Columbia, Missouri
Sabrina McCartney, Carrollwood Day School, Tampa, Florida
Kathy Panus, Concordia School, Concord, California Sandra Wright, Adlai E. Stevenson High School, Lincolnshire, Illinois

## Project Director

William Bosshardt, Florida Atlantic University

Project Coordinator
Christopher Caltabiano, Council for Economic Education

## 1stFinancial3ank

This publication was made possible through funding provided by 1st Financial Bank USA.
*Views expressed in this document are those of the authors and do not necessarily represent those of the Federal Reserve Bank of Philadelphia, the Federal Reserve Bank of St. Louis, the Federal Reserve Bank of Atlanta, or the Federal Reserve System.

Copyright © 2013, Council for Economic Education, 122 East 42 Street, Suite 2600, New York, NY 10168. All rights reserved. The Content Standards and Benchmarks in this document may be reproduced for noncommercial educational and research purposes. Notice of copyright must appear on all pages. Printed in the United States of America.

## Contents

Introduction ..... iv
Brief Guide to the Standards ..... viii
Summary of the Standards ..... ix
The Standards with Benchmarks
I. Earning Income ..... 1
II. Buying Goods and Services ..... 6
III. Saving ..... 11
IV. Using Credit ..... 16
V. Financial Investing ..... 21
VI. Protecting and Insuring ..... 26

Annual income twenty pounds, annual expenditure nineteen nineteen six, result happiness. Annual income twenty pounds, annual expenditure twenty pounds ought and six, result misery.

That advice, proffered by Charles Dickens' Mr. Micawber to the young David Copperfield, comes from an older, and perhaps simpler, time. But if there was ever a time when people could so easily master everything they needed to know about their finances, it ended long ago. Today the principles of personal finance-and the global economy in which they function-are mysteries to an alarming number of Americans. Mr. Micawber's rule of thumb has been swept aside, and in its place we find a bewildering variety of prescriptions for both happiness and misery: exotic investment instruments, arcane tax regulations, constantly changing computer technologies. Financial markets have grown in size, complexity, and global reach, providing both individuals and businesses exciting opportunities for reward and, simultaneously, unprecedented levels of risk. These changes in the financial landscape directly and indirectly affect the lives of individuals and the decisions they make as workers, consumers, savers, borrowers, and investors.

What's more, the pace of change is quickening at a time when individuals of all ages are being called upon to assume more responsibility for their financial lives. College tuition is now so costly—due in part to cutbacks in support from state governments-that postsecondary education has become a serious economic issue, and those high school graduates who do apply to college must explore complex funding packages when they decide whether, and where, they will go. Health care insurance offerings have multiplied, forcing would-be subscribers to select among a confusing mix of prices and fees. Retirees' pensions have been largely replaced with defined contribution plans, shifting the responsibility for saving and investing from the employer to the employee. Investors, who have an immense amount of financial information literally at their fingertips, face a staggering variety of financial products and services. In short, consumers today must decide how best to allocate finite resources among a stream of new financial products and payment options that would shock Mr. Micawber in their complexity.

## A New Role for the Schools

Students begin learning about the financial world at an early age. Long before they enter school, they have had the chance to observe the financial decisions made by their friends and families-occasions that allow them to begin to develop a financial mindset. But parents aren't always the most effective models for personal financial decision making. Formal education in school about financial terms and concepts can significantly help prepare students for the financial opportunities and challenges they will face as adults.

Increasingly, policymakers worldwide have come to the same conclusion:Young people need to be educated about personal finance. In the first large-scale international study to assess the financial literacy of young people, the Organisation for Economic Co-operation and Development (OECD) is testing 15-year-olds in 18 countries, including the United States, on their knowledge of personal finance and their ability to apply it to their financial problems. The goal of the Programme for International Student Assessment (PISA) is to compare levels of financial literacy across countries in order to see which countries perform best and identify effective national strategies and practices.

In the United States, the Council for Economic Education's (CEE) 2011 Survey of the States indicates that most states now recognize the value of personal financial instruction. The survey found that 46 states now include personal finance in their state education standards; 36 states require that these standards be implemented, up from 16 in 2000. In addition, 14 states required that a specific course on personal finance be offered in high school (up from 7 in 2000), and 13 of those states made it mandatory for graduation (up from just 1 in 2000). This trend is likely to continue.

The addition of personal finance to more school curricula gives urgency to developing national standards for instruction. Our hope is that the publication of the standards in this report will help guide school administrators, teachers, curriculum developers, and other parties charged with instilling personal financial literacy.

## Developing the Standards

The six standards presented in this report are the scaffolding for a body of knowledge and skills that should be contained in a personal finance curriculum. Each standard is an overarching statement of content, to which we have attached multiple age-appropriate benchmarks as a means of evaluating students' mastery. To make the standards as accessible as possible, they have been designed to apply to all socioeconomic student groups. The standards do not assume prior economic or financial knowledge and are written in deliberately nontechnical language so that they can be taught by teachers who are not trained in personal finance and economics.

At the same time, the standards are geared toward deepening students' understanding of personal finance through an economic perspective, and accordingly are designed to develop a curriculum that is not only practical but academically sound. We strongly believe that a basic understanding of economics provides a critical framework for making informed decisions about budgeting, saving, and investing. In learning basic economics, students come to appreciate that choices have costs and benefits, and that it is often necessary to sort through complex information and weigh multiple costs and benefits before arriving at a decision. Indeed, it would be fair to say that a systematic approach to decision making acquired in studying economics permeates virtually all aspects of life.

Implicit in this approach is an emphasis on the role that economics plays in the functioning of financial markets. Financial choices rarely occur in isolation. As a rule, investment decisions must be made in the context of markets. A better understanding of markets should result in more informed financial decisions. For example, investors may be offered a chance to buy a bond that pays an interest rate well above that paid by an insured account at a bank. If investors understand that riskier borrowers must pay a higher rate of interest, they know that the bond is probably riskier than the bank account. Financially illiterate investors who do not understand this trade-off may unwittingly take on an inappropriate level of risk. Financially literate investors may also decide to take on the risk, but they understand and, more importantly, knowingly accept and plan for the consequences of this risk. Furthermore, those investors are more likely to understand the risk-reward trade-off of new financial instruments as they become available-or at least realize what they need to understand.

## The Benefits of Financial Literacy

Ultimately, increased personal financial literacy will change student behavior. Students will learn how their personal situations and preferences affect their financial decision
making—and will also begin to understand the trade-offs inherent in every choice they make. For example, some individuals will save more for retirement; some will save less. Sound financial decision making does not dictate blindly throwing money into a retirement fund. Rather, it means asking oneself what lifestyle is desired at retirement and then determining what must be sacrificed today to achieve tomorrow's goals. In the end, more informed choices lead to better choices as well as greater satisfaction with the choices that are made.

These changes in behavior pay dividends to society as well. People who work, spend, save, borrow, invest, and manage risk wisely are less likely to require a government rescue. To be sure, financial literacy does not eliminate the need for a social safety net; even the most prudent individual can encounter financial difficulties. Government also necessarily regulates financial markets to prevent illegal or abusive practices and to ensure disclosure of pertinent financial information. However, most of the responsibility for managing financial matters rests with the individual. That responsibility is easier for adults to bear when they have learned the basics of personal finance in their youth.

## Background and Acknowledgments

The creation of national standards for financial literacy has been a truly collaborative process. The idea for standards arose out of a conference, "Assessment and Evaluation of K-12 Personal Finance and Economic Education in the 21st Century: Knowledge, Attitudes, and Behavior," held at the Federal Reserve Bank of St. Louis in May 2011. CEE subsequently organized a planning meeting in October of that year.

The Writing Committee that emerged from that planning session reviewed many documents, including the Department of Treasury's "Financial Education Core Competencies;" "Money as You Grow," developed by the President's Advisory Council on Financial Capability; PISA's "2012 Financial Literacy Assessment Framework;" and a wide variety of state standards as well as the Jump\$tart Coalition for Personal Financial Literacy's National Standards in K-12 Personal Financial Education. While these documents were helpful in providing the Writing Committee a perspective on other experts' views, none of the documents fully achieved the goals the committee established.

Each writer on the committee was assigned a standard to complete. The Economic and Financial Literacy Educators Review Committee, which was composed of university professors and educational professionals who train K-12 teachers, and the Educator Review Committee (the teachers themselves) provided feedback. The document also benefitted greatly from comments received by the Review Committee, which consisted of nationally recognized experts from academic institutions, the Federal Reserve, and private business. Various iterations of the standards were also vetted by groups such as the National Association of Economic Educators and the National Association of State Boards of Education. A draft was presented at a conference sponsored by the American Economic Association's Committee on Economic Education in May 2012. The final draft was submitted to CEE in November.

CEE expresses its appreciation in particular to the members of the Writing Committee for their significant role in bringing these standards to life. Also, project director William Bosshardt exhibited extraordinary guidance, leadership, and patience in coordinating the various components of this project, and we sincerely thank him for his contribution to this document. Finally, CEE gratefully acknowledges 1st Financial Bank USA for its support of this project and its commitment to financial literacy.

## References

Council for Economic Education. 2011. Survey of the States 2011: The State of Economic and Personal Finance Education in Our Nation's Schools. http://www.councilforeconed.org/ news-information/survey-of-the-states/
"Department of Treasury, Financial Education Core Competencies." Federal Register, vol. 75, no. 165 (2010): 52596. http://www.gpo.gov/fdsys/pkg/FR-2010-08-26/pdf/201021305.pdf

Jump\$tart Coalition for Personal Financial Literacy. 2007. "National Standards in K-12 Personal Finance Education." http://jumpstart.org/national-standards.html

Organisation for Economic Co-operation and Development. 2012. PISA 2012 Financial Literacy Assessment Framework. http://www.oecd.org/pisa/pisaproducts/46962580.pdf

President's Advisory Council on Financial Capability. "Money as You Grow: 20 Things Kids Need to Know to Live Financially Smart Lives." http://moneyasyougrow.org/

## Brief Guide to the Standards

The standards are formatted as follows:

## Standard Topic

The standard is an overarching statement from which the benchmarks are built.

## Concept Progression

A paragraph provides a rationale for how the benchmarks were constructed and describes the development of the concepts through the grade levels.

## Benchmarks: Grades 4, 8, 12

| At the completion of Grade 4, <br> students will know that: | At the completion of Grade 4, <br> students will use this knowledge to: |
| :--- | :--- |
| Benchmarks are listed for each grade <br> level. | Examples of how understanding might be <br> demonstrated by the student are given. |

## Using Decision-Making Skills: Topic

Economics is about making decisions. To help students understand how to make better decisions, the process is described in a systematic way through an example using the knowledge outlined in the benchmarks to make a decision within the context of the topic. The decision-making skill is divided into three steps as shown below. Each step is described for the example.

Planning and Goal Setting: This section discusses the information needed to plan for and achieve goals.

Making the Decision: This section identifies the costs and benefits associated with the decision and addresses how to compare costs and benefits before making the decision.

Assessing Outcomes: This section addresses how results are measured and when the decision might need to be reconsidered.

## Other Topic-Related Choices: Grades 4, 8, 12

Questions are provided to illustrate how the decision-making skills and content in the standard can be applied to answer practical questions or to address specific issues.

## Summary of the Standards

I. Earning Income Income for most people is determined by the market value of their labor, paid as wages and salaries. People can increase their income and job opportunities by choosing to acquire more education, work experience, and job skills. The decision to undertake an activity that increases income or job opportunities is affected by the expected benefits and costs of such an activity. Income also is obtained from other sources such as interest, rents, capital gains, dividends, and profits.
II. Buying Goods and Services People cannot buy or make all the goods and services they want; as a result, people choose to buy some goods and services and not buy others. People can improve their economic well-being by making informed spending decisions, which entails collecting information, planning, and budgeting.
III. Saving Saving is the part of income that people choose to set aside for future uses. People save for different reasons during the course of their lives. People make different choices about how they save and how much they save. Time, interest rates, and inflation affect the value of savings.
IV. Using Credit Credit allows people to purchase goods and services that they can use today and pay for those goods and services in the future with interest. People choose among different credit options that have different costs. Lenders approve or deny applications for loans based on an evaluation of the borrower's past credit history and expected ability to pay in the future. Higher-risk borrowers are charged higher interest rates; lower-risk borrowers are charged lower interest rates.
V. Financial Investing Financial investment is the purchase of financial assets to increase income or wealth in the future. Investors must choose among investments that have different risks and expected rates of return. Investments with higher expected rates of return tend to have greater risk. Diversification of investment among a number of choices can lower investment risk.
VI. Protecting and Insuring People make choices to protect themselves from the financial risk of lost income, assets, health, or identity. They can choose to accept risk, reduce risk, or transfer the risk to others. Insurance allows people to transfer risk by paying a fee now to avoid the possibility of a larger loss later. The price of insurance is influenced by an individual's behavior.

## Earning Income

## Students will understand that:

Income for most people is determined by the market value of their labor, paid as wages and salaries. People can increase their income and job opportunities by choosing to acquire more education, work experience, and job skills. The decision to undertake an activity that increases income or job opportunities is affected by the expected benefits and costs of such an activity. Income also is obtained from other sources such as interest, rents, capital gains, dividends, and profits.

## Concept Progression

This standard focuses on income earned or received by people. The primary focus at the 4th grade level is to describe different types of jobs as well as different forms of income earned or received. Attention at the 8th grade level turns to the benefits and costs of increasing income through the acquisition of education and skills. Government programs that affect income are introduced. The 12th grade level gives further emphasis to types of income and taxes, highlights benefit-cost decisions related to jobs and careers, and introduces labor markets.

## Benchmarks: Grade 4

| At the completion of Grade 4, students will know <br> that: | At the completion of Grade 4, students will use <br> this knowledge to: |
| :--- | :--- | :--- |
| 1.People have many different types of jobs from <br> which to choose. Different jobs require people to <br> have different skills. | Make a list of different types of jobs and describe the <br> different skills associated with each job. |
| 2. People earn an income when they are hired by an |  |
| employer to work at a job. |  |$\quad$| Explain why employers are willing to pay people to do |
| :--- |
| their work. |$|$| 3.Workers are paid for their labor in different ways <br> such as wages, salaries, or commissions. | Explain how a waitress, a teacher, and a realtor are <br> paid. |
| :--- | :--- | :--- |
| 4.People can earn interest income from letting other <br> people borrow their money. | Explain why banks and financial institutions pay <br> people interest when they deposit their money at <br> those institutions. |
| 5.People can earn income by renting their property <br> to other people. | Identify different types of property (such as <br> apartments, automobiles, or tools) that people own <br> and on which rent is paid. |


| 6. People who own a business can earn a profit, |
| :--- | :--- | :--- |
| which is a source of income. |$\quad$| Calculate the profit from a business with the |
| :--- |
| information provided on the business's costs and |
| revenues. |

## Benchmarks: Grade 8

At the completion of Grade 8, students will know the Grade 4 benchmarks for this standard and also that:

At the completion of Grade 8, students will use this knowledge to:

| 1. Careers are based on working at jobs in the same occupation or profession for many years. Different careers require different education and training. | Interview individuals and create a timeline that shows the education, training, and job experiences that occurred as the individuals progressed through different stages of their careers. |
| :---: | :---: |
| 2. People make many decisions over a lifetime about their education, jobs, and careers that affect their incomes and job opportunities. | Conduct research on a specific career. Describe the education, job, or career decisions individuals in this field might make over their lifetime and explain how this could affect their incomes and job opportunities. |
| 3. Getting more education and learning new job skills can increase a person's human capital and productivity. | Explain how taking a babysitting class or getting lifeguard training can improve a young person's human capital or productivity. |
| 4. People with less education and fewer job skills tend to earn lower incomes than people with more education and greater job skills. | Gather data on the average wage or salary for different jobs and explain how they differ by the level of education, job skill, or years of experience. |
| 5. Investment in education and training generally has a positive rate of return in terms of the income that people earn over a lifetime. | Using data on the lifetime earnings of workers with different levels of education, explain why adults with a college education typically earn more than adults with only a high school education. |
| 6. Education, training, and development of job skills have opportunity costs in the form of time, effort, and money. | Describe the opportunity costs of attending a training course on babysitting, lifeguarding, or first aid. |
| 7. People often use a portion of their savings to help themselves or their family members build human capital through education or job training. | Explain why older family members such as parents might choose to use their savings to support the education and training of younger family members. |

$\left.\begin{array}{|l|l|}\hline \text { 8. Entrepreneurs take the risk of starting a business } \\ \text { because they expect to earn profits as their } \\ \text { reward, despite the fact that many new businesses } \\ \text { can and do fail. Some entrepreneurs gain } \\ \text { satisfaction from working for themselves. }\end{array} \quad \begin{array}{l}\text { Name a local business that recently failed as well as a } \\ \text { business that has been successful. Speculate on why } \\ \text { one business was successful and the other was not. } \\ \text { Investigate what causes people to start their own } \\ \text { businesses or to become self-employed. }\end{array}\right\}$

## Benchmarks: Grade 12

At the completion of Grade 12, students will know the Grade 4 and Grade 8 benchmarks for this

## standard and also that:

1. People choose jobs or careers for which they are qualified based on the income they expect to earn and the benefits, such as health insurance coverage or a retirement plan, that they expect to receive.

## At the completion of Crade 12, students will use

 this knowledge to:Conduct research and create a list of potential income and employee benefits packages that are likely to be offered by different companies, government agencies, or not-for-profit organizations for a new worker in an occupation. Explain what decisions workers are likely to have to make regarding benefits.

Identify non-income factors that influence career or job choice by interviewing three individuals who work at different jobs.

Explain how people's willingness to wait or plan for the future affects their decision to get more education or job training in a dynamic and changing labor market.

Speculate how a high school student might assess the future benefits of going to college, and describe how that assessment will affect the student's decision to attend college.

Compare the benefits and costs of a college education to those of a technical school.

Compare the unemployment rates of workers with different levels of education.
$\left.\begin{array}{|l|l|l|}\hline \text { 5. } \begin{array}{l}\text { The wage or salary paid to workers in jobs } \\ \text { is usually determined by the labor market. } \\ \text { Businesses are generally willing to pay more } \\ \text { productive workers higher wages or salaries than } \\ \text { less productive workers. }\end{array} & \begin{array}{l}\text { Explain why wages or salaries vary among workers in } \\ \text { different types of jobs and among workers in the same } \\ \text { jobs. }\end{array} \\ \hline \text { 6. } \begin{array}{l}\text { Changes in economic conditions or the labor } \\ \text { market can cause changes in a worker's income or why the productivity of workers is important to } \\ \text { may cause unemployment. }\end{array} & \begin{array}{l}\text { Explain how an increase in the demand for mobile } \\ \text { apsinesses. }\end{array} \\ \text { aplications might impact the wages paid to software } \\ \text { developers. }\end{array}\right\}$

## Using Decision-Making Skills: Job and Career Choices

Planning and Goal Setting: People's choices of jobs and careers affect their income and quality of life. Choices about jobs and careers are often influenced by the level of education, the extent of work experience, the types of job skills, or the amount of job training required for a person to do that job or career. To make an informed decision, people have to gather sufficient information about possible jobs or careers. This information can include the wage or salary and benefits associated with the job or career together with opportunity costs associated with the education or training for that job or career.

Making the Decision: With information in hand, people then weigh the costs and benefits and make a choice. After having made a job or career choice, people then need to acquire the skills, training, and education necessary to enter that job or career. This investment in human capital requires further planning and goal setting. It may also require saving, borrowing, and risk taking to finance this investment in human capital.

Assessing Outcomes: Once people have a job or enter a career, they still must decide if they are satisfied with their choice. If they like their job, people may want further advancement that may require more education or job training so they can earn more income, obtain a promotion, or gain more work responsibility. On the other hand, people can become dissatisfied with their choice because they did not obtain the expected benefits or because their interests or circumstances changed. If they don't like their job, they may decide to change jobs or careers because the benefits of staying in the same job or career are not worth the costs. Other jobs or other careers may be more suitable.

## Other Income-Related Choices

## 4th Grade

- What type of work do you want to do when you grow up?
- How do you get prepared for your desired career or job?
- Why would you want to start a business of your own?


## 8th Grade

- Would you like to work for someone else or start your own business and work for yourself?
- What part-time jobs or volunteer work can you do now to explore jobs or careers you might want to pursue in the future?
- Why is it important to graduate from high school rather than dropping out?


## 12th Grade

- Should you get a summer job? Should you work during the school year?
- What type of postsecondary education do you want? What will be the expected costs and benefits of that education?
- How many hours a week do you want to work? How important is leisure time to you?
- What types of fringe benefits are important to you? How valuable are these benefits?
- What kinds of education or training will best help you advance in a job or a career in which you are interested?


## Buying Goods and Services

## Students will understand that:

People cannot buy or make all the goods and services they want; as a result, people choose to buy some goods and services and not buy others. People can improve their economic wellbeing by making informed spending decisions, which entails collecting information, planning, and budgeting.

## Concept Progression

The 4th grade benchmarks introduce the concepts of scarcity, choice, and opportunity cost. Factors that influence spending choices, such as advertising, peer pressure, and spending choices of others, are analyzed. Attention is given to comparing the costs and benefits of spending decisions. The basics of budgeting and planning are introduced. The 8th grade benchmarks expand upon these concepts. More attention is paid to making a spending decision. Payment methods are introduced along with the importance of weighing the costs and benefits of each. Budgeting is discussed in more detail, including the classification of expenses. The 12th grade benchmarks frame a consumer's decision using economic ideas such as satisfaction, determinants of demand, costs of information search, choice of product durability and other features, and the role of government and other institutions in providing information for consumers.

## Benchmarks: Grade 4

## At the completion of Grade 4, students will know that:

1. Economic wants are desires that can be satisfied by consuming a good, a service, or a leisure activity.
2. People make choices about what goods and services they buy because they can't have everything they want. This requires individuals to prioritize their wants.
3. People spend a portion of their income on goods and services in order to increase their personal satisfaction or happiness.

At the completion of Grade 4, students will use this understanding to:

Brainstorm a list of wants and then identify examples of goods, services, or leisure activities they can buy to satisfy each want.

Create a list of goods or services they want given a set budget constraint, rank the goods and services from the most to the least desired, and justify their ranking.

Explain why consumers with identical vacation budgets choose different options when planning a weeklong vacation.

| 4. Whenever people buy something, they incur an |  |
| :--- | :--- | :--- |
| opportunity cost. Opportunity cost is the value of <br> the next best alternative that is given up when a <br> person makes a choice. | Present an example of a buying choice a person made <br> and identify the opportunity cost of that choice. |
| 5.Informed decision making requires comparing <br> the costs and benefits of spending alternatives. <br> Costs are things that a decision maker gives <br> up; benefits are things that a decision maker <br> gains. | Compare the costs and benefits of buying a bicycle <br> in two settings, rural and urban, and for different <br> people including a younger child, a teenager, and a <br> grandparent. |
| 6.People's spending choices are influenced by <br> prices as well as many other factors, including <br> advertising, the spending choices of others, and <br> peer pressure. | Write stories about how individual spending choices <br> were informed or influenced by advertising, the <br> spending choices of others, peer pressure, or the prices <br> of alternative choices. |
| 7.Planning for spending can help people make <br> informed choices. A budget is a plan for <br> spending, saving, and managing income. | Explain why shopping with a list can help consumers <br> with their spending choices. |

## Benchmarks: Grade 8

## At the completion of Grade 8, students will know the Grade 4 benchmarks for this standard and also that:

1. When making choices about what to buy, consumers may choose to gather information from a variety of sources. The quality and usefulness of information provided by sources can vary greatly from source to source. While many sources provide valuable information, some sources provide information that is deliberately misleading.
2. By understanding a source's incentives in providing information about a good or service, a consumer can better assess the quality and usefulness of the information.
3. People choose from a variety of payment methods in order to buy goods and services.
4. Choosing a payment method entails weighing the costs and benefits of the different payment options.

## At the completion of Grade 8, students will use this knowledge to:

Gather information for an electronic good from sources such as manufacturers' websites, retail websites, and consumer review websites. Explain what information is most helpful in making their decision.

Search the Internet and print materials and identify deceptive selling practices.

Explain why advice from a source such as a salesperson may or may not be useful when deciding which product to buy.

Explain how they would use the following payment methods to purchase a good or service: cash, check, debit card, credit card, mobile phone, online payment, prepaid card, layaway, and rent to own.

Choose the best payment method for the following purchases by weighing the costs and benefits of various payment options: ticket to a concert, food at a convenience store, airline ticket, cell phone bill, beverage at a middle school basketball game, and car payment.
$\left.\begin{array}{|ll|l|}\hline \text { 5. A budget includes fixed and variable expenses, as } \\ \text { well as income, savings, and taxes. }\end{array} \quad \begin{array}{l}\text { Prepare a monthly budget for a family given their } \\ \text { income, savings goals, taxes, and list of fixed and } \\ \text { variable expenses. }\end{array}\right\}$

## Benchmarks: Grade 12

## At the completion of Grade 12, students will know the Grade 4 and Grade 8 benchmarks for this standard and also that:

1. Consumer decisions are influenced by the price of a good or service, the price of alternatives, and the consumer's income as well as his or her preferences.
2. When people consume goods and services, their consumption can have positive and negative effects on others.
3. When buying a good, consumers may consider various aspects of the product including the product's features. For goods that last for a longer period of time, the consumer should consider the product's durability and maintenance costs.
4. Consumers may be influenced by how the price of a good is expressed.

| of a good is expressed. | advertise the price of a flat screen TV expressed as an <br> amount per day or week rather than the actual full price. <br> List different ways retailers use to express the prices of <br> their products. |
| :--- | :--- | :--- |
| 5.People incur costs and realize benefits when <br> searching for information related to their <br> purchases of goods and services. The amount of <br> information people should gather depends on <br> the benefits and costs of the information. | Write a newspaper column, "Tips for Consumers," <br> explaining why searching for information may be more <br> important when purchasing expensive, durable goods <br> and services than for inexpensive and nondurable <br> products. Include an explanation of how impulse <br> buying can be avoided by sleeping on a decision before <br> making a big purchase. |
| 6.People may choose to donate money to <br> charitable organizations and other not-for-profits <br> because they gain satisfaction from donating. | Brainstorm a list of charitable organizations that <br> are operating in the students' community. For each <br> organization, list a possible reason that a donor might <br> want to give to that charitable organization. |
| 7.Governments establish laws and institutions <br> to provide consumers with information about <br> goods or services being purchased and to protect <br> consumers from fraud. | Draft a complaint letter to an appropriate firm or agency <br> about a problem the consumer has encountered with a <br> purchase. |

## Using Decision-Making Skills: Budgeting for Purchases

Planning and Goal Setting: A high school senior has many expenses, including yearbook, class ring, homecoming, graduation announcements, senior pictures, cap and gown, college visits and application fees, and numerous prom-related expenditures. In addition, students may be responsible for ongoing expenses such as car insurance, gas for their car, clothes, cell phone, entertainment, and personal care items. Managing all of these expenses can be a bit daunting without some planning. When they generate a list of ongoing expenses and those specifically related to their senior year, students are often surprised at how extensive the list is. By establishing goals for their senior year and prioritizing the items on their list according to what is most important to them, students can begin the process of creating a senior year budget.

Making the Decision: Establishing a budget requires students to commit to live within their income and not expand that income indefinitely by using credit or asking parents for money. It also helps students determine which high school expenses they can afford and which they will have to forego. The first steps in creating a senior year budget are very similar to creating a budget for a household. This requires gathering information on sources of income (gifts, wages, and help from parents) and estimating their expenses (divided into fixed and variable). Next, income and expenses are separately totaled; then expenses are subtracted from income. A positive number allows students to make choices on how to allocate these funds by considering the costs and benefits of their options. A negative number requires further planning: making choices on how to decrease expenses and/or increase their income and determining what trade-offs can be made.

Assessing Outcomes: Budgets are dynamic. Circumstances change over time, requiring budget adjustments. For example, the price of the yearbook or class ring might be more than originally planned, or cost of car insurance might increase. Incomes can change for a variety of reasons, such as hours are reduced at a part-time job, gift money received is smaller than expected, or parents are unable to provide the level of financial support anticipated. Each of these has an impact on a budget. Reviewing budgets regularly allows students to make adjustments. They may identify problems that require further planning, or they may be able to reallocate dollars to reach more of their senior year goals.

## Other Spending-Related Choices

## 4th Grade

- What would you choose as a present for a parent, brother, or sister?
- What would you do with money received as a birthday gift? What is the opportunity cost of your choice?


## 8th Grade

- If you wanted a new electronic game console, which one would you choose?
- What would you consider when deciding among different cell phone plans?
- How many stores or websites should you visit before buying a pair of shoes? How many before you buy a new computer?


## 12th Grade

- Which is the best way to get to your part-time job: taking public transportation, riding your bike, or borrowing your parent's car?
- If you decide to go to college, which is the best choice of where to live: at home, in an apartment, or in a dorm?
- Where will you take your boy/girlfriend out for a date?
- Should you buy a house or rent an apartment?
- How would you choose between two similar apartments based on clauses in the lease?
- If you need a car, what would you choose to do: buy a new car, lease a new car, or buy a used car?


## Students will understand that:

Saving is the part of income that people choose to set aside for future uses. People save for different reasons during the course of their lives. People make different choices about how they save and how much they save. Time, interest rates, and inflation affect the value of savings.

## Concept Progression

At the 4th grade level, the primary focus is for students to understand the concept of saving. Students should know how people save money, where people can save money, and why people save money, as well as the concept of interest. At the 8th grade level, the focus turns to the role that financial institutions play as intermediaries between savers and borrowers as well as the role government agencies such as the Federal Deposit Insurance Corporation (FDIC) play in protecting savings deposits. The role of markets in determining interest rates is introduced. Finally, the mathematics of saving is covered, including the power of compound interest. All of this is framed around the choices people make about how much to save. At the 12th grade level, more complex concepts are introduced, such as real versus nominal interest rates, present versus future value, financial regulators, the factors determining the value of a person's savings over time, automatic savings plans, "rainy-day" funds, and saving for retirement.

## Benchmarks: Grade 4

| At the completion of Grade 4, students will know <br> that: | At the completion of Grade 4, students will use <br> this knowledge to: |
| :--- | :--- |
| 1. Income is saved, spent on goods and services, or |  |
| used to pay taxes. |  | | Explain the difference between saving and spending |
| :--- |
| and give examples of each. |


| 5. A savings plan helps people reach their savings |
| :--- | :--- | :--- |
| goals. |$\quad$| Select a savings goal and identify steps to take in order |
| :--- |
| to reach that savings goal. |

## Benchmarks: Grade 8

## At the completion of Grade 8, students will know the Grade 4 benchmarks for this standard and also that:

1. Banks and other financial institutions loan funds received from depositors to borrowers. Part of the interest received from these loans is used to pay interest to depositors for the use of their money.

## At the completion of Grade 8, students will use this knowledge to:

Draw and label a diagram showing the role that financial institutions play in channeling funds from savers to borrowers.

Conduct research into the interest rate paid on savings and charged for loans by financial institutions in their community and create a classroom bulletin board summarizing their findings.

Define an interest rate as the price paid for using someone else's money, expressed as a percentage of the amount saved.

Explain why banks that experience an increase in the number of people who want loans may decide to pay higher interest rates on deposits.

Calculate the total amount of interest earned on two certificates of deposit—one with a higher rate of interest than the other-and explain how the certificate of deposit with the higher interest rate can help a saver reach his or her savings goal faster.
5. Principal is the initial amount of money upon which interest is paid.
6. Compound interest is the interest that is earned not only on the principal but also on the interest already earned.

Differentiate between principal and interest.

Use the Rule of 72 to determine the number of years it will take for their savings to double in value.

Using a formula for compound interest, calculate how much two different savers, one who starts to save at age 21 and one who starts to save at age 35 , will have at retirement.
7. The value of a person's savings in the future is determined by the amount saved and the interest rate. The earlier people begin to save, the more savings they will be able to accumulate, all other things equal, as a result of the power of compound interest.

Predict which of two individuals will have more in savings for retirement when one individual has saved $\$ 2,000$ a year for the last 15 years before retirement and the other has saved \$1,000 a year for last 30 years before retirement, assuming each earns the same rate of interest.
8. Different people save money for different reasons, including large purchases (such as higher education, autos, and homes), retirement, and unexpected events. People's choices about how much to save and for what to save are based on their tastes and preferences.
9. To assure savers that their deposits are safe from bank failures, federal agencies guarantee depositors' savings in most commercial banks, savings banks, and savings associations up to a set limit.

Write a short story comparing the savings choices of a young college graduate to those of a married couple who recently celebrated their 40th birthdays and who have two children.

Identify the FDIC and the National Credit Union Administration (NCUA) as the government agencies responsible for insuring depositors' savings and state the limit of FDIC and NCUA coverage.

Explain why the bank-run scene in the movie It's a Wonderful Life is less likely to occur in today's world of insured banks.

## Benchmarks: Grade 12

| At the completion of Grade 12, students will know <br> the Grade $\mathbf{4}$ and Grade $\mathbf{8}$ benchmarks for this <br> standard and also that: | At the completion of Grade 12, students will use <br> this knowledge to: |
| :--- | :--- | :--- |
| 1.People choose between immediate spending and <br> saving for future consumption. Some people have <br> a tendency to be impatient, choosing immediate <br> spending over saving for the future. | Identify instances in their lives where they decided to <br> buy something immediately and then wished they had <br> instead saved the money for future purchases. |
| 2. |  |
| Inflation reduces the value of money, including <br> savings. The real interest rate expresses the rate of <br> return on savings, taking into account the effect <br> of inflation. The real interest rate is calculated <br> as the nominal interest rate minus the rate of <br> inflation. | Explain why savers expect a higher nominal interest rate <br> when inflation is expected to be high. |
| 3.Real interest rates typically are positive because <br> people expect to be compensated for deferring <br> the use of savings from the present into the future. <br> Higher interest rates increase the rewards for saving. | Explain how saving can result in getting more goods <br> and services in the future. |
| 4.The nominal interest rate tells savers how the dollar <br> value of their savings or investments will grow; the <br> real interest rate tells savers how the purchasing <br> power of their savings or investments will grow. | Given the nominal interest rate and the rate of inflation <br> over the course of one year, explain what will happen to to <br> the purchasing power of savings. |
| 5.Money received (or paid) in the future can be <br> compared to money held today by discounting <br> the future value based on the rate of interest. | Use spreadsheet software to calculate the amount a <br> 10-year-old would need to save today in order to pay <br> for one year of college tuition eight years from now. |
| 6.Government agencies supervise and regulate <br> financial institutions to help protect the safety, <br> soundness, and legal compliance of the nation's <br> banking and financial system. | Explain the role that government agencies charged <br> with regulating financial institutions play in helping to <br> protect the safety, soundness, and legal compliance of <br> the nation's banking system. These agencies include the <br> Federal Reserve Sysem, the Office of the Comptroller <br> of the Currency, the Consumer Financial Protection <br> Bureau, the FDIC, and state banking departments. |


| 7. | Government policies create incentives and <br> disincentives for people to save. | Explain why traditional IRAs (individual retirement <br> accounts), Roth IRAs, and educational savings accounts <br> provide incentives for people to save. |
| :--- | :--- | :--- |
| 8. | Employer benefit programs create incentives and <br> disincentives to save. Whether or how much an | Explain why matches of retirement savings by <br> employers substantially change the incentives for <br> employee decides to save can depend on how <br> employees to save. |
| the alternatives are presented by the employer. |  |  |$\quad$| Explain why having employees "opt out" of savings |
| :--- |
| programs results in a higher level of saving than having |
| them "opt in." |

## Using Decision-Making Skills: Saving for Postsecondary Education

Planning and Goal Setting: Families make important decisions about how much to save and how much to spend. Some of the most important savings decisions that families must make are how to save and how much to save for the postsecondary education of their children. How much is saved by the parents and how much is saved by the children are determined by many factors including the parents' income, the level of real interest rates, the earning capacity of the children, the number of children in the family, the postsecondary aspirations of the children, and the availability to the family of alternative means of funding postsecondary goals. With each paycheck (or other source of income), parents and children alike are faced with the choice of how much of that money they will save toward college or other postsecondary education and how much they will spend. They need to consider their current wants in comparison to their savings goals, including postsecondary education. To make these important decisions, they will collect information about the costs and benefits associated with different postsecondary education options and information about savings and spending alternatives.

Making the Decision: After collecting information about the costs and benefits associated with different postsecondary education options as well as information about other savings and spending alternatives, parents and children will weigh those costs and benefits, and make a decision about how much of their income to save toward postsecondary education; how much to save for other savings goals, such as retirement; and how much to spend now.

Assessing Outcomes: After making a decision about how much of their income to save for postsecondary education, how much to save toward other savings goals, and how much to spend, families will assess the benefits of their spending and saving. They will assess the degree to which their decision got them closer to their savings goals, including postsecondary education, and the amount of benefit they received from their spending choices. They will then use these assessments when making spending and savings decisions in the future.

## Other Saving-Related Choices

## 4th Grade

- Where do you choose to put your savings?
- How can you save enough money to reach your savings goal?
- How much should you save and how much should you spend?


## 8th Grade

- How long are you willing to wait to reach your savings goal?
- Where will you save your money?
- How can you save to buy your mother or father a birthday gift?
- What are you willing to give up to be able to save more in order to reach a savings goal?


## 12th Grade

- How do your saving and spending decisions change when government policies or employee benefit programs change?
- How much should you save from each of your paychecks for retirement?
- When should you start saving for retirement?
- Should parents decide to put off saving for retirement in order to save for their child's college education?
- How much do you need to save to buy a car?



## Using Credit

## Students will understand that:

Credit allows people to purchase goods and services that they can use today and pay for those goods and services in the future with interest. People choose among different credit options that have different costs. Lenders approve or deny applications for loans based on an evaluation of the borrower's past credit history and expected ability to pay in the future. Higher-risk borrowers are charged higher interest rates; lower-risk borrowers are charged lower interest rates.

## Concept Progression

At the 4th grade level, students should understand the concept of credit and the cost of using credit-namely, the obligation to repay what is borrowed plus interest on the amount borrowed. Students should recognize that a reputation for repaying loans contributes to a person's ability to obtain loans in the future. At the 8th grade level, attention turns to why people use credit, the sources of credit, why interest rates vary across borrowers, and the reasons for using credit to invest in education and durable goods. Students should be able to make basic calculations related to borrowing, including principal and interest payments as well as compound interest. At the 12th grade level, the focus is on credit reports, credit scores, behaviors that contribute to strong credit reports and scores, and the impact of credit reports and scores on consumers. Consumer protection laws as they apply to credit and credit card use are also covered.

## Benchmarks: Grade 4

At the completion of Grade 4, students will know
that:

1. Interest is the price the borrower pays for using someone else's money.

At the completion of Grade 4, students will use this knowledge to:

Explain the reason why, when a person borrows $\$ 100$ to buy a new cell phone, he or she will have to pay back more than the $\$ 100$ at a future date.

Identify goods and services people often purchase with the use of a loan. of value now and agree to repay the lender over time, or at some date in the future, with interest.
3. By using credit to buy durable goods-such as cars, houses, and appliances-people are able to use the goods while paying for them.

Explain why people do not wait to buy a car until they have saved enough to pay for the car with cash.
4. Borrowers who repay loans as promised show that they are worthy of getting credit in the future. A reputation for not repaying a loan as promised can result in higher interest charges on future loans, if loans are available at all.

Explain why a student might refuse to lend lunch money to someone who didn't pay back lunch money that was borrowed previously.

Explain why a bank would charge more interest or decide not to lend to a borrower who has had problems repaying a loan in the past.

## Benchmarks: Grade 8

## At the completion of Grade 8, students will know the Grade 4 benchmarks for this standard and also that:

1. People who apply for loans are told what the interest rate on the loan will be. An interest rate is the price of using someone else's money expressed as an annual percentage of the loan principal.
2. The longer the repayment period on a loan and the higher the interest rate on the loan, the larger is the total amount of interest charged on a loan.

| 3. A credit card purchase is a loan from the financial |
| :--- | :--- |
| institution that issued the card. Credit card |
| interest rates tend to be higher than rates for |
| other loans. In addition, financial institutions may |
| charge significant fees related to a credit card and |
| its use. |

4. Borrowers who use credit cards for purchases and who do not pay the full balance when it is due pay much higher costs for their purchases because interest is charged monthly. A credit card user can avoid interest charges by paying the entire balance within the grace period specified by the financial institution.
5. Various financial institutions and businesses make consumer loans and may charge different rates of interest.

|  | savings and loans, as well as loans obtained through a <br> variety of other businesses ranging from payday loan <br> stores and pawn shops to credit extended directly by <br> the seller. |
| :--- | :--- |
| 6. Interest rates on loans fluctuate based on <br> changes in the market for loans. | Explain why mortgage interest rates might be lower <br> when people are more reluctant to buy houses. |

7. Lenders charge different interest rates based on the risk of nonpayment by borrowers. The higher the risk of nonpayment, the higher the interest rate charged. The lower the risk of nonpayment, the lower the interest rate charged.
8. People can use credit to finance investments in education and housing. The benefits of using credit in this way are spread out over a period of time and may be large. The large costs of acquiring the education or housing are spread out over time as well. The benefits of using credit to make daily purchases of food or clothing are short-lived and do not accumulate over time.

As a banker, decide for each of three potential borrowers with different credit backgrounds whether to extend credit, and if so, what the interest rate should be. Write a decision letter to the borrower justifying the banker's decision.

Explain the benefits and costs when choosing to use credit to acquire an education, a smart phone, or a pair of jeans.

## Benchmarks: Grade 12

## At the completion of Grade 12, students will know the Grade 4 and Grade 8 benchmarks for this standard and also that:

1. Consumers can compare the cost of credit using the annual percentage rate (APR), initial fees charged, and fees charged for late payment or missed payments.
2. Banks and financial institutions sometimes compete by offering credit at low introductory rates, which increase after a set period of time or when the borrower misses a payment or makes a late payment.
3. Loans can be unsecured or secured with collateral. Collateral is a piece of property that can be sold by the lender to recover all or part of a loan if the borrower fails to repay. Because secured loans are viewed as having less risk, lenders charge a lower interest rate than they charge for unsecured loans.
4. People often make a cash payment to the seller of a good-called a down payment-in order to reduce the amount they need to borrow. Lenders may consider loans made with a down payment to have less risk because the down payment gives the borrower some equity or ownership right away. As a result, these loans may carry a lower interest rate.
5. Lenders make credit decisions based in part on consumer payment history. Credit bureaus record borrowers' credit and payment histories and provide that information to lenders in credit reports.

At the completion of Grade 12, students will use this knowledge to:

Use the APR, initial fees, late fees, nonpayment fees, and other relevant information to compare the cost of credit from various sources for the purchase of a product.

Explain why a bank may offer low-rate introductory credit offers. as a house for a mortgage or a car for a car loan.

Explain why lenders charge lower interest rates on mortgages as compared to unsecured loans.

Explain how a down payment reduces the total amount financed and why this reduces the monthly payment and/or the length of the loan.

Explain why a borrower who has made a down payment has an incentive to repay a loan or make payments on time.

List factors from an individual's credit history or credit application that may cause a lender to deny credit.

Explain what credit bureaus do.
\(\left.$$
\begin{array}{|ll|l|}\hline \text { 6. Lenders can pay to receive a borrower's credit } \\
\text { score from a credit bureau. A credit score is a } \\
\text { number based on information in a credit report } \\
\text { and assesses a person's credit risk. }\end{array}
$$ \quad \begin{array}{l}Explain the concept of a credit score and what it <br>

indicates about a borrower.\end{array}\right\}\)| Explain why certain factors, such as having many credit |
| :--- |
| cards with large lines of credit and large balances, might |
| hurt a credit score. | \left\lvert\, | 7. In addition to assessing a person's credit risk, |
| :--- | :--- |
| credit reports and scores may be requested and |
| used by employers in hiring decisions, landlords |
| in deciding whether to rent apartments, and |
| insurance companies in charging premiums. |$\quad$| Provide two examples of how having a good credit |
| :--- |
| score can benefit a person financially. |
| Explain why employers find it useful to hire someone |
| with a better credit score. |\right.

## Using Decision-Making Skills: High School—Choosing and Financing a Car

Planning and Goal Setting: Students in high school often want a car. Deciding what car to buy is the easy part. The tough part is deciding how to pay for that car. One option is for students to save until they can afford to buy the car. Of course, that involves giving up other things to save for the car-opportunity cost-and having to wait to be able to drive the car. If a car is the person's only means of transportation for work or school, saving and waiting may not be the best option. Students, with help from their parents, can get a loan from a bank, a credit union, the
car dealer, or perhaps a family member. Getting a loan requires students to do some homework. They must decide whether or not to make a down payment on the car. A down payment will make the monthly payment lower and the overall interest paid for the car less, but they give up the interest they would earn on the down payment amount if they kept it in their savings account. If they decide to obtain a loan from a bank, credit union, or car dealer, they have more homework to do. What are the APRs being offered for each loan from each lender? What is the term of the loan? What's the best option for them?

Making the Decision: Once they have done all their homework, students can compare the information they have gathered, evaluate the costs and benefits of each loan, and select the payment option that is best for them.

Assessing Outcomes: After purchasing the car and driving it, the student could be very satisfied with the car and the loan. On the other hand, the car may have more maintenance issues or achieve poorer gas mileage than originally thought. Ideally, the student will have the loan paid off long before the car starts making funny noises or leaking oil. Eventually, the costs of keeping the car will exceed the benefits, and the student will have to make another set of decisions.

## Other Credit-Related Choices

## 4th Grade

- Would you charge your brother or sister interest on the $\$ 5$ loan you made to him or her?


## 8th Grade

- Would you purchase a new bicycle if you have only saved enough to pay part of the price for the new bicycle?
- Would you lend money to a friend?


## 12th Grade

- How would you finance your postsecondary education given expected future earnings for your career choice?
- Which type of credit card is best for you?
- What kind of mortgage financing should a newly married couple choose when buying a home?


## Financial Investing

## Students will understand that:

Financial investment is the purchase of financial assets to increase income or wealth in the future. Investors must choose among investments that have different risks and expected rates of return. Investments with higher expected rates of return tend to have greater risk. Diversification of investment among a number of choices can lower investment risk.

## Concept Progression

At the 4th grade level, students begin to understand that investment means using resources to expand an individual's or business's abilities to produce in the future. A financial investment is using one's savings to purchase financial assets with the goal of increasing one's income and/or wealth in the future. At the 8th grade level, students will understand the variety of possible financial investments and be able to calculate rates of return. At the 12th grade level, students are expected to be able to explain the relevance of and to calculate real and after-tax rates of return. They will be able to discuss how markets cause rates of return to change in response to variation in risk and maturity. Students will explain how diversification can reduce risk. Students will understand how financial markets react to changes in market conditions and information.

## Benchmarks: Grade 4

| At the completion of Grade 4, students will know <br> that: | At the completion of Grade 4, students will use <br> this knowledge to: |
| :--- | :--- |
| 1. After people have saved some of their income, <br> they must decide how to invest their savings so <br> that it can grow over time. | Describe the difference between saving and financial <br> investing. |
| 2. A financial investment is the purchase of a <br> financial asset such as a stock with the expectation <br> of an increase in the value of the asset and/or <br> increase in future income. | Explain why a stockholder benefits if the company <br> produces an increasingly popular product. |

## Benchmarks: Grade 8

## At the completion of Grade 8, students will know

 the Grade 4 benchmarks for this standard and also that:1. Financial assets include a wide variety of financial instruments including bank deposits, stocks, bonds, and mutual funds. Real estate and commodities are also often viewed as financial assets.
2. Interest is received from money deposited in bank accounts. It is also received by owning a corporate or government bond or making a loan.
3. When people buy corporate stock, they are purchasing ownership shares in a business. If the business is profitable, they will expect to receive income in the form of dividends and/or from the increase in the stock's value. The increase in the value of an asset (like a stock) is called a capital gain. If the business is not profitable, investors could lose the money they have invested.
4. The price of a financial asset is determined by the interaction of buyers and sellers in a financial market.

## At the completion of Grade 8, students will use

 this knowledge to:Describe the differences among the different types of assets. Find the prices of a variety of current possible investments.

Calculate the amount of interest income received from depositing a certain amount of money in a bank account paying 1 percent per year and from owning a bond paying 5 percent per year.

Determine the amount of dividends paid from a selected stock and how much the price of the stock has appreciated or depreciated over the year.

Explain why the price of a stock might change if more individuals decide to purchase the stock. Explain why the price of a stock might change if more companies issue new shares of stock to raise new investment funds.
5. The rate of return on financial investments consists of interest payments, dividends, and capital appreciation expressed as a percentage of the amount invested.
6. Financial risk means that a financial investment has a range of possible returns, including possibilities of actual losses. Higher-risk investments have a wider range of possible returns.
7. The rate of return earned from investments will vary according to the amount of risk. In general, a trade-off exists between the security of an investment and its expected rate of return.

Calculate rates of return on a number of financial instruments taking into account interest, dividends, rents, and expected appreciation over time.

Compare the risk of an insured certificate of deposit with the risk of a purchase of a number of shares of stock. Explain the difference.

Compare rates of return of a variety of different investments and speculate on the amount of risk each of the investments entails.

## Benchmarks: Grade 12

## At the completion of Grade 12, students will know

 the Grade 4 and Grade 8 benchmarks for this standard and also that:1. The real return on a financial investment is the nominal return minus the rate of inflation.
2. Federal, state, and local tax rates vary on different types of investments and affect the after-tax rate of return of an investment.
3. Expenses of buying, selling, and holding financial assets decrease the rate of return from an investment.

| investment. |
| :--- | :--- |
| 4.Buyers and sellers in financial markets determine <br> prices of financial assets and therefore influence <br> the rates of return on those assets. |
| 5.An investment with greater risk than another <br> investment will commonly have a lower market <br> price, and therefore a higher rate of return, than <br> the other investment. |
| 6.Shorter-term investments will likely have lower <br> rates of return than longer-term investments. | rates of return than longer-term investments.

7. Diversification by investing in different types of financial assets can lower investment risk.

|  | suntan lotion business and a rain umbrella business. <br> The other investor owns two suntan lotion businesses. <br> Explain why a financial advisor might encourage a <br> client to include stocks, bonds, and real estate assets in <br> his or her portfolio. |
| :--- | :--- |
| 8. Financial markets adjust to new financial news. <br> Prices in those markets reflect what is known <br> about those financial assets. | Explain how prices of financial investments can adjust <br> when given specific news about a company's or <br> industry's future profitability. |
| 9.The prices of financial assets are affected by <br> interest rates. The prices of financial assets are also <br> affected by changes in domestic and international <br> economic conditions, monetary policy, and fiscal <br> policy. | Give an example of a change in interest rates affecting <br> the current value of a financial asset that pays returns <br> in the future. Explain why the current value increases <br> when interest rates fall. |


| 10. Investors should be aware of tendencies that people have that may result in poor choices. These include avoiding selling assets at a loss because they weigh losses more than they weigh gains and investing in financial assets with which they are familiar, such as their own employer's stock or domestic rather than international stocks. | Explain why investors may sell stocks that have gained in value, but hold ones that have lost value. Explain why this may not make sense. <br> Identify an example of why an investor may have a bias toward familiar investments and why this may or may not be a rational decision. |
| :---: | :---: |
| 11. People vary in their willingness to take risks. The willingness to take risks depends on factors such as personality, income, and family situation. | Explain how the portfolio of a retiree might differ from that of a young, single person. |
| 12. An economic role for governments exists if individuals do not have complete information about the nature of alternative investments or access to competitive financial markets. | Explain why it is important for individuals to have accurate information about a company's sales and profits when investing in that company. |
| 13. The Securities and Exchange Commission (SEC), the Federal Reserve, and other government agencies regulate financial markets. | Conduct research to learn about the SEC or the Federal Reserve and identify their roles in regulating financial markets. |

## Using Decision-Making Skills: Choosing Financial Investments

Planning and Goal Setting: Households and individuals define the purposes of investing and set appropriate goals. Once they have specified goals and the approximate amount of money they would like to have in the future, the next step is to choose investments. They identify when income from financial investments will likely be needed and use that information to decide on maturities of the investments. They also decide on the acceptable level of risk of possible financial investments. Once they have this information, households will face a series of trade-offs.

Making the Decision: For investments that will yield returns allowing a household to reach its goals, households will weigh the risk of investments versus the benefits. High-risk investments may well carry a higher expected return and may require less saving to reach a goal. However, this comes at a cost of perhaps not meeting the goal if the asset performs poorly.

Assessing Outcomes: Households periodically examine their investments to decide if they will reach their goals. They may readjust their financial investments or change the amount they are saving if they do not expect to reach their goals. How an investment has performed in the past is not what matters in choosing future investments. What matters in choosing an investment is the additional cost of the new investment compared with the additional potential revenues.

## Other Investing-Related Choices

## 4th Grade

- How should you invest your savings if the goal is to buy a birthday present for your parent next year?


## 8th Grade

- How should you invest your savings if you want to help pay for camp next summer?
- How should you invest your savings if the goal is to pay for postsecondary education?


## 12th Grade

- How should you invest your savings if the goal is to purchase a car in three years?
- How should you invest your savings if the goal is to buy a house in 10 years?
- How should you invest your savings if the goal is to provide retirement income?
- Under what circumstances should you select individual stocks, a mutual fund that is designed to earn higher than average rates of return, or a mutual fund that represents the entire stock market?
- What types of financial assets should you include in your retirement portfolio?


## Protecting and Insuring

## Students will understand that:

People make choices to protect themselves from the financial risk of lost income, assets, health, or identity. They can choose to accept risk, reduce risk, or transfer the risk to others. Insurance allows people to transfer risk by paying a fee now to avoid the possibility of a larger loss later. The price of insurance is influenced by an individual's behavior.

## Concept Progression

This standard builds an awareness of the ways in which wealth and income are vulnerable to loss from unexpected events. At the 4th grade level the primary focus is for students to be aware of financial risk and learn that individuals can reduce that risk by altering their behavior to reduce the likelihood and size of a loss. At the 8th grade level, the benchmarks introduce insurance (transfer of risk through risk pooling) as an option and emphasize that each option for managing risk (assume it, reduce it, insure it) entails a cost. The cost is often influenced by an individual's own behavior. The 8th grade benchmarks also introduce the risk associated with identity theft. At the 12th grade level the benchmarks expand the discussion of insurance contracts to consider how contract features encourage individuals to take steps to reduce the potential size of a loss. The 12th grade benchmarks also address more specific financial vulnerabilities with health, property/casualty, disability, and life insurance products. In addition, the 12th grade benchmarks focus on a wider range of personal information-sharing activities and how to protect against identity theft.

## Benchmarks: Grade 4

| At the completion of Grade 4, students will know <br> that: | At the completion of Grade 4, students will use <br> this knowledge to: |
| :--- | :--- |
| 1. Risk is the chance of loss or harm. | Give examples of the risk associated with activities <br> such as riding a bicycle, using a skateboard, or having <br> a pet. |
| 2. Risk from accidents and unexpected events is an |  |
| unavoidable part of daily life. | Write a newspaper article on an unexpected "bad" <br> event such as a tornado, car accident, or illness, <br> and describe the effect the event would have on <br> individuals and their families. |


| 3. Individuals can either choose to accept risk or |  |
| :--- | :--- | :--- |
| take steps to protect themselves by avoiding or <br> reducing risk. | Draw a poster depicting an age-appropriate activity <br> (e.g., owning and riding a bicycle) that illustrates how <br> to avoid risk of harm or loss (not riding the bike) or <br> how to reduce the chance of a bad event (riding in <br> a safe manner) and potential harm if the bad event <br> happens (wearing a bike helmet). |
| 4.One method to cope with unexpected losses is to <br> save for emergencies. | Give examples of events for which emergency savings <br> could offset financial losses. |

## Benchmarks: Grade 8

## At the completion of Grade 8, students will know the Grade 4 benchmarks for this standard and <br> also that:

## At the completion of Grade 8, students will use this knowledge to:

1. Personal financial risk exists when unexpected events can damage health, income, property, wealth, or future opportunities.
2. Insurance is a product that allows people to pay a fee (called a premium) now to transfer the costs of a potential loss to a third party.

Write a scenario describing how a storm blowing a tree onto a roof can impact a family's financial situation.

| 2.Insurance is a product that allows people to pay a <br> fee (called a premium) now to transfer the costs of <br> a potential loss to a third party. |
| :--- | :--- |

Explain why homeowners buy flood insurance for $\$ 300$ a year when the likelihood of a flood in their area is extremely low.
3. Insurance companies analyze the outcomes

Explain how homeowners who are covered by homeowners insurance "share" with other policyholders the risk of loss from fire or storm create insurance contracts (policies). By collecting damage. a relatively small amount of money, called a premium, from each policyholder on a regular basis, the company creates a pool of funds to compensate those individuals who experience a Identify key information that the insurance company would need to know to determine how large a premium to collect from each policyholder. large loss.
4. Self-insurance is when an individual accepts a risk and saves money on a regular basis to cover a potential loss.
5. Insurance policies that guarantee higher levels of payment in the event of a loss (coverage) have higher prices.

List examples of potential events and costs against which people might self-insure.

Explain how a deductible affects the payout on an auto insurance claim, and how the individual's choice of deductible affects the price of the policy at the time it is purchased.
6. Insurance companies charge higher premiums to

Explain why drivers who receive repeated speeding tickets will see their insurance premiums increase. the risk of monetary loss is greater for these individuals and events.
7. Individuals can choose to accept some risk, to take steps to avoid or reduce risk, or to transfer risk to others through the purchase of insurance. Each option has different costs and benefits.

Identify ways in which an automobile driver can avoid, reduce, or transfer the risk of being in an automobile accident.

Explain why people may prefer to purchase insurance against fire in their apartment, but self-insure to handle the cost of tooth cavities.
8. Social networking sites and other online activity can make individuals vulnerable to harm caused by identity theft or misuse of their personal information.

Identify ways that identity thieves can obtain someone's personal information.

List actions an individual can take to protect personal information.

## Benchmarks: Grade 12

At the completion of Grade 12, students will know the Grade 4 and Grade 8 benchmarks for this standard and also that:

At the completion of Grade 12, students will use this knowledge to:

1. Probability quantifies the likelihood that a specific event will occur, usually expressed as the ratio of the number of actual occurrences to the number of possible occurrences.
2. Individuals vary with respect to their willingness to accept risk. Most people are willing to pay a small cost now if it means they can avoid a possible larger loss later.
3. Judgment regarding risky events is subject to errors because people tend to overestimate the probability of infrequent events, often because they've heard of or seen a recent example.
4. People choose different amounts of insurance coverage based on their willingness to accept risk, as well as their occupation, lifestyle, age, financial profile, and the price of insurance.
5. People may be required by governments or by certain types of contracts (e.g., home mortgages) to purchase some types of insurance.
6. An insurance contract can increase the probability or size of a potential loss because having the insurance results in the person taking more risks. Policy features such as deductibles and copayments are cost-sharing features that encourage the policyholder to take steps to reduce the potential size of a loss (claim).
7. People can lower insurance premiums by behaving in ways that show they pose a lower risk.

Use the concept of probability to describe the likelihood of a bad event that could pose risk for a person.

Discuss whether or not a premium paid to insure against an accident that never happens is wasted.

Discuss how an extended warranty on a consumer product is like insurance. Evaluate the costeffectiveness of extended warranties on three consumer products: a new automobile, a smart phone, and a dishwasher, considering the likelihood that the product will fail, the cost of replacing the item, and the price of the warranty.

Given hypothetical profiles for three types of individuals who differ with respect to occupation, age, lifestyle, marital status, and financial profile, assess the types and levels of personal financial risk faced by each and make recommendations for appropriate insurance.

Explain why homeowners insurance is required by a lender when a homeowner takes out a mortgage.

Investigate their state's regulations regarding the amount of auto insurance that drivers are required to purchase.

Given an accident scenario, calculate the amount that would be paid on an insurance claim after applying exclusions and deductibles.

Explain why automobile owners with a low deductible on their automobile insurance may be less likely to lock their cars.

Explain why taking a safe-driving course can lower an auto insurance premium and why not smoking can lower a health insurance premium.

| 8. Health insurance provides funds to pay for health care in the event of illness and may also pay for the cost of preventive care. Large health insurance companies can often negotiate with doctors, hospitals, and other health care providers to obtain lower health care prices for their policyholders. | Compare the coverage and costs of hypothetical plans for a set of health care scenarios. <br> Using sample policyholder benefit statements, identify any negotiated discounts for health care services and determine the cost of health care in the absence of insurance. |
| :---: | :---: |
| 9. Disability insurance is income insurance that provides funds to replace income lost while an individual is ill or injured and unable to work. | Given a potential disability scenario for an individual, assess the extent of personal financial risk and determine whether disability insurance is appropriate for that individual. |
| 10. Property and casualty insurance (including renters insurance) pays for damage or loss to the insured's property and often includes liability coverage for actions of the insured that cause harm to other people or their property. | Contact an insurance company for an auto insurance quote on a given automobile (make, model, and year) and explain the different categories and levels of coverage in the policy. |
| 11. Life insurance benefits are paid to the insured's beneficiaries in the event of the policyholder's death. These payments can be used to replace wages lost when the insured person dies. | Create hypothetical profiles for three individuals who differ with respect to age, marital status, dependents, and occupation. Identify their vulnerability to income loss and make recommendations for life insurance coverage for each. |
| 12. In addition to privately purchased insurance, some government benefit programs provide a social safety net to protect individuals from economic hardship created by unexpected events. | Describe examples of government transfer programs that compensate for unexpected losses, including Social Security Disability benefits, Medicare, Medicaid, unemployment insurance, and workers' compensation. |
| 13. Loss of assets, wealth, and future opportunities can occur if an individual's personal information is obtained by others through identity theft and then used fraudulently. By managing their personal information and choosing the environment in which it is revealed, individuals can accept, reduce, and insure against the risk of loss due to identity theft. | Describe problems that can occur when an individual is a victim of identity theft. <br> Give specific examples of how online transactions, online banking, email scams, and telemarketing calls can make consumers vulnerable to identity theft. <br> Describe the conditions under which individuals should and should not disclose their Social Security number, account numbers, or other sensitive personal information. |
| 14. Federal and state regulations provide some remedies and assistance for victims of identity theft. | Recommend actions a victim of identity theft should take to limit losses and restore personal security. |

## Using Decision-Making Skills: Purchasing Auto Insurance

Planning and Goal Setting: Coping with the financial impact of unexpected events begins with a thoughtful assessment of risk by asking the question, "In what ways are a person or family financially vulnerable?" Auto insurance is a good example of a product that protects against several types of losses. An informed decision about how much insurance to purchase requires gathering information about the potential types of coverage under the policy and how each coverage option affects the total premium. An auto accident can damage one's car, a valuable asset. It can leave the car owner without reliable transportation while it is being repaired. The accident can damage other cars and property and cause personal harm to others involved in the accident. Auto insurance policies have features that cover all of these potential losses, and a purchaser can choose among different coverage levels and
deductibles. Different auto insurers will offer different premium quotes for each of these features. Those quotes will depend in part on the individual's driving record, as well as the make, model, and year of the car to be insured.

Making the Decision: Once all of the relevant information about the available insurance coverage has been gathered, insurance buyers must weigh the benefits and costs of the coverage options, relative to their budget. In this way, an informed decision can be made to purchase insurance to cover certain types and amounts of risk. At the same time, the individual can choose to handle remaining risk associated with owning an automobile by selfinsuring through reliance on savings and other financial assets. The price of insurance coverage can influence the related decision regarding whether or not to own a car and the type of car to own.

Assessing Outcomes: If a person purchases insurance for a bad event that doesn't occur, it does not mean that the insurance premium was wasted. But the financial vulnerability of individuals and families does change over time, creating a need to periodically reassess insurance decisions. Risk of injury and the potential size of loss associated with an accident can change with driving or commuting patterns, driving experience, and the type of car owned. Growing families with new (inexperienced) drivers face higher auto insurance costs because the risk of an accident is higher, as is the risk of liability for harm to others. Rising household income creates a need for greater income replacement should income be interrupted by disability or death resulting from an auto accident. However, increasing income and accumulated savings also make a higher deductible more attractive because smaller losses can be more easily self-insured (in exchange for lowering the insurance premium). Household risk management is an ongoing process of evaluating new risk exposure and determining the most cost-effective options to protect against the unexpected.

## Other Protecting-Related Choices

## 4th Grade

- What steps could you take to lower the risk of injury in a bicycle accident?


## 8th Grade

- What are the options and costs of insurance that would cover veterinary care for an injured pet dog or cat? Would reliance on savings be a better alternative?
- Should you share personal information when an Internet site asks for it? What types of sites would be appropriate for you to share more personal information, and on what types of sites should you share less information?


## 12th Grade

- For auto insurance, should you purchase collision insurance as well as liability coverage? How much liability coverage is appropriate for you? How much underinsured and uninsured motorist coverage is appropriate for you?
- How can you lower your auto insurance costs? Identify as many options as you can. For your circumstances, which of these options seem most helpful for accomplishing your goal within the next year? The next five years?
- Which health care insurance plan should you enroll in at work? How large a deductible should you choose? Should you opt for a cheaper plan with a restricted network of providers?
- Should you purchase extended warranty plans on cars, household appliances, or consumer electronic items such as TVs, laptops, or smart phones?
- Should you purchase an identity theft protection plan or rely solely on careful handling of your personal information in online transactions and social networking?

The Council for Economic Education is the leading organization in the United States that focuses on the economic and financial education of students from kindergarten through high school. CEE trains educators to teach young people the fourth "R"—a real-world understanding of economics and personal finance-so that they will be able to make informed and responsible choices throughout their lives as consumers, savers, investors, citizens, and participants in the global economy. Each year CEE's programs reach more than 55,000 teachers and approximately 5 million students.

