



Money skills you need for life.

**Hands on Banking®**



## **How Hands on Banking® / El futuro en tus manos® Aligns with Texas Education Standards**

The *Hands on Banking* program is helping students across the United States grasp important mathematics concepts while gaining valuable skills for life. The curriculum aligns with national and state principles and standards for mathematics, reading, and economics. All units and lessons are grade-level appropriate and are available in both English and Spanish.

The **No Child Left Behind Act** is a federal law designed to improve the academic achievement of all students, particularly those who are minorities, disabled, economically disadvantaged, or have limited English proficiency. The Act requires teachers of mathematics to provide all students with equal opportunities to excel and the mathematical skills and knowledge they need to actively participate in American society. Consistent with the objectives of the No Child Left Behind Act, the *Hands on Banking / El futuro en tus manos* curriculum includes supplemental materials for grade levels 4-12 that is also aligned with both state and national educational standards for mathematics, reading, and economics.

Specifically, *Hands on Banking* Teaching Guides coordinate with:

- *Texas Essential Knowledge and Skills for Mathematics, 2006*
- *Texas Essential Knowledge and Skills for Social Studies, 2009-2010*
- *Texas Essential Knowledge and Skills for English Language Arts and Reading, 2009-2010*
- *Texas Essential Knowledge and Skills for Economics with Emphasis on the Free Enterprise System and Its Benefits, High School, 1998*
- *Texas Essential Knowledge and Skills for Home Economics Education, 1998*
- *Texas Essential Knowledge and Skills for Business Education, 1998*
- *Principles and Standards for School Mathematics* compiled by the National Council for Teachers of Mathematics (2000)
- *National Standards in K-12 Education*, Jumpstart Coalition for Personal Financial Literacy (2007)
- *Voluntary National Content Standards in Economics*, National Council on Economic Education and National Association of Economics Educators and the Foundation for Teaching Economics (2007)
- *Standards for the English Language Arts*, sponsored by the National Council of Teachers of English and the International Reading Association (1996)
- *Economic and Personal Finance and Marketing Standards*, Business Education Standards from National Business Education Association from Securities Industry Foundation for Economic Education (2002)
- ISTE National Educational Technology Standards for Students (NETS\*S) (2005)
- Department of Defense Education Activity (DODEA) *Curriculum Standards for Mathematics, Reading, and Social Studies. "Teaching the children of America's military families worldwide."* (2009)

We encourage teachers to use the connections below as starting points. Please refer to your own school, district, or local, standards to determine the appropriateness of individual units and lessons for your students.

## **Connections between *Hands on Banking* and Texas Essential Knowledge and Skills for Mathematics, 2006**

### **GRADE 4**

#### **NUMBER, OPERATION, AND QUANTITATIVE REASONING. THE STUDENT USES PLACE VALUE TO REPRESENT WHOLE NUMBERS AND DECIMALS.**

(B) use place value to read, write, compare, and order decimals involving tenths and hundredths, including money, using concrete objects and pictorial models

*The student adds and subtracts to solve meaningful problems involving whole numbers and decimals.*

(B) add and subtract decimals to the hundredths place using concrete objects and pictorial models. (D) use multiplication to solve problems (no more than two digits times two digits without technology)

(E) use division to solve problems (no more than one-digit divisors and three-digit dividends without technology).

Underlying processes and mathematical tools. The student applies Grade 4 mathematics to solve problems connected to everyday experiences and activities in and outside of school.

(A) identify the mathematics in everyday situations;

(B) solve problems that incorporate understanding the problem, making a plan, carrying out the plan, and evaluating the solution for reasonableness;

(C) select or develop an appropriate problem-solving plan or strategy, including drawing a picture, looking for a pattern, systematic guessing and checking, acting it out, making a table, working a simpler problem, or working backwards to solve a problem

### **Grade 5**

*Number, operation, and quantitative reasoning. The student uses place value to represent whole numbers and decimals.*

(A) use place value to read, write, compare, and order whole numbers through the 999,999,999,999

(B) use place value to read, write, compare, and order decimals through the thousandths place. *Number, operation, and quantitative reasoning. The student adds, subtracts, multiplies, and divides to solve meaningful problems.*

(A) use addition and subtraction to solve problems involving whole numbers and decimals;

(B) use multiplication to solve problems involving whole numbers (no more than three digits times two digits without technology);

(C) use division to solve problems involving whole numbers (no more than two-digit divisors and three-digit dividends without technology), including interpreting the remainder within a given context

*Underlying processes and mathematical tools. The student communicates about Grade 5 mathematics using informal language.*

(A) explain and record observations using objects, words, pictures, numbers, and technology;

(B) relate informal language to mathematical language and symbols.

*Underlying processes and mathematical tools. The student uses logical reasoning.*  
(A) make generalizations from patterns or sets of examples and nonexamples; and  
(B) justify why an answer is reasonable and explain the solution process.

## **Grade 6**

*Number, operation, and quantitative reasoning. The student represents and uses rational numbers in a variety of equivalent forms.*

(B) generate equivalent forms of rational numbers including whole numbers, fractions, and decimals;

(C) use integers to represent real-life situations;

*Number, operation, and quantitative reasoning. The student adds, subtracts, multiplies, and divides to solve problems and justify solutions.*

(B) use addition and subtraction to solve problems involving fractions and decimals;

(C) use multiplication and division of whole numbers to solve problems including situations involving equivalent ratios and rates;

Patterns, relationships, and algebraic thinking. The student solves problems involving direct proportional relationships. The student is expected to:

(B) represent ratios and percents with concrete models, fractions, and decimals

*Underlying processes and mathematical tools. The student applies Grade 6 mathematics to solve problems connected to everyday experiences, investigations in other disciplines, and activities in and outside of school. =*

A) identify and apply mathematics to everyday experiences, to activities in and outside of school, with other disciplines, and with other mathematical topics;

## **Grade 7**

*Number, operation, and quantitative reasoning. The student represents and uses numbers in a variety of equivalent forms.*

(B) convert between fractions, decimals, whole numbers, and percents mentally, on paper, or with a calculator; and

*Number, operation, and quantitative reasoning. The student adds, subtracts, multiplies, or divides to solve problems and justify solutions.*

(A) represent multiplication and division situations involving fractions and decimals with models, including concrete objects, pictures, words, and numbers;

(B) use addition, subtraction, multiplication, and division to solve problems involving fractions and decimals

(D) use division to find unit rates and ratios in proportional relationships such as speed, density, price, recipes, and student-teacher ratio

(F) select and use appropriate operations to solve problems and justify the selections; and

(G) determine the reasonableness of a solution to a problem.

*Patterns, relationships, and algebraic thinking. The student solves problems involving direct proportional relationships.*

(A) estimate and find solutions to application problems involving percent

*Underlying processes and mathematical tools. The student applies Grade 7 mathematics to solve problems connected to everyday experiences, investigations in other disciplines, and activities in and outside of school.*

(A) identify and apply mathematics to everyday experiences, to activities in and outside of school, with other disciplines, and with other mathematical topics

## **Grade 8**

*Number, operation, and quantitative reasoning. The student understands that different forms of numbers are appropriate for different situations.*

(A) compare and order rational numbers in various forms including integers, percents, and positive and negative fractions and decimals

(B) select and use appropriate forms of rational numbers to solve real-life problems including those involving proportional relationships;

*Number, operation, and quantitative reasoning. The student selects and uses appropriate operations to solve problems and justify solutions.*

(A) select appropriate operations to solve problems involving rational numbers and justify the selections

(B) use appropriate operations to solve problems involving rational numbers in problem situations

*Patterns, relationships, and algebraic thinking. The student identifies proportional or non-proportional linear relationships in problem situations and solves problems.*

(B) estimate and find solutions to application problems involving percents and other proportional relationships such as similarity and rates.

## **Grades 9-12** (amended for implementation in 2006)

### ***Algebra I & II***

(a) Basic understandings.

(1) Foundation concepts for high school mathematics. . . Students will continue to build on this foundation as they expand their understanding through other mathematical experiences.

### Mathematical Models with Applications

(a) General requirements. The provisions of this section shall be implemented beginning September 1, 1998. Students can be awarded one-half to one credit for successful completion of this course.

(c) Knowledge and skills.

(M.1) The student uses a variety of strategies and approaches to solve both routine and non-routine problems.

The student is expected to:

(A) compare and analyze various methods for solving a real-life problem;

- (B) use multiple approaches (algebraic, graphical, and geometric methods) to solve problems from a variety of disciplines; and
- (C) select a method to solve a problem, defend the method, and justify the reasonableness of the results.

## **Connections between *Hands on Banking* and Texas Essential Knowledge and Skills for Social Studies, 1998**

### **GRADE 4**

- (4.10) **Economics.** The student understands the basic economic patterns of early societies in Texas and the Western Hemisphere.
- (4.12) **Economics.** The student understands the characteristics and benefits of the free enterprise system in Texas. The student is expected to:
  - (C) give examples of the benefits of the free enterprise system in Texas.
- (4.13) **Economics.** The student understands patterns of work and economic activities in Texas. The student is expected to:
  - (A) explain how people in different regions of Texas earn their living, past and present;
  - (D) describe the impact of mass production, specialization, and division of labor on the economic growth of Texas.

### **Grade 5**

- (5.12) **Economics.** The student understands the characteristics and benefits of the free enterprise system in the United States. The student is expected to:
  - (B) describe how the free enterprise system works in the United States; and
  - (C) give examples of the benefits of the free enterprise system in the United States.
- (5.13) **Economics.** The student understands the impact of supply and demand on consumers and producers in a free enterprise system. The student is expected to:
  - (A) explain how supply and demand affects consumers in the United States; and
- (5.14) **Economics.** The student understands patterns of work and economic activities in the United States. The student is expected to:
  - (A) analyze how people in different parts of the United States earn a living, past and present.

### **Grade 6**

- (6.10) **Economics.** The student understands categories of economic activities and the means used to measure a society's economic level. The student is expected to:
  - (B) describe and measure levels of economic development using various indicators such as individual purchasing power, life expectancy, and literacy.

### **Grade 7**

- (7.12) **Economics.** The student understands the factors that caused Texas to change from an agrarian to an urban society. The student is expected to:
  - (C) explain the changes in the types of jobs and occupations that have resulted from the urbanization of Texas.
- (7.13) **Economics.** The student understands the interdependence of the Texas economy with the United States and the world. The student is expected to:
  - (B) analyze the impact of economic phenomena within the free enterprise system such as supply and demand, profit, government regulation, and world competition on the economy of Texas.

## **Grade 8**

(8.15) **Economics.** The student understands the origins and development of the free enterprise system in the United States.

## **Connections between *Hands on Banking* and Texas Essential Knowledge and Skills for Economics with Emphasis on the Free Enterprise System and Its Benefits, High School (1998)**

### **Grades 9-12**

§118.2. ***Economics with Emphasis on the Free Enterprise System and Its Benefits,***  
High School

(c) Knowledge and skills.

(5) The student understands the concepts of scarcity and opportunity costs.

(6) The student understands the circular-flow model of the economy.

(7) The student understands the interaction of supply, demand, and price.

(8) The student understands the role of financial institutions in saving, investing, and borrowing.

## **Connections between *Hands on Banking* and Texas Essential Knowledge and Skills for English Language Arts and Reading, 2009-2010**

### **GRADE 4**

*Listening/speaking/purposes. The student listens actively and purposefully in a variety of settings.*

(A) determine the purposes for listening such as to gain information, to solve problems, or to enjoy and appreciate (4-8)

*Reading/fluency. The student reads with fluency and understanding in texts at appropriate difficulty levels.*

(B) read regularly in instructional-level materials that are challenging but manageable (texts in which no more than approximately 1 in 10 words is difficult for the reader; a "typical" fourth grader reads approximately 90 wpm)

*Reading/variety of texts. The student reads widely for different purposes in varied sources.*

(B) select varied sources such as nonfiction, novels, textbooks, newspapers, and magazines when reading for information or pleasure (4-5)

*Reading/vocabulary development. The student acquires an extensive vocabulary through reading and systematic word study.*

(A) develop vocabulary by listening to selections read aloud (4-8);

*Reading/comprehension. The student comprehends selections using a variety of strategies.*

(A) use his/her own knowledge and experience to comprehend (4-8);

(B) establish and adjust purposes for reading such as reading to find out, to understand, to interpret, to enjoy, and to solve problems (4-8);

(C) monitor his/her own comprehension and make modifications when understanding breaks down such as by rereading a portion aloud, using reference aids, searching for clues, and asking questions (4-8)

(K) answer different types and levels of questions such as open-ended, literal, and interpretative as well as test-like questions such as multiple choice, true-false, and short answer (4-8)

## **Grade 5**

*Listening/speaking/purposes. The student listens actively and purposefully in a variety of settings.*

(A) determine the purposes for listening such as to gain information, to solve problems, or to enjoy and appreciate (4-8)

*Reading/word identification. The student uses a variety of word identification strategies.*

(C) locate the meanings, pronunciations, and derivations of unfamiliar words using dictionaries, glossaries, and other sources (4-8)

*Reading/fluency. The student reads with fluency and understanding in texts at appropriate difficulty levels.*

(B) read regularly in instructional-level materials that are challenging but manageable (texts in which no more than approximately 1 in 10 words is difficult for the reader; a "typical" 5th grader reads approximately 100 wpm) (5)

(C) demonstrate characteristics of fluent and effective reading (4-6);

(D) adjust reading rate based on purposes for reading (4-8)

*Reading/variety of texts. The student reads widely for different purposes in varied sources*

(B) select varied sources such as nonfiction, novels, textbooks, newspapers, and magazines when reading for information or pleasure (4-5)(.9)

*Reading/vocabulary development. The student acquires an extensive vocabulary through reading and systematic word study.*

(B) draw on experiences to bring meanings to words in context such as interpreting figurative language and multiple-meaning words (4-5);

(C) use multiple reference aids, including a thesaurus, a synonym finder, a dictionary, and software, to clarify meanings and usage (4-8)

*Reading/comprehension. The student comprehends selections using a variety of strategies.*

(A) use his/her own knowledge and experience to comprehend (4-8)

(B) establish and adjust purposes for reading such as reading to find out, to understand, to interpret, to enjoy, and to solve problems (4-8)

(K) answer different types and levels of questions such as open-ended, literal, and interpretative as well as test-like questions such as multiple choice, true-false, and short-answer (4-8)

*Reading/literary response. The student expresses and supports responses to various types of texts.*

(A) offer observations, make connections, react, speculate, interpret, and raise questions in response to texts (4-8)

*Viewing/representing/interpretation. The student understands and interprets visual images, messages, and meanings.*

## **Grade 6**

*Reading/Fluency. Students read grade-level text with fluency and comprehension.*

*Reading/Vocabulary Development. Students understand new vocabulary and use it when reading and writing*

*Reading/Comprehension of Informational Text/Procedural Texts. Students understand how to glean and use information in procedural texts and documents.*

(A) follow multi-tasked instructions to complete a task, solve a problem, or perform procedures

## **Grade 7**

*Reading/Fluency. Students read grade-level text with fluency and comprehension.*

*Reading/Vocabulary Development. Students understand new vocabulary and use it when reading and writing*

*Reading/Comprehension of Informational Text/Procedural Texts. Students understand how to glean and use information in procedural texts and documents.*

(A) follow multi-tasked instructions to complete a task, solve a problem, or perform procedures

## **Grade 8**

*Reading/Fluency. Students read grade-level text with fluency and comprehension.*

*Reading/Vocabulary Development. Students understand new vocabulary and use it when reading and writing*

*Reading/Comprehension of Informational Text/Procedural Texts. Students understand how to glean and use information in procedural texts and documents.*

## **Chapter 110. Texas Essential Knowledge and Skills for English Language Arts and Reading, Subchapter C. High School**

110.31. English Language Arts and Reading, English I (One Credit), Beginning with School Year 2009-2010.

- (b) Knowledge and skills.
  - (1) Reading/Vocabulary Development. Students understand new vocabulary and use it when reading and writing. Students are expected to:
    - (A) determine the meaning of grade-level technical academic English words in multiple content areas (e.g., science, mathematics, social studies, the arts) derived from Latin, Greek, or other linguistic roots and affixes;

110.32. English Language Arts and Reading, English II (One Credit), Beginning with School Year 2009-2010.

- (b) Knowledge and skills.
  - (1) Reading/Vocabulary Development. Students understand new vocabulary and use it when reading and writing. Students are expected to:
    - (A) determine the meaning of grade-level technical academic English words in multiple content areas (e.g., science, mathematics, social studies, the arts) derived from Latin, Greek, or other linguistic roots and affixes;

110.33. English Language Arts and Reading, English III (One Credit), Beginning with School Year 2009-2010.

- (b) Knowledge and skills.
  - (1) Reading/Vocabulary Development. Students understand new vocabulary and use it when reading and writing. Students are expected to:
    - (A) determine the meaning of grade-level technical academic English words in multiple content areas (e.g., science, mathematics, social studies, the arts) derived from Latin, Greek, or other linguistic roots and affixes;

110.34. English Language Arts and Reading, English IV (One Credit), Beginning with School Year 2009-2010.

- (b) Knowledge and skills.
  - (1) Reading/Vocabulary Development. Students understand new vocabulary and use it when reading and writing. Students are expected to:
    - (A) determine the meaning of grade-level technical academic English words in multiple content areas (e.g., science, mathematics, social studies, the arts) derived from Latin, Greek, or other linguistic roots and affixes;

## **Connections between *Hands on Banking* and Texas Essential Knowledge and Skills for Business Education, 1998**

### ***Business Education, Middle School***

§120.2. Introduction to Business Support Systems.

- (c) Knowledge and skills.
  - (1) The student performs payroll and banking procedures.
  - (2) The student researches consumer and employee issues and discusses financial implications for the individual. The student is expected to:
    - (A) prepare and maintain a personal budget;

### **High School**

#### ***§120.24. Business Support Systems***

- (c) Knowledge and skills.
  - (2) The student researches consumer and employee issues and discusses financial implications for the individual. The student is expected to:
    - (A) prepare and maintain a personal budget;

#### ***§120.25. Introduction To Business***

- (c) Knowledge and skills.
  - (3) The student researches consumer issues and determines financial implications for the individual. The student is expected to:
    - (A) prepare and maintain a personal budget;
    - (B) interpret and explain the rights and responsibilities of the consumer;

## **Connections between *Hands on Banking* and Texas Essential Knowledge and Skills for Business Education Home Economics Foundations (1998)**

### ***§122.12. Personal and Family Development***

(21) Consumer and resource management. The student determines types of resources and considerations for responsible use. The student is expected to:

- (B) identify sources of income;
- (C) evaluate responsibility in managing personal and family resources;
- (D) apply the decision-making process in planning the allocations and use of finances;

### ***§122.63. Consumer and Family Economics***

(c) Knowledge and skills.

(1) Management of financial resources. The student incorporates the management process in financial planning to enhance economic security for individuals and families. The student is expected to:

- (A) utilize the decision-making process in financial planning and management;
- (B) determine the use of human and nonhuman resources in financial management;
- (C) describe effects of individual and family priorities on financial decisions across the life span; and
- (D) describe effects of cultural, demographic, and societal factors on family financial decisions.

- (7) Economic security. The student assesses factors affecting the production and use of income. The student is expected to:
- (A) determine sources of income;
  - (B) describe effects of personal and family priorities and goals on income and financial planning;
  - (C) evaluate the effectiveness of financial planning in reflecting personal and family goals;
  - (D) summarize the effects of external economic influences on spending decisions; and
  - (E) determine the components of effective consumer buying.
- (8) Economic security. The student explains the relationship of financial planning to economic security. The student is expected to:
- (A) identify components of a budget;
  - (B) explain the functions, types, and services of financial institutions;
  - (C) identify savings and investment opportunities;
  - (D) relate insurance types to individual and family needs;
  - (E) explain the relationship between retirement planning and family financial security;
  - (F) compare sources and costs of credit;
  - (G) describe effective use of credit;
  - (H) develop an effective individual or family budget and record keeping system;
  - (I) utilize technology to examine personal financial management plans; and
  - (J) identify professional financial planning resources.
- (11) Career preparation. The student completes a supervised career-connections experience applying knowledge and skills developed in the study of consumer and family economics. The student is expected to:
- (A) determine home and business applications of knowledge and skills developed in the study of consumer and family economics; and
  - (B) utilize a career-connections experience to demonstrate occupational applications of competencies developed in the study of consumer and family economics.

**We congratulate you on your support of financial education in your schools, and thank you for your interest in our program. We welcome your questions and comments, or if you would like additional information, please contact us at [hobinfo@wellsfargo.com](mailto:hobinfo@wellsfargo.com)**