



RETIRE RICH App – Mini-Lesson

Free download on the Google Play or iTunes Stores

Overview:

Retire Rich is a free, engaging, easy-to-use app for students and others to explore the implications of different plans to save for retirement. Students can change annual savings, interest rates, and the timing of saving to see what happens over the course of a lifetime.

Materials:

- Mobile device(s) able to download free apps.
- Adapter to connect to projector (if using just one device)
- Handout (optional)

Recommended Ages:

4th-12th grade

Time Needed:

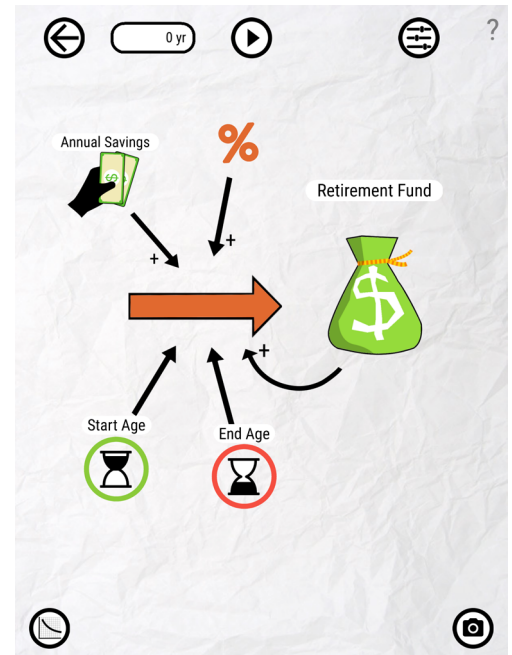
30-60 minutes

Connections to Curricular Standards:

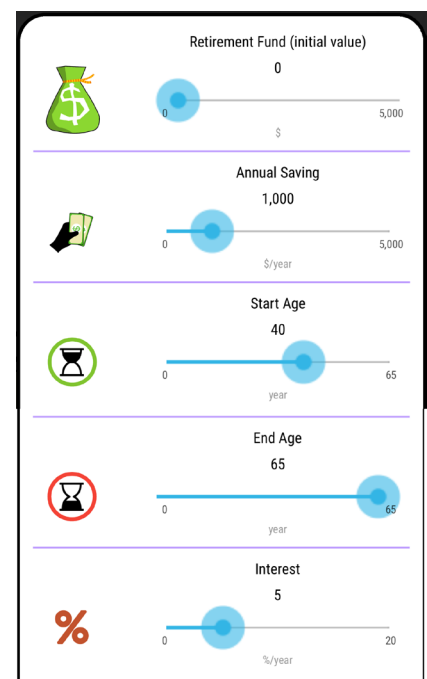
- State and national Math standards, See article, [“Thinking Systemically About Common Core Mathematical Practice Standards.”](#)
- National Standards for Financial Literacy – “At the 4th grade level, the primary focus is for students to understand the concept of saving.... At the 8th grade level, ... the mathematics of saving is covered, including the power of compound interest.... At the 12th grade level, more complex concepts are introduced, such as ... saving for retirement.”

Suggested Instructional Sequence:

- Have a brief conversation about what people do when they retire, discussing questions such as: How do people still pay their bills and afford to live without a job? and When should a person start planning for retirement?
- Go through “The Story” in the app.
- Pause and discuss how well Tara’s plan worked.
- Allow students to continue experimenting with “The Model” to create a plan that’s possible and most effective, given their individual situation. After they feel confident that they have a good plan, have them complete the attached handout as they do one final run.
- Discuss students’ reflections from their handouts.



Retire Rich Model Screen



Retire Rich Controls (sliders)

Additional Ideas and Connections

- Algebra I or II: Use the model with resulting graphs to explore the concept of exponential growth and the equation for accumulating interest in a bank account.
- Surface, practice and discuss related mathematical practices.
 1. Make sense of problems and persevere in solving them.
 2. Reason abstractly and quantitatively.
 3. Construct viable arguments and critique the reasoning of others.
 4. Model with mathematics.
 5. Use appropriate tools strategically.
 6. Attend to precision.
 7. Look for and make use of structure.
 8. Look for and express regularity in repeated reasoning.
- Extend student learning with one or more of the optional related resources.

Related Curricular Resources:

See the Creative Learning Exchange website to download lessons, purchase materials and access additional online simulations for:

- [*Dollars and Sense*](http://www.clexchange.org/curriculum/dollarsandsense/default.asp) – A series of lessons and simulations for Grades 5-12. The lessons combine systems thinking and mathematical tools with computer simulations to challenge students to manage their personal financial futures. Available from <http://www.clexchange.org/curriculum/dollarsandsense/default.asp>
- [*The Shape of Change – The Friendship Game*](http://www.clexchange.org/cleproducts/shapeofchange.asp), an exploration of exponential growth. Book available from the Creative Learning <http://www.clexchange.org/cleproducts/shapeofchange.asp>

Acknowledgments and Sources:

- Lesson written by Anne LaVigne for the Creative Learning Exchange, <http://www.clexchange.org>
- BTN, <http://learnwithbtn.com/>
- National Standards for Financial Literacy
<http://councilforeconed.org/resource/national-standards-for-financial-literacy/>

My Retirement Plan

Name: _____

Retirement Fund: _____
(initial value)

Annual Saving: _____

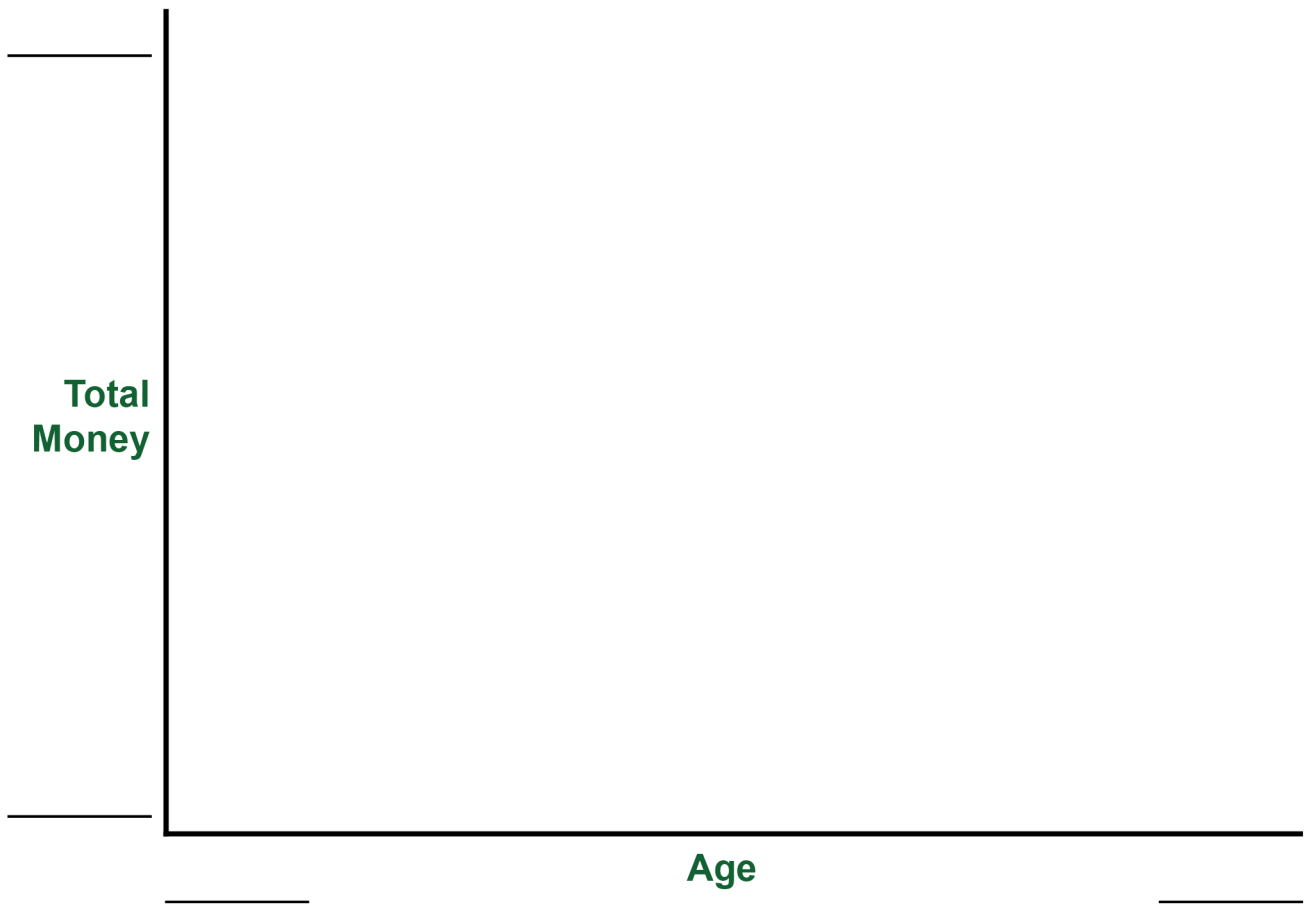
Start Age: _____

End Age: _____

Interest: _____
%/year

Label and draw your retirement savings on the graph.

My Savings for Retirement



Reflection

What worked best and was also realistic, given your current age and your ability to set aside money for retirement?

How could you adjust your plan to get better results by the time you reach retirement age (65 years)?

Available at www.clexchange.org

Working in K-12 education to develop Systems Citizens

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