

MAKING CONTACT!

MARGONI GOES WIRELESS



Monica Kulling Illustrated by Richard Rudbachs

GOING UP!

ELISHA OTIS'S TRIP TO THE TOP



Monica Kulling Illustrated by David Parkins

IT'S A SNAP!

GEORGE EASTMAN'S FIRST PHOTOGRAPH



Monica Kulling Illustrated by Bill Slavin

IN THE BAG!

MARGARET KNIGHT WRAPS IT UP



Monica Kulling Illustrated by David Parkins

ALL ABOARD!

ELIJAH MCGOY'S STEAM ENGINE



Monica Kulling Illustrated by Bill Slavin

MAKING CONTACT!

MARGONI GOES WIRELESS



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Great Idea Series

# SPIC-AND-SPAN!

## LILLIAN GILBRETH'S WONDER KITCHEN



Monica Kulling

Illustrated by David Parkins

Aligns with Common Core State Standards

# TEACHER'S GUIDE



TUNDR BOOKS

# DEAR EDUCATOR

*Spic-and-Span! Lillian Gilbreth's Wonder Kitchen* presents the life of the highly intelligent, enormously creative and accomplished Lillian Gilbreth. An efficiency expert, an industrial engineer, an inventor, a psychologist, an author and a professor, Gilbreth was the first woman elected to the National Academy of Engineering, was the subject of two movies and had a U.S. postage stamp issued in her honor.

*Spic-and-Span!* can be used in the classroom in a number of ways including:

- Exploring conceptual and thematic connections such as function, change, connection, efficiency, convenience, time, innovation, progress and feminism
- As an introduction to the genre of biography
- Enrichment for a science and technology unit
- As a whole class read aloud or for independent reading and/or research

The activity guide includes a variety of discussion questions, whole class, small group, and independent activities and prompts to elicit a meaningful understanding of the text for children ranging in age from five to eight years. The suggested activities can be adapted to suit the needs of your students. Where applicable, activities have been aligned with Common Core State Standards.

## ABOUT THE BOOK

Lillian Moller Gilbreth, born in 1878, put her privileged life aside for one of adventure and challenge. She and her husband, Frank, became efficiency experts by studying the actions of factory workers. They ran their household of eleven children efficiently too. When Frank suddenly died, Lillian faced enormous worry. Where would the family live? How would she pay for their food, clothing and education? When the Brooklyn Borough Gas Company eventually hired her to improve kitchen design, Lillian interviewed over four thousand women to discover what didn't work in their own kitchens. It was only the beginning.



## ABOUT THE AUTHOR

Monica Kulling was born in Vancouver, British Columbia. She received a BA in creative writing from the University of Victoria. She has published over forty fiction and nonfiction books for children, including picture books, poetry and biographies. She is best known for introducing biography to children just learning to read and has written about Harriet Tubman, Houdini, Eleanor Roosevelt and Amelia Earhart, among others. Monica Kulling lives in Toronto, Canada.

## ABOUT THE ILLUSTRATOR

David Parkins is the award-winning illustrator of over fifty children's books. He began his career at Dyfed College of Art in Wales, studying wildlife illustration. He then went to Lincoln College of Art for three years, and has been a freelance illustrator since his graduation in 1979. He spent several years at the beginning of his career producing illustrations for educational publishers, and has earned most of his keep drawing for the British cartoon *The Beano*. David Parkins lives in Ontario with his wife and daughter.



# PRE-READING DISCUSSION / ACTIVITIES

1. Review/introduce the genre of biography with the class. Take out a few simple but diverse biographies from the school library as examples. Give students the opportunity to quickly skim through some of the books. Introduce the idea of a biography told in a picture book format. As a class, make a list of the essential elements of a biography.
2. Discuss the difference between fiction and non-fiction. Can a book have both fiction and non-fiction elements in it? Can you think of an example of this?
3. Reveal the title of the story to the students. What is a “wonder kitchen”? Write a short description of what you think a “wonder kitchen” might include.
4. Look at the illustration on the cover. In what time period is the book set? How do you know?
5. Look up the words “efficient” and “efficiency” in the dictionary. Write a definition for each in your own words.

## LEARNING ACTIVITIES

### 1. Lillian’s Time

- Read the poem “Lillian’s Time.” The poem uses figurative language to convey a certain feeling. Name three metaphors and/or similes used in the poem. What tone do they set?
- How do you think Lillian is feeling in the poem? Have you ever heard the phrase “the calm before the storm”? How might this phrase apply to the poem?

*(RI.1.1, RI.1.4, RI.1.5)*

### 2. Lillian

- Lillian was born into a very wealthy family and had she chosen to do so, she could have lived a very “pampered life.” What does it mean to have a pampered life? Why do you think that Lillian chose a different path in life?
- How would you describe Lillian? As a class, make a list of all of Lillian’s strengths, weaknesses and talents as shown in the book. Using your list as a reference, write a character sketch of Lillian. Only include information that you have evidence for from the book.
- Look at the list of strengths, weaknesses and talents. Which of the items on the list do you think was most important in helping Lillian succeed?
- Are there any items on the list that you would personally like to work on?

*(RI.1.1, RI.1.4, RI.1.5)*

### 3. Industrial Engineer and Psychologist

- “Lillian was not only an industrial engineer, but a psychologist too.” Think about the type of work that Lillian and her husband did at the factory. What kinds of things would an industrial engineer and psychologist do? Why was Lillian considered to be both when working with the factory workers?
- How does Lillian use these skills both inside and outside the home later on in life? Find examples in the story.

*(RI.1.1, RI.1.5)*

# LEARNING ACTIVITIES (continued)

## 4. Important Events

- After her husband's death, Lillian faced many problems. What were some of the difficulties she faced? How did she deal with these problems? Using the chart below, show the problems and solutions in writing and/or pictures.

| <b>Problem</b> | <b>Solution</b> |
|----------------|-----------------|
|                |                 |
|                |                 |
|                |                 |

- What are the steps that need to be taken to make something more efficient (identify the problem, research and brainstorm solutions, create a plan, make changes)? Create a flowchart that outlines the steps in sequence.

*(RI.1.1, RI.1.5, RI.2.3)*

# LEARNING ACTIVITIES *(continued)*

## 5. Clockwork

- “The kitchen is the heart of the home. It should run like clockwork.” What does it mean to say that the kitchen should “run like clockwork”? Why was Lillian’s kitchen not running like clockwork? What was her solution?
- Can you think about anything in your classroom or your home that needs to “run like clockwork”? What steps must be taken in order for this to happen?
- As a class, walk around the classroom and make a list of any “inefficiencies.” Is there anything about the classroom’s design that could be improved upon in order to save time and space?
- In small groups or partners, draw a simple bird’s-eye view map of the classroom. Circle any areas that you think could be improved. Orally and/or in writing, present your list of improvements to your classmates. Alternatively, create and present a plasticine model of the classroom, showing the new and improved classroom.
- “Lillian was a pioneer in ‘ergonomics’ – the study of workplace design.” Throughout her adult life, Lillian worked in ergonomics. What are three examples outlined in the text that describe her working in this field? What things did Lillian consider necessary in order for a workplace to run smoothly?

*(RI.1.1, RI.1.4, RL.1.5, W.1.2)*

## 6. The Most Important Job

- “During her lifetime, Lillian Gilbreth was an efficiency expert, an industrial engineer, an inventor, a psychologist, an author, and a professor. But she always said that her favorite role was that of a mother.” Which of Lillian’s roles do you think was the most important? Why? In small groups, discuss this question using the following prompts:
  - What is an industrial engineer? What is an inventor? What is a psychologist? What is an author? What is a professor? What is a mother?
  - What is an event in the story that shows Lillian acting in each of these roles? Are there any roles that we don’t see her in?
  - Why/how are each of these jobs important?
  - Which one do you think is the most important? Why?
- Write a short paragraph that explains your own thinking about which of these roles was most important. Provide at least three reasons to support your opinion.

*(RI.1.1, RI.1.4, RL.1.5, W.1.1, W.1.2)*



## 7. Lillian's Story

- Although the book doesn't tell the whole story of Lillian's life, the reader gets a good idea of the important accomplishments she achieved. Select one of these accomplishments and write a first person narrative (from Lillian's point of view) that recounts what happened. Alternatively, draw pictures to recount the sequence of events that led to her accomplishments.
- Imagine that, like Lillian, you have created an efficiency that changed the way something was done. Write and/or draw the story of your invention.
- There are books that tell stories (fiction) and books that give information (non-fiction). How is this book both? Why do you think the author chose to teach the reader about Lillian's great idea in this format?

(RI.1.1, RI.1.2, W.1.3, W.2.3)



## WRAP-UP DISCUSSION AND EXTENSION ACTIVITIES

1. Lillian believed in living a balanced life, in part by ensuring she and her family enjoyed “happiness minutes” each day. How do you spend your happiness minutes? Write a journal-style entry that describes your idea of happiness minutes.
2. Re-read the story and look for more examples of figurative language used by the author.
3. Do you have any further questions about Lillian Gilbreth or anything else you read in the book? Record your questions and, with the teacher's guidance, plan how best to have the questions answered.
4. Consider watching the movies based on Lillian's life: *Cheaper by the Dozen* and *Belles on Their Toes*.

## PRAISE FOR *Spic-and-Span! Lillian Gilbreth's Wonder Kitchen*:

"Kulling focuses on Gilbreth's notable designs for the home ... Kulling describes how Gilbreth, with her understanding of household operations, invented other useful domestic items, such as the electric mixer, pedal-operated garbage can and ergonomic desk. The lively illustrations by David Parkins help to tell the story and offer illuminating details, from the antiquated cash-room at Macy's department store to the look of a modern 1920s kitchen. *Spic-and-Span!* is a thought-provoking and entertaining introduction to a fascinating inventor."

– *Readerly, National Reading Campaign*

"It's another insightful read in Tundra's Great Ideas Series by Toronto's Kulling and UK-born illustrator David Parkins. The book is geared to ages five to eight, but adults will also appreciate Gilbreth's many contributions to everyday life."

– *The Waterloo Region Record*

"Presented in storybook fashion with fascinating details about a husband and wife team that turned into a one-woman-show with the untimely passing of her significant other, we meet, greet, and learn about the woman who brought us many marvels we still enjoy today."

– *Satisfaction for Insatiable Readers*

## LINKS

[www.monicakulling.ca](http://www.monicakulling.ca)

[www.davidparkins.com](http://www.davidparkins.com)

## OTHER BOOKS IN THE GREAT IDEA SERIES:

*It's a Snap! George Eastman's First Photograph*

*All Aboard! Elijah McCoy's Steam Engine*

*Going Up! Elisha Otis's Trip to the Top*

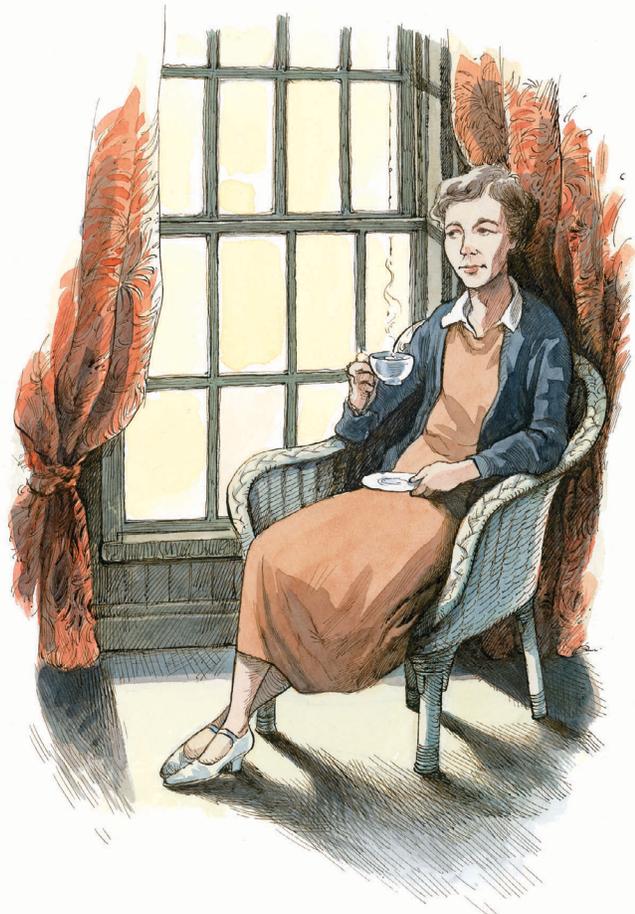
*In the Bag! Margaret Knight Wraps It Up*

*Making Contact! Marconi Goes Wireless*

*To the Rescue! Garrett Morgan Underground*

*Clean Sweep! Frank Zamboni's Ice Machine*

*Zap! Nikola Tesla Takes Charge*



# APPENDIX: Common Core State Standard

- CCSS.ELA-Literacy.RI.1.1** Ask and answer questions about key details in a text.
- CCSS.ELA-Literacy.RI.1.4** Ask and answer questions to help determine or clarify the meaning of words and phrases in a text.
- CCSS.ELA-Literacy.RL.1.2** Retell stories, including key details, and demonstrate understanding of their central message or lesson.
- CCSS.ELA-Literacy.RL.1.4** Identify words and phrases in stories or poems that suggest feelings or appeal to the senses.
- CCSS.ELA-Literacy.RL.1.5** Explain major differences between books that tell stories and books that give information, drawing on a wide reading of a range of text types.
- CCSS.ELA-Literacy.RL.2.3** Describe how characters in a story respond to major events and challenges.
- CCSS.ELA-Literacy.W.1.1** Write opinion pieces in which they introduce the topic or name the book they are writing about, state an opinion, supply a reason for the opinion, and provide some sense of closure.
- CCSS.ELA-Literacy.W.1.2** Write informative/explanatory texts in which they name a topic, supply some facts about the topic, and provide some sense of closure.
- CCSS.ELA-Literacy.W.1.3** Write narratives in which they recount two or more appropriately sequenced events, include some details regarding what happened, use temporal words to signal event order, and provide some sense of closure.
- CCSS.ELA-Literacy.W.2.3** Write narratives in which they recount a well-elaborated event or short sequence of events, include details to describe actions, thoughts, and feelings, use temporal words to signal event order, and provide a sense of closure.

