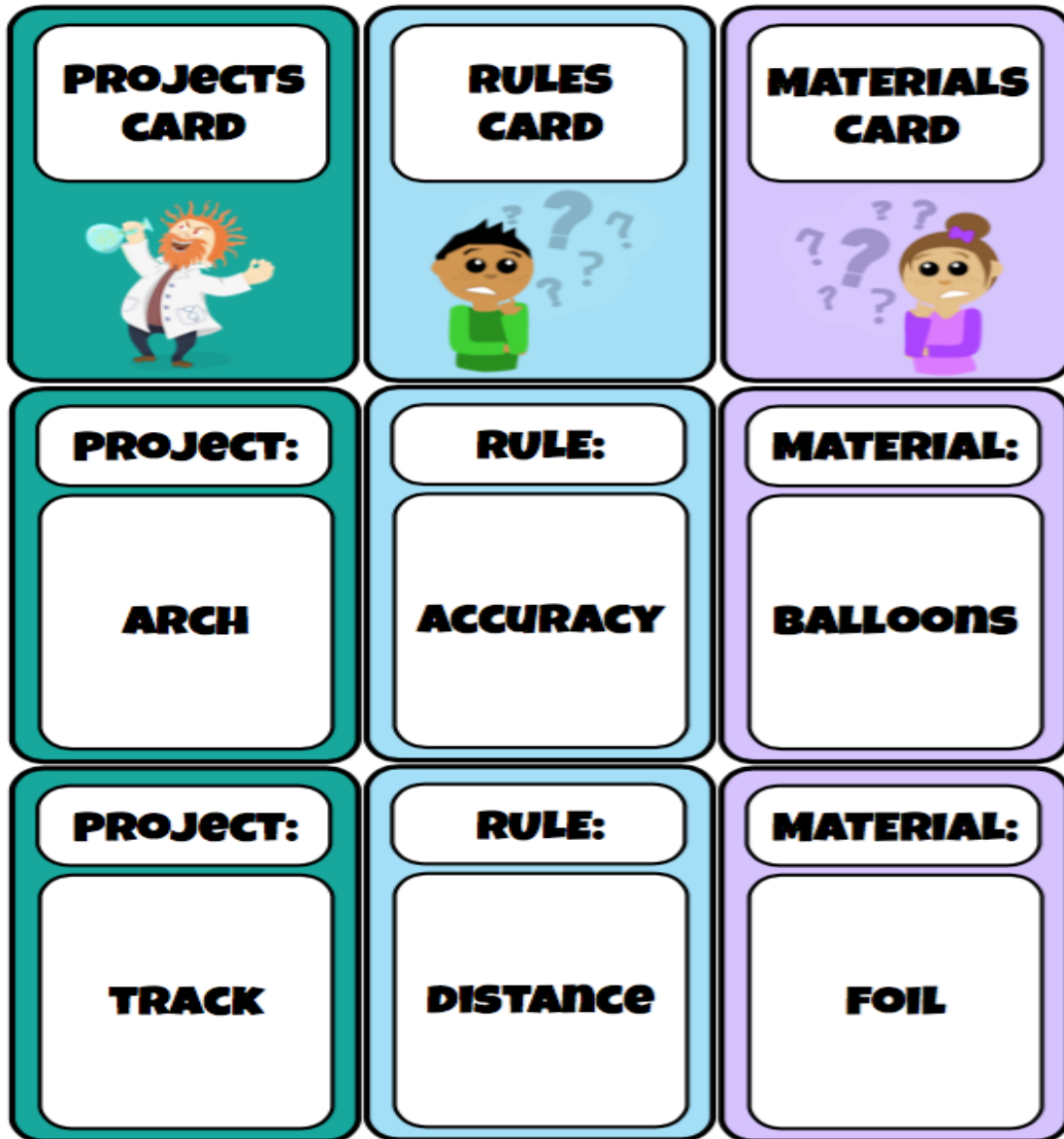


50 STEM LABS CARDS

second edition



MAKE YOUR OWN STEM LABS WITH 99
MATERIALS, PROJECTS, AND RULES CARDS

PROJECTS CARD



RULES CARD



MATERIALS CARD



HOW TO MAKE THESE CARDS:

Cut the cards out. Laminating them will prolong their usability. Shuffle!

USING THE CARDS:

Shuffle them into 3 piles: Projects, Rules, and Materials. Draw 1 or more from each pile. Brainstorm how to come up with the best project you can using the information on the selected cards.

OPTIONS:

- **FREEFORM:** After drawing cards, each group has to decide how to interpret the cards and come up with a project that uses the cards.
- **MAJORITY VOTE:** Draw at least 2 of each card type. Vote on which ones to keep.
- **RANDOMIZER:** Mix all 3 piles together. Draw out only 3 cards of any type. You must use those 3 all together.
- **2 OUT OF 3 AIN'T BAD:** Random draw 3 cards. Use your 2 favorites.
- **1 AND OUT:** Draw only 1 card at random. Each team comes up with a unique idea relating to it.

BLANK CARDS:

9 blank cards of each type have been added at the end, so you can expand your set with more ideas!

HOW TO USE THESE CARDS: (Some examples)

EXAMPLE 1: ORIGINAL

(1 card drawn from each category, use all 3 if possible)

Cards Draw: Arch Project, Buoyancy Rule, Balloons Material

Project Idea: Design an arch of any material that fits x & y dimensions that can float on water without falling over, using platforms designed with balloons. Not easy, right?

EXAMPLE 2: MAJORITY VOTE

(2 cards drawn from each category, keep your favorites)

Cards Draw: Dead Lift & Kite Projects, Depth & Tearing Rules, Wax Paper & Pasta Materials

Project Idea: Keep the Dead Lift, Tearing, and Wax Paper cards. A Dead Lift is a device that supports weight without being crushed. In this case, with the tearing rule, maybe have a device built of mostly wax paper (and some tape/glue/etc) that has something hanging from the side of it using a paper clip hook. The project will be anchored and have to resist being ripped apart as more weight is added to the hook's side.

EXAMPLE 3: 2 OUT OF 3 AIN'T BAD

(3 card random draw, keep 2)

Cards Draw: Sorter Project, Survival Rule, Tape Material

Project Idea: Keep the Survival Rule and Tape Material. Make some sort of device or chain with mostly tape that must not be broken when adding weight to it? Or, make a bridge type device out of tape. A large weight will be slowly rolled from end to end, and it must not tear or the tape must not become unstuck from either end.

PROJECT:

ARCH

PROJECT:

BRIDGE

PROJECT:

CAR

PROJECT:

TRACK

PROJECT:

TOWER

PROJECT:

AIRPLANE

PROJECT:

BOAT

PROJECT:

KITE

PROJECT:

**CATAPULT
OR
CANNON**

**PROJECTS
CARD**



**PROJECTS
CARD**



**PROJECTS
CARD**



**PROJECTS
CARD**



**PROJECTS
CARD**



**PROJECTS
CARD**



**PROJECTS
CARD**



**PROJECTS
CARD**



**PROJECTS
CARD**



RULE:

ACCURACY

RULE:

BUOYANCY

RULE:

CAPACITY

RULE:

DISTANCE

RULE:

HEIGHT

RULE:

LENGTH

RULE:

STRENGTH

RULE:

ROTATION

RULE:

SPEED

**RULES
CARD**



**RULES
CARD**



**RULES
CARD**



**RULES
CARD**



**RULES
CARD**



**RULES
CARD**



**RULES
CARD**



**RULES
CARD**



**RULES
CARD**



MATERIAL:

BALLOONS

MATERIAL:

CLAY

MATERIAL:

eGGS

MATERIAL:

FOIL

MATERIAL:

mARBLES

MATERIAL:

**MARSH-
MALLOWs**

MATERIAL:

**note
CARDS**

MATERIAL:

PAPER

MATERIAL:

**PAPER
CLIPS**

**MATERIALS
CARD**



**MATERIALS
CARD**



**MATERIALS
CARD**



**MATERIALS
CARD**



**MATERIALS
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**MATERIALS
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**MATERIALS
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**MATERIALS
CARD**



**MATERIALS
CARD**



ANDREW FRINKLE

Andrew Frinkle is an award-nominated teacher and writer with experience in America and overseas. He has taught PreK all the way up to adult classes, and has focused on ESOL and EFL techniques. With a young child at home now, he's been developing more and more teaching strategies and books aimed at helping young learners.

His many educational works include:

- 50 STEM Labs, 50 More STEM Labs, & 50 Science Labs
- Common Core Assessment Templates
- Common Core Vocabulary Cards
- Elementary & Middle School Common Core Workbooks
- Graph Paper Math
- How to Draw with Basic Shapes
- Science Now!
- Sentence Builders & Word Builders
- Weekly Sentence Strips
- Story Starters
- Movers and Shakers & the Expansion Sets
- Basic Skills Workbooks: Alphabet Skills, Colors, Number Sense, Nursery Rhymes, Phonics, and Shapes
- Monster Zoo Math
- Dealing With Archetypical Children - A Classroom Management Resource
- Make Your Own Comic Books
- Board Game in a Book Series & Card Game in a Book Series
- Get this and other books on Amazon, Lulu, and other online booksellers!

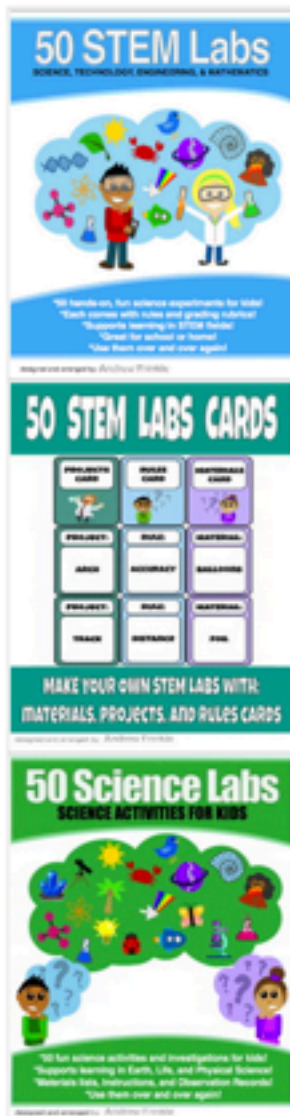


Read more about Andrew Frinkle at www.underspace.org. He also maintains the educational websites www.50stemlabs.com, www.littlelearninglabs.com, and www.common-core-assessments.com. He also works full time for www.havefunteaching.com and its affiliated sites, as well as writing fantasy and science fiction novels under the pen name Velerion Damarke.

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50 STEM LABS SERIES

Get the whole series in print on [Amazon](#) or download them on [TeachersPayTeachers!](#)



50 STEM LABS CARDS

50 STEM Labs is about teaching kids to think with their hands and minds. It's about problem-solving and completing a task in the fields of Science, Technology, Engineering, and Math.

STEM Labs cards takes the popular 50 STEM Labs series and makes it into a randomized card set. Make your own STEM Labs by drawing out Project, Materials, and Rules cards. Mix and Match to make thousands of combinations!

This second edition set includes 99 STEM Labs Cards:

- * 27 Projects Cards (9 new ones)
- * 27 Rules Cards (9 new ones)
- * 45 Materials Cards (18 new ones)

Plus, you get:

- * 9 Blank Cards of each card type

50STEMLABS.COM