Children's
TECHNOLOGY
REVIEW

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COPPA is Coming July 1 p. 10

On the cover: **What Will I Be?** on Page 23

* Donotes an "Editor's Choice."

Children's Technology Review
EDITOR'S CHOICE
20 13
FOR EXCELLENCE IN DESIGN

Apps for Kindergarten

Last month, I did a favor for a friend, who is a school principal, by making a list of apps for her new Kindergarten iPads. The list is on page 6.

Apps You Trust May Cost More

In fact checking the prices for my Apps for Kindergarten article, I noticed that prices seem to be going up. Most significantly Oceanhouse Media's **Oh the Pets You Can Get** went from $3.99 to $5.99; Toca Boca's **Robot Lab**, from $.99 to $2.99 along with a 300% increase for **Toca Band**, from $.99 to $2.99. Remember Duck Duck Moose's **Wheels on the Bus**? It now costs 200% (twice) as much as it did when it was first released (from $.99 to $1.99). The lesson for publishers may be that once you establish your brand and earn the trust of your customers, you can raise the price. But not before.

My tech advice for parents? Don't take advice.
Hanna Rosin's AppCamp inspired Atlantic article http://bit.ly/12IHUX2 about iPad obsession among children has continued to make waves, some splashing onto the pages of the New York Times http://nyti.ms/Znbzxs where it was hastily mixed with Sherry Turkle's dismal tomes. I was invited to be on a segment on NPR's "Tell Me More" http://n.pr/17rbQXN that included my friend Lisa Guernsey. As I prepared for the segment I made these notes; not all of which made it into the program. So here they are:

- *The "Technology is bad for children" is hardly new. It used to be TV (it's now been 52 years Newton Minnow's vast wasteland speech). Forty years ago it was Rock 'n Roll; twenty-one years it was Mortal Kombat in the neighborhood arcades.*
- *It's not about the screen — it's about what's on the screen. Some activities encourage social play; others foster isolation. Parents need to understand that different apps have different outcomes.*
- *When new things like iPads come along, parents tend to worry, while children tend to explore. It is the latter reaction that leads to better understanding.*
- *Don't implicitly trust experts. We might know apps but we don't know your kids or your family.*

During the interview I offered the acronym ABS (Access, Balance and Support) which I'm finding to be increasingly useful. What does it mean? All children need **access** to quality tech, to test the limits, break things, and to build authentic knowledge. **Balance** means taking care of a real puppy, along with the virtual variety; and **support** means a backup team of caring adults, librarians and teachers to serve as role models, app curators, guides, playmates and (hopefully) friends.

Pushing the Boundaries of Digital Storytelling

I've been thinking a lot about literacy and technology lately which resulted in the presentation "Pushing the Boundaries of Digital Storytelling" with ten examples of the cutting edge ebooks. It is posted on YouTube, at http://youtu.be/bAsC9vpuhvk.

LittleClickers: Amazing Gardens

Spring is a good time to plant a garden, but how much do you know about how they grow? Here are some links to sites and videos that will help you learn more about plants and gardens. We'll show you a pumpkin that weighs more than a polar bear, and give you a link that can teach you how to make a rain barrel. Visit www.littleclickers.com.

Ready or not: Here comes COPPA

Two lawyers discuss the new COPPA law that takes effect on July 1. See the guest editorial on page 11.

Amazing Gardens

Spring is a good time to plant a garden, but how much do you know about how they grow? Here are some links to sites and videos that will help you learn more about plants and gardens.

1. What is the largest vegetable in the world? At Seed to Feed Me http://bit.ly/10CD4UG you can see pictures of the largest fruit and vegetables in the world, like a 100 pound head of lettuce, a 268 lb watermelon, or a 1689 lb pumpkin that weighs as much as polar bear!

2. What is the oldest living seed in the world? At National Geographic http://bit.ly/XstbxC you can learn about some 32,000 year old seeds found buried beneath the ice in Siberia, that were still alive. When they planted, they grew into delicate white flowers.

3. What's the difference between an annual and a perennial? At the Permaculture Institute http://bit.ly/10RIUTK you'll learn that nearly all garden plants, like tomatoes, carrots and pumpkins are annuals, meaning they die after one season. Perennials, like potatoes, rhubarb and asparagus, come back year after year.

4. How long does it take to grow a radish, and how deep do you plant the seed? At Cornell University's vegetable growing guide http://bit.ly/ZeOJyK you can look up specific seeds and learn that radishes grow in about 30 days, but you'll need 70 days for a zucchini. You can find specific facts about almost any seed you might plant in your garden, just in case you lose the instructions on the seed packet.

APPLICATION

Make a rainbarrel! Did you know that over 600 gallons of water falls on a 1000 square foot roof during a typical storm? Every drop could be used to water your carrots. Here's are step by step instructions on how to make a rain barrel. Here are the instructions in PDF form: http://www.hws.edu/fli/pdf/rain_barrel_manuel.pdf

Grow a flower in a cup- at http://www.kidsgardening.org/node/3914 you will find everything you need to plant your own seed in a cup. You'll need a styrofoam cup with a small hole in the center. Easy flowers are marigolds or pansies; easy vegetables are corn or watermelon, which will sprout in about 5 days.

This head of lettuce (above) weighs over 100 pounds, and the flower (below) grew from seeds that are over 32,000 years old.

Store the Storm

QUIZ: Are these pests or friends?

Check all the bugs that are BAD for your garden.

___ Honeybee
___ Earthworms
___ Ladybugs
___ Parasitic Wasp
___ Praying Mantis

The answer? All are friends, and not pests. Not all bugs are good however. At http://www.garden.org/pestlibrary you can see a list of the pests, and at OrganicGardening.com or http://bit.ly/10K3jve you can learn how earthworms help your garden's soil.

▶ You Tube™ Gardening

Here are 19 videos about gardening http://www.youtube.com/playlist?list=PLcBVHzUUEKwluJt3g8CEzf1SeMz2Agzq7
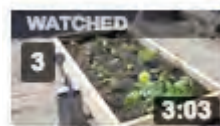
Interact with this page online, at http://www.LittleClickers.com/gardening

Editor's Choice
April 2013

Here's a summary of the the top rated products from this months issue, sorted by age.

Younger Children

ABC Farm, $2.99, by Peapod Labs https://itunes.apple.com/us/app/abc-farm/id615898597?mt=8 Your retinal display will sizzle with this collection of 210 (or so) clear open-source photos of farm life, and farm animals. New to this version -- the ability to toggle between Spanish or English. For ages 3-8.

Alphabet Animals: A Slide and Seek Adventure, $1.99, by Auryn, Inc. https://itunes.apple.com/us/app/alphabet-animals-slide-peek/id600589482?ls=1&mt=8 Letters are turned into beautifully illustrated animals in this simple alphabet-book app that is an ideal way to let children playfully discover some excellent illustrations. You can also make your own namecard out of the animals and save it to your photo library. The interactivity is subtle, and hardly innovative, and alphabet apps are a dime-a-dozen these days. Get this one for its artistic merits. Quick look: http://youtu.be/1XrpAewvxGw. For ages 3-6.

Mask Jumble Animals, $1.99, by Pi'ikea Street https://itunes.apple.com/us/app/mask-jumble-animals/id548763608?mt=8 Here's an app that can instantly put a smile on any child's face. How? It turns your iPad or iPhone into a magical mirror that can turn your face into an animal mask. To render the animal-you, the app must be able to see your whole face clearly, the lighting should not be too bright or too dark, and you must hold the device steady and keep your face centered in the mirror. Note that this app was a bit buggy on our iPad3, crashing unexpectedly but not frequently enough to make the app unusable. See also Mask Jumble Halloween. For ages 4-8.

Play 123, $free, by CJ Educations https://itunes.apple.com/us/app/play123/id500024209?mt=8 is a collection of ten "virtual manipulatives" -- innovative minigames that are easy to learn and full of responsive play opportunities that encourage discovery of some key number and logic concepts. Even though this is a free app, we don't like the links to additional apps in iTunes in the main menu. Also bad: the sugary-sweet English narration; but neither are fatal flaws. The innovative design merits a download. See the preview video at http://youtu.be/mdissKySfIw. For ages 2-up.

Early Elementary

Highlights Hidden Pictures Puzzles, $1.99, by Highlights for Children, Inc. https://itunes.apple.com/us/app/highlights-hidden-pictures/id567496439?mt=8 These days there are hundreds of apps that ask you to find the hidden object on a touch screen. But for most people older than 20, the original "Hidden Picture" activity was the one that appeared each month in Highlights for Children magazine. Note that all the purchases are hidden away from children two layers deep and behind a sliding button task. Additional theme packs can be purchased for $.99 each from a parent menu that is locked behind a sliding puzzle. A quick look: http://youtu.be/Vo5Bd9TIZS4. For ages 4-up.

More Trucks, $1.99, by Duck Duck Moose Design https://itunes.apple.com/app/id609771588 This sequel to the first Trucks from Duck Duck Moose offers four fun and playful vehicle-themed activities. Our testers especially liked putting out the fires, playing tic-tac-toe against the firehouse dog, and racing the drag racers. Some of the activities are tricky at first, so parents be on hand the first time through. This app works best as a one player game. Testers were less enthusiastic about the crane activities -- "it's two hard to build anything." The music in this app is noteworthy, including a sampling of jazz, blues and rock. This is Duck Duck Moose's 16th title and is a solid download. Quick look: http://youtu.be/aQhmzWyggM4 For ages 3-7.

Nutcracker, The, $1.99, by Tibuktu Labs https://itunes.apple.com/us/app/the-nutcracker-by-timbuktu/id595959391?mt=8 OK, this is off season, but it was one of the 20 noteworthy titles identified by the Jurors of the BolognaRagazzi Digital prize. Get this one for the innovative vertical (up and down) scrolling technique, where the activities and ideas unfold. The content is limited, however. If you design eBooks for children, this app is wodrth your consideration. For ages 5-up.

Stack the States, $.99, by Dan Russell-Pinson https://itunes.apple.com/us/app/stack-the-states/id381342267?mt=8 This is an old app, but we somehow overlooked it for an Editor's Choice Award. The recognition is long overdue. This multiple-choice quiz game rewards you with more than a correct answer. You get a chance to drop the state onto a platform -- a process that also makes you more aware of a state's unique shape. Content includes the names, locations, major cities and sizes of the US states, plus flags. Wrong answers disappear along with an explanation, but correct answers, give the the ability to drop the state. See also Stack the Countries. For ages 7-up.

Upper Elementary

Luigi's Mansion: Dark Moon, $40, by Nintendo of America is the sequel to the 2001 GameCube release. This time, Luigi explores six haunted Mansions to find the pieces of the shattered Dark Moon, hunting down the spirits while collecting coins, keys, and gems. The controls are easy to use and learn, even if you've never played this game before. At some points, the controls feel limited (e.g., while using the Poltergust). All in all, however Nintendo has done a great job reviving Luigi's ghost-hunting career. For ages 6-up.

What Will I Be?, $2.99, by Digital Leaf Limited https://itunes.apple.com/us/app/what-will-i-be/id593449762?mt=8 Wondering what you'll be when you grow up? Now there's an app for that. Featuring clear watercolor illustrations and pleasant British-sounding narration, the 19

page eBook follows a predictable pattern, with about four animated surprises on each screen. There are a lot a typical professions depicted on the pages, including a doctor, teacher, mechanic and sailor. We especially like how you can choose which gender you want featured in the story. The hidden animated features are playful. Children can activate the X-ray machine and see what,Äôs inside the dad, make the airplane zoom off the screen, or throw the enormous pie up in the air. ¬†A "find the hidden dog" on each page is a fun feature. In terms of interactive design, this is nothing special. But the story, art and narration is top notch. Engagement is increased because a dog is hidden on each page. See the preview at http://youtu.be/Rd0Zx-tF5Cs. For ages 3-up.

Middle and High School

IBM Think, $free, by IBM Corp. https://itunes.apple.com/us/app/ibm-think/id546222093?mt=8 Free and fascinating, this app turns your iPad into a hands-on museum designed to let you explore some big ideas -- stuff like how different kinds of maps have developed, the role of key inventions, and other big ideas.   This is the kind of app that is nice to have in your library, to increase the chance that your child might stumble into a powerful concept that just might plant a seed. Runs on iPads running iOS 5.0 or later. Content includes a 10-minute video. Note that this is a big 500 MB download. For ages 10-up.

Apps for Kindergarten by Warren Buckleitner

Last month a friend who is an elementary principal called me, and asked for a list of good apps to support the curriculum. I turned to our review database (you can too, at http://reviews.childrenstech.com/ctr/ctrlogin.php) to come up with this list of apps to support the curriculum. Here's some highlights from the list, hand picked from the 715 Kindergarten iPad apps we've reviewed to date. First some notes: This list is by no means comprehensive, and some are part of a series that we might have included to introduce you to a promising developer. The reviews are continually updated in the CTR Review Database.

Reading Skills

These self-correcting phonics games playfully deliver practice with skills needed to become a reader.

Endless Alphabet, $free with ads (a premium, ad-free version is planned) by Callaway Digital Arts https://itunes.apple.com/us/app/endless-alphabet/id591626572?mt=8 shows children how the letters can be combined, in a jigsaw-like fashion -- to make words. When a letter is touched, it becomes animated and sounds itself out, linking word bits with meaning in a playful, child controlled way that makes this an extremely valuable early reading experience.

Kindergarten Reading, $.99, by Duck Duck Moose Design https://itunes.apple.com/us/app/kindergarten-reading-hd-by/id573698255?mt=8 contains nine fast-paced early reading activities that do an excellent job introducing and reinforcing the first sight words, like dog, cat and zoo. The result is an excellent early reading skills activity; for home or classroom use. The app introduces letter sounds for all consonants, short vowels, long vowels and consonant-vowel-consonant (CVC) words. It also tracks children's progress.

PlaySquare: WordWorld's Happy Birthday Dog!, $free, by PlaySquare, LLC http://itunes.apple.com/us/app/playsquare-presents-wordworlds/id536304087?mt=8 bills itself as "touchable television," letting children discover 25 common words. It mixes interactive play with TV-quality video. The result is a solid language experience, with a chance to play with letters and words to apply some of the concepts. Note that this can be a noisy app (like TV) perhaps making it better suited for home rather than classroom use. For ages 3-6.

Word Wagon, $1.99, by Duck Duck Moose Design http://tinyurl.com/wordwagon is designed specifically to prepare a child for a school reading program, with a well-designed letter and word recognition activity that provides structured practice with letters and letter sounds in the context of 103 common words organized into seven categories.

Interactive Alphabet 1.5, $3, by Piikea Street https://itunes.apple.com/us/app/interactive-alphabet-abcs/id383967580?mt=8 might be old, but it has a simple, responsive design that helps children make letter/sound/word associations. For F, you see a fan, along with the words "F is for Fan." You can then explore the screen -- touching the F sounds out the letter. This is an excellent first app that is high in child control.

Noodle Words, $2.99, by NoodleWorks Interactive http://itunes.apple.com/us/app/noodle-words-active-word-game/id477765985?mt=8 converts 18 common words like run,

sparkle into active toys that jump, stretch, dance and sparkle if they are touched.

Monkey Word School Adventure, $1.99, by Thup Games https://itunes.apple.com/us/app/monkey-word-school-adventure/id565951597?mt=8 contains six bite-sized phonics and word recognition games, plus simple management features so you can track what children do.

Reading For Fun

Here are some apps for providing an informal language experience.

Animal SnApp: Farm, $3.99, by Nosy Crow https://itunes.apple.com/us/app/animal-snapp-farm/id563238581?mt=8 is a well-crafted make-your-own nursery rhyme, and an excellent language experience.

Monster's Socks, $2.99, by Martin Hughes http://itunes.apple.com/us/app/monsters-socks/id521546698?mt=8 is a 12-screen adventure about a child-like monster (who is not scary) who wakes up to discover that he has lost his socks. Especially noteworthy: the way this title breaks away from typical page flips and lets you instead freely move forward or backward through the story.

Another Monster at the End of This Book, $.99, by Callaway Digital Arts http://itunes.apple.com/us/app/another-monster-at-end-this/id473095033?mt=8 is the second in the series that pulls the child into Grover's creative attempts to keep Elmo (and your child) from turning the page, and discovering the monster (Elmo) on the last screen.

Storia, $free, http://www.scholastic.com/storia is Scholastic's answer to Amazon.com. The online book store offers books in a

variety of screen types and sizes, for both computer or tablet. Book features include excellent navigation features, silky smooth page turning and a no-frills dictionary system.

Oh the Pets You Can Get, $3.99, by Oceanhouse Media https://itunes.apple.com/us/app/oh-pets-you-can-get!-all-about/id577277383?mt=8 is ideal for beginning readers. As with other Oceanhouse Media titles, each picture is cleverly labeled. See also **One Fish, Two Fish, Red Fish, Blue Fish**, $3.99, by Oceanhouse Media. See also **Trains** by Byron Barton, $.99, by Oceanhouse Media https://itunes.apple.com/us/app/trains-byron-barton/id562376571?mt=8

Spanish/English

My principal friend specifically asked me for some apps that can provide informal, playful exposure to Spanish. The good news is that these are increasingly easy to find. Here are two.

ABC Farm, $1.99, by Peapod Labs http://itunes.apple.com/us/app/abc-food/id460479661?mt=8# is the latest release from Peapod labs that turns your iPad or iPhone screen into a bilingual (Spanish/English) alphabet-themed visual encyclopedia. Touching any of the letters within the word lets you quickly jump to a new set of words, offering secondary navigation. About a third of the photos include either YouTube videos or rub-away images. There are many Peapod Labs titles with a similar design (See also ABC House, ABC ZooBorns ABC Music, ABC Wildlife, ABC Play, ABC Food and ABC Go) but this is the first with the Spanish/English option. Our video demo is at http://youtu.be/LRfDE5XxlgY

Harry and the Haunted House (iPad), $4.99, by Wanderful http://itunes.apple.com/us/app/harry-haunted-house-wanderful/id565239081?mt=8 is one of many of the original Living Books, and each makes an excellent addition to your bilingual library. Each screen is full of animated surprises that support the story and you can buy additional languages for $2.99 an in-app feature within the parent settings. For ages 3-up.
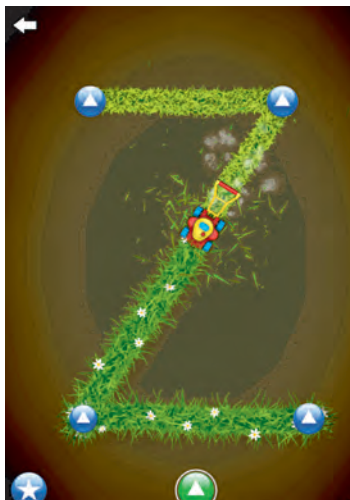
Handwriting

Letter and word tracing apps abound. The best for a playful, structured introduction to letters is **LetterSchool**, $2.99, by Boreaal Publishers http://itunes.apple.com/us/app/letter-school/id435476174?mt=8 with uppercase and lowercase letters, as well as numbers from 1 to 10. You can toggle between three types of letters/numeral styles -- D'Nealian (used in many US schools), HWT (Handwriting Without Tears) and Zaner-Bloser (the "traditional" format).

Language: Writing

Learning to write -- by combining letters into words, sentences, paragraphs and stories, is supported by many apps.

Word Wizard, $2.99, by L'Escapadou http://itunes.apple.com/app/id447312716 turns your iPad into a talking alphabet/language generator. To build a word, you drag it from an alphabet strip onto a 44 letter grid, where it snaps into place, pronouncing any word that might be created, including nonsense words.

Write My Name, $4.99, by Project Injini https://itunes.apple.com/us/app/write-my-name-by-injini/id500623496?mt=8 is a clean, teacher friendly app that is good for helping children learn to write letters and words by tracing the uppercase and lowercase letters used in their name.

Telling Stories

Turns out the iPad is also good as a tool for giving children a voice.

DoodleCast for Kids, $1.99, by zinc Roe Design http://itunes.apple.com/us/app/doodlecast-for-kids/id469487373?mt=8 is an easy to use, powerful "talk and draw" experience which makes self-narrating and sharing a drawing into a nearly one-step process.

Draw and Tell HD, $1.99, by Duck Duck Moose Design http://itunes.apple.com/us/app/draw-tell-hd-by-duck-duck/id504752087?mt=8 is an excellent creativity app with both drawing and narration features. It turns your iPad into a drawing/flannel board and story telling machine.

Explain Everything, $2.99, by Morris Cooke https://itunes.apple.com/us/app/explain-everything/id431493086?mt=8 is more of a teacher utility, but it could be very useful when plugged into an AppleTV system. It makes it easy to mix photos, movies and sketches with recorded sounds.

Spelling

These apps can make spelling practice much less tedious, by providing a setting were children can informally discover words.

Animal Crosswords, $.99, by OkiDokiApps https://itunes.apple.com/us/app/animal-crosswords-english/id523130989?mt=8 is a solid collection of 56 crossword puzzles based on 300

common spelling words. You can toggle between upper/lowercase letters, and a "clean up and start over" mode lets you reset the crosswords and show/hide correct letters in crossword. Besides being good for playfully introducing site words, this app can be a good cooperative learning language experience because more than one child can help assemble words.

Montessori Crosswords, $2.99, https://itunes.apple.com/us/app/montessori-crosswords-spelling/id384334005?mt=8 by L'Escapadou is another well designed set of 300 crossword puzzles, with letters that can sound themselves out. This is an extremely powerful early reading experience.

Science

These apps can help add some fiber (or some bats) to your science curriculum.

Jim Henson's Sid's Science Fair, $2.99, by PBS Kids https://itunes.apple.com/us/app/sids-science-fair/id462788044?mt=8 is really as much about math as it is about science. Using a science fair metaphor, the playful, easy-to-use collection of activities includes a magnifying glass to notice subtle differences, an interactive chart where items can be classified by shape, color and pattern and a time machine, with 14 sets of objects that can be put into order. These include an apple being eaten, a candle burning or a plant growing.

Bats! Furry Fliers of the Night, $2.99, by Bookerella http://itunes.apple.com/us/app/bats!-furry-fliers-night/id494297887?mt=8 will satisfy any child's curiosity about these amazing flying mammals. Each page includes an interactive feature that illustrates the biology of the bat; making this app like a small hands on museum. The content is based on the book by Mary Kay Carson.

Rounds: Franklin Frog, $4.99, by Nosy Crow https://itunes.apple.com/us/app/rounds-parker-penguin/id577753717?mt=8 playfully introduces the concept of life-cycles. Children participate in a G-rated version of each stage of frog reproduction, helping a male frog hop, swim, croak, eat and find a female to reproduce. See also Rounds: Parker Penguin

Logic

These apps are thick with math-related skills like classification, seriation, memory and associated vocabulary. Each is high in child control, and provides something for everyone.

Bugs and Numbers, $2.99, by Little Bit Studio https://itunes.apple.com/us/app/bugs-and-buttons/id446031868?mt=8 is the third set of 18 bug and learning infested games and activities. The app is organized into three basic stages, to grow with a child; e.g., from basic counting to early fractions. The app also features 36 achievements and rewards and multiple user profiles. Our video demo is at http://youtu.be/aTRiZ3dHxkA. See also **Bugs and Bubbles** http://itunes.apple.com/app/bugs-and-bubbles/id500195730?ls=1&mt=8 and **Bugs and Buttons** by Little Bit Studio, LLC http://itunes.apple.com/us/app/bugs-and-buttons/id446031868?mt=8

Highlights Hidden Pictures Puzzles, $1.99, by Highlights for Children, Inc. https://itunes.apple.com/us/app/highlights-hidden-pictures/id567496439?mt=8 contains 18 famous hidden picture illustrations; 9 organized around the theme "Bedtime," and 9 for "Fall Fun." The row of hints can be hidden if you like, to make the game more challenging. There's also a hint system that puts a circle around an item. A quick look: http://youtu.be/Vo5Bd9TIZS4

Build and Play 3D - Plane, Train, Robot and More, $1.99, by Pronetis Kids http://itunes.apple.com/us/app/build-play-3d-plane-train/id545626598 looks a lot like Sort and Stack Toys, with nine snap together machines and vehicles that can be dragged and dropped into place. Incorrect answers just fall back to the side; correct positions fall into place with a satisfying snap. This is a great excellent starter app. See also **Sort and Stack Toys 3D** http://itunes.apple.com/us/app/sort-and-stack-toys-3d/id545625065

**Go Go Games**, $1.99, by Go Go Games https://itunes.apple.com/us/app/go-go-games/id565022507?ls=1&mt=8 contains three well-designed and well-leveled classification games that start easy, and get harder. The transportation theme will have a strong appeal to some children.

Math Facts

Here's a universal truth -- every child will need to know their times tables. The general thinking is that fluency with these base level skills -- e.g., knowing that 8 x 8 = 64, without a pause, can create a foundation for later higher order math problem solving. Here are some apps for the job.

Motion Math: Hungry Guppy, $2.99, by Motion Math Games http://itunes.apple.com/us/app/motion-math-hungry-guppy/id542563075?mt=8 connects small fingers with big concepts -- namely the principal of additive sums. The better you do, the harder the challenge. This is the fifth app from the Stanford University-inspired app studio Motion Math, and the second that deals with a hungry fish. See also **Motion Math: Wings**. It is an excellent addition to any iPad, especially if it is located in a preschool or Kindergarten classroom. See the video at http://youtu.be/ZY3vxOxm1wA
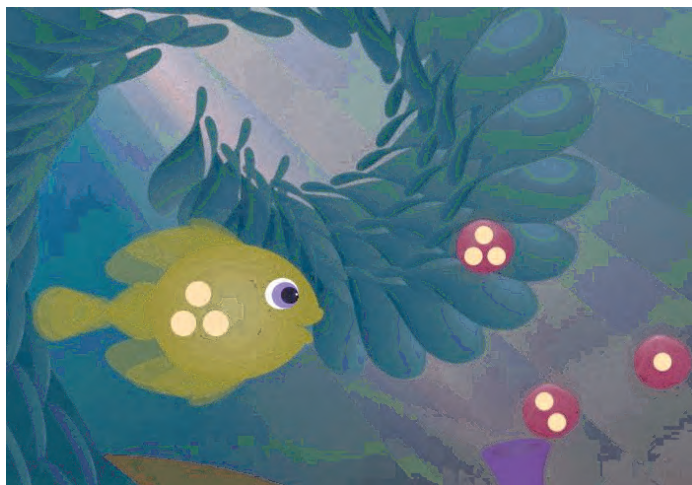
Park Math, $1.99, by Duck Duck Moose Design https://itunes.apple.com/us/app/park-math-by-duck-duck-moose/id391407836?mt=8 contains seven easy-to-explore games, each with multiple ways to explore early math concepts. It is possible to toggle between two levels of play (preschool and kindergarten) The iPad version, called Park Math HD includes First Grade, with counting up to 100 and addition/subtraction with numbers up to 20.

Montessori Numbers, $2.99, by L'Escapadou http://bit.ly/montessorinumbers contains four number sandboxes in one app, each good for letting a preschooler freely experiment with the first mathematical relationships using number sets that range from 0 to 1000. It is rare to find an early math app that offers this type of number range and flexibility. Here's a quick look: http://bit.ly/numbersvideo and http://bit.ly/numbersvideo2.

Count to 100!, $1.99, by FuzzyBees https://itunes.apple.com/ca/app/count-to-100!/id562791055?mt=8 is an interactive base ten (10 x 10) counting board that can be filled in with taps. A child can discover "there are twenty 5's that make up 100," or "counting by 12 creates stairsteps." You can either freely explore, or set up a challenge, such as count by 2s, 5s, 10s and 25s. We like how the app starts directly by showing the counting board, and the options are easy to find. Here's a quick look: http://youtu.be/canYevjHBOs.

Math vs Zombies, $free, by Tap to Learn https://itunes.apple.com/us/app/math-games-math-vs-zombies/id470896560?mt=8 offers a fun and addicting format for practicing your subtraction, multiplication and division facts. If you're expecting higher order math thinking with this app, look elsewhere. The longer you play the more levels you unlock. The zany theme can be the sugar that helps the medicine go down. Video preview at http://youtu.be/XO0W1MXBUvw.

Geography

Having a copy of Google Earth is always useful, to supplement the traditional classroom globe. Here are some other apps to make the world seem a bit smaller:

Flat Stanley (App), $free, by Flatter World Inc. http://itunes.apple.com/us/app/flat-stanley/id382161936?mt=8 was inspired by the 1963 book "Flat Stanley" by Jeff Brown, with help from Dale Hubert, a Canadian elementary teacher. This app rendition lets you superimpose a Flat Stanley cutout character over a photo taken with your iPad's camera.

Barefoot World Atlas, $7.99, by Barefoot Books https://itunes.apple.com/gb/app/barefoot-world-atlas/id489221652?mt=8 combines highlights from each country with realtime facts from Wolfram/Alpha. All in all, there's plenty to explore, and the spinning globe organization works far better than a book.

Stack the States, $.99, by Dan Russell-Pinson https://itunes.apple.com/us/app/stack-the-states/id381342267?mt=8 is a bit tricky for most Kindergarteners because of the reading involved, but the game-like format introduces the names, locations, major cities and sizes of the US states, plus flags.

Art & Creativity

Touch screens are excellent experimental scribble pads that let you try out visual ideas.

Paint My Wings, $.99, by Toca Boca https://itunes.apple.com/us/app/paint-my-wings/id432858701?mt=8 provides a playful introduction to symmetry, starting with a butterfly who says "paint my wings!" Using a palette of colors, you finger paint lines or dots on one of the wings, and can see it mirrored on the other wing, in real time.
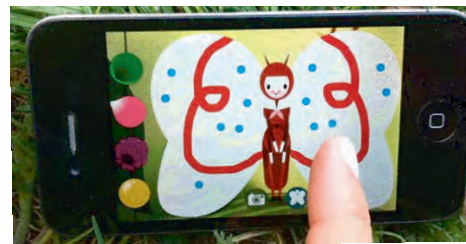
MadPad, $.99 for iPhone, $2.99 for iPad, by Smule, Inc. http://itunes.apple.com/us/app/madpad-remix-your-life/id456072329?mt=8 turns your camera equipped iPhone or iPad into a sound mix board. Instead of using existing songs and beats, it lets you capture everyday sounds, which can be recorded and played back or warped with a two finger swipe. Look out for in-app sales and sponsored content.

Foldify, $2.99, by Pixle http://itunes.com/apps/foldify plays with your notion of 2D and 3D space, by letting you scribble on one dimension (the flat, 2D part) and see the result, in real time, on a 3D rendering that you can spin with your finger. Take a quick look, at http://youtu.be/xSjLjbHcsW4.

Music

Can't afford your own music teacher? Here are some apps for your music folder.

TonePad, $.99 by LoftLab https://itunes.apple.com/us/app/tonepad-pro/id318285192?mt=8 is a musical creativity experience that lets you compose your own rhythmic simple songs by arranging dots (or notes) on a 16x16 grid. Like the pins on a music box, each dot activates a tone, making it easy to make rhythmic and melodic patterns.

A Jazzy Day, $4.99, by The Melody Book https://itunes.apple.com/us/app/jazzy-day-music-educa-tion/id493451508?mt=8 introduces children to Jazz music and it's instruments. There are no cheesy synthesizers here. In addition, there's a full jazz Big Band arrangement that can be mixed and matched, making it fun to play with various parts of the band to hear how they turn into a "conversation."

Dr. Seuss Band, $.99, by Oceanhouse Media http://itunes.apple.com/us/app/dr.-seuss-band/id474940131?mt=8 is a zany Dr. Seuss horn, with eight buttons that can play a whole-tone scale. You can either freely improvise by touching the keys, or you can use the one octave keyboard on the bottom of the screen to earn points by matching songs from the song book.

Toca Band, $2.99, by Toca Boca https://itunes.apple.com/us/app/toca-band/id521640648?mt=8 turns your iPad or iPhone into a playful, powerful musical sandbox. Our testers wished for a pause button, so you could silence your band without having to rebuild it from scratch. Plug your iPad or iPod Touch into a set of speakers, and have a classroom dance, where different children can take control of different instruments.

The Orchestra, $13.99, by Touch Press https://itunes.apple.com/us/app/the-orchestra/id560078788?mt=8 turns an iPad an interactive tour of a working symphonic orchestra. It is well crafted and immersive, and introduces some ideas such as music notation and scores. The app was created by Touch Press, in partnership with the Music Sales Group and Esa-Pekka Salonen. This is a big app -- 1.95 GB.

Social Emotional Development

Four Little Corners, $2.99, by DADA Company https://itunes.apple.com/app/four-little-corners/id598573155 is a wonderful adaptation of a printed children's book by Jerome Ruillier, adapted for the iPad by Dada Company, from Spain. The story is about a square who can't get through a door, because it is the wrong shape. Our video demo is at http://youtu.be/Iifcw6A3d3M.

Nash Smasher!, $1.99, by Crab Hill Press https://itunes.apple.com/us/app/nash-smasher!-for-ipad/id405340373?mt=8 is a 23 screen book about Nash, a 7 year old boy who likes to break things -- a theme that any child can understand. Each page has one or multi-stage hot spots, plus pull tabs and dials that let you do the smashing (and un-smashing). The story has a happy ending, as Nash learns how to control his impulses.

Indoor Recess

My PlayHome, $2.99, by Bluefish. https://itunes.apple.com/us/app/my-playhome/id439628153?mt=8 turns your iPad into a four room playhouse where just about anything can be moved around and re-arranged. This is a well designed, open ended play experience that children can enjoy in a small group.

More Trucks, $1.99, by Duck Duck Moose Design https://itunes.apple.com/us/app/id609771588 is the sequel to the first Trucks app; with four fun and playful vehicle-themed activities. Our testers especially liked putting out the fires, playing tic-tac-toe against the firehouse dog, and racing the drag racers. Quick look: http://youtu.be/aQhmzWyggM4

Pip and Posy: Fun and Games, $2.99, by Nosy Crow https://itunes.apple.com/us/app/pip-and-posy-fun-and-games/id514916095?ls=1&mt=8 is a well crafted collection of jigsaw puzzles, games of concentration and coloring books. There are five games in all, each featuring the art of the German book illustrator Axel Scheffler and the trademark British Nosy Crow narration. This is a great all-purpose app to have for a rainy day or a long car trip. For ages 3-9.

SmackTalk (App) 1.3, $1.99, by Marcus Satellite http://itunes.apple.com/us/app/smacktalk/id306752436?mt=8 See your voice coming out of a Chihuahua with Smack Talk ($1, 2-up), a sound morphing app that turns your iPad into an echo chamber.

Story Toys Jr. Farm 123, $free, by StoryToys https://itunes.apple.com/us/app/farm-123-free-storytoys-jr/id508002368?mt=8 features a solid design and playful 3D graphics. This particular story mixes farm animals with an all-to-common counting theme. What makes it stand out is the way the 3D graphics are synced with your screen movements, giving it a "book on a stage" effect. See also StoryToys Grimm's Snow White, $1.99, by StoryToys https://itunes.apple.com/us/app/grimms-snow-white-3d-interactive/id577460310?mt=8

Toca Hair Salon 2, $1.99, by Toca Boca https://itunes.apple.com/us/app/toca-hair-salon-2/id569632660?mt=8 is the second edition of Toca Hair Salon is just as zany, with some added frosting that makes it more fun.

Toca Tea Party, $2.99, by Toca Boca http://itunes.apple.com/us/app/toca-tea-party/id424174500?mt=8 Turn your iPad into a top-down view of a tea party complete with slurps and spills, with a real-looking set of tea cups, juice glasses, pastries and so on. The experience is high in child control, and the sounds add a lot to the play.

Amendments To COPPA and
Protecting Children's Privacy

By Elizabeth Bruns and Kimberly Nguyen, Mitchell Silberberg & Knupp LLP

Elizabeth Bruns and Kimberly Nguyen are lawyers with the firm Mitchell Silberberg & Knupp LLP. This article was submitted voluntarily to CTR. Neither party was compensated (this is not an "advertorial").

Last December the Federal Trade Commission adopted amendments to the Children's Online Privacy Protection Act, otherwise known as COPPA. These changes will go into effect on July 1, 2013. This article discusses the importance of the Act from a legal point of view, and how some of the recent revisions might affect the development and operation of children's apps. First some definitions.

What is COPPA?

COPPA (see http://www.ftc.gov/ogc/coppa1.htm) is the only child-specific federal privacy law in the U.S. It was enacted by Congress in an effort to protect children from unfair or deceptive acts relating to the collection of their information online. Through this law, Congress made clear that parents should be the gatekeepers of their children's personal information online and that parents need clear and accurate information about online practices. The COPPA Rule requires website operators and online service operators to follow certain rules in requesting, using and disclosing children's personal information.

The current Rule amendments are the result of a mandatory review in 2010, when the FTC acknowledged that the technological landscape and the ways children interact online have changed drastically since COPPA was enacted.

One of the main focuses of the amendments is on mobile application privacy and how the Act applies to mobile technology. The FTC released two reports on mobile applications ("apps") for children and found that most app developers fail to disclose adequately (or at all) to parents their collection and disclosure practices with respect to children's information. App developers should be aware of their responsibilities under COPPA and parents should be informed of their rights with respect to the collection and disclosure of their children's personal information.

The basic requirement of COPPA is that operators of commercial websites and online services (including certain apps) must provide notice and obtain parents' consent before collecting personal information from children under age 13. We will talk about some of the details of this basic requirement below.

Do all apps need to comply with COPPA?

COPPA applies to commercial websites and online services directed to children that collect, maintain, or provide the opportunity to disclose personal information ("PI"). A mobile app is considered an "online service" if it sends or receives information over the Internet and allows children to play network-connected games, engage in social networking activities, purchase goods or services online, receive behaviorally targeted advertisements, or interact with other content or services.

In determining whether an app is directed to children, the FTC will consider the app's subject matter and content; whether it uses animated characters; the age of models; child-oriented language, graphics, activities, incentives; whether the app has child celebrities or celebrities appealing to children; whether advertising, promoting or appearing on the app is directed to children; evidence about the intended audience and empirical evidence about audience composition.

> "... app developers ... are strictly liable for children's personal information..."

The revised Rule clarifies that app developers of child-directed websites are strictly liable for children's personal information collected through child-directed websites or their services, by independent entities or third parties who collect or maintain such information on behalf of the app developers, such as in the cases of advertising networks and downloadable plug-ins.

Because of this strict liability standard, app operators should go beyond their contract with the network or plug-in and investigate if the network or plug-in is able to, and is actually, complying with COPPA.

The new Rule allows an app that is child-directed, but which does not target children as its primary audience, to age screen users to provide COPPA protections only to children under 13. COPPA also applies to operators of general audience sites and online services (including tween or teen sites) who have actual knowledge that they collect PI of children under 13. An operator will have "actual knowledge" if a child self-identifies as under 13 through an age screen or the operator is notified by a parent or other person.

What is personal information?

PI is individually identifiable information about an individual collected online. The new amendments expand the definition of PI to include: Photos, videos or audio files containing a child's image or voice; screen/user name if it functions in the same manner as online contact information; geolocation information sufficient to identify street name and name of city/town; and Persistent Identifiers used to recognize a user over time and across different websites or online services (including cookie strings, user IDs, IP addresses, processor or device serial numbers, unique device identifiers).

The new Rule provides three new exceptions to the requirement to obtain parental consent before collecting PI from children under 13:

(1) if an app collects a persistent identifier (but no other PI from a child) for the sole purpose of providing support for internal operations;

(2) if an app collects a parent's online contact information but no other PI from a child solely to keep the parent informed of the child's activities; and

(3) if a plug-in collects a persistent identifier on a child-directed app but no other PI from a previously registered user who is 13 or older.

App operators also must provide parents access and the opportunity to delete their child's PI and optout of future collection.

How can an app developer obtain parental consent before collecting children's PI?

Under the existing Rule, the appropriate methods of obtaining verifiable parental consent include consent forms via postal mail or facsimile, or a credit card to complete a transaction, or telephonic verification of the parent, or emailing the parent with the requirement that the parent acknowledge and respond to the email.

The Rule is amended to include electronic scans of signed consent forms, consent via video-conference, use of a debit card or other online payment system if it provides notification of each transaction and use of a parent's government-issued ID checked against a database, but only if the parent's ID is deleted promptly after verification.

What should an app developer include in its privacy disclosure notice?

Under the new Rule, which streamlines the disclosure requirements, app developers must provide a short, simple statement that includes:

(1) what information is collected from children, including whether the mobile app allows a child to publicly post personal information;

(2) how the app operator uses the information; and

(3) the disclosure practices for such information.

Operators must post their privacy policy and links to the policy wherever personal information is collected, give parents direct "just-in-time" notice of its practices and obtain verifiable parental consent before collecting PI from children, with limited exceptions. Such disclosure notice need only be placed on the home or landing screen, and not at the point of purchase, if any.

What new provisions does the amended Rule have regarding data security?

The new Rule adds a requirement that operators take reasonable steps to release children's personal information only to parties capable of maintaining its security. When an app developer discloses children's PI to third parties, they must inquire about the third party's data security capabilities and receive assurances (either by contract or otherwise) that the third party is capable of maintaining and will maintain the security, confidentiality and integrity of such information. However, the app developer will not be required to ensure that the security, confidentiality and integrity of such information is maintained by the third party.

Further, the new Rule requires operators to retain children's PI for only as long as is reasonably necessary to fulfill the purpose for which it was collected and to properly delete PI by taking reasonable measures to protected against unauthorized access to or use of such deleted PI.

Disclaimer: This article is offered only for general informational and educational purposes. It is not offered as and does not constitute legal advice or legal opinion. You should not act or rely on any information contained in this article without first seeking the advice of an attorney. This article is not meant to be a comprehensive review of all of the COPPA Rule amendments, but rather an overview of some of the key changes that might affect app development and use.

Here's an alphabetical listing of new products, along with a full review, specific ratings and tester feedback. The "Entry Date" refers to the date we first learned of the product.

A Troop is a Group of Monkeys

Sixteen beautiful illustrations by Pamela Baron are combined with good music, non-watered down narrative and limited interactive design in this ebook. The idea? To introduce a very specialized set of vocabulary words: plural nouns for animal groups (such as "a pride of lions" and "a parliament of owls") by way of a musical, rhyming story. The story was written by Julie Hedlund and the original music produced by Tim McCanna. Each of the animal groups responds in some way, although the page turns are not responsive, and there are interesting things on many screens that don't do anything. In addition, there is no support for emerging readers. This app is the first in a trilogy about colorful collective nouns for animals. It will also be released as a hardcover book.

Details: Little Bahalia Publishing, http://littlebahalia.com/. Price: $3.99. Ages: 3-8. Platform: iPad. Teaches/Purpose: reading, science, biology, vocabulary. Rating (1 to 5 stars): 3.8 stars. Entry date: 2/19/2013. [WB]

Ease of Use	9
Educational	7
Entertaining	N
Design Features	7
Good Value	7

75%

A pandemonium of parrots begins to take flight.

ABC Farm

Your retinal display will sizzle with this collection of 210 (or so) clear open-source photos of farm life, and farm animals. Each is organized by it's starting letter (for example, R is for Rooster). New to this version -- the ability to toggle between Spanish or English. Many of the pictures also have simple letter related games or pre-screened YouTube videos.

Need to know: You'll need an online connection in order to view the videos and the background music can drive you from the room, but it can be adjusted in the parent options. Other apps in the ABC series include ABC Christmas, ABC Zooborns, ABC House, ABC Food, ABC Go, ABC Music, ABC Play and ABC Wildlife. See http://youtu.be/YvCjVvF0hQ0

Details: Peapod Labs, www.peapodlabs.com. Price: $2.99. Ages: 3-8. Platform: iPad, iPhone. Teaches/Purpose: language, English and Spanish. Rating (1 to 5 stars): 4.6 stars. Entry date: 3/15/2013. [WB]

Ease of Use	9
Educational	10
Entertaining	9
Design Features	9
Good Value	9

92%

gallo

Alphabet Animals: A Slide and Seek Adventure

Ease of Use	9
Educational	9
Entertaining	8
Design Features	9
Good Value	9

88%

Letters are turned into beautifully illustrated animals in this simple alphabet-book app that is an ideal way to let children playfully discover some excellent illustrations. You can also make your own namecard out of the animals and save it to your photo library.

The app features the art of Suse MacDonald (the celebrated children's illustrator). You can either flip (swipe) through the animals, tapping to hear the letter, or you can pull a tab, to see the letter that inspired the animal gradually revealed, pop-up book style. As the letter is revealed, the animal animates; a nice touch. Alphabet Animals is a part of the Auracle line from Auryn Inc. and is based on the book by the same name. The bottom line: The interactivity is subtle, and hardly innovative, and alphabet apps are a dime-a-dozen these days. Get this one for its artistic merits. Quick look: http://youtu.be/1XrpAewvxGw.

Details: Auryn, Inc., http://auryn.com/. Price: $1.99. Ages: 3-6. Platform: iPad. Teaches/Purpose: reading. Rating (1 to 5 stars): 4.4 stars. Entry date: 3/19/2013. [WB]

ArtSee Studio

Ease of Use	9
Educational	9
Entertaining	8
Design Features	7
Good Value	9

84%

iPad cases for children abound, but if your intention is to turn your iPad into a child's easel, ArtSee Studio (WowWee.com, $40) is the best bet. Designed to offer both protection against a drop, as well as reduce the chance a preschooler will explore your email, the plastic case includes a home button lock, as well as six stamps, each designed to launch a set of creativity options. After securing your iPad in place, you download the free app (called ArtSee Studio).

You can then start using the five stamp tools and the stylus to freely create. The one weak point -- our testers found it hard to "undo" -- once you put a stamp down, how do you make it go away? But they were impressed by the powerful drawing tools, and the way the stamps could become animated and moved around the screen. It is easy to save projects, and there's a set of games such as Connect the Dots. The case is compatible with all generations of iPad (iOS 5 & iOS 6) and the kit includes one case, five tools, a pen and instructions.

Download the app: https://itunes.apple.com/us/app/artsee-studio/id549729375?mt=8

See the video at http://www.youtube.com/watch?v=JJI_9cklTKI

Details: WowWee USA, Inc., www.wowwee.com. Price: $40. Ages: 3-up. Platform: iPad. Teaches/Purpose: art, creativity. Rating (1 to 5 stars): 4.2 stars. Entry date: 3/15/2013. [WB]

Big Cat Race

Ease of Use	6
Educational	6
Entertaining	
Design Features	3
Good Value	3

45%

A good idea that is poorly implemented, this app tries to turn your iPhone or iPod Touch into an pedometer by using the accelerometer. The screen goes black when you run and it is confusing to use.

Details: GenzPlay, www.genzplay.com. Price: $0.99. Ages: 4-up. Platform: iPad, iPhone, iPod Touch, Android. Teaches/Purpose: running, physical fitness. Rating (1 to 5 stars): 2.3 stars. Entry date: 9/25/2012. [WB]

Chalk Box Story, The

This is a good idea, the art is excellent, but the content is limited, and there's no option to freely draw.

The story is based on the idea that if a box of chalk could talk, the colors would have specific suggestions. You start by using the blue chalk to color the sky and ocean, the green to color the leaves of the trees, and so on. As you color, you help a boy get off a desert island. The idea works... the first time. But there's only one story, with limited content. A free-drawing option would also be nice, given the easy to use sticks of chalk and animated sticker collection.

Details: Auryn, Inc., http://auryn.com/. Price: $2.99. Ages: 4-11. Platform: iPad. Teaches/Purpose: creativity. Rating (1 to 5 stars): 3.9 stars. Entry date: 2/9/2013. [WB]

Ease of Use	8	78%
Educational	7	
Entertaining	7	
Design Features	9	
Good Value	8	

Doki Explores the Ocean

Five extremely typical activities are bundled into one app, making us wonder "does the world really need another coloring book?" Especially one with looping music that can't be controlled. Created by LivoBooks in partnership with the Discovery Kids, this app is supposed to help you learn about sea life.

Features include the ability to toggle between English, Spanish and Portuguese although there's very little language in the app.

Details: LivoBooks, www.livobooks.com. Price: $3.99. Ages: 4-7. Platform: iPad, iPhone. Teaches/Purpose: classification, logic, memory. Rating (1 to 5 stars): 3.5 stars. Entry date: 1/30/2013. [WB]

Ease of Use	8	70%
Educational	7	
Entertaining	7	
Design Features	7	
Good Value	6	

Find the Letters HD

Designed to provide practice discriminating between commonly reversed letters, this is a large set of leveled hidden picture puzzles. The picture is hidden behind a large 13 x 13 square grid.

To find it you must study all the squares, to find the ones marked by a specific letter, and then a color code key to fill in the picture.

These are letters that are commonly confused due to reversal problems -- letters like d and b, T and F; E and H, p and q; and some are harder than others. All the squares with d might be red, and all the b's might be white, for example. There are four challenge levels.

Details: EdNinja, http://edninja.com/. Price: $4.99. Ages: 3-up. Platform: iPad. Teaches/Purpose: reading, visual and perceptive abilities, visual discrimination. Rating (1 to 5 stars): 4.3 stars. Entry date: 1/30/2013. [WB]

Ease of Use	9	86%
Educational	8	
Entertaining	8	
Design Features	9	
Good Value	9	

Highlights Hidden Pictures Puzzles

Ease of Use	8
Educational	9
Entertaining	8
Design Features	9
Good Value	9

86%

A quick look: http://youtu.be/Vo5Bd9TIZS4

These days there are hundreds of apps that ask you to find the hidden object on a touch screen. But for most people older than 20, the original "Hidden Picture" activity was the one that appeared each month in Highlights for Children magazine.

Today, a selection of those same puzzles are on the iPad's multi-touch screen. Instead of coloring the item in, you give it a tap with your fingertip, to see it filled in with color, automatically. The more you find, the more your picture fills in, until the entire scene is complete.

The app comes with 18 illustrations; 9 organized around the theme "Bedtime," and 9 for "Fall Fun." Each puzzle contains between 12 to 27 hidden objects which are presented at the top of the screen by way of a scrollable row of objects. The row of hints can be hidden if you like, to make the game more challenging. There's also a hint system that puts a circle around an item.

The background music can be turned on or off from the parent menu. You can also toggle between three languages or reset the high puzzle scores, which are also saved in the cloud, using Apple's Game Center.

Features include an ongoing scoreboard that remembers which puzzles a child has completed, and a parents menu includes additional puzzle packs ($0.99 each) and the ability to switch to Spanish or Chinese. Note that all the purchases are hidden away from children two layers deep and behind a sliding button task. Additional theme packs can be purchased for $.99 each from a parent menu that is locked behind a sliding puzzle.

Details: Highlights for Children, Inc., www.highlights.com. Price: $1.99. Ages: 4-up. Platform: iPad, iPhone, iPod Touch. Teaches/Purpose: logic, visual discrimination, matching; Spanish and Chinese. Rating (1 to 5 stars): 4.3 stars. Entry date: 2/26/2013. [WB]

Hive Activity Centre, The

Ease of Use	7
Educational	6
Entertaining	8
Design Features	6
Good Value	6

66%

Five mid-quality, typical activities feature the animated bee characters from the Disney Junior TV show. There's a jigsaw puzzle, a game of concentration, racing, coloring and a spot the difference activity. Features let you adjust the sound and difficulty level. There are many other options that do the same thing that are better designed.

Details: Avanquest Software Publishing Ltd., www.avanquest.co.uk. Price: $0.99. Ages: 4-12. Platform: iPad, iPhone. Teaches/Purpose: logic, memory. Rating (1 to 5 stars): 3.3 stars. Entry date: 3/19/2013. [WB]

IBM Think

Free and fascinating, this app turns your iPad into a hands-on museum designed to let you explore some big ideas -- stuff like how different kinds of maps have developed, the role of key inventions, and other big ideas.

Using a sunflower-like main menu, you can explore five idea clusters simply by touching the petals which are labeled seeing, mapping, discover, understanding, believing and acting.

This is the kind of app that is nice to have in your library, to increase the chance that your child might stumble into a powerful concept that just might plant a seed. Runs on iPads running iOS 5.0 or later. Content includes a 10-minute HD film. Note that this is a big 500 MB download. Created by SYPartners, Motion Theory and Mirada.

Details: IBM Corp., www.ibm.com/pc/multimedia. Price: $free. Ages: 10-up. Platform: iPad 5.0, 500 GB. Teaches/Purpose: science, social studies, innovation, art. Rating (1 to 5 stars): 4.6 stars. Entry date: 3/13/2013. [WB]

Ease of Use	8
Educational	10
Entertaining	9
Design Features	9
Good Value	10

92%

Legend of Momotaro, The

With a design inspired by a scroll (or Emaimono) instead of a page, this beautifully illustrated folk tale contains ten scenes, each containing "hidden secrets." The story is the famous Japanese fairytale of Momotaro. It's a familiar one... an old man and woman want a child. Their wish is magically granted in a surprising way... by way of a peach.

You can touch the text to have the story read to you, or use your finger to scroll to read to yourself. The app features ambient sounds from Japan.

Features include original illustrations; animations and sounds; narration and both read-to-me or read-by-myself modes; plus 120 interactive elements that introduce Kanji. Because some of the narration is provided by native Japanese speakers, this app is good for providing informal exposure to the Japanese language. Note that the text is very small on the iPad mini, despite the ability to zoom in.

Details: GhostHand Games, LLC, www.ghosthandgames.com. Price: $2.99. Ages: 5-up. Platform: iPad (179 MB). Teaches/Purpose: Japanese folk tale, language, Kanji, Japanese. Rating (1 to 5 stars): 4 stars. Entry date: 11/20/2012. [WB]

Ease of Use	8
Educational	
Entertaining	
Design Features	
Good Value	

80%

Leo Lion Band

Children can mix-and-match their melodies by building a band out of animated animals. We were less than impressed by the animated graphics and synthesized songs, but we did like the ability to freely adjust the speed of the song, and the volume of each track.

Content includes three songs (Twinkle, Twinkle Little Star, If You're Happy and You Know It, and Head, Shoulders, Knees and Toes). There are 11 animals to choose from, each with its own instrument and style and you can use a dice to change all players and the song. The best feature is that you can change the volume of each player by dragging the character up or down.

Details: Soundical Oy, http://www.soundical.com. Price: $1.99. Ages: 2-8. Platform: iPad, iPhone. Teaches/Purpose: music, instruments, rhythm, pitch, volume. Rating (1 to 5 stars): 4.3 stars. Entry date: 1/2/2013. [WB]

Ease of Use	9
Educational	9
Entertaining	8
Design Features	8
Good Value	9

86%

Luigi's Mansion: Dark Moon

Ease of Use	8
Educational	N
Entertaining	9
Design Features	9
Good Value	8

85%
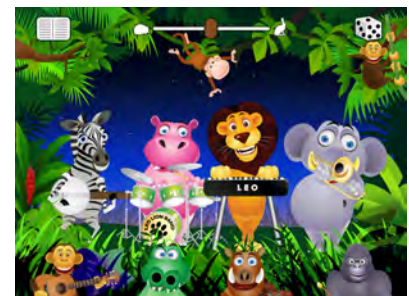
Luigi's Mansion: Dark Moon is the sequel to the 2001 GameCube release. This time, Luigi explores six haunted Mansions to find the pieces of the shattered Dark Moon, hunting down the spirits while collecting coins, keys, and gems.

This edition nicely leverages the abilities of the 3DS. It puts a map and your progress on the lower screen so you always know where you are and how you're doing, and you can use the 3DS camera and motion sensing when fighting or exploring. The controls are easy to use and learn, even if you've never played this game before. There's plenty to do, plus there's a multiplayer mode that I did not try in the game that we downloaded.

We liked how easy it was to explore. Sometimes you'd be hunting, other times collecting. Weaknesses to note: at some points, the controls feel limited (e.g., while using the Poltergust). All in all, however Nintendo has done a great job reviving Luigi's ghost-hunting career.

Details: Nintendo of America, www.nintendo.com. Price: $40. Ages: 6-up. Platform: Nintendo 3DS. Teaches/Purpose: logic, problem solving. Rating (1 to 5 stars): 4.3 stars. Entry date: 6/13/2011. [MJD]

Mask Jumble Animals

Ease of Use	9
Educational	9
Entertaining	9
Design Features	9
Good Value	10

92%

Here's an app that can instantly put a smile on any child's face. How? It turns your iPad or iPhone into a magical mirror that can turn your face into an animal mask. The app uses face recognition technology (of the variety used in most digital cameras) to "find" your eyes, nose and mouth through your iPad or iPhone's front facing camera. Instantly, you see different ears, eyes, hair and other facial features from ten different animals. As you move, the mask stays stuck on your face; and you can scroll through various parts to test out different looks.

Other content includes a matching game and a strawberry catching game for you to catch in your mouth. When you catch enough you unlock a new animal mask. You can also take pictures of yourself for your in-app gallery, and share custom postcards of the animal-you with friends and family. Note: to render the animal-you, the app must be able to see your whole face clearly, the lighting should not be too bright or too dark, and you must hold the device steady and keep your face centered in the mirror. Note that this app was a bit buggy on our iPad3, crashing unexpectedly but not frequently enough to make the app unusable. See also Mask Jumble Halloween.

Details: Pi'ikea Street, www.piikeastreet.com. Price: $1.99. Ages: 4-8. Platform: iPad, iPhone, iPod Touch (192 MB). Teaches/Purpose: creativity, self esteem. Rating (1 to 5 stars): 4.6 stars. Entry date: 8/28/2012. [WB]

Math vs Zombies

Ease of Use	9
Educational	7
Entertaining	9
Design Features	8
Good Value	9

84%

Fun and addicting but limited to basic math facts this app makes it fun to practice your addition, subtraction, multiplication and division facts. If you're expecting higher order math thinking with this app, look elsewhere. This app is about basic math facts practice.

Here's how it works: you start out by watching a stream of zombies as they slowly approach your hands. The zombies get closer and closer. You can always stop them by typing the correct answer. Note that earlier versions of this game used a gun which has been replaced by a freezing Ray. The longer you play the more levels you unlock.

The zany theme can be the sugar that helps the medicine go down, at least when it comes to math facts. Video preview at http://youtu.be/XO0W1MXBUvw

Details: Tap to Learn, . Price: $free. Ages: 6-12. Platform: iPad, iPhone. Teaches/Purpose: math, addition, subtraction, division, multiplication, basic math facts. Rating (1 to 5 stars): 4.2 stars. Entry date: 1/23/2013. [WB]
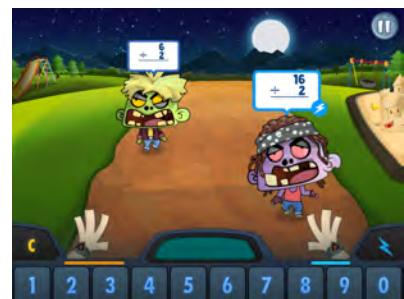
More Trucks

This sequel to the first Trucks from Duck Duck Moose offers four fun and playful vehicle-themed activities. Our testers especially liked putting out the fires, playing tic-tac-toe against the firehouse dog, and racing the drag racers.

Girls, don't be put-off by the truck theme. The play patterns driving this app will appeal to both genders and all ages. Some of the activities are tricky at first, so parents be on hand the first time through.

Note that this is the second truck-themed app from Duck Duck Moose. It works best as a one player game. Contents include a side-scrolling game where you move a truck by swiping left or right to get the truck near a burning building. Our 7 year old tester didn't like how the water seemed to shoot past the flaming windows. "Monster Trucks" was a favorite. You drive ten silly monster trucks through changing terrain experimenting with different speeds, directions, and jumps. The final two activities let you use a crane to construct and then knock down stacks of blocks or tow cars to the junkyard where they can be unloaded and stacked. Testers were less enthusiastic about the crane activities -- "it's two hard to build anything." The music in this app is noteworthy, including a sampling of jazz, blues and rock. This is Duck Duck Moose's 16th title and is a solid download. Quick look: http://youtu.be/aQhmzWyggM4

Details: Duck Duck Moose Design, www.duckduckmoosedesign.com. Price: $1.99. Ages: 3-7. Platform: iPhone, iPad. Teaches/Purpose: logic, fine motor development, temporal relations. Rating (1 to 5 stars): 4.5 stars. Entry date: 3/28/2013. [WB]

Ease of Use	8
Educational	8
Entertaining	9
Design Features	10
Good Value	10

90%

Nutcracker, The

One of the 20 noteworthy titles identified by the Jurors of the BolognaRagazzi Digital prize, Timbuktu's Nutcracker by Francesca Cavallo and Philip Giordano uses an innovative vertical (up and down) scrolling technique, where the activities and ideas unfold. The content is limited, however. If you design eBooks for children, this app is worth your consideration.

Details: Tibuktu Labs, www.timbuktu.me. Price: $1.99. Ages: 5-up. Platform: iPad, iPhone. Teaches/Purpose: language, some logic. Rating (1 to 5 stars): 4.3 stars. Entry date: 2/9/2013. [WB]

Ease of Use	9
Educational	8
Entertaining	9
Design Features	9
Good Value	8

86%

Play 123

Here's a collection ten "virtual manipulatives" -- innovative minigames that are easy to learn and full of responsive play opportunities that encourage discovery of some key number and logic concepts. Rather than being told what a triangle is, you get to sketch one; and later, pop it to make room for more shapes. There are several color-related activities, including one where you can discover how red and blue equals purple, and another where you spin a color wheel into motion to mix colors. Because the multi-touch features are enabled, more than one child can play at the same time. Even though this is a free app, we don't like the links to additional apps in iTunes in the main menu. Also bad: the sugary-sweet English narration; but neither are fatal flaws. The innovative design merits a download. See the preview video at http://youtu.be/mdissKySfIw.

Details: CJ Educations, www.cjeducations.com/. Price: $free. Ages: 2-up. Platform: iPad, iPhone. Teaches/Purpose: math, logic, memory. Rating (1 to 5 stars): 4.6 stars. Entry date: 11/19/2012. [WB]

Ease of Use	9
Educational	10
Entertaining	9
Design Features	9
Good Value	9
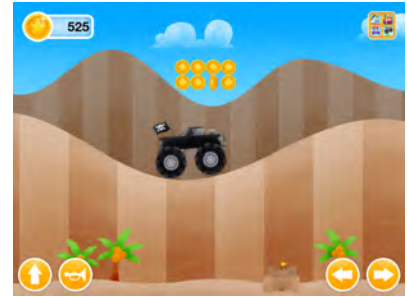
92%

PlayART

Elementary and middle school art teachers take note: this app turns your iPad into a classic-art flannel board, stocked with the key elements from five artists -- Vincent Van Gogh, Paul Cézanne, Claude Monet, Henri Rousseau and Paul Klee. You can either try to recreate the original masterpiece by dragging and dropping the elements, or compose your own.

Content includes 100 elements and 25 canvasses, from the artists' original paintings. You can tap, drag, flip, stamp or resize the elements on the different backgrounds to quickly experiment with different visual styles. Finished products can be saved in "My Museum" for later sharing on social media sites. An Artists Museum contains original paintings and a short child-narrated video biography about each artist. Need to know: The sound effects and music are strange but they can be muted, and the interface takes some getting used to. See http://youtu.be/NeeYiP9s4pU.

Details: Tapook Digital Publishing, www.tapook.com. Price: $3.99. Ages: 8-up. Platform: iPad. Teaches/Purpose: classical art, creativity. Rating (1 to 5 stars): 4.3 stars. Entry date: 7/16/2012. [WB]

Ease of Use	8	86%
Educational	9	
Entertaining	8	
Design Features	9	
Good Value	9	

Pookie's Snow Day

This is a very pleasant, beautifully illustrated experience, although it is limited in terms of content. Consisting of nine interactive screens by Kati Nawrocki, children will find something to explore in each scene. In the story, you help Pookie the hedgehog return home before winter arrives. It features watercolor cut-out illustrations, gentle music and the voice of British narrator Phil Sayer, and it would make a nice bedtime story.

Each scene features interactivity. For example, children can forage for food on the forest ground, help Pookie cross a rushing river, and dress him for winter. The app also features sorter-box puzzles, riddles, and chance games.

There is no text scaffolding. Weaknesses include looping background music, the use of some standard command prompts which require reading, and a prompt to save work directly to Facebook. An open-ended creativity activity lets children make their own scenes. Children can also create their own artwork by combining images and backgrounds from the story with their own photos and drawings.

Details: Gutpela Interactive, www.gutpela.com. Price: $3.99. Ages: 2-6. Platform: iPad. Teaches/Purpose: reading, language. Rating (1 to 5 stars): 4.4 stars. Entry date: 12/9/2012. [WB]

Ease of Use	7	88%
Educational	9	
Entertaining	10	
Design Features	9	
Good Value	9	

Sid the Science Kid - Sid's Slide to the Side

Sid has a problem -- his new sneakers have too much friction. This problem is described in two narrated stories, presented in a way that you help Sid the Science Kid (from the PBS show), by touching the screen to move things along. Each page is nicely narrated and the problem is one that children can relate to. But the entire experience feels very didactic and some of the experiments are confusing. For example in Push-a-Puck it's hard to know what material your puck is made out of. The most fun is Sid's Speedway, where you run into an oil slick which should reduce friction, but your car slows down. So it's not always clear just what is going on. But it is a fun activity. Additional content includes a song from Teacher Susie and real video footage that shows race car tires. This is the first in a planned series of "Appisodes" from Mindshapes that wraps activities and songs together with games. There is no in-app content to worry about.

Details: Mindshapes Limited, www.mindshapes.com. Price: $2.99. Ages: 3-7. Platform: iPad, iPhone, iPod Touch. Teaches/Purpose: science, friction . Rating (1 to 5 stars): 4 stars. Entry date: 4/2/2013. [WB]

Ease of Use	9	80%
Educational	8	
Entertaining	8	
Design Features	7	
Good Value	8	

Sight Words Learn to Read

Designed to teach your high frequency Dolch sight words, this app asks children to match the words by touching fish that contain words. Each fish is showcasing three different sight words.

Every correctly tapped word rewards your child with a star, and at the end of the round the stars are tallied up. If you child correctly taps more than 10 fish in the round they are awarded a prize to add to their very own fish tank. If your child does not achieve the minimum number of fish to pass the round, the word is then repeated to build memory retention.

It would be better if the fish reacted to the touch, to give instant feedback.

Key features include: two game plays – Pre-schooler & Kindergarten; an underwater theme with animated marine animals and plants; interactive game play and narration by Sharon Brogden; word repetition to encourage memory building; option for instructions to assist with game play; saved game play with reset function; and 40 rounds of game play for Pre-Schoolers and 52 for Kindergarten. Content and play format is limited -- this app can get boring. This app is designed for small screens.

Details: Karina Ranaldi, www.sightwordslearntoread.com. Price: $1.99. Ages: 3-6. Platform: iPad, iPhone, iPod Touch. Teaches/Purpose: reading, sight words, Dolch . Rating (1 to 5 stars): 3.9 stars. Entry date: 12/17/2012. [WB]

|		
Ease of Use	9	78%
Educational	8	
Entertaining	7	
Design Features	7	
Good Value	8	

Spacebook

It's not fancy, but this collection of 5,000+ astronomy photos is the kind of app that a young Carl Sagan would certainly have on his or her iPad or iPhone. Think of it as a customized browser for astronomy photos.

After you start the app, you see a grid of photo thumbnails that are constantly updated, which is why this app won't work unless your iPad is connected to the Internet. But the good news is that you'll always get some fresh photos whenever you start up this app. That's because the content comes from NASA's Astronomy Picture of the Day website. Each picture comes with a title, a paragraph descriptor, and related images. You can easily tag or share the photos, to make your own slide show. You can also easily share a photo to Instagram, twitter or Pinterest or Facebook. A search feature makes it easy pull up photos by any keyword you type. Want to see Jupiter? You'll find hundreds of photos. How about a giant crater? You'll find one. The photos include nebulae, planets, moons, meteors, comets, satellites, distant and nearby stars, eclipses, and rovers. You can also browse the "Popular" feed and see the Spacebook community's favorite image. Features include the ability to zoom into a photo, and a shuffle mode to browse images at random. You can either swipe through the photos or shake your device to jump to a random photo.

Again, this app isn't flashy, but it does deliver on the content.

Details: Nicholas Hughes, http://help.spacebo0k.com. Price: $2.99. Ages: 7-up. Platform: iPad, iPhone, iPod touch (Internet). Teaches/Purpose: astronomy, space, stars, solar system. Rating (1 to 5 stars): 4.3 stars. Entry date: 1/25/2013. [WB]

Ease of Use	9	86%
Educational	9	
Entertaining	7	
Design Features	9	
Good Value	9	
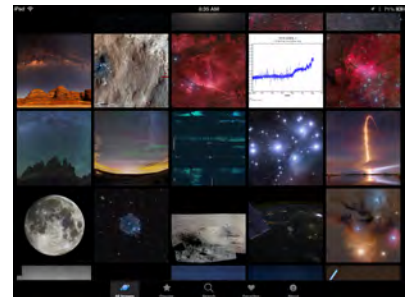
Stack the States

Do you know the state flag for North Carolina? Or which state borders Canada? This multiple-choice quiz game rewards you with more than a correct answer. You get a chance to drop the state onto a platform -- a process that also makes you more aware of a state's unique shape. Content includes the names, locations, major cities and sizes of the US states, plus flags.

Wrong answers disappear along with an explanation, but correct answers, give the the ability to drop the state.

The goal is to earn enough states to build a stack that reaches a high water mark. Because the states are depicted to scale (Texas is huge) you learn more than just facts. You also see how complex borders can be.

When you complete a level, you earn a new state that is placed on your personal map. The goal is to win all the states. Records are saved automatically, for up to six player profiles. See also Stack the Countries.

Note that the free version contains ads for other Dan Russell-Pinson apps, as well as prompts to upgrade on the main menu. But it's free -- so fair enough.

Details: Dan Russell-Pinson, http://dan-russell-pinson.com/. Price: $.99. Ages: 7-up. Platform: iPhone, iPad. Teaches/Purpose: geography, USA states. Rating (1 to 5 stars): 4.5 stars. Entry date: . [WB]

Ease of Use	8	90%
Educational	10	
Entertaining	9	
Design Features	9	
Good Value	9	

Step-by-Story - Caillou's Window – A Fingerprint Network App

Ease of Use	5
Educational	6
Entertaining	5
Design Features	3
Good Value	1

40%

A good idea surrounded by a money making scheme and some clunky design, this story creation activity asks children to make a story that features Caillou, using a multiple-choice style menu.

There are three options from the main menu: make, play and silly. Make lets you build a story, by choosing a setting (e.g., "Fall") and a main character. Your five part sentence might be: "Outside it was Fall, when Daddy saw Caillou skiing on a space dragon, on a shooting star." You can then go into the play mode to see the story retold, using blocky animation. It is not possible to control the speed of the playback, making you feel out of control. In addition, the variety of stories you can make is limited and impersonal. It would be better if you could insert your own name and/or photos in the story.

The money making scheme -- "A Fingerprint Network" -- uses coins to reward children for downloading and playing more paid content. The coins can be used in a device that resembles a slot machine called the "coin-o-copia." You earn more coins by downloading new games, playing them daily and inviting new friends to join. If you win, you can "use your coins for really really really fun things!" The pairing of low quality business tactics that exploit young children with low quality interactive design gives you two reasons for avoiding this product.

Details: Fingerprint Digital, www.fingerprintplay.com. Price: $.99. Ages: 2-5. Platform: iPad, iPhone 42 MB. Teaches/Purpose: language, sequencing, money. Rating (1 to 5 stars): 2 stars. Entry date: 3/14/2013. [WB]

TechPet

Ease of Use	7
Educational	N
Entertaining	9
Design Features	8
Good Value	7

78%

This virtual pet leverages the ability of your iPhone 3, 4, or 4s, or your 4th generation iPod Touch. You start by downloading the TechPet app and then you snap your device into the dog's head.

TechPet features voice/motion recognition that allows him to move, sing, and dance, and has voice playback in both your voice and in a puppy voice. The more you feed, play with, groom and take care of your puppy, the more features you can unlock. You can customize your puppy with digital bows, glasses, and other accessories. Other features include: games - the more you play the more you unlock; and play music from your iTunes playlist while TechPet sings and dances along. Up to six TechPets can sing and dance together. Testers liked the idea, but did not like sacrificing their iPhone or iPod Touch.

Details: Bandai America, Inc., www.bandai.com. Price: $60. Ages: 12-up. Platform: iPhone, iPod Touch. Teaches/Purpose: a virtual pet. Rating (1 to 5 stars): 3.9 stars. Entry date: 3/15/2013. [WB]

Timun Mas (Golden Cucumber)

Ease of Use	9
Educational	8
Entertaining	9
Design Features	8
Good Value	7

82%

Here's a nicely illustrated retelling of a traditional Indonesian folk story, about a brave girl who's trying to escape from an evil Ogre.

The app features illustrations, animations, music and interactivity, along with both Indonesian and English language, that allows both local Indonesians and foreigners to understand the flow of the story. Interactive features include the ability to tap the moon that passes by the house to see the house tremble; or you can water a small cucumber and see how it grows by holding the water bucket for a long time. You can also eat the cucumbers by tapping them one by one to clear up the passage of the Ogre.

Details: LooLooChoo, www.LooLooChoo.com. Price: $1.99. Ages: 3-8. Platform: iPad. Teaches/Purpose: reading. Rating (1 to 5 stars): 4.1 stars. Entry date: 8/9/2012. [WB]
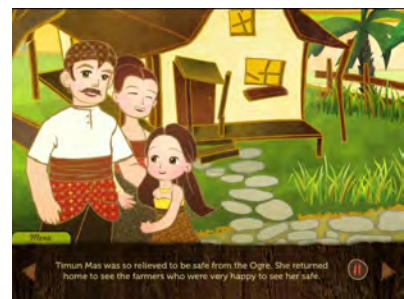
What Will I Be?

Wondering what you'll be when you grow up? Now there's an app for that. Featuring clear watercolor illustrations and pleasant British-sounding narration, the 19 page eBook follows a predictable pattern, with about four animated surprises on each screen. There are a lot a typical professions depicted on the pages, including a doctor, teacher, mechanic and sailor. We especially like how you can choose which gender you want featured in the story. The hidden animated features are playful. Children can activate the X-ray machine and see what's inside the dad, make the airplane zoom off the screen, or throw the enormous pie up in the air. A "find the hidden dog" on each page is a fun feature.

In terms of interactive design, this is nothing special. But the story, art and narration is top notch. Engagement is increased because a dog is hidden on each page. See the preview at http://youtu.be/Rd0Zx-tF5Cs.

Details: Digital Leaf Limited, http://www.digitalleaf.co.uk. Price: $2.99. Ages: 3-up. Platform: iPad, iPhone, iPod Touch, Android. Teaches/Purpose: reading, careers, social studies, counting. Rating (1 to 5 stars): 4.4 stars. Entry date: 3/19/2013. [WB]

Ease of Use	9	88%
Educational	8	
Entertaining	9	
Design Features	9	
Good Value	9	

Wince Don't Feed the WorryBug

Based on the book, Don't Feed The WorryBug by Andi Green, this app tells the story of a little monster named Wince who worries so much The WorryBug appears. Children can join Wince on his journey of self awareness. The illustrations are beautiful, and there's enough interactivity to support the story, which is delivered bite sized rhyming sentences.

Content includes five pages in the free trial version; 20 in the full version; each with background music that loops and can't be muted. Interactivity is limited. On one page it is possible to record your own worries using the iPad's microphone, and then play them back to make them disappear. This could be a great way to bring up the topic of managing worries with a child.

Details: iMagine Machine, www.imaginemachine.com. Price: $2.99. Ages: 4-7. Platform: iPad. Teaches/Purpose: reading, worrying, intrapersonal development. Rating (1 to 5 stars): 4 stars. Entry date: 12/13/2012. [WB]

Ease of Use	9	80%
Educational	8	
Entertaining	8	
Design Features	7	
Good Value	8	

Future Releases & Updates

This section contains a listing of products in the process of being reviewed, but not yet rated. We also include significant updates of older products.

Arthur's Birthday

Here's another Living Book brought back from the past by Wanderful. Inspired by the Marc Brown story, each page has read aloud text and interactive elements. In the story, Arthur and Muffy are each planning their birthday parties for next Saturday afternoon. Arthur creates a solution that includes everyone. Features include the ability to toggle between English and Spanish (French is available as an in-app sale), a challenge on each page (see if you can find all the confetti) and the ability to move between pages either with a swipe or with scrolling page navigation.

Details: Wanderful, www.wanderfulstorybooks.com. Price: $4.99. Ages: 3-7. Platform: iPad, iPhone, iPod Touch. Teaches/Purpose: language, Spanish, English. Entry date: 12/18/2012.

Camelio Tablet

Camelio is a 7" Android Tablet with "Personality Packs" built around licensed themes like Hot Wheels, Barbie, Monster High and Hello Kitty. The packs include a tablet case, and a code that unlocks branded content such as videos, music, books, wallpapers and widgets designed around the theme pack.

Up to five children can have a profile on one device. Features include a bumper, parental controls, Android 4.1 (JellyBean), front and rear-facing cameras and 25 pre-installed apps.

This is one of a line of tablets from Vivitar, a division of Saker International. See also the XO Learning Tablet.

Details: Sakar International Inc., www.sakar.com. Price: $150. Ages: 2-12. Platform:

iTooch Elementary School

Looking for a "curriculum in an app?" iTooch Elementary covers the official Math, Science and Language Arts curricula for 3rd, 4th and 5th graders in France. Each app (called a "title") is sold as an in-app sale, contains "40-50 chapters" and includes "1000-2000 activities." I tried the first level and found it hard to get started. You have to create a student account, and then download a free trial of one of the titles. It was hard to know if the download was free, a free trial, or we were being charged $4.99. I tried the first unit and found the presentation to be very much like a typical school test that has been nicely constructed although it was easy to find some sloppy problem construction. Take, for example, the photo of a jet flying with trees in the background, along with the caption "the jet is flying at 36,495 feet." It is easy to toggle between practice mode and test mode.

Content include 10 titles that can be tested for free before being purchased for $4.99 (Grade 3: Math, Language Arts, Science; Grade 4: Math, Language Arts, Science; Grade 5: Math, Language Arts, Science). Each contains 40-60 chapters per title with lessons, examples, and figures and 1,500-4,500 questions per title with clues, detailed explanations and images. Features include Apple Game Center integration with 35 achievements to unlock, an embedded calculator, a virtual blackboard and a lesson summary attached to each chapter. This concept is certainly promising.

Details: eduPad, . Price: $free trial. Ages: 5-12. Platform: iPad, iPhone, iPod Touch. Teaches/Purpose: math, reading, science, language, fractions, money. Entry date: 1/25/2013.

Kliki

Kliki is a simulation of a very simple leveled classification activity with a classic wooden puzzle in which kids must fit the suitable pieces. It features a variety of animals and bugs, along with sound effects.

Kliki is a nicely designed but limited jigsaw puzzle activity that would work well as a child's first app for children aged two and three years.

Details: NoBlinkTV, www.zoococo.com/en/. Price: $0.99. Ages: 2-up. Platform: iPad. Teaches/Purpose: classification. Entry date: 12/17/2012.

Maily: Your Kids' First Email

Designed to let a child send personalized emails consisting of finger drawings to parents, grandparents, and friends. Drawing tools include pencils, brushes, photos, backgrounds, stickers and expressions. Features include pencils and brushes to draw; text tool to write; 30 stamps; 30 personalized backgrounds; a photo camera and a personal inbox.

New emails from family arrive in your child's personal inbox, and with their personal contact list, they can reply and send emails. The app comes with parent controls so you can approve or reject messages before they are sent or received by your child. Designed in the UK.

Details: Maily, http://maily.com/. Price: $free. Ages: 4-up. Platform: iPad. Teaches/Purpose: email, writing. Entry date: 1/25/2013.
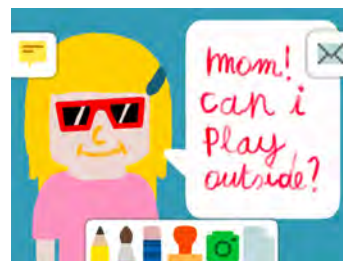
Recycle HD

This dry, multiple-choice app is designed to explain the why and how of the 3Rs - Reduce, Reuse, Recycle. Features include: Did You Know section featuring facts about the 3Rs; text to speech feature which allows each section of the text to be narrated; visual matching game to reinforce concepts learned in the app; and a quiz based on Bloom's taxonomy that is designed to test not only remembering and understanding but also applying, evaluating, and analyzing the concepts. The content of the app correlates to Common Core Science Standards in the USA. Reading required.

Details: Sprout Labs, www.sproutlabs.net. Price: $1.99. Ages: 5-up. Platform: iPad. Teaches/Purpose: recycling, science, the environment. Entry date: 11/6/2012.

Transformers: Fall of Cybertron

This third-person shooter for PS3 or XBox takes place on the Transformer's planet of Cybertron, where the final battles of the war are taking place, just prior to arrival on Earth. You can experience the war from either the Autobot or the Decepticon point of view as you work through missions designed around each character.

There are large scale battles, character specific abilities, character customization and online multiplayer modes. Content includes Combaticons, Insecticons, and Dinobots and characters that can convert from a robot into an alternate mode. For example, Grimlock can change into his T-Rex Dinobot in case he needs to breathe fire.

Details: Activision, Inc., www.activision.com. Price: $60. Ages: 10-up. Platform: Xbox 360, PlayStation 3. Teaches/Purpose: logic. Entry date: 8/31/2012.

XO Learning Tablet

Has Nicholas Negroponte's $100 laptop turned into yet another cut-rate Android children's tablet? Will the promised "global distribution" into developing countries take place in retail stores, like Walmart?

The XO Learning Tablet is part of a license agreement between One Laptop per Child (OLPC) and Vivitar, the camera company that was purchased by Sakar, a company known for making low priced, often low quality children's electronics. The company will release the XO Learning Tablet to U.S. retailers beginning with Walmart stores and Walmart.com Summer 2013.

The 7" Android device will feature OLPC's new XO Learning System, an Android-compatible software package for child-centric learning for ages 3-12. All content has been curated and selected for appropriateness and educational value, including applications, books, games and videos utilizing children's aspirations as a theme to drive learning experiences. XO Learning also offers a full range of parental controls, user IDs for up to three children, and a dashboard where the child or parent can review usage, types of content and the skills the child is developing. Separate English and Spanish content will be available with the press of an icon for bilingual families, with additional languages to be added in future releases.

Back in 2005, MIT Media Lab's Nicholas Negroponte attempted to bridge the divide between the digital haves and have-nots with a low-cost, child-centric computer, famously called the $100 laptop. This XO branded tablet shows that no dream can stand up to the glacial power of Moore's law. The tablet's success or failure is now in the hands of consumers. See the CTR video at http://youtu.be/llvEyLBgT50 and http://youtu.be/DdxPnJuYL1A.

Details: Sakar International Inc., www.sakar.com. Price: $150. Ages: 3-12. Platform: Android. Teaches/Purpose: An Android tablet. Entry date: 2/10/2013.