

The logo for Spraoi SCHOOL is centered in a white, irregular oval shape. The word "Spraoi" is written in a large, blue, rounded, cursive-style font. Below it, the word "SCHOOL" is written in a smaller, dark blue, bold, sans-serif font. To the right of "SCHOOL" is a small "TM" trademark symbol. The background is a solid blue color with various white dashed-line icons: a question mark in the top left, a lightbulb in the top right, a hand in the middle left, a clock in the middle right, a star in the lower middle, a wavy line at the bottom, a house in the bottom left, and a checkmark in the bottom right.

Spraoi SCHOOL

TM

Educational Apps and Games
for Home and School



Have Fun and Learn!

Spraoi School is an engaging series of apps and games that deliver bite-sized educational concepts that directly target curriculum objectives.

The Spraoi School series aims to support children in the development of mathematical, language and science-based reasoning — all through captivating and intuitive game-play!

'Spraoi' (*pronounced 'Spree'*) is the Irish word for 'play', and the concept of **learning through play** is at the heart of all of our educational apps and games.

ENGAGING AND INTERACTIVE

Spraoi School's engaging series of apps and games help young learners to explore hard-to-grasp educational concepts through gameplay and on

their own terms and at their own pace, irrespective of their individual ability. All games and apps under release from the Spraoi School series go through rigorous user-acceptance testing and multiple school pilots, with language and terminology review from educational experts worldwide.

OUR MISSION?

It's simple: to make intuitive and engaging apps that are directly aligned to Common Core State Standards, yet are as compelling as any game. We want our apps to spark and develop a lifelong interest in learning!

COMMON CORE STATE STANDARDS ALIGNMENT

Spraoi School products are aligned to Common Core State Standards. The Common Core State Standards provide a consistent, clear understanding of what students are expected to learn, so teachers and parents know what they need to do to help them. The standards are designed to be robust and relevant to the real world, reflecting the knowledge and skills that our young people need for success in college and careers.

In the United States of America, forty-five states, the District of Columbia, four territories, and the Department of Defense Education Activity have adopted the Common Core State Standards.

SYMMETRY SCHOOL

The first release in the Spraoi School series is Symmetry School – a captivating, brain-twisting game designed to support and encourage a fundamental understanding of the concepts of reflective & rotational symmetry.

Symmetry School encourages learners to use their intuition and imagination to explore symmetrical puzzles. Through gameplay, learners are aided in developing an essential foundation in spatial reasoning, problem solving and visualization.

Symmetry School: Learning Geometry – for iPad and iPad mini – is available to parents and teachers on the Apple App Store, and to schools and educational institutions through the Apple Volume Purchase Program (see page 6 for further details).

COMING SOON TO SPRAOI SCHOOL

Future releases in the Spraoi School series will include Fractions School, Symmetry School Junior, Number School and more!

The Spraoi School Series

Spraoi School aims to spark and develop a lifelong interest in mathematical, language and science-based learning – all through captivating and intuitive game-play!

Available now:

Have fun and learn with
SYMMETRY
SCHOOL

Coming soon:

Have fun and learn with
FRACTIONS
SCHOOL

Have fun and learn with
SYMMETRY
SCHOOL Jr.

Have fun and learn with
NUMBER
SCHOOL

To learn more about Spraoi School, go to:
www.spraoischool.com



Symmetry School

The first product in the Spraoi School series is Symmetry School — a captivating, brain-twisting game designed to support and encourage mathematical development in children.

Symmetry School's intuitive learning experience allows children of varying abilities to learn through play, exploring hard-to-grasp concepts of symmetry on their own terms and at their own pace.

MATHEMATICS OF SHAPE AND SHAPE

Geometry, the mathematics of shape and space, was selected as a fun and practical way to introduce mathematical thinking, and Symmetry School encourages learners to use their intuition and imagination to explore symmetrical puzzles. Through gameplay, learners will be aided in developing an

essential foundation in spatial reasoning, problem solving and visualization.

The increasing complexity of the activities from the 'Easy' to the 'Hard' levels ensures that pupils of all abilities are catered for and are developing a fundamental understanding of the concepts of reflective & rotational symmetry.



LEARNING OBJECTIVES

Using Symmetry School: Learning Geometry learners will:

- Learn to recognise reflective and rotational symmetry.
- Use an understanding of reflective symmetry to complete the missing part of a pattern.
- Use an understanding of rotational symmetry to predict and describe the results of rotating patterns.
- Recognise simple spatial patterns and relationships and make predictions about them.
- Develop a foundation for understanding symmetry at later levels.
- Solve problems and learn to work systematically.
- Develop fine motor skills.
- Have fun and learn!

GAMEPLAY – REFLECTIVE & ROTATIONAL

Using an appealing combination of shapes and colours, Symmetry School provides endless rounds of challenges to help learners perfect their mastery of both reflective and rotational symmetry. A carefully-levelled system allows learners to progress from simple reflective patterns with a single line of symmetry, to more challenging rotational puzzles where the learner must visualise the effect of rotating part of a pattern around a single centre point. Predicting the final, rotated position of a pentagon can be a brain-twisting exercise for grown-ups, too!

PRACTICE AND PLAY

Symmetry School includes a 'Free Play' mode which

delivers the flexibility of a blank canvas to allow your child to create their own symmetrical patterns and to engage in imaginative play. In Free Play mode, children are encouraged to use their imagination and to explore what they have learnt about reflective and rotational symmetry.

TEACHER APPROVED

Our rigorous school pilots and usability tests ensure that our apps work as well in the classroom as they do at home. Symmetry School has a homework module that enables students to send their results to a parent or teacher, a whiteboard version is available for classroom use with every app purchase, and we have an array of supplemental teaching materials available for download.

MULTILINGUAL SUPPORT

Symmetry School: Learning Geometry is available in English, French, German, Spanish, Irish and Chinese. The educational vocabulary and terminology used in Symmetry School has been chosen by international educationalists for all included languages, and rigorously user tested through multiple home and school pilots.

New languages coming soon: Dutch, Italian, Russian and Turkish.

AVAILABLE ON THE APP STORE

Symmetry School: Learning Geometry is available to download on the Apple App Store.





In the Classroom

Designed for pupils of all abilities, Symmetry School is aligned to Common Core State Standards and fits perfectly into the classroom as a short-form, supplemental learning tool.

Launched by the Irish Minister for Education and Skills, Symmetry School has been rigorously user tested through multiple school pilots, and carefully designed with teachers in mind — a supplemental game that helps support in-class learning and engagement, yet remains compelling enough for children to want to play outside of the classroom!

Symmetry School encourages learners to use their intuition to explore symmetrical puzzles — puzzles that progress in difficulty from simple reflective to complex rotational symmetry, and include both vertical and horizontal lines of symmetry. Symmetry School features contextual hints at each difficulty level that offer the student different ways

of thinking about solving the puzzle. The language and terminology used within Symmetry School has been chosen by international educationalists for all languages.

‘...pupils of all academic abilities can explore symmetry in an enjoyable and enthralling manner.’ – teachnet.ie

COMMON CORE STATE STANDARDS ALIGNMENT

Symmetry School is aligned to the following Common Core State Standards:

- *CCSS.Math.Practice.MP1* – Make sense of problems and persevere in solving them.
- *CCSS.Math.Practice.MP4* – Model with mathematics.
- *CCSS.Math.Content.4.G.A.3* – Recognize a line of symmetry for a two-dimensional figure as a line across the figure such that the figure can be folded along the line into matching parts. Identify line-symmetric figures and draw lines of symmetry.
- *CCSS.Math.Content.8.G.A.1* – Verify experimentally the properties of rotations, reflections, and translations.
- *CCSS.Math.Content.8.G.A.2* – Understand that a two-dimensional figure is congruent to another if the second can be obtained from the first by a sequence of rotations, reflections, and translations; given two congruent figures, describe a sequence that exhibits the congruence between them.
- *CCSS.Math.Content.8.G.A.3* – Describe the effect of dilations, translations, rotations, and reflections on two-dimensional figures using coordinates.

EXTENDED LEARNING

The Spraai School team work to ensure great teacher support for our products. Each app purchase provides free access to **Symmetry School Online**, perfect for whiteboard, projector or lab use.

There are supplemental print activities and lesson plans available to download, as well as a handy 'Email Your Result' module used for homework activities.



ADE Institute 2013

PixelSoup were invited to participate in the Apple Distinguished Educator Institute 2013 event in Cork on July 29, 2013.

Apple Distinguished Educators (ADEs) are part of a global community of education leaders recognized for doing amazing things with Apple technology in and out of the classroom.

We were one of 14 developers invited to the event designed to facilitate collaboration and discussion – with over 150 educators from Europe, Middle East and India – around innovative content for K-12 and University content. We showcased the Spraai School series & our Symmetry School: Learning Geometry iPad app at the 'Meet the Developer' Event at the Apple Distinguished Educator Institute 2013.

Apple Volume Purchase Program

This program allows educational institutions to purchase iOS apps in volume and distribute them to students and teachers.

The apps in the Spraai School series are available to schools for bulk purchasing at a 50% discount for purchases of 20 apps or more.

To learn more, go to: www.apple.com/education/ipad/volume-purchase-program/



Learning at Home

As parents, we want our children to not just be entertained when using the iPad, but to learn at the same time — Symmetry School bridges the gap between ‘classroom’ time and learning at home.

Math is one of the core school subjects that many children tend to dread. If your child does not become interested in math at an early age, it can affect his or her learning abilities in middle school, high school and even in college.

LEARNING THROUGH PLAY

One of the things that children love in life is games and games can be the perfect tool for developing a child’s interest in math. Symmetry School: Learning Geometry uses gameplay to spark and develop a lifelong interest in math.

Perfect for continuing the learning at home, Symmetry School’s easy-to-use interface delivers an intuitive learning experience for your child, and allows children of varying abilities to learn through play and experimentation, exploring hard-to-grasp concepts of symmetry on their own terms and at their own pace. Endless rounds of challenges help children perfect their mastery of reflection and rotational symmetry.

The Symmetry School: Learning Geometry app allows parents and children to play and learn together, helping parents become involved with how their child explores and develops their interest in math.

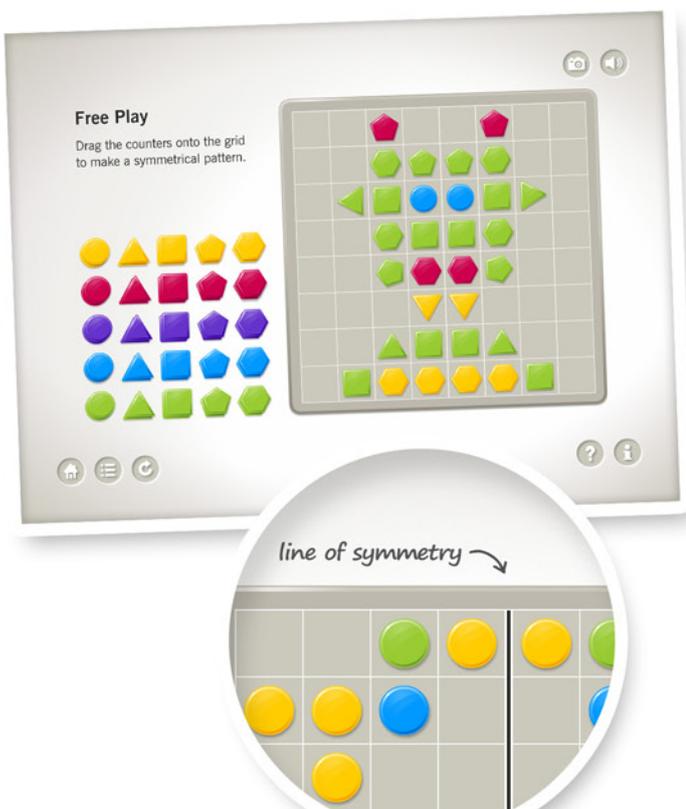
A SAFE LEARNING ENVIRONMENT

We believe safety should come first when children are using our products. That's why our products always include:

- No in-app purchasing
- No advertisements
- No collection of personal information
- No sharing of data with other companies
- All external links (to our website, facebook and twitter accounts) kept safely behind a child-safe parental wall

Spraoi School is a proud member of the 'KNOW what's inside™' initiative, and all of our products are designed with online privacy, trust and transparency in mind. We're committed to keeping parents and teachers fully informed about how our apps work.

'50 Best Apps for Kids from 2013 that Parents can Trust' – *The Guardian*



- ✓ for kids
- ✓ privacy best practices
- ✓ no surprises

KNOW *what's inside*

PixelSoup, the makers of the Spraoi School series, are a member of the **KNOW *what's inside*** program.

The **KNOW *what's inside*** logo is a signal to parents that our app is designed with privacy in mind. We care about parents and kids enjoying technology together. We have committed to tell you how our apps work, so you know what to expect.

What does it mean for an app to have the **KNOW *what's inside*** logo?

When you see the **KNOW *what's inside*** logo, it is a signal to parents that the app maker takes your privacy seriously. Their apps are designed especially for children, with special attention to online privacy. By committing to tell you how their apps work with clearly written privacy policies and descriptions, you know what to expect - no unwanted surprises or tricks.

To learn more about the **KNOW *what's inside*** program, go to: www.momswithapps.com

MOMs
with apps

What the Experts Say

Spraoi School's Symmetry School has received positive feedback from top educationalists — see what they have to say!

“...ENGAGE WITH SYMMETRY IN A FUN WAY...”

“Symmetry School is an engaging piece of software. The activities allow the pupil to engage with symmetry in a fun way and promote problem solving skills. It can be used in a variety of classroom situations and I would highly recommend it. More please!”

— Eileen Ward, Educational Technologist

“...SURE TO CHALLENGE AND MOTIVATE ALL LEARNERS.”

“Symmetry school is a unique online tool that supports the development of geometrical reasoning in the areas of reflective and rotational symmetry. Other computer tools focus primarily on reflective symmetry or on identifying symmetry focusing predominantly using a region or area model. Symmetry School, however, presents an innovative and conceptually challenging perspective on symmetry by presenting a selection of explorations which increase in challenge and move beyond traditional (and limiting) representations of symmetry.

The advantage of Symmetry School for any classroom teacher, or school district, is its uniqueness in providing an environment within which learners of all abilities can practice their skills and then move on to more challenging activities.

The inbuilt 'Snapshot' feature available in the Free

Play activity is an invaluable tool that provides teachers the opportunities to keep a record of the development of children's geometrical reasoning which working independently with Symmetry School.

From a mathematics education perspective engaging with the Symmetry School activities provide invaluable experiences in symmetry and the design features make it appropriate for use with learners across a wide span of school mathematics grade levels. This program is sure to challenge and motivate all learners.”

— Dr. Aisling Leavy, Department of Language, Literacy and Mathematics Education, Mary Immaculate College - University of Limerick, Ireland

“...FUN AND INTERESTING..”

“Many students at CTYI, Dublin City University are good spatial learners and have very little opportunities to display their ability in their school environment. With the shortage of suitable graduates in the technology and engineering sector Symmetry School can go a long way to addressing this problem by exposing children to mathematical problems in a fun and interesting fashion.”

— Dr. Colm O'Reilly, Director, Centre for Talented Youth in Ireland (CTYI), Dublin City University, Ireland





“...MOTIVATE(S) CHILDREN TO TAKE AN ACTIVE PART IN MATHS LEARNING.”

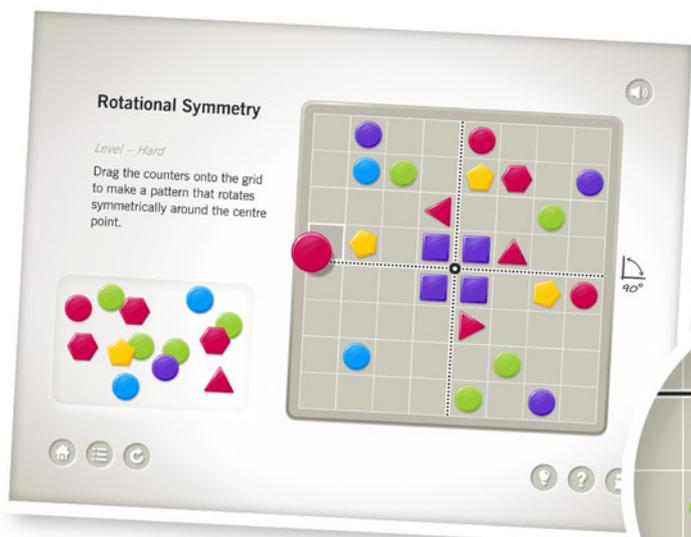
“Bit of a problem with Symmetry School...it’s addictive! It will certainly motivate children to take an active part in maths learning.”

— Muireann Ní Mhóráin, COGG (An Chomhairle um Oideachas Gaeltachta & Gaelscolaíochta)



EAS RECOMMENDED

Symmetry School: Learning Geometry has been Educational App Store (EAS) Recommended — 5 Star Rating — with cognitive development and creative development highlighted as key learning outcomes.



Apple App Store

No. 1 Education App in Ireland

Within the first week of launch, *Symmetry School: Learning Geometry* topped the Education iPad App Store charts in Ireland.

‘New & Noteworthy’ and ‘What’s Hot’

Symmetry School: Learning Geometry has been included in ‘New & Noteworthy’ and ‘What’s Hot’ in several Education iPad App Stores.



Featured in ‘Entertain Your Kids’

Symmetry School: Learning Geometry featured on the App Store Homepage in the Must-Have Collection ‘Entertain Your Kids – Apps for the Summer Holidays’.

Press and Reviews

Symmetry School has had an amazing response from traditional media and online reviewers — see what the critics have to say!

theguardian

‘50 Best Apps for Kids from 2013 that Parents can Trust’
– *The Guardian*

**APPS
PLAYGROUND**

“It’s one of the best learning games for kids that we’ve seen this year so far.” – *Apps Playground*

theguardian

‘20 Best iPhone and iPad Apps This Week (Friday 24 May 2013)’ – *The Guardian*



“Symmetry School is a goldmine of educational fun!” –
The iPhone Mom



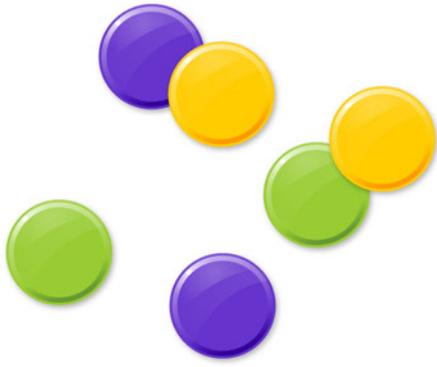
“Even as little as two or three hours of time spent on Symmetry School will bring out a marked difference in your child’s pattern recognition abilities.” – *iPad Kids*



“Symmetry School: Learning Geometry is an excellent app that provides endless rounds of challenges to help kids perfect their mastery of reflective and rotational symmetry.” – *Geeks With Juniors*



“This is a great app that will provide pupils of all academic abilities with opportunities to explore symmetry in an enjoyable and enthralling manner.” – *TeachNet*



“An extremely well-made app that is clearly designed for student discovery learning. Thank you for making something so valuable for students!”
– *Texas Computer Education Association (TCEA.org)*

“The first thing I noticed about Symmetry School is its beauty. No doubt about it, this is a good-looking app. The second thing I noticed was its simplicity. One doesn’t need any instructions (though these are included) to play the game. It’s very intuitive. The third thing I noticed was I got addicted very quickly! The game is educationally very sound and follows the maths curriculum in Ireland. The great thing, I think, is that it probably supports any country’s maths curriculum, as I’m fairly sure everyone has to learn about symmetry in some way. This instantly gives this app a massive market.” – *Anseo.net*



Featured in ‘Back to School’ Supplement

THE IRISH TIMES

Symmetry School: Learning Geometry makes list of recommended Back To School Apps in The Irish Times ‘Back to School’ supplement (21 August 2013).



Official App Launch

Spraoui School were delighted to welcome the Irish Minister for Education and Skills, Ruairi Quinn, to the official iPad launch of Symmetry School: Learning Geometry on the 9th June, 2013.



Pictured are Minister Ruairi Quinn and pupils from Mater Dei Primary School, Dublin.



Spraoi School is an engaging series of apps and games that deliver bite-sized educational concepts that directly target curriculum objectives — all through captivating and intuitive game-play!

The purpose of the Spraoi School series is to support the development of mathematical, language and science-based reasoning in early to middle childhood education.

Email us at: hello@spraoischool.com

Learn more at: www.spraoischool.com
www.twitter.com/spraoischool
www.facebook.com/spraoischool

