

# Philipp Legner

Flat 2, Knot House  
3 Brewery Square  
London, SE1 2LF

philipp@legner.com  
www.mathigon.org  
linkedin.com/in/legner



## Work Experience

### SOFTWARE ENGINEERING

#### Software Engineer at **Google**

Since December 2015 | London

#### Software Developer at **Bloomberg L.P.**

August 2013 – December 2015 | London

- 16 week 'FSD' software development training program
- Full stack developer at Bloomberg New Energy Finance
- CodeCon online coding competition platform

#### Software Developer at **Wolfram Research**

8 Week Internship, Summer 2012 | Hanborough, Oxford

Work on a cloud based version of Wolfram Mathematica

#### Summer Analyst at **Goldman Sachs**

10 Week Internship, Summer 2011 | London

Building portfolio optimisation software for GSAM

### MEDIA AND PUBLISHING

#### Creator of **Mathigon.org**

Launched Summer 2012

- Popular and award winning maths education project
- Next generation of adaptive and explorable textbooks
- Apps, eBooks, videos, classroom activities and research

#### Assistant Producer at **Touch Press**

January 2012 – July 2013 (Part Time) | London

Work on 'Numbers', a mathematics iPad app by Ian Stewart

#### Editor of '**Eureka**', Cambridge Mathematics Magazine

Issues 60-62, 2010 – 2012 | Cambridge

Copy-editing, illustrations, graphics design, new iPad app

#### Researcher at **BBC Horizon**

Work Experience Placement, Summer 2012 | London



## Prizes and Awards

#### **Webby Awards** Nominee

April 2015 | International Academy of Digital Arts & Sciences

Mathigon is one of five education websites nominated for the "Internet's highest honour" (NY Times).

#### **Lovie Awards** Gold Winner (Education Websites)

October 2013 | International Academy of Digital Arts & Sciences

#### **International Young Physicist's Tournament**

July 2009 | Tianjin, China

Captain of UK team; Bronze medal

#### **Douglas Fox Prize** for Music and Composing

2009 | Awarded by the British Music Masters Association (MMA)

#### **Space Experiment Competition** Winner

2008 | Awarded by the British Space Agency and SSTL

Designed a satellite module to improve the accuracy of GPS. It was built with a budget of £100,000 and launched in 2010.

#### Bronze Medal at the **British Mathematical Olympiad**

2008

#### UK Winner of the **Cassini "Scientist for a Day"** Competition

2007 | NASA and Queen Mary University London



## Education

#### **UCL Institute of Education**, University of London **MA in Mathematics Education**

2012 – 2013

- Focus on maths outreach, education technology and HCI
- Research projects at the London Knowledge Lab

#### **University of Cambridge**, St John's College **BA Honours Degree in Mathematics**

2009 – 2012

- Part IA+IB: wide range of pure and applied courses
- Part II: focus on probability, statistics and combinatorics
- President of the St John's College Mathematics Society

#### **Shrewsbury School**, Shrewsbury

2007 – 2009

- A-Levels in Mathematics, Further Mathematics, Physics, Economics, and German, AS-Level in Music
- Sidney Gold Medal (awarded to one student every year)

#### **Gymnasium Adolfinum**, Moers, Germany

2002 – 2007



## Skills and Interests

### PROGRAMMING AND DESIGN

Advanced: **JavaScript, Python, Mathematica, SQL**  
Intermediate: **C, C++, STL, NumPy, Matlab, PHP**  
Basic: **Scikit-learn, OpenCV, R, MongoDB**

Web development: **HTML, CSS/Less/Sass, Node.js, Angular.js, Meteor.js, Polymer, d3.js, Leaflet.js**

Advanced: **Photoshop, Illustrator, InDesign**

Basic: **Final Cut, Premiere Pro**

### CONFERENCE TALKS

#### **The Mathematical Association**, Annual Conference

April 2015 | Keele University

#### **Hackademia** Education Technology Symposium

March 2015 | Online Symposium

#### **Tomorrow's Mathematicians Today** Conference

February 2010 | Greenwich University

### VOLUNTEERING

#### Mentor with **Code Club** and **ReachOut!**

Since 2013 – 2015 | London

#### Teaching with the **Millennium Mathematics Project**

2010 – 2012 | Cambridge

### LANGUAGES

**German** (native), **English** (fluent),  
**French** (basic), **Latin** and **Ancient Greek**

### MUSIC

**Composing, Piano, Organ** (regularly in chapel services),  
**Clarinet** (Grade 8, many orchestras and ensembles)