# JULIAN VALLYEASON



julian@vallyeason.com



www.vallyeason.com



www.github.com/jvallyea



www.angel.co/julian-vallyeason



Julian Vallyeason



### **Brown University**

Sc.B. in Chemical Engineering and Applied Math-Economics Providence, RI 2016-2020 GPA: 4.0 (out of 4.0)

Partial Differential Equations, Macroeconomics, Real Analysis, Organic Chemistry, Electrodynamics, Materials Science

### **TJHSST**

Alexandria, VA 2013-2016 SAT: 2400 ACT: 36 GPA: 4.52 National AP Scholar, Presidential Scholar Candidate, NHS Neuroscience, Linear Algebra, Probability, Quantum Mechanics



#### Co-Founder and Product Engineer, Pursuit Solar

Solar UAV startup that provides aerial data acquisition services in agriculture.

[www.cloudagronomics.com]

Providence, RI Fall 2016 - Present

Managed UAV financing and development. Recipient of Brown's Social Innovation Grant; Penn Aerospace Finalist, Startup Storm International Finalist.

### Movement Building Intern, World Resources Institute

Washington DC Summer 2017

Developed analysis tools using GDELT and social media API's to engineer a data-driven strategy for forest restoration. Conducted interviews with leading movement activists.

# Co-Founder and SAT Instructor, Perfect SAT-ACT [www.perfectsatact.com]

Online Summer 2016 – Present

Conducted outreach and publicity campaigns through YouTube and monthly seminars to expand business operations.

Lead SAT tutoring sessions; built 12-course SAT curriculum. Generates over \$1000 in monthly revenue through services.

### Political Affairs Intern, US-ASIA Institute

Winter 2016-2017

Represented USAI at conferences and congressional hearings. Corresponded with legislative staff and organized Congressional delegations.

Invited Programs: ICTforAg (2017), Next Gen Summit (2017), Innovation Dojo (2017), Ivy League Policy Summit (2017), CCG Conference (2017), Princeton Envision (2016)



# **ACADEMIC RESEARCH**

### Project Manager (indep.), JUMP Lab - Voltworks

Alexandria, VA Fall 2014 – Spring 2017

Developed mathematical model to optimize output in soil-based microbial fuel cells using different substrate compositions.

**Awards:** Virginia Science and Engineering Fair 1<sup>st</sup> Place (2015), Genius Olympiad International Finalist (2015), Princeton Envision Entrepreneurship Finalist (2<sup>nd</sup> Place), Princeton Tiger Launch Regional Finalist (2017)

### Neuroscience Researcher, Univ. of Maryland (Herberholz)

College Park, MD June 2015 – February 2016

Investigated role of sensory signals in crayfish dominance hierarchies.

**Awards:** USPHS Distinguished Project Award (2016), VTech National Capital Region Best Project (2016), HFES 2<sup>nd</sup> Place Award (2016)



### Cofounder / Outreach Manager, STEMWISE (501c3)

Nonprofit science and math tutoring organization in 4 locations nationwide.

Greater Washington Area Fall 2014 – Summer 2016

Recruited over 20 new members across 3 schools. Developed series of educational videos. Tutored in 3 community centers over 2 years.

Clients: Fairfax, Loudon, Arlington schools and community centers

### Engagement Director and Instructor, Montfort Youth Center

Nonprofit institution focused on giving underprivileged students in Malaysia access to a comprehensive education.

Malacca, Malaysia Summer 2014

Taught mathematics and English to dasses of 40 upper-level students.



Languages: English, French, Mandarin (working)

**Software:** Microsoft Office, Adobe Photoshop, Adobe Illustrator, Adobe Premiere, Autodesk Inventor, Autodesk Eagle, SolidWorks, Bloomberg (BESS Certification), Wolfram Mathematica

**Technology:** Java, MATLAB, Python, HTML / CSS, Javascript **Music:** Royal Conservatory of MusicLevel 10 (First Class Honors)

#### UNIVERSITY ORGANIZATIONS AND ACTIVITIES:

Power Systems Researcher, Brown Satellite Team

Designed PCB boards with solar cells. Conducted LiFePO4 heat and vacuum testing. Developed conformal silica gel coating procedure.

Business Associate, Brown Journal of World Affairs

Managed and produced website content for outreach and information dissemination. Responsible for the journal's administrative liasons.

Marketing Associate, IvyInspire Journal (Inter-Ivy Initiative)