# Sanjit Bhat | Résumé

27 Lexington Dr., Acton, MA 01720

#### **Education**

Acton-Boxborough Regional High School

Acton, MA

Weighted GPA: 4.33/5.0, Unweighted GPA: 3.84/4.0

2015-Present

2017-18: Honors/AP BC Calculus, Physics, U.S. History II, Spanish IV, English III 2016-17: Honors Pre-Calculus, Chemistry, U.S. History I, Spanish III, English II

2015-16: Honors Algebra II, Geometry, Biology, World History, Spanish II, English I SAT Reading & Writing: 700, Math: 800; Subject Math II: 800, Biology E: 790

AP Courses: Computer Science A (5/5)

AlphaStar Academy Santa Clara, CA

USA Computing Olympiad (USACO) Silver, Gold, and Platinum courses

2016–17

Computational geometry, data structures, search techniques, graph algorithms, and dynamic programming.

**KTByte Computer Science Academy** 

Lexington, MA

CS01 (Intro to CS), CS02 (AP CS), and CS91 (USACO Silver)

2015-17

## **Honors and Awards**

#### MIT Program for Research in Math, Engineering, and Science (PRIMES)

Highly-selective year-long high school research program

Jan 2017-Present

- 2-person team CS research project involved attacking and defending users' anonymity on Tor Network
- Independently learned via fast.ai current best practices and techniques for applied deep learning
- First-author of full-length conference paper submitted to a Tier 1 Computer Security conference
- Re-admitted into 2018 PRIMES program. Currently working on solo project involving adversarial attacks and defenses in theoretical deep learning. Self-studying Linear Algebra, via MIT OpenCourseWare

#### Siemens Competition: Math, Science, Technology - Semifinalist

Submitted PRIMES 2017 research project

2017

**USA Computing Olympiad - Gold Level** 

Penultimate level in highly-competitive CS Olympiad

Dec 2016

MIT Blueprint Hackathon - 1st place in Rookie Division

Created a game that integrated visual perception, auditory cues, and motor functions

Feb 2016

**President's Volunteer Service Award** 

Received Gold-level in 2015 and 2016 and AB community service award in 2017

2015-17

**National Honor Society** 

Member of Raymond J. Grey chapter

2018–Present

### **Publications**

**Bhat, S.**, D. Lu, A. Kwon, and S. Devadas. Var-CNN and DynaFlow: Improved Attacks and Defenses for Website Fingerprinting. *arXiv*, 2018, (in review at 27<sup>th</sup> USENIX Security Symposium).

#### **Extra-Curricular Activities**

#### AB IdeaLab (AB's Computer Science club)

Co-Captain (2017–Present)

2015-Present

- Organize team meetings, write introductory CS teaching material, and assist members with creating and executing original CS projects
- Planned and executed Major League Hacking local hack day (AB's Hackathon) in Dec 2017

### ABRHS Marching, Concert, and Jazz Bands

Principal Tuba (2018-Present), Trumpet (2015-17)

2015-Present

- 3<sup>rd</sup> chair concert band tuba player at Jan 2018 MMEA Eastern District Senior Festival
- AB marching band received the gold medal at the 2017 State-level MICCA festival

#### Piano

District Level Winner, Intermediate Class, National Piano Guild Auditions

2007-Present

#### **AB Science Olympiad Team**

Member of 15-student team: 1st place at Yale Invitational Tournament

2015–16

# **Community Service**

#### Boy Scouts of America, Troop 284, Acton, MA

Eagle Scout (Earned Sep 2016)

April 2012-Present

- Senior Patrol Leader in 2016. Responsibilities included planning troop meetings and campouts and serving as the primary interface between scouts and adult leaders
- Eagle Scout project involved painting the kitchen set and green screen at Acton TV to enhance the production value of their programming and the quality of their Virtual Set shows

#### Regional Delegate, Central MA Regional Student Advisory Council

Share opinions and solutions about relevant issues facing AB students

2016-Present

#### Peer Tutor

Assist high school students with homework and organizational skills

Fall 17-Present

#### Volunteer, Science Discovery Museum

Educated children with hands-on science exhibits

Aug 2015-May 2017

# **Work Experience**

# KTByte Computer Science Academy - Teaching Assistant Assisted students with introductory CS using Java and Processing

Lexington, MA

July 2015-Jan 2017

#### **Technical Skills**

Languages: Java, Python, LATEX

Libraries: Keras, NumPy, TensorFlow

OS: Windows, Linux (Ubuntu)