



## anish menon

2nd

Software Developer at Apple (iTunes-iCloud DRM/Security)

San Francisco Bay Area | Computer Software

Current Apple  
Previous Qualcomm, Compunetix  
Education Carnegie Mellon University

Connect

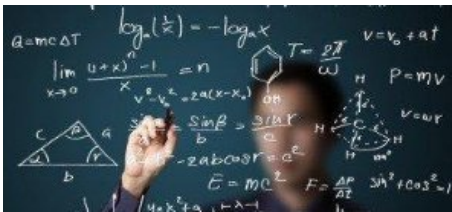
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500+ connections

<https://www.linkedin.com/in/anish-menon-618b283b>

### Posts

Published by anish



Is 1+1=2?

October 22, 2015



What is to gain?

December 14, 2014

### Background



#### Summary

I am an engineer at heart looking to develop new technologies and lead projects to commercialization



#### Experience

#### Software Developer

Apple

June 2015 – Present (1 year 3 months) | Cupertino, CA

iTunes DRM engineer



#### Senior Software Engineer

Qualcomm

April 2015 – May 2015 (2 months) | Greater San Diego Area

1>Global Platform TEE(Trusted Execution Environment)

Developed Crypto modules for GP TEE based on spec requirements. Working on meeting GP compliance for these modules

2>Hold all responsibilities from my previous title

- ▶ 1 honor or award
- ▼ 2 recommendations



### People Also Viewed



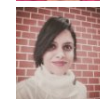
**Nikhil Jagdale**

Senior Software Systems Engineer at NVIDIA



**Sumonto Ghosh**

Software Engineer at Apple



**Sumita Rao**

Software Development Manager at Amazon Web Services



**Suresh Bollapragada**

Security, Software and Systems Engineering



**Jackson Tan**

Software Development Engineer at Amazon



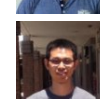
**Mark Rathjen**

Privacy Software Engineer at Google



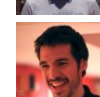
**Shantanu Goel**

Staff Engineer, ARM TrustZone Security at Qualcomm



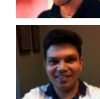
**Chenxi Zhang**

Software Engineer at Apple Inc.



**Nicolas Beier**

Senior Embedded Software Engineer at Qualcomm



**Jayanth Mandayam**

Associate Technical Director at Broadcom

### How You're Connected



You



Raj Khanna

[Ask Raj for an introduction](#)

See [more](#) connections in common



anish menon

### In Common with anish

x

## Software Engineer at Qualcomm (Security, Device Drivers)

Qualcomm

February 2012 – March 2015 (3 years 2 months) | Greater San Diego Area

Software design and development of features for Qualcomm MSM and MDM chips(snapdragon).

System level understanding of security implementation of Qualcomm chipsets

Interact with development, test and customer engineering teams to enhance the overall feature delivery process

The main projects that I work on are,

1>Content Protection :

System level feature interaction of Multimedia, Security and Kernel

Develop solution on ARM trustzone module

Understanding on Access control mechanism in hardware

2>Crypto :

Device drivers

Enhance Software algorithms

Balance security vs performance

3>Disk Encryption

Design and enhance Keystore functionality on Qualcomm's ARM trustzone implementation for disk encryption feature

4>Qualcomm access control

5>Image Authentication and Verification

Issues tackled regularly

Cache coherency

Power collapse

Race conditions

Hardware bugs

Debugging :

Extensive system level debugging using JTAG on ARM architecture.

► 3 honors and awards

## Device Driver Engineer (Intern)

Compunetix

June 2011 – August 2011 (3 months) | Greater Pittsburgh Area

Device Driver Engineer

•Configured SRIIO and Host Port Interface between PowerPC (8568) and DSP (TMS320C6455) to enable audio storage and playback. Achieved ten times faster data transfer on SRIIO compared to historical rates in communication system division.

•Develop code to enable booting of DSP's using SRIIO and HPI.

•Developed Audio frame arrangement application on DSP between FPGA and PowerPC.

•Performed profiling on Code Composer Studio to ensure handling and processing of audio in 125 Microsecond.

•Implemented SOLAFS vocoder on a single DSP for faster audio playback; and exceeded design requirements of Four DSP utilization for the task.

▼ 2 recommendations



**Chuck Brown**

Senior Design Engineer at Compunetix

Anish was hired as an intern and was placed in the Driver Team of the Software Department. In this capacity, one of a... View



**Thomas Altmeyer**

Embedded Software Manager at Compu...

Anish is a talented engineer. He is able to implement sophisticated signal processing algorithms in real world... View



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## People Similar to anish



**Anish Goyal** 2nd

Senior Software Engineer with Research inter...  
Connect



### Qualstar

Yongjin Kim

October 2012

Snapdragon bringup activities and support. Resolved power collapse issue and delivered several features

### Qualstar

Handoko Gunawan

September 2012

General Snapdragon bringup support

### Qualstar

Nagamalleswararao Ganji

June 2013

Excellent contribution for Samsung customer issue for HDMI DRM

### Qualstar

Sumonto Ghosh

May 2015

Speedy and Quality delivery for Global Platform for Secure applications and meet Compliance



## Volunteer Experience & Causes

### Opportunities anish is looking for:

- Skills-based volunteering (pro bono consulting)

### Causes anish cares about:

- Children
- Education
- Disaster and Humanitarian Relief
- Science and Technology



## Courses

### Carnegie Mellon University

- Real time Embedded Sytems (18-648)
- fundamentals of embedded systems (18-342)
- Digital Communications (18-450)
- Digital Communication and Signal Processing Systems Design (18-551)
- Leadership for Engineers (18-603)
- Advanced Digital Signal Processing (18-792)
- Machine Learning for Signal Processing (18-797)

### Independent Coursework

- An introduction to operations management (Wharton, UPenn, coursera)
- Songwriting (berklee college of music, coursera)
- Introduction to music production (berklee college of music, coursera)
- Developing your musicianship (berklee college of music, coursera)
- Introduction to finance(university of michigan , coursera)
- Usable Security(University of Maryland college park, Coursera)
- Software security(University of Maryland college park, Coursera)
- Hardware Security(University of Maryland college park, Coursera)



Full professional proficiency

Professional working proficiency









































































## Malayalam

Professional working proficiency



### Skills

#### Top Skills

45	Embedded Systems	          
34	Device Drivers	          
33	C	          
31	Debugging	          
24	ARM	          
5	Secure Coding	    
16	C++	          
7	Signal Processing	     
11	Embedded Software	         
7	RTOS	     

anish also knows about...

4	JTAG	7	Software Development	4	Embedded C	3	Cache Coherency
3	ARM security extensions	4	Cryptography	3	Microcontrollers		
2	Assembly Language	2	JIRA	2	Perforce	3	Secure Code Review
2	Testing	5	Software Design	2	Digital Signal...	8	Software Engineering
	See 2+						



### Education

#### Carnegie Mellon University

MS (Professional), Electrical and Computer Engineering, 3.54

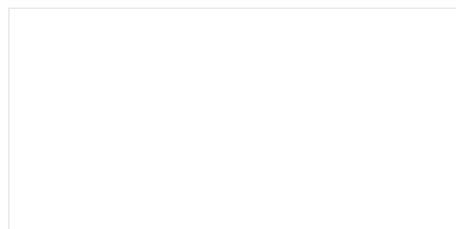
2010 – 2011



Specialization in Signal Processing and Embedded System

Activities and Societies: [Web Relations Officer for ECE Masters Advisory Council](#)

► 7 courses



## Atharva College Of Engineering

Bachelor of Engineering, Electronics & Telecommunication, 71%, First Class with Distinction

2005 – 2009

Mumbai University

## Bhavans College

2003 – 2005

## ISM

1991 – 2003

### Additional Info

#### • Interests

technical : reading latest technology blogs related to embedded systems, revisiting coursera.org for new learning II extra curricular : singing, poetry, writing lyrics, music composition



### Organizations

#### Additional Organizations

Masters Advisory Council

### Recommendations

Received (4) ▾ Given (1)

## Senior Software Engineer

Qualcomm



### Sumonto Ghosh

Software Engineer at Apple

“ Anish has worked on a few projects managed by me. Not only does he achieve the tasks in an efficient manner, he is able to make important decisions to meet project goals. The willingness to dive into problems makes him a very valuable asset for any team. I wish him best of luck for this future endeavors.

August 10, 2015, Sumonto managed anish at Qualcomm



### Roshan Lenagala

Firmware Engineer

“ I've worked with Anish in number of projects at Qualcomm and am highly impressed by his technical competence and his analytical skills. He is well versed in his area of expertise ( Security). He is dedicated and willing to do what's necessary to get the job done. His technical competence coupled with his managerial skills makes him a valuable engineer any organization... **more**

May 27, 2015, Roshan worked with anish at Qualcomm

## Device Driver Engineer (Intern)

Compunetix



Department. In this capacity, one of a handful of tasks Anish was given was to develop the driver that would provide the means to boot a Texas Instruments DSP over an SPIO (Serial Rapid I/O) interface.

Not only did Anish quickly learn a complex interface needed to create the means to... **more**

October 15, 2014, Chuck managed anish indirectly at Compunetix



**Thomas Altmeyer**

Embedded Software Manager at Compunetix

“ Anish is a talented engineer. He is able to implement sophisticated signal processing algorithms in real world applications. He has a world class engineering education and a gift for dealing with people. He can be trusted with assignments that would be a challenge for a senior engineer. He is a pleasure to work with.

October 12, 2011, Thomas managed anish at Compunetix

Connections

Shared (7)



**Raj Khanna** 1st

Manager Talent Acquisition



**Dave Santos** 1st

Senior Staff Manager, Qualcomm Inc.



**Mujeeb Ahmed Mohammed** 1st

Engineer III at Qualcomm at Qualcomm I...



**Kaushik Chaubal** 1st

Technology Analyst at BlackRock



**Kunal Lillaney** 1st

Research Assistant at Johns Hopkins Un...



**Abhishek A. Sharma** 1st

Components Research at Intel Corporati...



**Dr. Y S Rao** 1st

Professor at Sardar Patel Institute of Tec...

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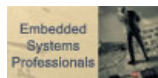
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