

ELECTRICAL ENGINEER · SYSTEMS ADMINISTRATOR 621 E 420 N, Apt 101, Provo, Utah, 84606, USA

□ 703-867-1010 | ■ jacob@holtom.me | 🕏 www.holtom.me | 🖸 jholtom

Work Experience

L-3 Communication Systems West

Salt Lake City, Utah

Jan 2018 - Sep 2018

- Design RF hardware for mission critical systems
- Test and Debug RF hardware
- Work in team and follow standard engineering process

BYU Spacecraft Group

RF ENGINEER

Provo, Utah

LEAD COMMUNICATIONS ENGINEER

Apr 2016 - PRESENT

- Twin satellites will fly in early 2018
- Design an end-to-end satellite communications system within technical constraints
- Lead RF engineering work designing antennas and amplifier systems
- Developed Linux Address Family on-board satellite to support end to end communications
- Developed Ground Station system using an Ettus USRP and GNURadio
- Developed dishes and on-board antenna systems

BYU Computer Aided Engineering Design and Manufacturing

Provo, Utah

Nov 2015 - Jan 2018

- Developed Linux Infrastructure to maintain storage, enable authentication and enhance the user experience
- Migrated to a new LDAP cluster and schema using SaltStack
- Implemented MIT Kerberos in the environment using SaltStack

SolvereOne and HouseCall IT

ASSISTANT SYSTEMS ADMINISTRATOR

Dulles, Virginia and Washington D.C.

Jun 2013 - Oct 2015

- Maintained and designed secure network deployments
- Deployed and maintained Windows user and application systems
- Managed Linux administration

Education

SYSTEMS ADMINISTRATOR

BYU (Brigham Young University)

Provo, Utah

B.S. IN ELECTRICAL ENGINEERING

Sep 2015 - Exp. Apr 2019

- · Math Minor
- Lead Communications Engineer on BYU's first small satellite mission

TJHSST (Thomas Jefferson High School for Science and Technology)

Alexandria, Virginia

HIGH SCHOOL DIPLOMA

Sep 2011 - Jun 2015

• Designed NFC System for Senior Research Project

Projects

CCSDS Kernel Driver

LINUX ADDRESS FAMILY

Jul 2017

Designed and implemented Linux kernel address family that adds CCSDS Space Packet Protocol support

Competencies

Active Directory, LDAP, Kerberos, Cisco IOS, Sophos UTM, Python, Haskell, C, C++, Embedded Development, Windows Server 2008 -2012 R2, CentOS/Ubuntu/Gentoo/RedHat Linux, BSD, Ansys HFSS, Matlab, Mathematica, VMWare vSphere, VMWare View, Microsoft Office 365, Nagios, Apache, NGINX, MySQL, PostgreSQL, HTML5, JavaScript, CSS, Java, Windows XP - 10, ZFS, SaltStack, LTspice, Autodesk EAGLE, Amateur Radio, FCC Licensing, RF Systems, Modulalation, Packetization and Framing, GNURadio, Ettus USRP, Nuand BladeRF, RF Analysis

OCTOBER 12, 2018 JACOB B. HOLTOM