

# GIRI KUNCORO

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Portfolio: <http://kuncoro.co>

## EDUCATION

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### Cornell University, USA

Jan 2015 - May 2016

*Master Degree in Information Science, Faculty of Computing and Information Science*

GPA: 3.88 (per Spring 2015) | Awards: Clinton Global Initiative (Top **3%**); Indonesia Ministry Full-Academic Scholarship

Coursework: *Operating System, Database, Data-driven Web App, Comp. Methods for Data Science, AI, Advanced HCI*

### Institut Teknologi Bandung (ITB), Indonesia

Aug 2006 - Jul 2010

*Bachelor Degree in Electrical and Computer Engineering, School of Electrical Engineering and Informatics*

GPA: 3.66/4.0 | Awards: ITB President's Best Student (Top **1%**); Dean's List (Top **2%**); IEEE Presidents' Challenge

## TECHNICAL SKILLS

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Programming Language & Tools	Python, Javascript, C/C++, Assembly (MCS-51), MySQL, PostgreSQL, MS SQL, Google App Engine (Datastore), AWS (EC2), Github, Mercurial, SVN, Asana, JIRA, Redmine
Web Development & Data Processing	D3.js, jQuery, HTML5, CSS3, AngularJS, Bootstrap, LeafletJS, Flask, TopoJSON, Crossfilter.js, Queue.js, Require.js, CartoDB, Matplotlib, Numpy, Pandas, NLTK
Hardware	Arduino, Atmel AVR, Bluetooth LE (iBeacon), 3D Printing, PCB Design (Eagle/Altium)

## WORK EXPERIENCES

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### Software Development Intern, General Electric, NY

May 2015 - Aug 2015

- Developed data analytics tool in Python (Numpy, Flask, HDF5 binary data) and Javascript (D3.js, jQuery, AngularJS) for largest interconnected grid in the world with 6,000+ power plant nodes each year, included multi-year feature which shorten the all simulation run drastically from 6 hours to 5 minutes.

### Software Engineer, Toshiba Corporation, Tokyo, Japan

Nov 2010 - May 2014

- Led a team of 3 developers and worked with cross-functional team of 15 to develop embedded software for Smart Grid real-time industrial controller (NI-cRIO, Modbus TCP/RS-485 protocols) in C, and graphical programming LabView that increased existing SDLC speed by 60%, designed MS SQL database to store 1,000+ field data points per second.
- Patent submissions: (1) Algorithm to Suppress Intermittent Solar Generated Power using Battery Storage, (2) Algorithm to Optimize State of Charge Calibration of Distributed Battery Energy Storage System.

## SELECTED PROJECTS

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### Communicate Indonesia: SMS Cloud Application for Rural Farmers (Python/Flask)

Aug 2015

- Self-initiated project to develop SMS based app for 3,000 rural farmers with no Internet access to improve farming productivity and livelihood. Developed using Python Flask, Twilio API, RESTful API, and Google App Engine.
- Awards: \$7,500 from Clinton Global Initiative (Resolution Project) and Engaged Learning.  
> <https://github.com/Ragil/Communicate-Indonesia>

### Visualizing Game of Thrones (Javascript/D3.js/Python)

Jun 2015

- Screen-scraped 100+ Game of Thrones characters from wiki using Python BeautifulSoup package, created D3.js based visualization that received 3,500 views from Reddit in one day.  
> <http://thronesviz.github.io>

### New York and Washington DC Bike Share Pattern Analyses (Javascript/Python)

May 2015

- Analyzed bikeshare open data using Numpy, Matplotlib, CartoDB, Mapbox, D3.js, and found unique ridership pattern in Central Park that potentially creates multi-million dollar new ads-businesses.  
> <http://bikeviz.github.io>

### Mark Wallet: iBeacon based Wallet Tracker (C/Arduino)

Nov 2014

- Developed Arduino and Bluetooth LE (TI CC2540/41) based tracker that connects with iOS to never loose wallet.
- Awards: ¥500,000 from Google's Startup Weekend Tokyo, \$3,000 from Blackberry and Indosat.  
> <http://mark4s.com/markwallet>