# Violetta Vylegzhanina

email: violetta.vylegzhanina3@gmail.com

EDUCATION  $\diamond$  M.Sc., Vanderbilt University, Computer Science Dept., USA.

Dec'15

GPA: 4.0/4.0.

♦ B.S., Vanderbilt University, Computer Science Dept., USA. GPA: 3.7/4.0.

May'13

### Work EXPERIENCE

♦ Verizon Media (Yahoo!), Sr Software Dev Engineer.

Oct'18-Present

- · Part of the Cloud Project Onboarding and Tracking team.
  - Implemented an interface for Athenz Auth service to handle Athenz headless user association for grid user creation.
  - Automated the creation of grid sudoer user groups that saved customers and developers several hours of manual and error-prone work per week.
  - Automated encryption zone auditing for improper data encryption directories.
  - Implemented essential functionality to support a new data grid.
  - Reduced technical debt by removing/rewriting legacy code and increasing test coverage.

#### ♦ CBS Interactive, Software Engineer.

May'17-Aug'18

- · Worked with leading edge technologies to deliver scalable and reliable high performance API systems to millions of unique users per month.
  - Implemented custom monitoring services via Amazon CloudWatch.
  - Researched, evaluated, and applied new processes and methods to enrich existing applications.
  - Developed JUnit and Mockito test cases to improve code coverage.
  - Contributed to development of automation solutions that improved build and deployment systems and supported continuous deployment/integration.
  - Contributed to the AWS migration of a product by evaluating technologies for efficient and secure storage and retrieval of sensitive information (e.g. Consul, Vault, AWS Parameter Store).
  - Designed and implemented an algorithm that significantly simplified code and reduced the execution time of a web feed parser by 50%.

# ♦ HITactics, Inc., Software Engineer.

Sep'15-May'17

- · Provided high quality software services for indoor positioning and asset tracking solutions that relied on heterogeneous components, such as IoT.
- · Designed and developed a customizable and scalable event-driven system that processed realtime data streams (e.g. Amazon Kinesis) for purposes such as monitoring, analytics, and notifications.
- · Designed and developed a set of secure Portal REST APIs that simplified retrieving and modifying server data.

## ♦ Change Healthcare, IT and Information Security Intern.

May'15-Aug'15

- · Saved several months of manual work by developing a tool that instantly documented 4.000 of attack characteristics.
- · Lead the project to prevent the company's websites against online phishing attacks.

- · Performed dynamic assessments of client-facing applications and provided remediation strategies for detected vulnerabilities.
- ♦ Institute for Software Integrated Systems, Research Assistant. May'13-May'15
  - · Conducted research on system security and improvement of Java applications' effectiveness through remediation of security flaws.
    - Detected security flaws using machine learning WEKA library<sup>1</sup>.
    - Optimized method tracing by intercepting specific method calls at run-time to reduce noisy data.
  - · Developed an Android app that deals with often changing unstructured data to ease the shopping experience of WIC (Women, Infants, and Children).
    - Improved integration among mobile health solutions using Open-mHealth<sup>2</sup> and MongoDB database on Amazon EC2 that stores purchase data.
    - Developed data analytics solutions for shopping choices data stored in SQLite database to provide healthy tips that are customized for each user.
- ♦ Schneider Electric, Engineering Intern.

Dec'11-Apr'13

- · Lead the reconstruction of test environment with automated test units in .NET.
- · Integrated unit tests with the software development cycle.

V. Vylegzhanina, D. C. Schmidt, and J. White. **Gaps and Future Directions in Mobile Security Research**. In *Proceedings of the 3rd International Workshop on Mobile Development Lifecycle*, MobileDeLi 2015, pages 49–50, New York, NY, USA, 2015. ACM. ISBN 978-1-4503-3906-3. doi: 10.1145/2846661.2846669

Publications

V. Vylegzhanina, D. C. Schmidt, P. Hull, J. S. Emerson, M. E. Quirk, and S. Mulvaney. **Helping Children Eat Well via Mobile Software Technologies**. In *Proceedings of the 2Nd International Workshop on Mobile Development Lifecycle*, MobileDeLi '14, pages 9–16, New York, NY, USA, 2014. ACM. ISBN 978-1-4503-2190-7. doi: 10.1145/2688412.2688413

V. Vylegzhanina, D. Brett, and A. Gokhale. **Design Considerations in Developing a Mobile Application for Scalable and Decentralized Publish/Subscribe-based Weather Alert System**. In *Proceedings of the 2013 ACM Workshop on Mobile Development Lifecycle*, MobileDeLi '13, pages 21–26, New York, NY, USA, 2013. ACM. ISBN 978-1-4503-2603-2. doi: 10.1145/2542128.2542135

SKILLS

- ♦ <u>Languages</u>: Java (expert), JavaScript (intermediate), C# (prior experience), C++ (prior experience), Python (prior experience).
- DevOps: Artifactory, Bamboo, Docker, Gradle, Git (GitHub/GitLab), Jenkins, JIRA, JUnit, Maven, Terraform, Vagrant.
- ♦ *Frameworks:* Spring, Retrofit, Hibernate, Vaadin, GWT, Ember.
- ♦ Software: Eclipse, IntelliJ IDEA, Visual Studio, Android Studio, HP WebInspect, Acunetix, HP Fortify on Demand.
- ♦ <u>Databases:</u> MySQL, PostgreSQL, MongoDB.
- ♦ Cloud Computing: Amazon Web Services (AWS).

AWARDS

Tau Beta Pi, Vanderbilt University, 2013.

Hobbies

Ballroom dancing, photography, interior design, embroidery, cooking, and gardening.

<sup>1</sup>http://www.cs.waikato.ac.nz/ml/weka/
2http://www.openmhealth.org/