



Department of Computer Science

# Toward TCC

## College Awareness Community Outreach (CACO) Application

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### Overview

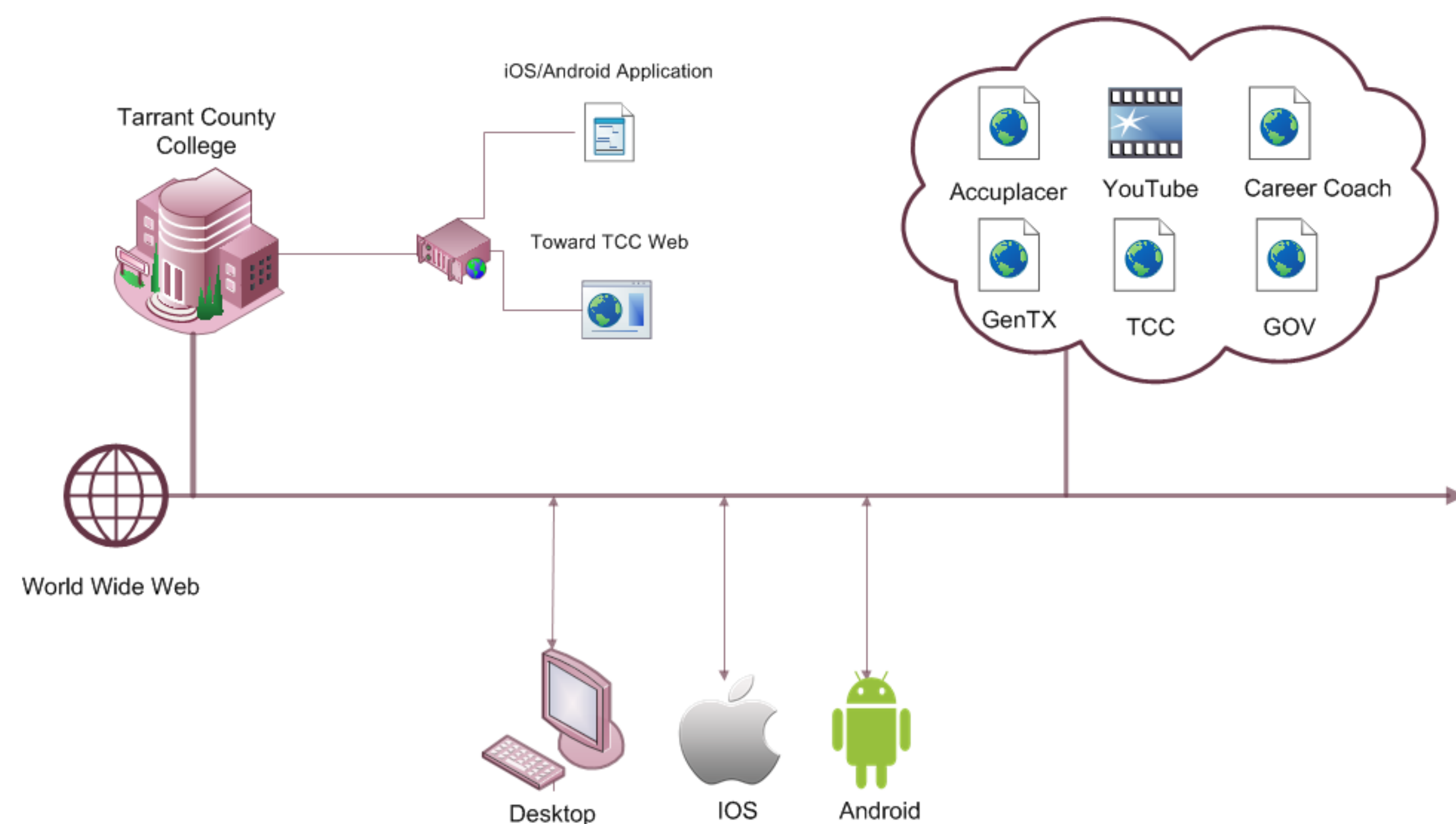
The Tarrant County College CACO program visits area schools to distribute information explaining steps to a successful college application process. This TCU Computer Science Capstone Project included the development of web and mobile applications that allow easy access to the information used by CACO.

The applications integrate existing resources to provide instructional videos, career advice, and a college preparation checklist. CACO will use the applications to help students achieve academic excellence and determine career paths. The mobile applications have been developed for both iOS and Android platforms.

### Goals

- Provide new, digital mediums for students to access CACO information
- Incorporate previously existing tools used by TCC that let students determine possible career paths, view entrance exam sample questions, etc.
- Provide interaction to help keep students motivated to do well in high school

### System Architecture



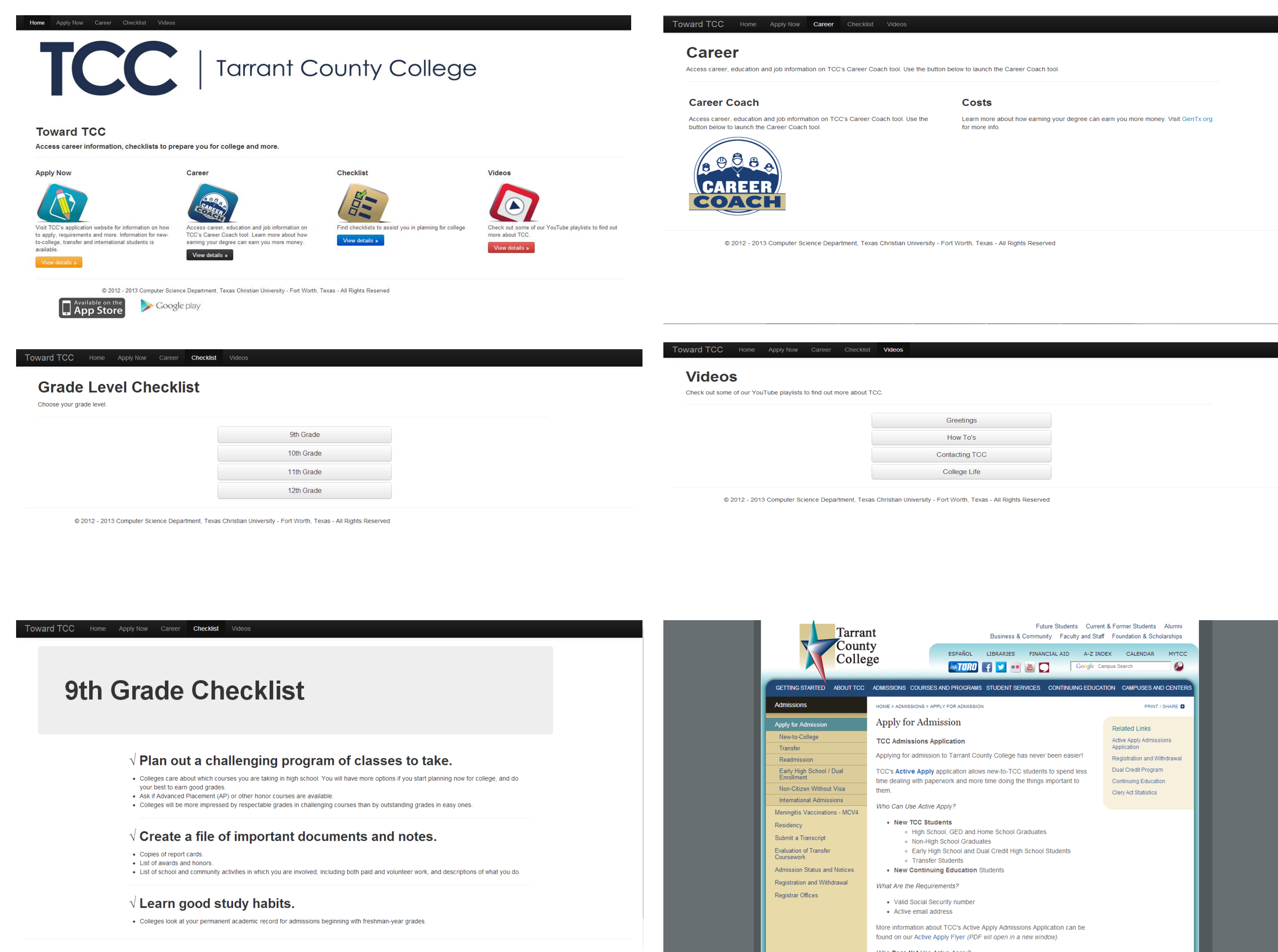
### iOS Application



### Android Application



### Web Application



### User Accounts

One of the project requirements is that TCC cannot have access to any personal information of "pre-students." This means that any accounts that are created to track a student's progress must be secure and only accessible by the user.

A SHA1 encryption of the user's information is stored to keep the profile secure, and all accounts are stored locally on the mobile device in order to be in accordance with Family Educational Rights and Privacy Act.

### Results and Conclusions

- Successfully completed web, Android, and iOS applications
- Had the opportunity to do interdisciplinary work alongside a professional graphic designer
- Gained experience gathering requirements and working with a client
- The application is in the user-acceptance testing phase and is planned to release in early May

### Acknowledgments

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### References

- Apple iPad <http://developer.apple.com/ipad/sdk/>
- Twitter Bootstrap <http://twitter.github.io/bootstrap/>
- Sublime Text Editor <http://www.sublimetext.com/>
- Stack Overflow <http://www.stackoverflow.com/>
- Android Resources <http://www.developer.android.com/>
- Eclipse <http://www.eclipse.org/>