

Open-Source Technology Use Report

Proof of knowing your stuff in CSE312

Guidelines

Provided below is a template you must use to write your report for each of the technologies you use in your project.

Here are some things to note when working on your report, specifically about the **General Information & Licensing** section for each technology.

- **Code Repository:** Please link the code and not the documentation. If you'd like to refer to the documentation in the **Magic** section, you're more than welcome to, but we'd like to see the code you're referring to as well.
- **License Type:** Three letter acronym is fine.
- **License Description:** No need for the entire license here, just what separates it from the rest.
- **License Restrictions:** What can you *not* do as a result of using this technology in your project? Some licenses prevent you from using the project for commercial use, for example.
- **Who worked with this?:** It's not necessary for the entire team to work with every technology used, but we'd like to know who worked with what.

Also, feel free to extend the cell of any section if you feel you need more room.

If there's anything we can clarify, please don't hesitate to reach out! You can reach us using the methods outlined on the course website or see us during our office hours.

eventlet

General Information & Licensing

Code Repository	https://github.com/eventlet/eventlet
License Type	MIT
License Description	<ul style="list-style-type: none">• It gives the permission for anyone else to use it without restriction where they have rights to use, copy, modify, merge, publish, distribute, sublicense, and/or sell copies of the• The copyright holder or contributors are not liable for any damages or claim
License Restrictions	<ul style="list-style-type: none">• Redistribution of source code needs the copyright notice and license
Who worked with this?	abi

Use as many of the sections below as needed, or create more, to explain every function, method, class, or object type you used from this library/framework.

eventlet.wsgi.server()

Purpose

Replace this text with some that answers the following questions for the above tech:

- What does this tech do for you in your project?
This manages the specifics of the websocket connection on the byte level. This code parses the websocket frames byte with the XOR of the mask and the calculation of the payload. Once these things are parses, we are to able to use the meaningful data stored in the body to execute higher level programs such as DM capability and the multi-user drawing board.
- Where specifically is this tech used in your project? Give us some details like file location and line number, if applicable. If too cumbersome, a general description of where it's used for a given purpose is fine as well.
This is used by flask-socketio in order to run the server along with websockets.

Dispel the magic of this technology. Replace this text with some that answers the following questions for the above tech:

- How does this technology do what it does for you in the **Purpose** section of this report? Please explain this in detail, starting from after the TCP socket is created. Remember, to be allowed to use a technology in your project, you must be able to know how it works.
This tech specifically does all the bit level parsing of the websocket and even does the handshake.
- Where is the specific code that does what you use the tech for? You **must** provide a link to the specific file in the repository for your tech with a line number or number range.
 - If there is more than one step in the chain of calls (*hint: there will be*), you must provide links for the entire chain of calls from your code, to the library code that actually accomplishes the task for you.
 - Example: If you use an object of type `HttpRequest` in your code which contains the headers of the request, you must show exactly how that object parsed the original headers from the TCP socket. This will often involve tracing through multiple libraries and you must show the entire trace through all these libraries with links to all the involved code.

*This section may grow beyond the page for many features.

<https://github.com/eventlet/eventlet/blob/88ec603404b2ed25c610dead75d4693c7b3e8072/eventlet/wsgi.py#L884>

<https://github.com/eventlet/eventlet/blob/88ec603404b2ed25c610dead75d4693c7b3e8072/eventlet/websocket.py#L43>

<https://github.com/eventlet/eventlet/blob/88ec603404b2ed25c610dead75d4693c7b3e8072/eventlet/websocket.py#L65>