- 1. The website will enable users to create vocabulary lists and study materials while studying a new language online (for example: when reading a foreign language newspaper online). The website will store words selected by the user into the user's account so that they can be exported or reviewed on the platform in the future. The words will be translated via an API and saved to the database with as much pertinent information about the word as possible.
- 2. The users will be people who are studying a foreign language and using online reading materials to practice.
- 3. User's will import content (ideally by entering a link, but potentially just by pasting in material), and a translation API or dictionary API will be used to pull information about words selected by the user. The website will store the foreign language word and also the word translated into the user's primary language. Ideally, the API used will also be able to provide information about the words various forms, tenses, etc.
- 4. A lot will hinge on what type of information I will be able to get from an translation/dictionary API. At the very least, the site will be able to translate a word and store it to a user's profile in the database. Ideally the site will be able to not only translate the word, but also get other forms of the word (tenses, plural forms, conjugations, etc.) so that a user can study the vocabulary word in all of it's forms, not just the form it happened to be presented in in the source text. The user will be able to link the word to the source (so that they can return to the source later on in order to see context, etc.) and also add it to vocabulary lists. Words will be associated with a source language and translated language, can be associated with multiple lists, and can be associated with multiple sources. Additional functionality may include enabling a user to share words, lists, and sources with other users. Hopefully it will be possible to import news articles directly into the site in some fashion such that a user could click on a word rather than having to copy and paste it into an input box. One option will be linking foreign language news source APIs to the site, but that would limit the available content to the APIs that are linked. It may be necessary to build in that sort of functionality, but also enable the user to paste large amounts of text into an input box, then render the text into clickable spans. Web scraping is also an option if I can find a provider of content with a reliable framework for presenting information. It will be necessary to secure user passwords in an encrypted manner. A proposed schema follows.