**Programming Languages Explanation**

**Benefits and Drawbacks of using C++ in a coding project.**

As implemented in the Grocery Tracking Program, C++ is effective in building a friendly user interface with possibility of formatting and colors, for example we have used different colors of the background and text for this project making the interface more appealing. Moreover c++ provides more scalability and portability.

On the other hand, C++ has some drawbacks like there is no automatic memory management and it can not effectively handle large amounts of data or data of different types. As we saw during the implementation of the Text-Based Histogram using C++, we had to use two loops, break the string into a substring and convert it from string to int.

**Benefits and Drawbacks of using Python in a coding project.**

Python is really efficient and provides reliability when it comes to handling and manipulation of large amounts of data or data with different data types which is why it is suited for the internal functions of the project. As we saw in the implementation phase where we easily stored and accessed the item's name and their frequency.

On the other hand Python is not really suited for the formatting of the user interface, it can be a bit difficult for someone who is new to the coding world.

**Combining two programming languages ?**

Every language has its strength and weakness like we discussed above, which is the reason when we combine two languages joining their strengths we can have better efficiency and user satisfaction, coming back to our project we saw these benefits in working as we used Python for handling and manipulating data working together with C++ as an external wrapper which provides better user interface. We can create better and more efficient programs by combining more than one programming language, for example if we combine in this project Java which provides automatic memory management and garbage collection as opposed to C++ we could have faster and more efficient code than this one.

In conclusion, once we are familiar with the strengths of programming languages we should combine them together to make better projects and have more freedom in the functionalities.