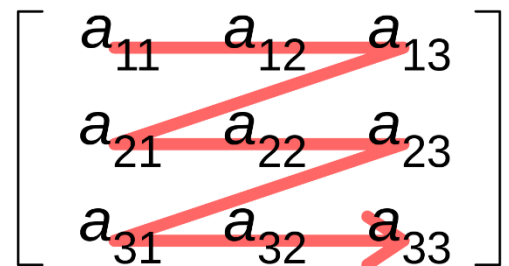


One programming technique that we have been trying to incorporate more into our assignments are visualizations such as drawings. Often, we tend to be stuck on a blank screen struggling to write code but as soon as we started to break each piece of code and function down into digestible pieces, it was easier to understand what we are trying to accomplish and visualize the process of what our expected output is supposed to be. For example, in our iii assignment, we decided to draw out our functions such as “row-major order” and “column-major order.” Sometimes after hours of coding, we forget what our functions are supposed to do and what we expect it to look like. In this drawing we can see that our row-major function is visualized as a vector of “a” values marked with their indices to be read from left to right. Same goes for the “column-major order.” We see that it is visualized as a vector of “a” values marked with their indices but expected to be read from top to bottom all the way through. These visualizations are a super helpful technique because we can get lost in our code and it helps us break down each function into a visualization to be able to understand in digestible pieces and then finally be able to put them together. This is something we regretted not doing earlier into our coding careers as it may have saved us countless hours of trying to understand a line of code in our heads. This is something we hope to incorporate for the rest of the semester and throughout our entire coding career as it has been super helpful and useful to do so far.

Row-major order



Column-major order

