1. Queue Implementation:

Developed the Queue class to manage queue operations efficiently. Utilized a double-linked linear list structure for element storage and management. Implemented essential methods like enqueue, dequeue, getSize, isEmpty, etc., ensuring proper queue functionality. Ensured integrity of the double-linked list during enqueue and dequeue operations.

1. Random Operation Generation:

Used <cstdlib> and <ctime> libraries to seed the random number generator. Generated a random trial count between 1 and 10. Employed rand() function to determine random counts for enqueue and dequeue operations within each trial.

1. Main Program Logic:

Developed the main program to orchestrate enqueue and dequeue operations for multiple trials. Created a single instance of the Queue class outside the loop to reuse the queue for all trials. Iterated through each trial, performing random enqueue and dequeue operations based on generated counts. Displayed queue content before and after each operation to track changes.