

JOY OF CODING

Day 4

Q 1.

Consider the following image



Doesn't it represent stack of books?

Each book has the credentials such as

Book_Id (int)

Book_Name (char)

Book_Author (char)

Book_Price (float)

You are required to arrange the books in such a way that, only the book at the top can be removed, and new book can be added only on to the top of the existing book stack. Imagine these books are to be kept in a box. The maximum number of books the box can contain is 5. Write C routine to

- insert book
- remove book
- display the existing book details

The program should also check the following constraints.

- if the box is full then, books can't be added
- books can't be removed if the box is empty

Note: Use Structures. Enhance the program with pointer to structure concept (Introduce -> operator)

Q 2.

Baby Sanvi's mother is preparing her for monthly assessment. To assess Sanvi's recognition and counting ability, mother shows a English sentence say "a big black bear sat on a big black rug" and ask her to identify each letter and to tell the most frequent alphabet. In this case it's **a** with count **6**. Automate this process by writing a program in C.

Note: Assume that the sentence will have only lower-case letters and no special characters.