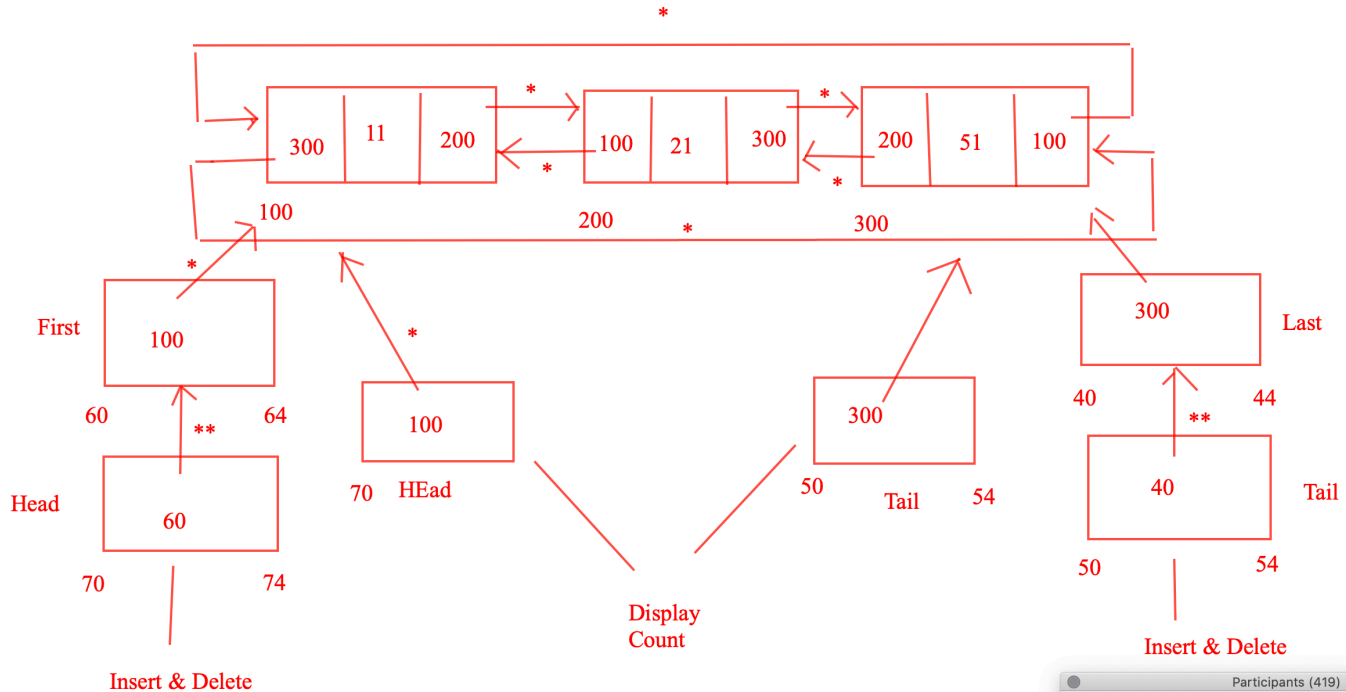


Logic Building Assignment : 42

Please complete below code snippet of Doubly Circular Linkedlist.



```
#include<stdio.h>
#include<stdlib.h>
```

```
struct Node
{
    int data;
    struct Node *next;
    struct Node *prev;
};
```

```
typedef struct Node NODE;
typedef struct Node * PNODE;
typedef struct Node ** PPNODE;
```

```
void InsertLast(PPNODE Head, PPNODE Tail, int value)
{
    PNODE newn = NULL;

    newn = (PNODE)malloc(sizeof(NODE));
```

```

newn->data = value;
newn->next = NULL;
newn->prev = NULL;

if((*Head == NULL) && (*Tail == NULL))    // Linked list is empty
{
    *Head = newn;
    *Tail = newn;
}
else    // Linked list contains atleast one node
{
    (*Tail)->next = newn;
    newn->prev = *Tail;
    *Tail = (*Tail) ->next;    // *Tail = newn;
}
(*Tail)->next = *Head;
(*Head)->prev = *Tail;
}

void InsertFirst(PPNODE Head, PPNODE Tail, int value)
{
    PNODE newn = NULL;

    newn = (PNODE)malloc(sizeof(NODE));

    newn->data = value;
    newn->next = NULL;
    newn->prev = NULL;

    if((*Head == NULL) && (*Tail == NULL))    // Linked list is empty
    {
        *Head = newn;
        *Tail = newn;
    }
    else    // Linked list contains atleast one node
    {
        newn->next = *Head;
        (*Head)->prev = newn;
        *Head = (*Head)->prev;
    }
    (*Tail)->next = *Head;
    (*Head)->prev = *Tail;
}

void DeleteFirst(PPNODE Head, PPNODE Tail)
{
    // Logic

```

```
}

void DeleteLast(PPNODE Head, PPNODE Tail)
{
    // Logic
}

void DeleteAtPos(PPNODE Head, PPNODE Tail, int pos)
{
    // Logic same as doubly linear linked list
}

void InsertAtPos(PPNODE Head, PPNODE Tail, int value, int pos)
{
    // Logic same as doubly linear linked list
}

void Display(PNODE Head, PNODE Tail)
{
    if((Head == NULL) && (Tail == NULL))
    {
        return;
    }
    do
    {
        printf("|%d| -> ",Head->Data);
        Head = Head -> next;
    }while(Head != Tail -> next);
}

int Count(PNODE Head, PNODE Tail)
{
    // Logic
}

int main()
{
    PNODE First = NULL;
    PNODE Last = NULL;        // Nawin
    int no = 0;

    printf("Enter number : ");
    scanf("%d",&no);
    InsertFirst(&First,&Last,no);
}
```

```
// Call all the functions  
  
return 0;  
}
```

