

IBM19CSD44

merge

```
void merge ( struct node *temp1,  
             struct node *temp2)
```

```
{
```

```
    struct node *newnode, *current;
```

```
    temp = head1;
```

```
    // temp = head2;
```

```
    while ( temp1 != NULL && temp2 != NULL)
```

```
    {
```

```
        newnode = (struct node *) malloc (sizeof(struct node));
```

```
        newnode->next = NULL;
```

```
        if ( temp1->data < temp2->data)
```

```
        {
```

```
            newnode->data = temp1->data;
```

```
            temp1 = temp1->next;
```

```
        }
```

```
    else
```

```
    {
```

```
        newnode->data = temp2->data;
```

temp1 = temp1 → next;

}

if (third == NULL)

{

third = newnode;

current = newnode;

}

else

{

current → next = newnode;

current = newnode;

}

}

if (temp1 != NULL)

{

while (temp2 != NULL)

newnode = (struct node *) malloc (sizeof (struct node));

newnode → data = temp2 → data;

newnode → next = NULL;

if (third == NULL)

{

third = newnode;

current = newnode;

}

```
else
```

```
{
```

```
    current → next = newnode;
```

```
    current = newnode;
```

```
}
```

```
    temp2 = temp2 → next;
```

```
}
```

```
}
```

```
else
```

```
{
```

```
    while (temp1 != NULL)
```

```
    {
```

```
        newnode = (struct node*) malloc (sizeof(struct node));
```

```
        newnode → data = temp1 → data;
```

```
        newnode → next = NULL;
```

```
        if (head == NULL)
```

```
        {
```

```
            head = newnode;
```

```
            current = newnode;
```

```
        }
```

```
    else
```

```
    {
```

```
        current → next = newnode;
```

```
        current = newnode;
```

```
    } temp1 = temp1 → next;
```

```
}
```



```
void create ( Struct node **hptr)
```

```
{
```

```
    Struct node * newnode, * temp;
```

```
    int item;
```

```
    char choice;
```

```
do
```

```
{
```

```
    newnode = (Struct node *) malloc (size of (Struct node));
```

```
    printf ("Enter the data : ");
```

```
    scanf ("%d", &item);
```

```
    newnode->data = item;
```

```
    newnode->next = NULL;
```

```
    printf ("Do u want to add elements 'n");
```

```
    flush (stdin);
```

```
    scanf ("%c", &choice);
```

```
    if
```

```
    if (*hptr == NULL) {
```

```
        *hptr = newnode; }
```

```
    else {
```

```
        temp = *hptr;
```

```
        while (temp->next != NULL)
```

```
        {
```

```
            temp = temp->next;
```

```
        }
```

· Void reverse()

{

Struct node * prev = NULL, * current = head;
* next = NULL;

while (current != NULL)

{

next = current -> next;

current -> next = prev;

prev = current;

current = next;

}

head = prev;

}