```python
def QuickSort(arr):

    elements = len(arr)

    #Base case
    if elements < 2:
        return arr

    current_position = 0 #Position of the partitioning element

    for i in range(1, elements): #Partitioning loop
        if arr[i] <= arr[0]:
            current_position += 1
            temp = arr[i]
            arr[i] = arr[current_position]
            arr[current_position] = temp

    temp = arr[0]
    arr[0] = arr[current_position]
    arr[current_position] = temp #Brings pivot to it's appropriate
position

    left = QuickSort(arr[0:current_position]) #Sorts the elements
to the left of pivot
    right = QuickSort(arr[current_position+1:elements]) #sorts
the elements to the right of pivot

    arr = left + [arr[current_position]] + right #Merging
everything together

    return arr
```