

Sort an array Using Recursion.

array = [] [] [] []

Base case : if ($n=1$) return;

We used 2 functions here.

Sort()

insert()

Sort $\xrightarrow[\text{step}]{\text{induction}}$ insert $\xrightarrow[\text{step}]{\text{induction}}$ vector.push()

Sort \rightarrow [] [] [] , temp

[] [] , temp = []

[] temp []

insert ([] , temp) {
if ($a[n-1] \leq \text{temp}$)
[] push(temp)
}

val = last element in array.

a.pop from array
insert(a, val) find new place

a.push that val.