

CSE 208
Offline 6: Splay Tree
Submission Deadline: Week 9

You have to implement a height balanced splay tree (**CPP/ Java object oriented code**). Implement the following functions.

Task	Function	Description	Expected Complexity	Marks
1	Print(T)	Print the tree T, get the code here . You can modify the code according to your Splay Tree code.	Doesn't matter	1 <i>[but' it's a must]</i>
2	Splay(x)	Do the splay operations and bring x to the root.	$O(\log n)$	8
3	Search(x)	Do the Search operation using the splay operation.	$O(\log n)$	2
4	Insert(x)	Do the Insert operation using the splay operation. Make sure you are using Split(x).	$O(\log n)$	4
5	Delete(x)	Do the Delete operation using the splay operation. Make sure you are using Join(L,R).	$O(\log n)$	5

****Submit only the source code named as 1505xxx_splay.cpp or 1505xxx_splay.java, along with relevant source files. Executables or the project codes must not be submitted.**