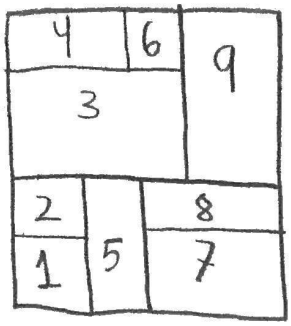
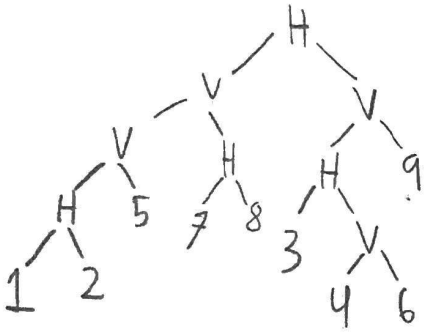
Problem 1



i	width	height
1	2	1
2	2	2
3	4	3
4	3	1
5	1	3
6	1	1
7	3	2
8	3	1
9	2	4

a) draw skewed slicing tree
b) give NPE



NPE: 12H5V78HV346VH9VH

Problem 2

PE = 12H34V56VHV

a) does PE satisfy Balloting property
b) is PE a NPE
c) give slicing tree for PE
d) find rost PE
e) draw the floor plan

i	w	h
1	2	3
2	2	2
3	3	1
4	2	3
5	1	2
6	2	2

a

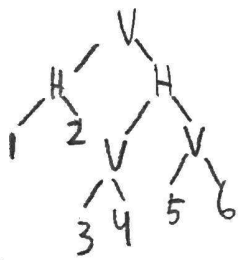
1) every operand occurs only once (1,2,3) — no repeated values for 1-6
2) # operands > # operators #(1,2,3) > #(V,H)

operands > # operators
6 > 5

b

no repeating operators 12H34V56VHV Normalized PE

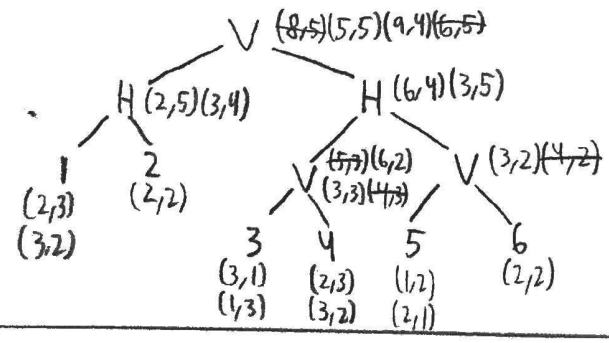
c



1) give all possible leaf orientations
2) propagate up (eliminate redundant orientations eg (1,2), ~~(1,3)~~

H: max width, add height
V: add width, max height

(w,h)



(5,5) = 25
(9,4) = 36

smallest rectangle: 5x5