Homework 9 (Due: 5/16)
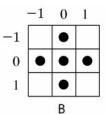
(A) Implement the Lantuejoul's skeletonization

method using the structuring element B:
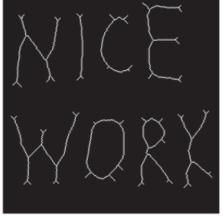
Apply the method to the following input image

Input image   Experimental results

○ Lantuejoul's method

Erosions	Openings	Differences
A	$A \circ B$	$A - (A \circ B)$
$A \Theta B$	$(A \Theta B) \circ B$	$(A \Theta B) - ((A \Theta B) \circ B)$
$A \Theta 2B$	$(A \Theta 2B) \circ B$	$(A \Theta 2B) - ((A \Theta 2B) \circ B)$
$A \Theta 3B$	$(A \Theta 3B) \circ B$	$(A \Theta 3B) - ((A \Theta 3B) \circ B)$
M	M	M
$A \Theta kB$	$(A \Theta kB) \circ B$	$(A \Theta kB) - ((A \Theta kB) \circ B)$

Until $(A \Theta kB) \circ B = \phi$

Skeleton $=$ U(Differences)