Local sequence alignment

Execute our local alignment algorithm (Smith-Waterman) on the strings ($x = $ CGATC and $y = $ ATCCG), with $g = -2$. Use back tracing to find the best local alignment.

	-	A	T	C	C	G
-						
C						
G						
A						
T						
C						

For the two pictures below, the diagonal lines represent a form of optimal alignment between x and y. Draw out what these alignments would look like (i.e. what portion of x aligns to what portion of y?) How could we modify our alignment algorithm to achieve these types of alignments?