

Study Questions 3
due Tuesday August 1

Blast Chapter 3

1. What are the differences between local and global alignment? What are the advantages and disadvantages of each?
2. What are some limitations of the gap-scoring schemes described for the Needleman-Wunsch algorithm and the Smith-Waterman algorithm? Explain why the gap modifications described on page 51 may produce better alignments.

Blast Chapter 5

3. Name two advantages of the BLAST algorithm over Smith-Waterman.
4. Explain the function of each of the parameters T, W, and X in the BLAST algorithm. What are the disadvantages of choosing a W value that is too small or too large?