Macromolecules Worksheet #2
Chapter 2 Section 3   **Name** _____ **Per.**

Part A. *Classify each as a carbohydrate, protein, lipid or nucleic acid.*

1. _____ starch   10. _____ polysaccharide

2. _____ cholesterol   11. _____ phospholipid

3. _____ steroid   12. _____ glycerol

4. _____ glycogen   13. _____ monosaccharide

5. _____ nucleotide   14. _____ cellulose

6. _____ RNA   15. _____ amino acid

7. _____ polypeptide chain   16. _____ enzyme

8. _____ glucose   17. _____ saturated fat

9. _____ unsaturated fatty acid   18. _____ DNA

Part B. *Identify the <u>specific</u> molecule (use the above terms) from each description. Some terms may be used more than once.*

17. _____ provides long-term energy storage for animals

18. _____ instructions for building proteins

19. _____ provides immediate energy

20. _____ sex hormones

21. _____ provides short-term energy storage for plants

22. _____ animal and plant structures

23. _____ forms the cell membrane of all cells

24. _____ speeds up chemical reactions by lowering activation energy

25. _____ one sugar

26. _____ cells convert this into ATP

27. _____ monomer of proteins

28. _____ provides long-term energy storage for plants

29. _____ genetic material

30. _____ steroid that makes up part of the cell membranes

31. _____ 3-carbon "backbone" of a fat

32. _____ provides short-term energy storage for animals

33. _____ many sugars

34. _____ monomer of nucleic acids

35. _____ forms the cell wall of plant cells

Part C. *Which specific molecule (saturated fat, unsaturated fat, protein, glucose, starch, cellulose) is each food mostly made of?*

36. _____ almond

37. _____ spinach

38. _____ beef jerky

39. _____ bacon

40. _____ noodles

41. _____ orange juice

42. _____ cheese

43. _____ wheat

44. _____ celery

45. _____ soy beans

46. _____ cranberries

47. _____ egg white

48. _____ table sugar

49. _____ popcorn

50. _____ lobster

51. _____ sesame oil

Part D. *State whether each is found in animals, plants or both.*

52. _____ saturated fat

53. _____ protein

54. _____ steroid

55. _____ amino acid

56. _____ DNA

57. _____ cellulose

58. _____ monosaccharide

61. _____ glucose

62. _____ RNA

63. _____ polysaccharide

64. _____ glycogen

65. _____ starch

66. _____ phospholipid

67. _____ enzyme

Part E. *Which food molecule (monosaccharide, polysaccharide, lipid, protein) would you eat if...*

68. …you needed a quick boost of energy? _____

69. …you wanted to grow strong nails? _____

70. …you haven't eaten in days? _____

71. …you wanted to grow healthy hair? _____

72. …you had a race tomorrow afternoon? _____

73. …you were getting ready for hibernation? _____

74. …you wanted to get bigger muscles? _____

75. …your next meal will be in a week? _____