第三章第一次作业

问答题：

1）探索除去课堂讲授以外列表的其他方法，请展示其方法和结果，并分析其功能。

上机题

1)写一个程序，用 while 循环实现对一个给定序列的倒排输出。给定 L=[1,2,3,4,5]输出为[5,4,3,2,1]

3）用列表推导式（推演表达式\解析式）生成九九乘法表，每个元素都是一个计算式子。使得输出列表为：['1 * 1 = 1', '1 * 2 = 2', '1 * 3 = 3', '1 * 4 = 4', '1 * 5 = 5', '1 * 6 = 6', '1 * 7 = 7', '1 * 8 = 8', '1 * 9 = 9', '2 * 1 = 2', '2 * 2 = 4', '2 * 3 = 6', '2 * 4 = 8', '2 * 5 = 10', '2 * 6 = 12', '2 * 7 = 14', '2 * 8 = 16', '2 * 9 = 18', '3 * 1 = 3', '3 * 2 = 6', '3 * 3 = 9', '3 * 4 = 12', '3 * 5 = 15', '3 * 6 = 18', '3 * 7 = 21', '3 * 8 = 24', '3 * 9 = 27', '4 * 1 = 4', '4 * 2 = 8', '4 * 3 = 12', '4 * 4 = 16', '4 * 5 = 20', '4 * 6 = 24', '4 * 7 = 28', '4 * 8 = 32', '4 * 9 = 36', '5 * 1 = 5', '5 * 2 = 10', '5 * 3 = 15', '5 * 4 = 20', '5 * 5 = 25', '5 * 6 = 30', '5 * 7 = 35', '5 * 8 = 40', '5 * 9 = 45', '6 * 1 = 6', '6 * 2 = 12', '6 * 3 = 18', '6 * 4 = 24', '6 * 5 = 30', '6 * 6 = 36', '6 * 7 = 42', '6 * 8 = 48', '6 * 9 = 54', '7 * 1 = 7', '7 * 2 = 14', '7 * 3 = 21', '7 * 4 = 28', '7 * 5 = 35', '7 * 6 = 42', '7 * 7 = 49', '7 * 8 = 56', '7 * 9 = 63', '8 * 1 = 8', '8 * 2 = 16', '8 * 3 = 24', '8 * 4 = 32', '8 * 5 = 40', '8 * 6 = 48', '8 * 7 = 56', '8 * 8 = 64', '8 * 9 = 72', '9 * 1 = 9', '9 * 2 = 18', '9 * 3 = 27', '9 * 4 = 36', '9 * 5 = 45', '9 * 6 = 54', '9 * 7 = 63', '9 * 8 = 72', '9 * 9 = 81']

（涉及知识，列表解析式，字符串格式化操作%）

示例：R = ['%d + %d' %(x,y) for x in range(4) for y in range(2)]

#输出为：['0 + 0', '0 + 1', '1 + 0', '1 + 1', '2 + 0', '2 + 1', '3 + 0', '3 + 1']

3）写一个 Python 程序，检查一个字符串是否为 Python 可以接受的小数或整数形式。例如，s=”3.5”或“3”或“3.”或“.3”的检查结果输出都为 True。