

## Alg2 Homework, due Thursday, Jan 25

On a separate sheet of paper, answer each question *completely*. Number your answers 1-4.

If  $\log(n) = 0.6$ , find the value of  $\log(10n)$ .

If  $m$  is a positive integer and  $\log(m) \approx 3.8$ , how many digits are there in  $m$ ? Explain how you know.

If  $m$  is a positive integer and  $\log(m) \approx 9.6$ , how many digits are there in  $m$ ? Explain how you know.

Vivian says  $\log(452,000) = 5 + \log(4.52)$ , while her sister Lillian says that  $\log(452,000) = 6 + \log(0.452)$ . Which sister is correct? Explain how you know.