

# Chapter 10 Review Questions



Studying for a chapter examination is a personal process, one which nobody else can do for you. Simply take the time to review what you have done. Here are the new terms in Chapter 10.

Addition law of logarithms [10.2]	Exponential equation [10.1]	Multiplicative law of logarithms [10.2]
Argument [10.1]	Grant's tomb properties [10.2]	Natural logarithm [10.1]
Change of base theorem [10.1]	Growth formula [10.3]	Richter number [10.3]
Common logarithm [10.1]	Half-life [10.3]	Richter scale [10.3]
Decay formula [10.3]	Laws of logarithms [10.2]	Subtractive law of logarithms [10.2]
Decibel [10.3]	Log of both sides theorem [10.2]	
Evaluate [10.1]	Logarithm [10.1]	
Exact solution [10.1]	Logarithmic equation [10.2]	
Exponential [10.1]	Logarithmic scale [10.3]	
	Micrometer [10.1]	

If you can describe the term, read on to the next one; if you cannot, then look it up in the text (the section number is shown in brackets). Next, study the types of problems listed at the end of Chapter 10.

## TYPES OF PROBLEMS

Know the definition of a logarithm. [10.1]

Evaluate logarithms. [10.1]

Use the Grant's tomb properties to simplify logarithmic expressions. [10.1, 10.2]

Solve exponential equations. [10.1]

Solve logarithmic equations. [10.2]

Solve applied problems of growth and decay. [10.3]

Once again, see if you can verbalize (to yourself) how to do each of the listed types of problems.

Work all of Chapter 10 Review Questions (whether they are assigned or not). Work through all of the problems before looking at the answers, and *then* correct each of the problems. The entire solution is shown in the answer section at the back of the text. If you worked the problem correctly, move on to the next problem, but if you did not work it correctly (or you did not know what to do), look back in the chapter to study the procedure, or ask your instructor.

Finally, go back over the homework problems you have been assigned. If you worked a problem correctly, move on to the next problem, but if you missed it on your homework, then you should look back in the book or talk to your instructor about how to work the problem.

If you follow these steps, you should be successful with your review of this chapter.