

## Mater and Minerals

### Operating Procedures and Notes for Homework.

#### Suggestions and rules.

1. Put your name on your texts, found unlabeled textbooks become the property of the instructors.
2. Read all handouts thoroughly.
3. In *Chemistry* commit to memory the rules for significant digits. *Do the rounding on the final answer after completing all the calculations* unless instructed otherwise. This will avoid round-off errors which are very important in problems with logarithms and other exponentials. Remember attention to significant digits is part of doing problems correctly.
4. Always put your name on *every* homework page.
5. Number *every* homework page.
6. Always do your work *neatly* and on *standard-sized paper* (8.5 x 11 inches). The faculty recommends engineer's pads because the grid makes drawing and scaling diagrams easier.
7. *For calculus and geology* indicate the problem or homework set at the top of the first page.
8. *For chemistry* add a cover page with your name, date, and assignment.
9. *For geology* write out or summarize each problem. Do not supply answers out of context.
10. If you use Excel, or other software make sure intermediate steps are identified and commentary inserted.
11. Put a box around answers unless they are very obvious. (Obvious to a total stranger.)
12. Neat hand written work is just fine for problem sets unless otherwise instructed.
13. If a problem asks for a drawing, it's *required*.
14. Problems dealing with dimensional units must have these written out, even if you use computer software.
15. Never *ever* use a paper clip or those cute little grade-school corner folds to keep your papers together. Always *staple* your work.
16. For reports and such *never ever* use a plastic cover. To do so will mean immediate dismissal from the class.
17. *Make a copy of the work you hand in.* We all loose things so protect your investment.
18. If you are working in a team make a copy of lab or field data. Never rely on just one person having the data for more than the initial collection day.
19. Always come to class with a calculator and the textbook.
20. Always bring your lab notebook, calculator, safety goggles and lab apron (or coat) to chemistry labs.
21. Always come to the geology labs or project sessions ready to get your feet wet and clothes dirty.
22. Always come to class ready to *start* on time.
23. Keep a portfolio, a three ring binder of all handouts, your notes and your work. The portfolio should have well labeled sections. Use a separate binder for each major subject area.
24. New this year will be specific instructions on how to hand in some homework sets for geology.

#### Equipment - Required

1. *Scientific calculator* with log, exponential, and trig functions essential. A low-cost one will do just fine.
2. *Specific chemistry lab notebook* available in the campus bookstore. Also lab apron, goggles are required.
3. *Sharp pencil* (recommend a 0.5 mm mechanical pencil).
4. *Ball point or other pen* with indelible ink (not water soluble like most roller-ball or nylon-tip pens)
5. Soft plastic or gum *eraser*.
6. A *stapler* for fastening your homework.
7. A 10x *hand lens*.

#### Equipment - Optional

1. A *triangle* and *protractor* for drawing.
2. An *engineer's scale* in 10s, 20s, 30s etc. of and inch will be helpful. Do not get an architect's rule. The bookstore has these and places that sell office supplies have them.
3. Nerd gear: pocket protector, lots of pens and pencils, thick glasses, a slide rule if you can find one, white socks and dark trousers.