

Common Course Outline

MATH 104

Business Mathematics

3 credits

The Community College of Baltimore County

Description

Business Mathematics begins with a review of basic operations, percent, ratio, and equation-solving techniques. The major part of the course consists of applications in the areas of accounting (taxes, payroll), retailing (discounts, markups, markdowns), and finance (U.S. Rule, interest, multiple payment plans, annuities, sinking funds, amortization). Prerequisite: (RDNG 052 or LVR2) and (MATH 082 or LVM2).

Overall Course Objectives

Upon completion of this course the student will be able to:

1. Solve linear equations involving percent and ratio.
2. Complete simple payroll ledgers.
3. Compute sales taxes, FICA and Medicare taxes, federal withholding, and property taxes and related problems.
4. Compute net cost, equivalent single discount, markup based on cost and on sales, selling price, and related problems.
5. Compute the principal, maturity values, proceeds, interest earned, and related problems of promissory notes.
6. Compute the annual percentage rate, amount of annuity, and payments of annuities, and related problems.
7. Construct depreciation schedules and solve related problems for straight-line, sum-of-the-years'-digits, double-declining balance and MACRS methods.
8. Compute overhead.
9. Interpret simple graphs.
10. Find the mean, median, mode, range, and standard deviation of sets of data.
11. Apply the Empirical Rule to the Normal Curve.

Major Topics

Review of operations with fractions, equations and formulas, and percent.
Banking services
Payroll
Taxes
Discounts, markups, and markdowns
Simple interest
Notes and bank discount
Compound interest
Annuities and Sinking funds
Depreciation
Business statistics

Course Requirements

Grading/exams: Grading procedures will be determined by the individual faculty member but will include the following: Final exam no less than 10% and no more than 30% of the total grade.

Writing: The individual faculty member will determine specific writing assignments.

Other Course Information

This course does not satisfy the general education mathematics requirement.
This course is taught in a traditional classroom setting and via cable TV.

Individual faculty members may include additional course objectives, major topics, and other course requirements to the minimum expectations stated in the Common Course Outline.

Date Revised: 02/28/00