



MASTER COURSE OUTLINE

A. MEDA 1230 Math for Allied Health Professionals

B. COURSE DESCRIPTION:

This course prepares allied health students for advanced study in dosage calculations, medication administration, and mathematics for pharmacology. Prerequisites for this course: Next Gen arithmetic qualifying cut score or equivalent score/course.  
**(1 Cr – 0 lect, 1 lab)**

C. **\*\*Core Theme: Critical Thinking**

D. RIVERLAND INSTITUTIONAL LEARNING OUTCOMES:

This course addresses the following Riverland Institutional Learning Outcome(s):

- ILO 1: critical thinking (*Core Theme Goal 2*)
- ILO 2: awareness of the larger global community (*Core Theme Goal 7 or 8*)
- ILO 3: ethical, engaged citizenship (*Core Theme Goal 9 or Goal 10*)
- ILO 4: communication and collaboration (*Discipline Goal 1 and by any learning outcome(s) involving communication or collaboration*)

E. MAJOR CONTENT AREAS:

- Review of basic mathematics in applied equations: addition, subtraction, multiplication, division of whole numbers, fractions, decimals, and percentages in relation to medications and dosages
- English and metric systems of measurement
- Measurement conversions and equivalencies
- Dosage calculation

F. GOAL TYPE, OBJECTIVES, AND OUTCOMES:

GOAL TYPE	OBJECTIVES Students will be able to	OUTCOMES The student will successfully
<u>**Critical Thinking</u>	imagine and seek out a variety of possible goals, assumptions, interpretations, or perspectives which can give alternative	1. analyze and find solutions to applied problems.

	meanings or solutions to given problems.	
<u>CS</u>	demonstrate basic math skills using whole numbers, fractions, decimals, and percentages.	<ol style="list-style-type: none"> <li>1. demonstrate accuracy in applying basic math skills to medication math problems.</li> <li>2. calculate proper dosages of medication for administration.</li> <li>3. apply mathematical computation to solve equations.</li> </ol>
<u>CS</u>	understand English and metric conversions as they applied to medication administration practices.	<ol style="list-style-type: none"> <li>1. define basic units of measurement in the metric system and household system.</li> <li>2. convert among measurement systems.</li> </ol>
<u>CS</u>	understanding abbreviations, graphs and tables.	<ol style="list-style-type: none"> <li>1. identify abbreviations used in calculating medication dosages.</li> <li>2. identify normal and abnormal results as reported in graphs and tables.</li> <li>3. document on a growth chart.</li> </ol>

G. SPECIAL INFORMATION:

This course may require use of the Internet, the submission of electronically prepared documents and the use of a course management software program. Students who have a disability and need accommodations should contact Accessibility Services at the beginning of the semester. This information will be made available in alternative format, such as Braille, large print, or current media, upon request.

H. COURSE CODING INFORMATION: Course Code X/Class Maximum 20; Letter Grade

Revision date: 01/10/23

AASC Approval date: 01/24/23

<b>*Riverland Community College Disciplines</b>	<b>MnTC Goal Number</b>
Communication (CM)	<b>1</b>
Natural Sciences (NS)	<b>3</b>
Mathematics/Logical Reasoning (MA)	<b>4</b>
History and the Social & Behavioral Sciences (SS)	<b>5</b>
Humanities and Fine Arts (HU)	<b>6</b>

<b>**Riverland Community College Core Themes</b>	<b>MnTC Goal Number</b>
Critical Thinking (CT)	<b>2</b>
Human Diversity (HD)	<b>7</b>
Global Perspective (GP)	<b>8</b>
Ethical and Civic Responsibility (EC)	<b>9</b>
People and the Environment (PE)	<b>10</b>

\*These five MnTC Goals have been identified as Riverland Community College Disciplines.

\*\* These five MnTC Goals have been identified as Riverland Community College Core Themes.

NOTE: The Minnesota Transfer Curriculum “10 Goal Areas of Emphasis” are reflected in the five required discipline areas and five core themes noted in the Riverland Community College program of study guide and/or college catalog.