



GEORGIA

PEACH STATE PATHWAYS

Career, Technical, & Agricultural Education

HEALTHCARE SCIENCE

COURSE: 25.552 Applications of Therapeutic Services

UNIT: 21.1 Reproductive System



INTRODUCTION

Annotation:

In this unit students will be introduced to the main issues involved in healthcare as it relates to applied anatomy, physiology and fundamental pathophysiology of the Reproductive System (male and female).

Grade(s):

X	9 th
X	10 th
X	11 th
X	12 th

Time:

Five 50 minute periods; One week if Pregnancy Time line option is used

Author:

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Additional Author(s):

Students with Disabilities:

For students with disabilities, the instructor should refer to the student's IEP to be sure that the accommodations specified are being provided. Instructors should also familiarize themselves with the provisions of Behavior Intervention Plans that may be part of a student's IEP. Frequent consultation with a student's special education instructor will be beneficial in providing appropriate differentiation.



FOCUS STANDARDS

GPS Focus Standards:

HS-ATS-8:

The student will analyze the anatomy, physiology and basic pathophysiology of each of the body's systems and apply knowledge in performance of evaluating, monitoring, and treatment of client(s) and/or simulations.

- a. Analyze anatomical structures in relationship to their physiological functions.
- b. Analyze the interdependence of the integumentary, skeletal, and muscular systems as these relate to the protection, support and movement of the human body.
- c. Assess the integration and coordination of body functions and their dependence on the endocrine and nervous systems to regulate physiological activities.
- d. Analyze the interdependence of the body's systems as related to wellness, disease, and disorders.
- e. Discuss the goals of therapy and care rehabilitation.
- f. Discuss the etiology of two common diseases in each body system and how to treat and/or prevent them.

GPS Academic Standards:

SAP1: Students will analyze anatomical structures in relationship to their physiological functions.

SAP2: Students will analyze the interdependence of the integumentary, skeletal, and muscular systems as these relate to the protection, support and movement of the human body.

SAP3: Students will assess the integration and coordination of body functions and their dependence on the endocrine and nervous systems to regulate physiological activities.

SAP4: Students will analyze the physical, chemical, and biological properties of process systems as these relate to transportation, absorption and excretion, including the cardiovascular, respiratory, digestive, excretory and immune systems.

National / Local Standards / Industry / ISTE:



UNDERSTANDINGS & GOALS

Enduring Understandings:

- Anatomical structures in each body system....Reproductive
- Interdependence of each body system...Reproductive
- Dependence of each body system to other working system(s).
- Body system related to wellness, disease and disorders within each system
- Common diseases and processes in each body system, how these diseases are treated and how, if possible, each can be prevented.
- How humans produce offspring

Essential Questions:

- How can each body system be independent among itself but still rely on other body systems to function?
- How might the reproductive system rely on the immune system?
- How are disease processes within the male and female reproductive systems identified, treated and/or prevented?
- How do the male and female reproductive organs produce offspring?
- How does a single, fertilized egg grow to become a complex human being?

Knowledge from this Unit:

- The independent functioning of the reproductive system.
- The dependence the reproductive system has on other systems.
- The common disease processes within the reproductive system.
- The common goal of treatment/prevention for disease processes of the reproductive system.

Skills from this Unit:

- Identify anatomical structure of the male and female reproductive systems on a model or diagram.
- Identify at least two common diseases/disorders within the male and female reproductive systems
- Differentiate between the dependence and interdependence of the body's systems

ASSESSMENT(S)

Assessment Method Type:

- ☐ Pre-test
- ☐ Objective assessment - multiple-choice, true- false, etc.
 - ☐ Quizzes/Tests
 - ☐ Unit test
- ☐ Group project
- ☐ Individual project
- ☐ Self-assessment - May include practice quizzes, games, simulations, checklists, etc.
 - ☐ Self-check rubrics
 - ☐ Self-check during writing/planning process
 - ☐ Journal reflections on concepts, personal experiences and impact on one's life
 - ☐ Reflect on evaluations of work from teachers, business partners, and competition judges
 - ☐ Academic prompts
 - ☐ Practice quizzes/tests
- ☐ Subjective assessment/Informal observations
 - ☐ Essay tests
 - ☐ Observe students working with partners
 - ☐ Observe students role playing
- ☐ Peer-assessment
 - ☐ Peer editing & commentary of products/projects/presentations using rubrics
 - ☐ Peer editing and/or critiquing
- ☐ Dialogue and Discussion
 - ☐ Student/teacher conferences
 - ☐ Partner and small group discussions
 - ☐ Whole group discussions
 - ☐ Interaction with/feedback from community members/speakers and business partners
- ☒ Constructed Responses
 - ☐ Chart good reading/writing/listening/speaking habits
 - ☐ Application of skills to real-life situations/scenarios
- ☐ Post-test

Assessment(s) Title:

- Pregnancy Time Line: Making a Poster.....The presentation is the assessment
- If you wish to give a written test, use prepared test from your text book, or
- Use attached rubric to test students on Reproductive System Structures, which may be done separately on male and female structures
- Have students write an essay explaining how the reproductive system is dependent on other body systems

Assessment(s) Description/Directions:

- Description/directions at top of attachment(s)

Attachments for Assessment(s):

- Reproduction Information Sheet and Key Terms list



LEARNING EXPERIENCES

Sequence of Instruction

- 1. Identify the Standards. Standards should be posted in the classroom for each lesson.**
- 2. Review Essential Questions.**
- 3. Identify and review the unit vocabulary.**
- 4. Assessment Activity.**

Instructor:

- a) Introduce the System by having students begin to look up related terms, do labeling, and assign reading material...you may wish to assign the Pregnancy Time-Line the first day of this unit if you choose that option and also assign dates if you plan to have students present their posters to the class. Give the Reproductive system structures rubric if will be using for an assessment
- b) Discuss and analyze anatomical structures in relationship to their physiological functions for the Reproductive systems; male and female. Multimedia presentation website below includes great slides for this discussion
- c) Discuss and analyze the interdependence of other systems of the human body as they may relate to the Reproductive Systems.
- d) Analyze and discuss the interdependence of the body's systems as related to wellness, disease, and disorders.
- e) Analyze pathology of the Reproductive system and discuss the goals of therapy and rehabilitation for them...follow # 6
- f) Discuss the etiology of two common diseases of the Reproductive system (male and female) and how to treat and/or prevent them.
 - Option: Do a Karyotyping activity or talk about genetics to include some of the common genetic disorders (Takes one class period) You will need scissors, tape or glue if you are using the activity from ADAM's 9 Month Miracle.
 - Option: Use computer soft ware which includes the reproductive system terminology for practicing word elements/ labeling/review and enhancement.
 - Option: Have student do an activity similar to The Nine Month Miracle's Comic Strip where student's are asked to draw up to 9-10 story boards explaining to a child that they are baby sitting, "Where babies come from"
 - If a birthing model is available, demonstrate vaginal delivery, or

- g) Plan at least one computer lab day if you have Medical Terminology for Health Professions by Ehrlich and Schroeder. Have students warm up using the concentration game then have them label, do word building, multiple choice, and True/False. You may end the class by taking one of the test as a quiz grade or having them print out the summary sheet of their work and take a grade based on their performance.
- h) Demonstrate birth if you have a birthing model or google childbirth videos and preview before showing to class-many available on the web
- i) Guest Speaker from a women's center would be an asset to this unit.
- j) Written Test is option or the poster may be used as an assessment method or the rubric identifying reproductive system structures and the written essay on interdependence with other body systems.

Student:

- a) Do reading, labeling, and vocabulary for the system
- b) Do activities as assigned by the instructor
- c) Do computer activities as assigned by the instructor
- d) Complete assessment(s)

Attachments for Learning Experiences:

Notes & Reflections:

- Medical Terminology for Health Professions by Ann Ehrlich and Carol L. Schroeder software if available...The software has Word Building, Short Answer, Multiple Choice, True/False and games such as Concentration, Hangman, Pronunciation, and Crosswords. One CD comes with each book so an entire computer lab could be loaded with this program.
- ADAM's The Nine Month Miracle has a lengthy unit on Conception/Pregnancy/Birth. Other activities from The Nine Month Miracle are 1. Karyotyping and 2. Comic Strip
- Assign the Pregnancy Time-Line early so that students will be able to get access to internet. If possible, plan at least one or two days in your computer lab or use portable computer lab.



CULMINATING PERFORMANCE TASK (Optional)

Culminating Unit Performance Task Title:

- Thoughts for Mother
- Pregnancy Time-Line: making a poster with rubric

Culminating Unit Performance Task Description/Directions/Differentiated

- Description/directions at top of attachment(s)

Attachments for Culminating Performance Task

- [Rubric for Pregnancy Time-Line](#): making a poster



UNIT RESOURCES

Web Resources:

- Using a search engine like google/ask/etc., search phrases like: "Weeks of Pregnancy"

Attachment(s):

Materials & Equipment:

- Birthing model (optional)
- glue or tape
- Internet
- Multi-media
- scissors
- TV/VCR
- Video
- Many multimedia presentation on the reproductive system are available through google such as <http://ftp.ccccd.edu/efanini/BIOL%202402/Lect%20Notes%20PPT/The%20Reproductive%20System.pdf>,
- http://www.google.com/search?hl=en&rlz=1T4GFRD_enUS203US204&q=reproductive+system+powerpoint&btnG=Search , This multimedia presentation includes slides on how other systems impact the Reproductive system

What 21st Century Technology was used in this unit:

<input type="checkbox"/>	Slide Show Software	<input type="checkbox"/>	Graphing Software	<input type="checkbox"/>	Audio File(s)
<input type="checkbox"/>	Interactive Whiteboard	<input type="checkbox"/>	Calculator	<input type="checkbox"/>	Graphic Organizer
<input type="checkbox"/>	Student Response System	<input type="checkbox"/>	Desktop Publishing	<input type="checkbox"/>	Image File(s)
<input type="checkbox"/>	Web Design Software	<input type="checkbox"/>	Blog	<input checked="" type="checkbox"/>	Video
<input type="checkbox"/>	Animation Software	<input type="checkbox"/>	Wiki	<input type="checkbox"/>	Electronic Game or Puzzle Maker
<input type="checkbox"/>	Email	<input checked="" type="checkbox"/>	Website		