DEPARTMENT: Academic Programs
CURRICULUM: The Natural World
COURSE TITLE: Geology of the National Parks and Monuments
COURSE NUMBER: GEOL& 115
TYPE OF COURSE: Academic Transfer
     Special Requirement Met: None
AREA(S) OF KNOWLEDGE: The Physical Universe
COURSE LENGTH: 1 quarter
CREDIT HOURS: 5
LECTURE HOURS: 33
LAB HOURS: 44
CLASS SIZE: 30
PREREQUISITES: None

COURSE DESCRIPTION:

Study of the geology and geologic history of selected national parks and selected national monuments, in the context of the geologic history of North America, the Pacific Basin and the Atlantic Ocean. Labs deal primarily with field maps. At least two field trips are required.
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April 2008

STUDENT LEARNING OUTCOMES ADDRESSED:

1. Human Relations – Use social skills to work in groups effectively
2. Critical Thinking and Problem Solving – Think critically in evaluating information, solving problems and making decisions.
3. Technology – Select and use appropriate technological tools for personal, academic and career tasks.
4. Communication – Read and listen actively to learn and communicate
5. Personal Responsibility – Be motivated and able to continue learning and adapt to change. Manage personal health and safety. Be aware of civic and environmental issues.

GENERAL COURSE OBJECTIVES:

At the end of the course the student will:

1. Be acquainted with the scientific method and give experience in applying this method to the reconstruction of the geologic history of much of North America as recorded in the rock and fossil records of our national parks and monuments.
2. Demonstrate scientific observation and skills through the examination of rocks and mineral, optional field trips, and use a variety of geologic and topographic maps.
3. Formulate clear, concise and pertinent answers to factual questions.

TOPICAL OUTLINE:

I. The rock cycle
II. Plate tectonics and rock formation
III. Volcanoes and other dramatic geologic features and hazards
IV. Weathering and erosion
V. National Parks and Monuments of the desert southwest
VI. National Parks and Monuments of the mountain west (including Alaska and Pacific Coast)
VII. Emphasis on the Pacific Northwest region
VIII. National parks of Hawaii
IX. National parks and Monuments of the Appalachians, east coast and continental interior
X. Brief introduction to dramatic geologic features around the world
XI. Hands-on introduction to rocks and minerals
XII. Interpretation of topographic and geologic maps.
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TOPOCAL OUTLINE: (CONT.)

Total hours  

77

REVISED BY: M. Von Der Ahe
DATE: April 2008

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<table>
<thead>
<tr>
<th>SLO #</th>
<th>Included in Course Objective Number</th>
<th>SSCC Student Learning Outcomes</th>
</tr>
</thead>
<tbody>
<tr>
<td>SLO 1.1</td>
<td>1, 2, 3</td>
<td>Communication - Read and listen actively</td>
</tr>
<tr>
<td>SLO 1.2</td>
<td>1, 2, 3</td>
<td>Communication - Speak and write effectively</td>
</tr>
<tr>
<td>SLO 2.1</td>
<td>2</td>
<td>Computation - Use mathematical operations</td>
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<tr>
<td>SLO 2.2</td>
<td>2</td>
<td>Computation - Apply quantitative skills</td>
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<tr>
<td>SLO 2.3</td>
<td>2</td>
<td>Computation - Identify, interpret, and utilize higher level mathematical and cognitive skills</td>
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<tr>
<td>SLO 3.1</td>
<td>2</td>
<td>Human Relations - Use social interactive skills to work in groups effectively</td>
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<tr>
<td>SLO 3.2</td>
<td></td>
<td>Human Relations - Recognize the diversity of cultural influences and values</td>
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<tr>
<td>SLO 4.1</td>
<td>1, 2, 3</td>
<td>Critical Thinking and Problem Solving -</td>
</tr>
<tr>
<td>SLO 5.1</td>
<td>1, 2</td>
<td>Technology - Select and use appropriate technological tools</td>
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<tr>
<td>SLO 6.1</td>
<td>1, 2, 3</td>
<td>Personal Responsibility - Be motivated and able to continue learning and adapt to change</td>
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<tr>
<td>SLO 6.2</td>
<td></td>
<td>Personal Responsibility - Value one's own skills, abilities, ideas and art</td>
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<tr>
<td>SLO 6.3</td>
<td></td>
<td>Personal Responsibility - Take pride in one's work</td>
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<tr>
<td>SLO 6.4</td>
<td></td>
<td>Personal Responsibility - Manage personal health and safety</td>
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<tr>
<td>SLO 6.5</td>
<td></td>
<td>Personal Responsibility - Be aware of civic and environmental issues</td>
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<tr>
<td>SLO 7.1</td>
<td>1, 2, 3</td>
<td>Information Literacy - Access and evaluate information</td>
</tr>
<tr>
<td>SLO 7.2</td>
<td>1, 2, 3</td>
<td>Information Literacy - Use information to achieve personal, academic, and career goals, as well as to participate in a democratic society</td>
</tr>
</tbody>
</table>

PREPARED BY: M. Von Der Ahe
DATE: April 2008