

GLENCOE CORRELATION
LIFE'S STRUCTURE AND FUNCTION (A)
FROM BACTERIA TO PLANTS (B)
ANIMAL DIVERSITY (C)
HUMAN BODY SYSTEMS (D)
ECOLOGY (E)
NEBRASKA
Science Standards Grades 5-8

OBJECTIVES	PAGE REFERENCES
8.1 Unifying Concepts and Processes	
8.1.1 By the end of eighth grade, students will develop an understanding of systems, order, and organization.	(A) 24-28, 40-47 <i>Explore Activity 7</i> Activity 29, 82, 88-89 (B) 127-131 <i>Activity 22-23, 83, 102</i> <i>Activity: Model and Invent 52-53</i> <i>National Geographic 66</i> (C) 12-13, 15-16, 43-45, 116-117 <i>Activity: Design Your Own Experiment 96-97</i> (D) 8, 14, 21-22, 101-104, 118-119, 146-150 (E) 8-11, 20-21, 44-49, 65-67 <i>Time: Science and Society 86-87</i> <i>Activity 111</i>
8.1.2 By the end of eighth grade, students will develop an understanding of evidence, models, and explanation.	(A) <i>Activity: Design Your Own Experiment 30-31, 176-177</i> <i>MiniLab 42, 113</i> <i>Activity 88-89</i> (B) <i>Explore Activity 7</i> <i>MiniLab 9, 110</i> <i>Activity: Design Your Own Experiment 114-115</i> <i>Activity 140-141</i> (C) <i>Activity: Design Your Own Experiment 28-29, 96-97</i> <i>Activity 62-63, 149</i> <i>Activity: Use the Internet 124-125</i> (D) <i>MiniLab 52, 76</i> <i>Activity: Design Your Own Experiment 82-83, 135-137, 196-197</i> <i>Activity 166-167, 189-190</i> (E) <i>Activity: Design Your Own Experiment 26-27</i> <i>MiniLab 47, 141</i> <i>Activity 54-55, 111</i> <i>Activity: Model and Invent 116-117</i>

OBJECTIVES	PAGE REFERENCES
<p>8.1.3 By the end of eighth grade, students will develop an understanding of change, constancy, and measurement.</p>	<p>(A) 14 <i>Activity 29</i> <i>Activity: Design Your Own Experiment 176-177</i> <i>Science Skill Handbook 199-200</i> QD 14</p> <p>(B) <i>Activity: Design Your Own Experiment 114-115</i> <i>Activity 132, 140-141</i> <i>Science Skill Handbook 163-164</i></p> <p>(C) <i>Skill Builder Activity 47</i> <i>Activity 76</i> <i>Science Skill Handbook 177-178</i></p> <p>(D) <i>Activity 25, 127, 166-167</i> <i>MiniLab 96, 160</i> <i>Science Skill Handbook 219-220</i></p> <p>(E) <i>MiniLab 13</i> <i>Activity 43, 54-55, 111</i> <i>Activity: Model and Invent 116-117</i> <i>Science Skill Handbook 171-172</i></p>
<p>8.1.4 By the end of eighth grade, students will develop an understanding of form and function.</p>	<p>(A) 40-42, 112-115 <i>National Geographic 81</i> UAA 41</p> <p>(B) 64, 77, 107, 110 <i>National Geographic 17, 111</i></p> <p>(C) 15-16, 41, 43, 107-109 <i>Activity 57</i> <i>Explore Activity 105</i> AC 109</p> <p>(D) 15, 50-53, 65, 103, 153 <i>Activity 107</i></p> <p>(E) <i>MiniLab 72</i> LD 72</p>

OBJECTIVES	PAGE REFERENCES
8.2 Science as Inquiry	
<p>8.2.1 By the end of eighth grade, students will develop the abilities needed to do scientific inquiry.</p>	<p>(A) 8-13 <i>Problem-Solving Activity 13</i> <i>Activity: Design Your Own Experiment 30-31, 146-147, 176-177</i> LD 10</p> <p>(B) <i>Problem-Solving Activity 20</i> <i>MiniLab 69</i> <i>Activity: Design Your Own Experiment 114-115</i> <i>Activity 132, 140</i> LD 18, 65</p> <p>(C) <i>Activity: Design Your Own Experiment 28-29, 96-97</i> <i>Activity 62-63, 76, 149</i> <i>Activity: Use the Internet 124-125</i></p> <p>(D) <i>Activity 25, 156, 166-167</i> <i>Activity: Design Your Own Experiment 82-83, 136-137, 196-197</i></p> <p>(E) <i>Activity 25, 43, 54, 111</i> <i>Activity: Design Your Own Experiment 26-27</i> <i>MiniLab 141</i></p>
8.4 Life Science	
<p>8.4.1 By the end of eighth grade, students will develop an understanding of the structure and function in living systems.</p>	<p>(A) 16, 40-47, 52, 83-87 CH 53</p> <p>(B) 19, 62-63, 74-77, 124-131</p> <p>(C) 15-16, 18-19, 38, 41, 43-44, 77-79, 106-110 <i>Activity 21, 57</i></p> <p>(D) 8-10, 14, 20-22, 47-53, 64-69, 92-95, 101-104, 118-119, 146-150, 151-153</p> <p>(E) 9-11, 77-83 <i>Activity 43, 76</i> <i>Activity: Use the Internet 84-85</i></p>
<p>8.4.2 By the end of eighth grade, students will develop an understanding of reproduction and heredity.</p>	<p>(A) 19, 103-104, 106-109, 128-130, 132-134, 136-142</p> <p>(B) 10, 32, 45, 94-95, 96-97 <i>MiniLab 94</i> MAM 10</p> <p>(C) 16, 19, 79, 115</p> <p>(D) 151-153, 157-160 <i>The Nature of Science 2</i></p>

OBJECTIVES	PAGE REFERENCES
<p>8.4.3 By the end of eighth grade, students will develop an understanding of regulation and behavior.</p>	<p>(A) 17, 47, 78-80, 157-161 <i>Activity 82</i> UAA 17</p> <p>(B) 124-131, 133-136 <i>Activity 132, 140-141</i></p> <p>(C) 15-16, 18-19, 44-45, 78-79, 81, 134-139, 140-142 <i>MiniLab 81</i> <i>Activity: Design Your Own Experiment 96-97</i> <i>Activity 149</i></p> <p>(D) 21, 22, 102, 118-119, 124-125, 150 <i>MiniLab 22</i> <i>National Geographic 120</i></p> <p>(E) 12, 14-15</p>
<p>8.4.4 By the end of eighth grade, students will develop an understanding of populations and ecosystems.</p>	<p>(A) 84 SJ 84</p> <p>(B) 10, 51, 127</p> <p>(E) 10, 12-17, 18, 20-24 <i>Problem-Solving Activity 15</i> <i>National Geographic 18</i> <i>Activity: Design Your Own Experiment 26-27</i></p>
<p>8.4.5 By the end of eighth grade, students will develop an understanding of diversity and adaptations of organisms.</p>	<p>(A) 157-161, 169-170, 172-175,</p> <p>(B) 33, 45, 63</p> <p>(C) 14, 19, 24, 27, 41, 47, 56, 61, 75, 84, 89, 95, 113, 122</p> <p>(E) 69, 71, 72-73, 74, 75, 130-131, 132, 133-136 <i>MiniLab 72, 133</i> <i>National Geographic 132</i></p>
8.6 Science and Technology	
<p>8.6.1 By the end of eighth grade, students will develop an understanding of technological design.</p>	<p>(A) <i>National Geographic 50-51</i></p> <p>(B) <i>Oops! Accidents in Science 86-87</i></p> <p>(D) <i>Oops! Accidents in Science 28-29</i></p> <p>(E) 100 <i>National Geographic 101</i> <i>Activity: Model and Invent 116-117</i> AS 117</p>
<p>8.6.2 By the end of eighth grade, students will develop an understanding of science and technology.</p>	<p>(A) 49, 52 <i>The Nature of Science 2-4</i> <i>National Geographic 50-51</i> CB 3 AC 4</p> <p>(B) <i>Time: Science and Society 116-117</i></p> <p>(D) 106 <i>The Nature of Science 2-4</i> CB 3</p> <p>(E) 97, 98, 100, 107 <i>Activity: Model and Invent 116-117</i> AS 117</p>

OBJECTIVES	PAGE REFERENCES
8.7 Science in Personal and Social Perspectives	
<p>8.7.1 By the end of eighth grade, students will develop an understanding of personal health.</p>	<p>(D) 36-40, 42-45, 72, 99, 101, 126, 184 <i>Problem-Solving Activity</i> 40 <i>National Geographic</i> 41 <i>Time: Science and Society</i> 56-57</p> <p>(E) 105, 106 CDIV 105 CC 106</p>
<p>8.7.2 By the end of eighth grade, students will develop an understanding of populations, resources, and environments.</p>	<p>(A) <i>Problem-Solving Activity</i> 70 (E) 19, 73, 133-134 <i>MiniLab</i> 133 <i>Time: Science and Society</i> 146-147 QD 131</p>
<p>8.7.3 By the end of eighth grade, students will develop an understanding of natural hazards.</p>	<p>(E) 64, 103-104, 107 <i>Science Stats</i> 56-57 <i>National Geographic</i> 66 <i>Time: Science and Society</i> 146-147 CC 65</p>
<p>8.7.4 By the end of eighth grade, students will develop an understanding of risks and benefits.</p>	<p>(A) 54-57, 143-145 <i>The Nature of Science</i> 4</p> <p>(B) 19, 40, 51 <i>Time: Science and Society</i> 116-117</p> <p>(C) 23, 24, 46, 55 <i>National Geographic</i> 26 <i>Time: Science and Society</i> 98-99 EX 23, 25 SJ 24</p> <p>(D) 13, 71-72, 79, 98-100, 105-106, 126, 185-188</p> <p>(E) 105, 106-107, 110 EX 73 CDIV 105</p>
<p>8.7.5 By the end of eighth grade, students will develop an understanding of science and technology in society.</p>	<p>(A) 49, 52, 57 <i>The Nature of Science</i> 2-4 <i>National Geographic</i> 50-51 CB 3 AC 4</p> <p>(B) <i>Time: Science and Society</i> 116-117</p> <p>(D) <i>The Nature of Science</i> 2-5 <i>Oops! Accidents in Science</i> 28-29 CB 3</p> <p>(E) 96-100, 113-115 <i>National Geographic</i> 101</p>

OBJECTIVES	PAGE REFERENCES
8.8 History and Nature of Science	
<p>8.8.1 By the end of eighth grade, students will develop an understanding of science as a human endeavor.</p>	<p>(A) 6-13 <i>The Nature of Science</i> 2-5 <i>Time: Science and History</i> 178-179 AC 9 IM 9</p> <p>(B) <i>The Nature of Science</i> 2-5 <i>Time: Science and Society</i> 54 CDIV 109, 129, 136</p> <p>(C) <i>The Nature of Science</i> 2-5 <i>Career Connection</i> 65 SJ 52 CDIV 111</p> <p>(D) 182 <i>The Nature of Science</i> 2-5 <i>Oops! Accidents in Science</i> 28-29 <i>Time: Science and Society</i> 56-57 <i>Time: Science and History</i> 84-85, 110-111</p> <p>(E) <i>The Nature of Science</i> 4 <i>Time: Science and Society</i> 86-87 <i>Time: Science and History</i> 28-29 <i>Career Connection</i> 119 CDIV 129</p>
<p>8.8.2 By the end of eighth grade, students will develop an understanding of the nature of science.</p>	<p>(A) 6-13 <i>The Nature of Science</i> 2-5 <i>Activity: Design Your Own Experiment</i> 30-31, 176-177 <i>Time: Science and History</i> 178-179</p> <p>(B) <i>The Nature of Science</i> 2-5 <i>Time: Science and Society</i> 54-55 <i>Activity: Design Your Own Experiment</i> 114-115 <i>Explore Activity</i> 123</p> <p>(C) <i>The Nature of Science</i> 2-5 <i>Activity: Design Your Own Experiment</i> 28-29, 96-97 <i>Activity: Use the Internet</i> 124-135 <i>Activity</i> 149</p> <p>(D) <i>The Nature of Science</i> 2-5 <i>Activity: Design Your Own Experiment</i> 82-83, 136-137, 196-197 <i>Time: Science and History</i> 84-85</p> <p>(E) 104, 130 <i>The Nature of Science</i> 4 <i>Activity: Design Your Own Experiment</i> 26-27 <i>Activity</i> 54</p>
<p>8.8.3 By the end of eighth grade, students will develop an understanding of the history of science.</p>	<p>(A) 21, 23, 24-25, 53, 112-113, 129-130, 156-159 <i>National Geographic</i> 22</p> <p>(C) CDIV 111</p> <p>(D) 181, 182 <i>The Nature of Science</i> 2-5 <i>Time: Science and History</i> 84-85, 110-111 <i>National Geographic</i> 183</p>

Codes Used for TWE Pages

AC	Activity
AS	Assessment
CB	Content Background
CC	Curriculum Connection
CDIV	Cultural Diversity
CH	Challenge
EX	Extension
IM	Identifying Misconceptions
LD	Lab Demonstration
MAM	Make a Model
QD	Quick Demo
SJ	Science Journal
UAA	Using an Analogy