<table>
<thead>
<tr>
<th>Current ASAC GENERAL CRITERION 3. STUDENT OUTCOMES</th>
<th>Changes to current general criterion</th>
<th>Proposed ANSAC GENERAL CRITERION 3. STUDENT OUTCOMES</th>
</tr>
</thead>
<tbody>
<tr>
<td>The program must have documented student outcomes that prepare graduates to attain the program educational objectives. There must be a documented and effective process for the periodic review and revision of these student outcomes.</td>
<td>No edits or changes</td>
<td>The program must have documented student outcomes that prepare graduates to attain the program educational objectives. There must be a documented and effective process for the periodic review and revision of these student outcomes.</td>
</tr>
<tr>
<td>B. Associate degree programs must demonstrate that graduates have:</td>
<td>Reorganized to A. and edited</td>
<td>A. Associate degree program student outcomes must include, but are not limited to the following:</td>
</tr>
<tr>
<td>(a) an ability to apply knowledge of mathematics, sciences, and other related disciplines</td>
<td>Renumbered as Item 1, incorporated (e), edited per SASC</td>
<td>(1) An ability to identify, formulate, and solve broadly defined technical or scientific problems by applying knowledge of mathematics and science and/or technical topics to areas relevant to the discipline.</td>
</tr>
<tr>
<td>(b) an ability to conduct experiments, as well as to analyze and interpret data</td>
<td>Renumbered as Item 2 and edited per SASC</td>
<td>(2) An ability to conduct experiments or test theories, as well as to analyze and interpret data</td>
</tr>
<tr>
<td>(c) an ability to identify, formulate, and solve applied science problems</td>
<td>Combined with Item 1</td>
<td>See (1)</td>
</tr>
<tr>
<td>(d) an ability to function on teams</td>
<td>Renumbered as Item 3</td>
<td>(3) An ability to function on teams</td>
</tr>
<tr>
<td>(e) an understanding of professional and ethical responsibility</td>
<td>Renumbered as Item 4</td>
<td>(4) An understanding of professional and ethical responsibility</td>
</tr>
<tr>
<td>---------------------------------------------------------------</td>
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<td>---------------------------------------------------------------</td>
</tr>
<tr>
<td>(f) an ability to communicate effectively</td>
<td>Renumbered as Item 5</td>
<td>(5) An ability to communicate effectively</td>
</tr>
<tr>
<td>(g) a recognition of the need for and an ability to engage in life-long learning</td>
<td>Moved to Curriculum</td>
<td></td>
</tr>
<tr>
<td>(h) a knowledge of contemporary issues</td>
<td>Eliminated</td>
<td></td>
</tr>
<tr>
<td>(i) an ability to use the techniques, skills, and modern applied science tools necessary for professional practice</td>
<td>Moved to curriculum</td>
<td>Now incorporated into Criterion 5, Paragraph 2, new item C</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>A. Baccalaureate degree programs must demonstrate that graduates have:</th>
<th>Reorganized and edited</th>
<th>B. Baccalaureate degree program student outcomes must include, but are not limited to the following:</th>
</tr>
</thead>
<tbody>
<tr>
<td>(a) an ability to apply knowledge of mathematics, science, and applied sciences</td>
<td>Renumbered as Item 1 and incorporated (e) and SASC wording</td>
<td>(1) An ability to identify, formulate, and solve broadly defined technical or scientific problems by applying knowledge of mathematics and science and/or technical topics to areas relevant to the discipline.</td>
</tr>
<tr>
<td>(b) an ability to design and conduct experiments, as well as to analyze and interpret data</td>
<td>Renumbered as Item 3 and edited with SASC wording</td>
<td>(3) An ability to develop and conduct experiments or test hypotheses, analyze and interpret data and use scientific judgment to draw conclusions</td>
</tr>
<tr>
<td>(c) an ability to formulate or design a system, process, or program to meet desired needs</td>
<td>Renumbered as Item 2 and edited with SASC wording</td>
<td>(2) An ability to formulate or design a system, process, procedure or program to meet desired needs.</td>
</tr>
<tr>
<td>Item</td>
<td>Original Text</td>
<td>Renumbering and Editing Details</td>
</tr>
<tr>
<td>------</td>
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<td>------------------------------------------------------------------------------------------------</td>
</tr>
<tr>
<td>(d)</td>
<td>an ability to function on multidisciplinary teams</td>
<td>Renumbered as Item 6 and edited per Task Group</td>
</tr>
<tr>
<td>(e)</td>
<td>an ability to identify and solve applied science problems</td>
<td>Renumbered as Item 1, combined with (1), and edited</td>
</tr>
<tr>
<td>(f)</td>
<td>an understanding of professional and ethical responsibility</td>
<td>Renumbered as Item 5, combined with (h), and edited</td>
</tr>
<tr>
<td>(g)</td>
<td>an ability to communicate effectively</td>
<td>Renumbered as Item 4 and edited per Task Group</td>
</tr>
<tr>
<td>(h)</td>
<td>the broad education necessary to understand the impact of solutions in a global and societal context</td>
<td>Combined with (f), and edited</td>
</tr>
<tr>
<td>(i)</td>
<td>a recognition of the need for and an ability to engage in life-long learning</td>
<td></td>
</tr>
<tr>
<td>(j)</td>
<td>a knowledge of contemporary issues</td>
<td></td>
</tr>
<tr>
<td>(k)</td>
<td>an ability to use the techniques, skills, and modern scientific and technical tools necessary for professional practice.</td>
<td>Moved to curriculum</td>
</tr>
<tr>
<td>Current ASAC GENERAL CRITERION 5. CURRICULUM</td>
<td>Changes to current general criterion</td>
<td>Proposed ANSAC GENERAL CRITERION 5. CURRICULUM</td>
</tr>
<tr>
<td>---------------------------------------------</td>
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<td>---------------------------------------------</td>
</tr>
<tr>
<td>The curriculum requirements specify subject areas appropriate to applied science programs but do not prescribe specific courses. The program's faculty must assure that the curriculum devotes adequate attention and time to each component, consistent with the objectives of the program and institution.</td>
<td>Edited</td>
<td>The curriculum requirements specify subject areas appropriate to applied or natural sciences programs but do not prescribe specific courses. For the purposes of accreditation, mathematics and statistics programs may be reviewed under the definition of applied and natural sciences. The program's faculty must assure that the curriculum devotes adequate attention and time to each component, consistent with the objectives of the program and institution.</td>
</tr>
<tr>
<td>New (NOTE – EAC has defined college level math differently. Definition of Natural Science is pulled in part from EAC and SASC document Definition of Applied Science is pulled from SASC document.</td>
<td></td>
<td>College level Mathematics consists of mathematics that requires a degree of mathematical sophistication at least equivalent to that of college algebra. For illustrative purposes, some examples of college-level mathematics include college algebra, precalculus, calculus, differential equations, probability, statistics, linear algebra and discrete mathematics. Natural Science increases the knowledge base of a field of</td>
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</table>

College level Mathematics consists of mathematics that requires a degree of mathematical sophistication at least equivalent to that of college algebra. For illustrative purposes, some examples of college-level mathematics include college algebra, precalculus, calculus, differential equations, probability, statistics, linear algebra and discrete mathematics. Natural Science increases the knowledge base of a field of
research and science collectively that are involved in the study of the physical world and its phenomena. Natural science consists of but is not limited to biology, physics, chemistry, geology and other natural sciences including life, earth and space sciences. Applied Science uses the knowledge base in natural science to solve specific problems.

The curriculum must include:

| a. | combination of college-level mathematics and basic sciences (some with experimental experience) appropriate to the discipline |
| b. | applied science topics appropriate to the program |
| c. | a general education component that complements the technical content of the curriculum and is consistent with the program and institution objectives. |

Students in baccalaureate degree programs must also be prepared for applied science practice through a

<table>
<thead>
<tr>
<th>Edited per SASC and Task Group</th>
<th>The curriculum must include:</th>
</tr>
</thead>
<tbody>
<tr>
<td>a. combination of college-level mathematics and sciences (some with laboratory and/or experimental experience) appropriate to the discipline</td>
<td></td>
</tr>
<tr>
<td>b. advanced technical and/or science topics appropriate to the program</td>
<td></td>
</tr>
<tr>
<td>c. a general education component that complements the technical and scientific content of the curriculum and is consistent with the program and institution objectives.</td>
<td></td>
</tr>
</tbody>
</table>

Students in baccalaureate degree programs must also be prepared for practice in a field
| curriculum culminating in comprehensive projects or experiences based on the cumulative knowledge and skills acquired in earlier course work. | of applied or natural sciences through a curriculum culminating in comprehensive projects or experiences based on the cumulative knowledge and skills acquired in earlier course work. |