| Name  | Date       |
|---|------------|
| APES Topic 10 – Geology and Mineral Resources | Mr. Romano |

## AIM: How can soil erosion and degradation be minimized?

| Soil Conservation Technique              | Description  | How it Helps with Soil Conservation  |
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| 1. CONSERVATION TILLAGE                  | minimal-till (loosen soil only) or no-till (machines inject seeds)   | - doesn't disrupt soil so<br>less soil erosion occurs                                      |
| 2. CONTOUR PLOWING                       | plant crops in rows using the contour of the land so that the rows act as little "dams"                      | - reduces runoff and soil erosion<br>- retains more water                                  |
| 3. TERRACING                             | convert steeper sloped plains into a series of steps/platforms   | - reduces runoff and soil erosion<br>- retains more water                                  |
| 4. WINDBREAKS                            | plant rows of trees as a wind barrier  | - reduce wind erosion of topsoil and damage to plants                                      |
| 5. CROP ROTATION                         | plant crops like tobacco, corn,<br>and cotton in a field one year<br>and then legumes there the<br>next year | - restores nutrients to the soil<br>- reduces losses to pests<br>because of target changes |
| 6. COVER CROPS (a type of intercropping) | crops specifically grown to hold soil in place   | - reduces erosion<br>- suppresses weed growth  |
| 7. POLYACRYLAMIDE (PAM)                  | water-absorbent chemical gel   | - increases soil water retention - conditions soil (especially clays)                      |