Production Update:
Nitrate poisoning: High levels of nitrate in forages can be toxic to animals. Animals convert nitrate \(\rightarrow\) nitrite \(\rightarrow\) ammonia in their digestive systems. The conversion of nitrate \(\rightarrow\) nitrite is faster than nitrite \(\rightarrow\) ammonia. Therefore, when animals eat forages high in nitrate, nitrite can accumulate. Nitrite interferes with the ability of the blood to carry oxygen, and high levels can sicken or kill an animal. Nitrites normally do not accumulate in legumes such as alfalfa or in perennial grasses. High nitrate levels are most often found in annual crops such as sudangrass, sorghum, corn, and small grains, and in several weed species. Nitrate accumulates in these crops when growth is slowed by conditions such as cold temperatures or frost, cloudy weather, or drought.

Insect Management: Threecornered alfalfa hopper, *Spissistilus festinus* (Say) is a treehopper commonly found in desert alfalfa. Populations buildup in the spring and persist into the fall. They feed by inserting their needle-like mouth parts into stems, sucking out juices. Adult female hoppers girdle stems by depositing eggs, causing the stem and leaves to turn red, purple or yellow above the girdle. Adults are light-green, thick-bodied, triangular insects about 1/4 inch long that readily fly when disturbed. Nymphs are grayish-white, soft bodied, with saw-toothed spines on their backs. Nymphs are confined to the lower portions of the plant and may not be picked up in a sweep net. There are rarely enough threecornered alfalfa hoppers in alfalfa fields to cause economic damage. Definitive monitoring and treatment guidelines have not been developed because threecornered alfalfa hoppers are a sporadic problem in alfalfa.

Weed Control: Mild winters cause some weeds that are normally summer annuals, to grow like biennials or perennial plants. This is more common with grasses that with broadleaf weeds. Sprangletop and sandbur are notorious for overwintering. Overwintered weeds are not controlled with preemergent herbicides.

### Market Summary:

<table>
<thead>
<tr>
<th></th>
<th>High</th>
<th>Low</th>
<th>Average</th>
<th>Off grade</th>
</tr>
</thead>
<tbody>
<tr>
<td>Past 2 weeks</td>
<td>120</td>
<td>95</td>
<td>115</td>
<td>80-90</td>
</tr>
<tr>
<td>Last year</td>
<td>85</td>
<td>80</td>
<td>83</td>
<td>70-80</td>
</tr>
</tbody>
</table>

### 10 Year Summary (May 4 to May 17, 1995-2004):

![Graph showing market summary from May 4 to May 17, 1995 to 2004.](image)

This and other Alfalfa Reports can be found on the web at: [http://cals.arizona.edu/crops/counties/yuma/alfalfareports/](http://cals.arizona.edu/crops/counties/yuma/alfalfareports/)

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