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# NATIVE GRASS PASTURE YIELDS

The 47 pasture cages in the native grass pasture at the livestock farm were clipped for yield the eighth consecutive year. The pasture includes about 23 acre of formerly plowed land which was reseeded to crested wheatgrass in the late 1930's. The remaining 165 acres, however, consists of unplowed native grass. The new highway constructed this year has reduced the acreage of native grass substantially and has resulted in the entire elimination of one type, Type 5 in Table 5.

The oven-dry weights of forage produced by each one of the eight different vegetation types are given in Table 5. The comparative yields for the eight years of clipping are also given in the table.

From 1946 through 1950 this pasture received very heavy spring, summer, and fall grazing use. In 1951, 1952, and 1953 the pasture had only light spring and late fall use. As result of this lighter grazing use, the native grass cover has shown considerable improvement in the last two years.

The yields this year were the greatest yields that have thus far been obtained in the eight years of the study. The 1953 yields averaged just about or slightly more than twice the eight year average on all types but one. This latter type, the big bluestem type, has a more or less permanent supply of subsoil moisture, so that it is not as much affected by supplies of moisture from current precipitation as are the other types.

The production of native grass this year must be very close to a record for the period since the white man has regularly inhabited this section of the country. Old timers in the area do not remember any better native grass years, and while the records are not complete, the yields from the Pyramid Park area for the late 30's and early 40's indicate, with a fair reliability, that the yields produced this year have not been exceeded in at least the last 20 years.

**Table 5 - Forage Yields From Cage Clippings Dickinson Station Native Grass Pasture 1946-1953.**

| Type No. | Type Description | Forage Yield - Lbs. per Acre Oven-dry Material | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| | | 1946 | 1947 | 1948 | 1949 | 1950 | 1951 | 1952 | 1953 | 8 Year Average |
| 1 | Upland Type | 924.0 | 1432.2 | 776.1 | 434.2 | 709.7 | 512.4 | 592.8 | 1767.9 | 893.7 |
| 2 | Upland Draw | 1313.0 | 2393.6 | 1209.7 | 869.5 | 914.7 | 869.2 | 948.0 | 3008.7 | 1440.8 |
| 3 | Lower Draw | 1455.3 | 2972.2 | 1384.9 | 941.1 | 1226.5 | 597.4 | 1701.3 | 3144.3 | 1677.9 |
| 4 | Bench Type | 658.3 | 1039.5 | 667.4 | 315.2 | 741.6 | 310.5 | 469.7 | 1586.9 | 723.6 |
| 5 | Upland Slope | 561.3 | 1394.8 | 1128.7 | 548.8 | 623.7 | 349.1 | 496.0 | 1805.4 | 863.5 |
| 6 | Lower Bench | 1268.8 | 1518.0 | 1263.3 | 742.8 | 800.1 | 339.1 | 597.2 | 2804.4 | 1166.7 |
| 7 | Big Bluestem | 2127.9 | 2849.0 | 2551.6 | 2135.7 | 3444.1 | 1823.5 | 2133.8 | 3522.5 | 2573.5 |
| 8 | Crested Wheatgrass | 936.9 | 1944.8 | 1221.6 | 612.7 | 1261.8 | 989.5 | 656.8 | 2383.4 | 1250.9 |
| Average - all types | | 1155.7 | 1943.0 | 1275.4 | 825.0 | 1215.3 | 723.8 | 949.5 | 2502.9 | 1323.8 |

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