# RANGE PLANT IDENTIFICATION 3 or 4 Member Teams

## I. PURPOSE

This event helps students develop an interest in a wide variety of plants that are important habitat components for wildlife and domestic livestock. This program is taught in the agriculture curriculum to help enhance the higher thinking skills of its participants. The Range and Pasture Plant Identification CDE and its supporting instruction helps students recognize a significant number of specific plants and their fundamental growth characteristics as well as understand the importance of plants as a component of the environment in which animals exist. This event provides opportunity for mastery of the foundational knowledge and understanding contributing to future learning and success in college level coursework related to plant identification, understanding of growth parameters, and economic importance of plants.

# II. EVENT FORMAT

# A. Team Make-up

Three or four individuals per school form a team. All members will be scored and the top three scores will count towards the team total.

# **B.** Event Format

- 1. The event shall consist of 60 samples of grasses, forbs, legumes, and woody plants selected from the Texas Master Plant List.
- 2. The participant will identify each plant and for each indicate (1) length of life, (2) season of growth, (3) origin, and (4) the economic values of wildlife and grazing.
- 3. All grass samples will have inflorescence present. Identification of all plants should be based on botanical characteristics.
- 4. The Texas Master Plant List is the official list for this event. The common name of each plant, spelling, capitalization and compounding of plant names follows that of the Master List. Latin names are not required but are included on the Master Plant List.
- 5. Improper identification will nullify all points concerning a given sample.
- 6. A list of common names associated with a "Plant Number" will be provided to each individual. Individuals will use the "Plant Number" to identify plants on the scoring sheets. For example, *Broom snakeweed* is "Plant Number" **076**.
- 7. Plants with dual characteristics should have both correctly checked. For example: Ash juniper is listed as both a warm and cool season plant and both these characteristics would have to be checked to earn full credit. In the event, the only characteristics to be checked are those given on the attached checklist.
- 8. Materials used in the event will be mounted. <u>Students will not be allowed to handle specimens</u>.
- 9. The Texas Master Plant List will be the official score card for grading the student's paper and should be followed during the training period.

# III. SCORING

Scoring for each specimen will be as follows:

Correct identification ...... 5 points Characteristics ...... 1 point each (6 total)

# **Total Points**

Individual..... 660 Team ...... 1.980

#### IV. **TIEBREAKERS**

If two or more teams have the same total score.

- 1. The team with the highest score on plant identification will win, if still tied;
- 2. The team with the highest alternate score will win, if still tied;
- 3. The winner will be determined by a toss of a coin.

If two or more individuals have the same total score,

- 1. The contestant with the highest score on plant identification will win.
- 2. If still tied, the individuals' team with the highest alternate score will win.
- 3. If still tied, the winner will be determined by a toss of a coin.

#### V. References

### A. General:

S.L. Hatch and J. Pluhar. 1993. Texas Range Plants. Texas A&M University Press. Stubbendieck, J., S. L. Hatch, and C.H. Butterfield. 1997. North American Range Plants. 5 ed. University of Nebraska Press.

# **B. Photographic Books:**

Ajilvsgi, G. 1984. Wildflowers of Texas. Shearer Publ. Enquist, M. 1987. Wildflowers of the Texas Hill County. Lone Star Botanical. Loughmiller, C. and L. Loughmiller. 1989.

Texas Wildlflowers, A Field Guide. Univ. of Texas Press.

Warnock, B.H. 1974. Wildflowers of the Guadalupe Mountains and the Sand Dune Country, Texas. Sul Ross State University.

Warnock, B.H. 1977. Wildflowers of the Davis Mountains and the Marathon Basin. Sul Ross State University.

Whitson, T. and other. 1992. Weeds of the West. Pioneer of Jackson Hole.

# C. Technical Publications:

Correll, D.J. and M.C. Johnston. 1979. Manual of the Vascular Plants of Texas. University of Texas.

Gould, F.W. 1951. Grasses of the Southwestern United States. The University of Arizona Press.

Gould, F.W. 1978. Common Texas Grasses, an illustrated guide. Texas A&M University Press.

Hitchcock, A.S. 1971. Manual of the Grasses of the United States (2 ed., Agnes Chase). Dover Publ. (2 volumes).

Powell, A. M. 1994. Grasses of the Trans-Pecos and Adjacent Areas. University of Texas Press.

Powell, A.M. 1988. Trees and Shrubs of Trans-Pecos Texas. Big Bend Natural History Association.

# Plant ID List

PLAN NUM		PLAN NUM	IT IBER
0040			
GRAS 001		065	Tumblegrass
002	Alkali sacaton Bahiagrass	066	Tumble windmillgrass
003	Barnyardgrass	067 068	Vinemesquite
004	Beaked panicum	069	Virginia wildrye
005	Bermudagrass	070	Weeping lovegrass Western wheatgrass
006	Big bluestem	071	White tridens
007	Big cenchrus	072	Wright threeawn
800	Black grama	073	Yellow Indiangrass
009	Blue grama		
010	Blue panicum	FORE	BS
011	Broomsedge bluestem	074	Bitter sneezeweed
012	Brownseed paspalum	075	Broadleaf milkweed
013	Buffalograss	076	Broom snakeweed
014	Buffelgrass	077	Common broomweed
015	Burrograss	078	Engelmanndaisy
016 017	Bush muhly	079	Field bindweed
018	California cottontop Canada wildrye	080	Maximilian sunflower
019	Cane bluestem	081	Mexican sagewort
020	Common carpetgrass	082 083	Nuttall deathcamas
021	Common curlymesquite	084	Orange zexmenia Silverleaf nightshade
022	Dallisgrass	085	Slim aster
023	Eastern gamagrass	086	Texas croton
024	Fall witchgrass	087	Threadleaf groundsel
025	Green sprangletop	088	Upright prairie-coneflower
026	Gulf cordgrass	089	Western bitterweed
027	Hairy grama	090	Western ragweed
028	Hairy tridens	091	Yankeeweed
029	Hall panicum		
030	Hooded windmillgrass		IMES & RATANY (HERBACEOUS)
031 032	Inland saltgrass	092	Alfalfa
032	Johnsongrass King Ranch bluestem	093	Austrian winterpea
034	Kleingrass	094	Bur-clover
035	Knotroot bristlegrass	095 096	Crimson clover
036	Little barley	097	Hairy vetch Nuttall milkvetch
037	Little bluestem	098	Singletary pea
038	Longtom	099	Texas bluebonnet
039	Marshhay cordgrass	100	Trailing ratany
040	Meadow dropseed	101	White clover
041	Oldfield threeawn	102	White sweetclover
042	Pink pappusgrass	103	Woolly loco
043	Plains bristlegrass	104	Yellow neptunia
044	Plains lovegrass		
045 046	Purpletop	WOOI	
040	Rattail smutgrass Red grama	105	Ashe juniper
048	Red lovegrass	106 107	Black brush
049	Rescuegrass	107	Blackjack oak
050	Ryegrass	109	Coyotillo Guajillo
051	Sand dropseed	110	Honey mesquite
052	Sand lovegrass	111	Huisache
053	Scribner dichanthelium	112	Live oak
054	Sideoats grama	113	Loblolly pine
055	Silver bluestem	114	Lotebush
056	Switchgrass	115	Post oak
057	Tall Fescue	116	Redberry juniper
058	Tanglehead	117	Sand sage
059	Texas bluegrass	118	Shortleaf pine
060 061	Texas cupgrass Texas grama	119	Skunkbush
062	Texas grama Texas wintergrass	120	White brush
063	Thin paspalum	121 122	Willow baccharis
064	Tobosa	122	Yaupon

MASTER PLANT LIST													
	ANNUAL	IAL	N <sub>O</sub>	N	ORI	GIN		EC	ONO	MIC	VAL	UE	
NAME OF PLANT		ENN	SEAS	SEAS	및	8	WI	LDLI	FE	(	SRAZ	ZING	
LATIN NAMES ARE FOR REFERENCE ONLY		PER	COOL SEASON	WARM SEASON	NATIVE	INTRODUCED	G009	FAIR	POOR	G005	FAIR	POOR	POISON
GRASSES													
ALKALI SACATON (SPOROBOLUS AIROIDES)		x		x	х				x		x		
2. BAHIAGRASS (PASPALUM NOTATUM)		x		x		x			X	х			
3. BARNYARDGRASS (ECHINOCHLOA CRUSGALLI VAR CRUSGALLI)	х			x		x			×			x	
4. BEAKED PANICUM (PANICUM ANCEPS)		x		X	х			x		X			
5. BERMUDAGRASS (CYNODON DACTYLON)		X		X		х			X	x			
6. BIG BLUESTEM (ANDROPOGON GERARDII)		x		X	х				x	х			
7. BIG CENCHRUS (CENCHRUS MYOSURIODES)		x		X	х			x		x			
8. BLACK GRAMA (BOUTELOUA ERIOPODA)		х		х	х		х			x			
9. BLUE GRAMA (BOUTELOUA GRACILIS)		x		х	х		х			x			
10. BLUE PANICUM (PANICUM ANTIDOTALE)		х		х		х	х			х			х
11. BROOMSEDGE BLUESTEM (ANDROPOGON VIRGINICUS)		x		X	х				x			х	
12. BROWNSEED PASPALUM (PASPALUM PLICATULUM)		X		X	х			x			X		
13. BUFFALOGRASS (BUCHLOE DACTYLOIDES)		X		X	х			x		X			
14. BUFFELGRASS (CENCHRUS CILIARIS)		x		X		х			X	x			
15. BURROGRASS (SCLEROPOGON BREVIFOLIUS)		x		X	х				X			x	
16. BUSH MUHLY (MUHLENBERGIA PORTERI)		x		X	х				X	x		() - ()	
17. CALIFORNIA COTTONTOP (DIGITARIA CALIFORNICA)		x		х	х			х		x			
18. CANADA WILDRYE (ELYMUS CANADENSIS)		x	х		х			х		х			
19. CANE BLUESTEM (BOTHRIOCHLOA BARBINODIS VAR BARBINODIS)		x		x	х				X		х		
20. COMMON CARPETGRASS (AXONOPUS AFFINIS)		x		x	х			х			х		
21. COMMON CURLYMESQUITE (HILARIA BELANGERI)		x		x	х				х		х		
22. DALLISGRASS (PASPALUM DILATATUM)		x		х		х		х		х			
23. EASTERN GAMAGRASS (TRIPSACUM DACTYLOIDES)		x		x	х			х		х			
24. FALL WITCHGRASS (LEPTOLOMA COGNATUM)		x		x	x			x			x		
25. GREEN SPRANGLETOP (LEPTOCHLOA DUBIA)		x		х	х			х		х			
26. GULF CORDGRASS (SPARTINA SPARTINAE)		x		x	х				x		х		
27. HAIRY GRAMA (BOUTELOUA HIRSUTA)		x		x	х			x			x		
28. HAIRY TRIDENS (ERIONEURON PILOSUM)		x		x	х				x			x	
29. HALL PANICUM (PANIICUM HALLII VAR HALLII)		x		X	х			x			x		

MASTER PLANT LIST														
	JA.	IAL	NO	NO	ORI	GIN	ECONOMIC VALUE							
NAME OF PLANT	ANNUAL	PERENNIAL	SEAS	SEAS	뿔	Ð	WI	LDLI	FE	GRAZING				
LATIN NAMES ARE FOR REFERENCE ONLY  GRASSES		PE	COOL SEASON	WARM SEASON	NATIVE	INTRODUCED	G00D	FAIR	POOR	GOOD	FAIR	POOR	POISON	
30. HOODED WINDMILLGRASS (CHLORIS CUCULLATA)		x		х	х			х			x			
31. INLAND SALTGRASS (DISTICHLIS SPICATA VAR STRICTA)		x		х	х				х		х	(C )		
32. JOHNSONGRASS (SORGHUM HALEPENSE)		x		х		х		х		х			х	
33. KING RANCH BLUESTEM (BOTHRIOCHLOA ISCHAEMUM VAR SONGARICA)		x		х		х		х			х			
34. KLEINGRASS (PANICUM COLORARUM)		x		х		х		х		х			х	
35. KNOTROOT BRISTLEGRASS (SETARIA GENICULATA)		x		х	х			х			х			
36. LITTLE BARLEY (HORDEUM PUSILLUM)	х		х		х				х			х		
37. LITTLE BLUESTEM (SCHIZACHYRIUM SCOPARIUM VAR FREQUENS)		х		х	х				х	х				
38. LONGTOM (PASPALUM LIVIDUM)		х		x	х			х			х			
39. MARSHHAY CORDGRASS (SPARTINA PATENS)		x		x	х				х	х				
40. MEADOW DROPSEED (SPOROBOLUS DRUMMONDII)		x		x	х				х		х			
41. OLDFIELD THREEAWN (ARISTIDA OLIGANTHA)	х			х	х				х			х		
42. PINK PAPPUSGRASS (PAPPOPHORUM BICOLOR)		х		х	х				х		х			
43. PLAINS BRISTLEGRASS (SETARIA LEUCOPILA)		x		х	х			х		х				
44. PLAINS LOVEGRASS (ERAGROSTIS INTERMEDIA)		х		х	х				х	х				
45. PURPLETOP (TRIDENS FLAVUS)		x		x	х			х			х			
46. RATTAIL SMUTGRASS (SPOROBOLUS INDICUS)		x		х		х			х			х		
47. RED GRAMA (BOUTELOUA TRIFIDA)		x		х	х				х			х		
48. RED LOVEGRASS (ERAGROSTIS SECUNDIFLORA)		х		х	х				х			х		
49. RESCUEGRASS (BROMUS UNIOLOIDES)	х		х			х		х			х			
50. RYEGRASS (LOLIUM PERENNE)	х		х			х		х		х				
51. SAND DROPSEED (SPOROBOLUS CRYPTANDRUS)		x		х	х				х		х			
52. SAND LOVEGRASS (ERAGROSTIS TRICHODES)		x		х	х				х	х				
53. SCRIBNER DICHANTHELIUM (DICHANTHELIUM OLIGOSANTHES VAR)		x	х		х			х			х			
54. SIDEOATS GRAMA (BOUTELOUA CURTIPENDULA VAR CURTIPENDULA)		x		x	х		х			х				
55. SILVER BLUESTEM (BOTHRIOCHLOA SACCHARIODES VAR TORREYANA)		x		x	х				х		х			
56. SWITCHGRASS (PANICUM VIRGATUM)		x		x	х			х		х				
57. TALL FESCUE (FESTUCA ARUNDINACEA)		x	х			х		x		х				
58. TANGLEHEAD (HETEROPOGON CONTORTUS)		x		х	х				х	х				

MASTER PLANT LIST															
	JAL	A	NO	NO	ORI	GIN		EC	ONO	MIC	VIC VALUE				
NAME OF PLANT	ANNUAL	PERENNIAL	SEAS	SEAS	뿔	Ü	WI	LDLI	FE	(	GRAZ	ZING	j		
LATIN NAMES ARE FOR REFERENCE ONLY  GRASSES / FORBS		H	COOL SEASON	WARM SEASON	NATIVE	INTRODUCED	G005	FAIR	POOR	G000	FAIR	POOR	POISON		
<u></u>															
59. TEXAS BLUEGRASS (POA ARACHNIFERA)		х	х		х			x		x					
60. TEXAS CUPGRASS (ERIOCHLOA SERICEA)		x		x	x			x		х					
61. TEXAS GRAMA (BOUTELOUA RIGIDISETA)		x		x	x				х			х			
62. TEXAS WINTERGRASS (STIPA LEUCOTRICHA)		x	х		х			x			x				
63. THIN PASPALUM (PASPALUM SETACEUM)		x		x	x			x			x				
64. TOBOSA (HILARIA MUTICA)		x		x	х				х		х				
65. TUMBLEGRASS (SCHEDONNARDUS PANICULATUS)		х		x	х				х			х			
66. TUMBLE WINDMILLGRASS (CHLORIS VERTICILLATA)		х		x	х				х			х			
67. VINEMESQUITE (PANICUM OBTUSUM)		х		x	х			x		х		,,,,,,			
68. VIRGINIA WILDRYE (ELYMUS VIRGINICUS)		х	х		х			x		х					
69. WEEPING LOVEGRASS (ERAGROSTIS CURVULA)		х		х		х			х		х				
70. WESTERN WHEATGRASS (AGROPYRON SMITHII)		х	х		х			х		х					
71. WHITE TRIDENS (TRIDENS ALBESCENS)		х		x	х			x			х				
72. WRIGHT THREEAWN (ARISTIDA WRIGHTII)		x		x	х				х		х				
73. YELLOW INDIANGRASS (SORGHASTRUM NUTANS)		х		x	х			х		х					
FORBS															
1. BITTER SNEEZEWEED (HELENIUM AMARUM)	х			х	х				х			х	х		
2. BROADLEAF MILKWEED (ASCLEPIAS LATIFOLIA)		х		х	х				х			х	х		
3. BROOM SNAKEWEED (XANTHOCEPHALUM SAROTHRAE)		х		x	х			х				х	х		
4. COMMON BROOMWEED (XANTHOCEPHALUM DRACUNCULOIDES)	х			x	х				х			х			
5. ENGELMANNDAISY (ENGELMANNIA PINNATIFIDA)		х	х		х		х			x					
6. FIELD BINDWEED (CONVOLUVULUS ARVENSIS)		х		х		х			х			х			
7. MAXIMILIAN SUNFLOWER (HELIANTHUS MAXIMILIANI)		х		х	х			х			х				
8. MEXICAN SAGEWORT (ARTEMISIA LUDOVICIANA)		x		х	х				х	х					
9. NUTTALL DEATHCAMAS (ZYGADENUS NUTTALLII)		x	х		х				х			х	х		
10. ORANGE ZEXMENIA (ZEXMENIA HISPIDA)		х		х	х				х	х					
11. SILVERLEAF NIGHTSHADE (SOLANUM ELEAGNIFOLIUM)		x		x	х				х			х	х		
12. SLIM ASTER (ASTER SUBULATUS VAR LIGULATUS)	х			x	х			x			х	30			
13. TEXAS CROTON (CROTON TEXENSIS)	х			х	х		х					х			

MASTER PLANT LIST														
	₹	IAL	S S	SON	ORI	GIN	ECONOMIC VALUE							
NAME OF PLANT	ANNOAL	PERENNIAL	SEA	SEA	NATIVE	员	WI	LDLI	FE	Ĭ	GRAZ	ZING		
LATIN NAMES ARE FOR REFERENCE ONLY  FORBS  LEGUMES & RATANY (HERBACEIOUS)  WOODY		PE	COOL SEASON	WARM SEASON	NAT	INTRODUCED	G005	FAIR	POOR	0000	FAIR	POOR	POISON	
14. THREADLEAF GROUNDSEL (SENECIO LONGILOBUS)		x		x	х				х			х	х	
15. UPRIGHT PRAIRIE-CONEFLOWER (RATIBIDA COLUMARIS)		x		х	х		х					х		
16. WESTERN BITTERWEED (HYMENOXYS ODORATA)	х		х		х				х			х	х	
17. WESTERN RAGWEED (AMBROSIA PSILOSTACHYA)		х		x	х		х					х		
18. YANKEEWEED (EUPATORIUM COMPOSITIFOLIUM)		x		x	х				х			х		
LEGUMES & RATANY (HERBACEOUS)														
ALFALFA (MEDICAGO SATIVA)		x		х		x	х			х				
2. AUSTRIAN WINTERPEA (PISUM ARVENSE)	х		х			х		х			х	8 8		
3. BUR-CLOVER (MEDICAGO POLYMORPHA VAR VULGARIS)	х		х			х		х		х				
4. CRIMSON CLOVER (TRIFOLIUM INCARNATUM)	х		х			х		x		х				
5. HAIRY VETCH (VICIA VILLOSA)	х		х			х		х		х				
6. NUTTALL MILKVETCH (ASTRAGALUS NUTTALLIANUS VAR)	х		х		х				х		х		х	
7. SINGLETARY PEA (LATHYRUS HIRSUTUS)	х		х			х		x		х			2	
8. TEXAS BLUEBONNET (LUPINUS SUBCARNOSUS)	x		х		х				x			x		
9. TRAILING RATANY (KRAMERIA LANCEOLATA)		x		x	х			х			х			
10. WHITE CLOVER (TRIFOLIUM REPENS)		X	x			x		x		x				
11. WHITE SWEETCLOVER (MELILOTUS ALBA)	x			x		х		x		х				
12. WOOLLY LOCO (ASTRAGALUS MOLLISSIMUS)		x	х		х				х			x	х	
13. YELLOW NEPTUNIA (NEPTUNIA LUTEA)		x		x	х			х			x			
WOODY														
ASHE JUNIPER (JUNIPERUS ASHEI)		x	х	x	х			х				x	2	
2. BLACK BRUSH (ACACIA RIGIDULA)		x		x	х			х				x		
3. BLACKJACK OAK (QUERCUS MARYLANDICA)		x		x	х			х				x	х	
4. COYOTILLO (KARWINSKIA HUMBOLDTIANA)		x		x	х				x			x	х	
5. GUAJILLO (ACACIA BERLANDIERI)		x		x	х			x			х	SC 30	х	
6. HONEY MESQUITE (PROSOPIS GLANDULOSA)		x		x	х			x				x		
7. HUISACHE (ACACIA FARNESIANA)		x		x	х				х			x		
8. LIVE OAK (QUERCUS VIRGINIANA)		x	х	x	х		х				х	et s	х	
9. LOBLOLLY PINE (PINUS TAEDA)		x	х	х	х				х			x		

MASTER PLANT LIST														
	¥	IAL	Š	Š	OR	IGIN		EC	ONO	MIC	VAL	UE		
NAME OF PLANT	ANNUAL	PERENNIAL	SEAS	SEA	¥	Ü	WILDLIFE			GRAZING			í	
LATIN NAMES ARE FOR REFERENCE ONLY		æ	COOL SEASON	WARM SEASON	NATIVE	NTRODUCED	0000	FAIR	POOR	G009	FAIR	POOR	POISON	
WOODY						=								
										5				
10. LOTEBUSH (ZIZIPHUS OBTUSIFOLIA)		X		Х	х		Х					X		
11. POST OAK (QUERCUS STELLATA)		х		x	х			х				X	x	
12. REDBERRY JUNIPER (JUNIPERUS PINCHOTII)		x	х	x	x				х			x		
13. SAND SAGE (ARTEMISIA FILIFOLIA)		x		x	x				X	3		x		
14. SHORTLEAF PINE (PINUS ECHINATA)		x	х	х	x				x			x		
15. SKUNKBUSH (RHUS AROMATICA VAR FLABELLIFORMIS)		x		x	x			x			х			
16. WHITE BRUSH (ALOYSIA GRATISSIMA)		x		x	х				х			x	x	
17. WILLOW BACCHARIS (BACCHARIS SALICINA)		x		х	х				х			х	х	
18. YAUPON (ILEX VOMITORIA)		x	х	x	х		x				х			
<del></del>						1							1	

Plant names used in the list are based on MP-585/Revised,
"Texas Plants - A Checklist and Ecological Summary" by
F.W. Gould, "Manual of the Vascular Plants of Texas" by
D.A. Correll, and M.C. Johnston and "Common Grasses of Texas"
by F. W. Gould

# **EXPLANATION OF CHARACTERISTICS**

<u>GRASS</u> - A member of a large, world-wide family of annual or perennial plants distinguished by round or flattened stems, solid at the nodes and 2-ranked, alternate, parallel-veined leaves composed of a split sheath and blade. The flowered unit is the spikelet composed of one or more florets.

FORB - Any herb other than a grass.

<u>LEGUME</u> - Herbs or woody plants with usually showy bonnet-like or butterfly-shaped flowers, alternate mostly compound leaves with stipules, and a simple pod bearing one or several seeds in one row.

<u>WOODY PLANT</u> - Containing tissues such as are present in true wood. Some plants are woody only near the base.

ANNUAL - Living less than one year. Such plants must grow from seeds each year.

<u>PERENNIAL</u> - Lasting more than a year. Producing leaves and stems each year from rootstocks, crown buds or branches.

<u>COOL</u> - Making all or most of the growth in the fall, winter, and spring.

<u>WARM SEASON</u> - Making most of the growth in the frost-free months of spring, summer and fall.

<u>ECONOMIC VALUES</u> - The desirability and ranking of a plant for reseeding, wildlife and grazing use in range and pasture management.

NATIVE - Native to the North American continent.

INTRODUCED - Not native to North America. It may be desirable or undesirable for use.

<u>WILDLIFE VALUES</u> - Are based on palatability of the plants to wildlife of an economic importance--deer, antelope, turkey, quail and dove. The plants were rated from the standpoint of food only. A plant may be rated "good" for quail and be "poor" or worthless for deer and antelope. The highest rating for the plant was selected as the economic wildlife value.

Good - Highly palatable to one or more of the classes of wildlife. Fair - The plant is commonly used by one or more of the classes of wildlife. Poor-The plant is seldom used as food.

<u>GRAZING VALUES</u> - The worth of a plant for livestock, determined by considering its palatability, nutritive quality, and volume of forage produced. It must be considered in relation to the climate and soil and its adaptation and proper use. For example:

Buffalograss is GOOD value on a clay loam soil in a 20-inch rainfall area, but on the same soils in a 35-inch rainfall belt it produces less than half the forage of big bluestem, little bluestem and Indiangrass and, therefore, in the higher rainfall area would not have more than a FAIR value. Grazing value is a comparative value, but it is not intended to compare plants

from irrigated or improved pasture (where fertilizers and legumes are used) with plants of native ranges (where fertility is maintained by natural means).

<u>GOOD GRAZING</u> - A term applied to a plant that is in high volume production, highly palatable (not necessarily at all seasons), and nutritious, where it is adapted.

<u>FAIR GRAZING</u> - The plant is not as good as the better plants in volume production, palatability, and quality in an area where it is adapted.

<u>POOR GRAZING</u> - The plant rates the lowest in one of more basic requirements, in most areas where it is found.

<u>POISON</u> - A plant that has a toxic substance at different stages growth that will cause sickness or death to livestock. At other times during the growth stage the plant may be considered good for grazing.