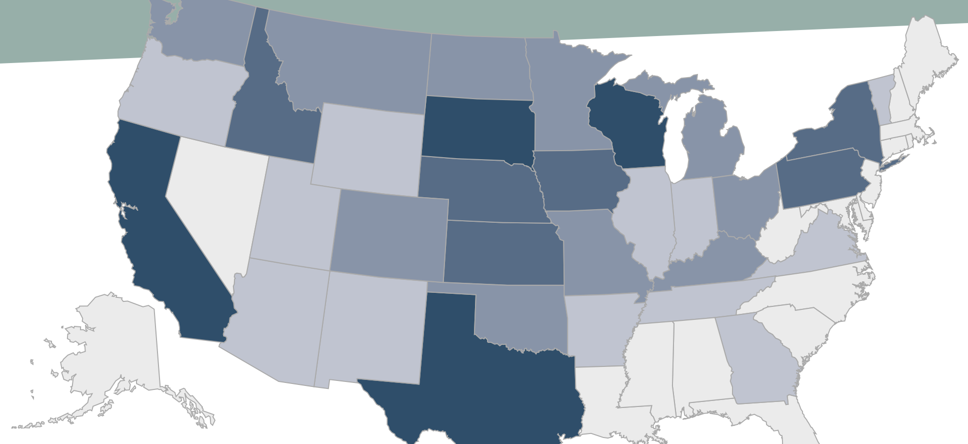
2023 U.S. forage statistics

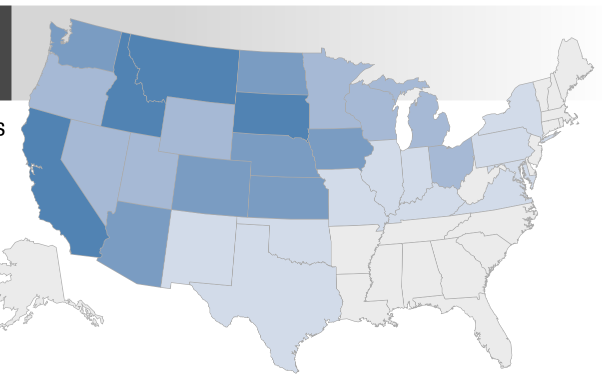


Total forage production

- More than 15,000 thousand tons
- 10,000 to 15,000 thousand tons
- 5,000 to 10,000 thousand tons
- 2,000 to 5,000 thousand tons
- 0 to 2,000 thousand tons

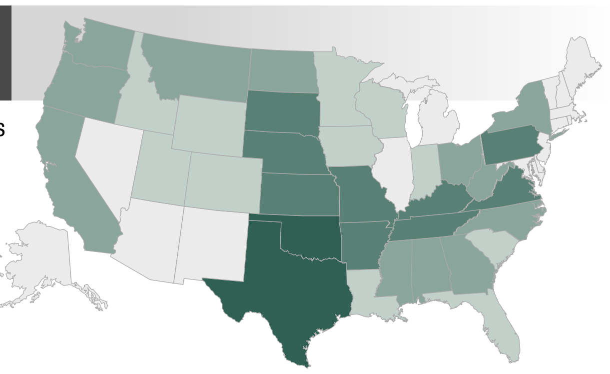
Total forage production is represented by the total of alfalfa, other hay, silage and greenchop production.

Total alfalfa hay production



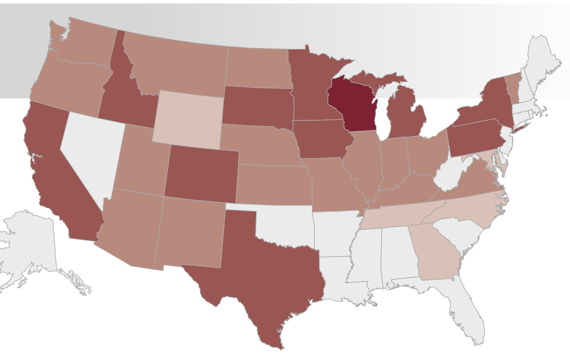
- More than 3,000 thousand tons
- 2,000 to 3,000 thousand tons
- 1,000 to 2,000 thousand tons
- 100 to 1,000 thousand tons
- 0 to 100 thousand tons

Total other hay production



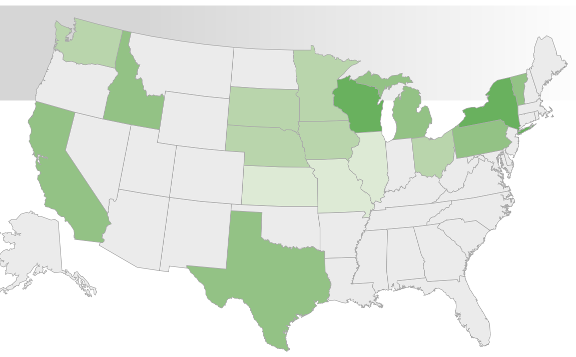
- More than 5,000 thousand tons
- 2,000 to 5,000 thousand tons
- 1,000 to 2,000 thousand tons
- 500 to 1,000 thousand tons
- 0 to 500 thousand tons

Total corn silage production



- More than 10,000 thousand tons
- 5,000 to 10,000 thousand tons
- 1,000 to 5,000 thousand tons
- 500 to 1,000 thousand tons
- 0 to 500 thousand tons

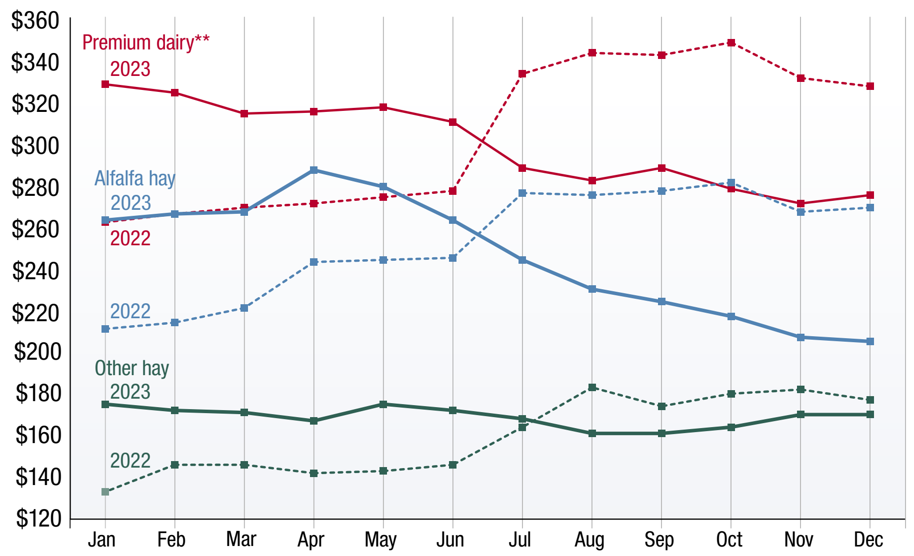
Total greenchop production



- More than 4,000 thousand tons
- 1,000 to 4,000 thousand tons
- 500 to 1,000 thousand tons
- 1 to 500 thousand tons
- 0 tons

U.S. monthly average* prices, alfalfa, other and Premium dairy hay

2022-23 (dollars per ton)



* Average prices paid in 27 major hay-producing states

**Weighted average price for Premium/Supreme alfalfa hay in the five largest milk-producing states: California, Idaho, New York, Texas and Wisconsin.

Source: *USDA National Agricultural Statistics Service*

For market reports updated monthly, visit progressiveforage.com

2023 national forage review

Progressive Forage Editor **Dave Natzke**

Prices

Average monthly prices for alfalfa and premium dairy alfalfa classes of dry hay maintained late 2022 peaks through the first half of 2023 but then softened to end the year (see line graph on back page). Annual averages hid some of the year-to-year volatility in those classes, while monthly average prices for other hay were less volatile.

The 2023 annual average price for dairy-quality alfalfa hay was about $299 per ton, down about $4.40 from 2022's average. However, the December average of $275 was down more than $50 per ton from January.

Similarly, 2023 U.S. prices for all alfalfa hay* averaged $246 per ton, down almost $7 from 2022. December's year-end average was $82 below the April peak.

Contrasting alfalfa trends, prices for all other hay averaged $184 per ton in 2023, up about $24.50 from 2022's average, with month-to-month variation in a narrow range.

Alfalfa hay's price premium over other hay peaked at $120 per ton in April but fell to just $35 per ton by December.

Production

Nationally, dry hay production rebounded somewhat in 2023. In most categories, acreage increases were offset by slightly lower yields. Compared to a year earlier:

• *All dry hay:* Production was estimated at 119 million tons, up 6% from 2022. Area harvested was estimated at 52.8 million acres, up 8%; average yield, at 2.25 tons per acre, was down 0.04 ton. Florida and Oklahoma posted record-high production levels, while Indiana, Michigan, Minnesota, New York, Vermont and Wisconsin set record lows.

• *Alfalfa and alfalfa mixtures:* Production in 2023 was estimated at 49.9 million tons, up 2% from the 2022 total. Harvested area, at 15.6 million acres, was up 3%; average yield was estimated at 3.19 tons per acre, down 0.03 ton. A record-high yield was estimated in Idaho.

• *All other hay:* 2023 production totaled 68.9 million tons, up 9% from 2022. Harvested area, at 37.2 million acres, was up 11%; average yield was estimated at 1.85 tons per acre, down 0.02 ton. Record-high productions were estimated in Arizona, Florida and Oklahoma, while record-low productions were estimated in Iowa, Minnesota and Wisconsin.

• *Total forage:* The USDA's total forage estimation program covers 17 states. Haylage and greenchop are converted to 13% moisture and combined with dry hay production to derive total forage estimates.

With dry hay, the 17-state total for all forage production was 73.6 million tons, down 1% from 2022. About 37.9 million tons were alfalfa and alfalfa mixtures, down 3%.

All haylage and greenchop forages were harvested from 3.45 million acres in 2023, down about 13%. That was only partially offset by higher average yields, with total production at 25.5 million tons, down 10%.

• *Corn silage:* Production was estimated at 130 million tons for 2023, up 1% from 2022. Area harvested for silage was estimated at 6.47 million acres, down 6%; average yield was estimated at 20.1 tons per acre, up 1.4 tons.

• *Sorghum silage:* Production was estimated at 4.98 million tons, down 12% from 2022. Area harvested for silage was estimated at 384,000 acres, down 27% from the previous year; yield averaged 13 tons per acre, up 2.2 tons per acre.

• *New seedings of alfalfa and alfalfa mixtures:* Acreage newly seeded to alfalfa increased for a second consecutive year. In 2023, acreage was estimated at 1.74 million acres, up 4% from 2022 but still the third-lowest total in 25 years. About 1.29 million acres (73%) of new seeding was concentrated in 22 of 24 major dairy states, but new seeding in those states was down about 9,000 acres compared to a year earlier.

• *Hay stocks:* Heading into the 2023 growing season, all dry hay stocks stored on U.S. farms on May 1, 2023, totaled about 14.33 million tons, down nearly 15% from a year earlier. With higher production and lower use, hay inventories as of Dec. 1, 2023, totaled about 76.72 million tons, up 7% from the seven-decade low in Dec. 1, 2022. Among major dairy states, December 2023 hay inventories were estimated about 1.5% lower than a year earlier, with record lows in Minnesota, New York, Ohio and Wisconsin.

Exports

Despite easing port and other logistical problems, 2023 hay export volumes declined from the year before.

At 2.18 million metric tons (MT), alfalfa hay exports fell to a nine-year low. Much of the decline can be attributed to a midyear softening of sales to China, which was the destination for about 41% of all U.S. alfalfa hay exports during the year. Compared to a year earlier, exports of alfalfa meal and alfalfa cubes were mostly lower.

Exports of other hay continued to soften, with the annual total of just under 1 million MT, the lowest volume in at least 17 years. Japan maintained its spot as the top market, taking about 53% of other hay shipments during the year, followed by South Korea at 26%.

Weather and drought

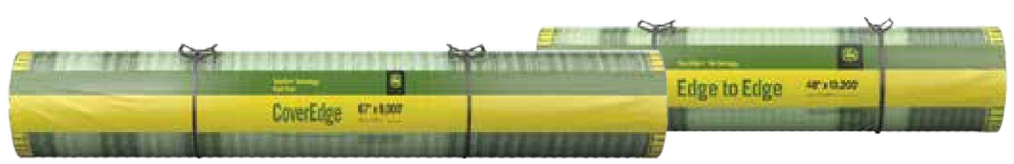
After 126 weeks (Sept. 29, 2020 – Feb. 21, 2023), drought coverage across the contiguous U.S. finally fell below 40%. For hay growers, 2023 U.S. average moisture conditions improved, primarily in the West and northern Plains.

USDA Drought Monitor maps estimated about 56% of major alfalfa-producing areas were under drought conditions to start the year, but that fell to 25% by June, ending the year at just 21%. U.S. hay-producing acreage considered under drought conditions fluctuated between a high of 43% in January to a low of 25% in May-June, ending the year at about 34%.

** Monthly average prices calculated by the USDA are across all hay qualities. Among major hay-producing states, the range of monthly prices can vary by $100 per ton or more.*

John Deere Netwrap with TamaTec+™ Technology

Giving you MORE than ever, for LESS.



Product Name	Width	Roll Length
John Deere CoverEdge TamaTec+	51 in. (130cm)	12,100 ft. (3,700m)
John Deere CoverEdge TamaTec+	67 in. (170cm)	9,000 ft. (2,750m)
John Deere Edge to Edge TamaTec+	51 in. (123cm)	13,200 ft. (4,025m)
John Deere Edge to Edge TamaTec+	67 in. (163cm)	9,700 ft. (2,950m)

Tama
Tama USA Inc.
Toll Free: 1-800-225-8946
Website: www.tama-usa.com

MARCREST

210 BALER

25 US TONS/HR
1000 BALES PER HOUR
50lb, 6-7 FLAKES

19 US TONS/HR
750 BALES PER HOUR
50lb, 8-9 FLAKES

30 US TONS/HR
850 BALES PER HOUR
70lb, 8 FLAKES

The Baler Made for Bale Baron®

The first high-capacity small square baler that matches performance of Bale Baron 5250.

1-519-887-9910 marcrestmfg.com

The Power of Good Bacteria.

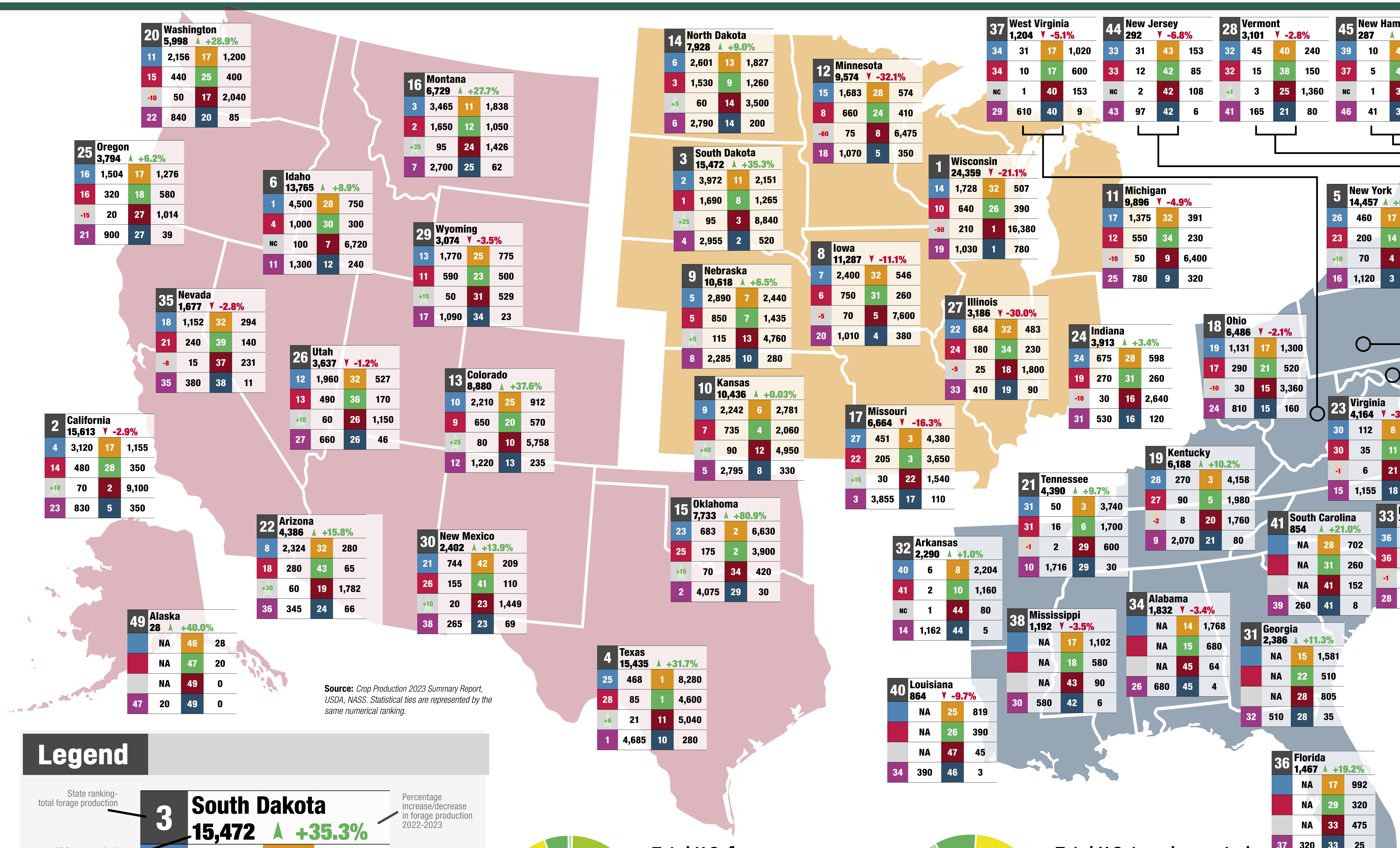
SILOSOLVE® FC is a unique, dual-action inoculant that improves aerobic stability and at the same time improves dry matter recovery over a broad range of dry matter and forages. It has consistently yielded silage preferred by dairy cows and promotes rapid, controlled fermentation to ensure that dry matter and nutrients from the field are available. To learn more, scan the QR code.

SiloSolve® FC

CHR HANSEN
Improving food & health

2023 U.S. forage statistics

Tama | MARCREST | CHR HANSEN | AGPROUD.com Family • Farming • Livestock



20 Washington 5,998 ▲ +28.9%

11	2,156	17	1,200
15	440	25	400
-10	50	17	2,040
22	840	20	85

25 Oregon 3,794 ▲ +6.2%

16	1,504	17	1,276
16	320	18	580
-15	20	27	1,014
21	900	27	39

6 Idaho 13,765 ▲ +8.9%

1	4,500	28	750
4	1,000	30	300
NC	100	7	6,720
11	1,300	12	240

16 Montana 6,729 ▲ +27.7%

3	3,465	11	1,838
2	1,650	12	1,050
+35	95	24	1,426
7	2,700	25	62

29 Wyoming 3,074 ▼ -3.5%

13	1,770	25	775
11	590	23	500
+15	50	31	529
17	1,090	34	23

35 Nevada 1,677 ▼ -2.8%

18	1,152	32	294
21	240	39	140
-8	15	37	231
35	380	38	11

26 Utah 3,637 ▼ -1.2%

12	1,960	32	527
13	490	36	170
+10	60	26	1,150
27	660	26	46

2 California 15,613 ▼ -2.9%

4	3,120	17	1,155
14	480	28	350
+10	70	2	9,100
23	830	5	350

13 Colorado 8,880 ▲ +37.6%

10	2,210	25	912
9	650	20	570
+25	80	10	5,758
12	1,220	13	235

22 Arizona 4,386 ▲ +15.8%

8	2,324	32	280
18	280	43	65
+30	60	19	1,782
36	345	24	66

30 New Mexico 2,402 ▲ +13.9%

21	744	42	209
26	155	41	110
+10	20	23	1,449
38	265	23	69

49 Alaska 28 ▲ +40.0%

	NA	46	28
	NA	47	20
	NA	49	0
47	20	49	0

14 North Dakota 7,928 ▲ +9.0%

6	2,601	13	1,827
3	1,530	9	1,260
+5	60	14	3,500
6	2,790	14	200

3 South Dakota 15,472 ▲ +35.3%

2	3,972	11	2,151
1	1,690	8	1,265
+25	95	3	8,840
4	2,955	2	520

9 Nebraska 10,618 ▲ +6.5%

5	2,890	7	2,440
5	850	7	1,435
+5	115	13	4,760
8	2,285	10	280

10 Kansas 10,436 ▲ +0.03%

9	2,242	6	2,781
7	735	4	2,060
+40	90	12	4,950
5	2,795	8	330

15 Oklahoma 7,733 ▲ +80.9%

23	683	2	6,630
25	175	2	3,900
+15	70	34	420
2	4,075	29	30

4 Texas 15,435 ▲ +31.7%

25	468	1	8,280
28	85	1	4,600
+6	21	11	5,040
1	4,685	10	280

12 Minnesota 9,574 ▼ -32.1%

15	1,683	28	574
8	660	24	410
-60	75	8	6,475
18	1,070	5	350

8 Iowa 11,287 ▼ -11.1%

7	2,400	32	546
6	750	31	260
-5	70	5	7,600
20	1,010	4	380

17 Missouri 6,664 ▼ -16.3%

27	451	3	4,380
22	205	3	3,650
+15	30	22	1,540
3	3,855	17	110

1 Wisconsin 24,359 ▼ -21.1%

14	1,728	32	507
10	640	26	390
-50	210	1	16,380
19	1,030	1	780

27 Illinois 3,186 ▼ -30.0%

22	684	32	483
24	180	34	230
-5	25	18	1,800
33	410	19	90

11 Michigan 9,896 ▼ -4.9%

17	1,375	32	391
12	550	34	230
-10	50	9	6,400
25	780	9	320

24 Indiana 3,913 ▲ +3.4%

24	675	28	598
19	270	31	260
-10	30	16	2,640
31	530	16	120

18 Ohio 6,486 ▼ -2.1%

19	1,131	17	1,300
17	290	21	520
-10	30	15	3,360
24	810	15	160

19 Kentucky 6,188 ▲ +10.2%

28	270	3	4,158
27	90	5	1,980
-2	8	20	1,760
9	2,070	21	80

21 Tennessee 4,390 ▲ +9.7%

31	50	3	3,740
31	16	6	1,700
-1	2	29	600
10	1,716	29	30

32 Arkansas 2,290 ▲ +1.0%

40	6	8	2,204
41	2	10	1,160
NC	1	44	80
14	1,162	44	5

40 Louisiana 864 ▼ -9.7%

	NA	25	819
	NA	26	390
	NA	47	45
34	390	46	3

38 Mississippi 1,192 ▼ -3.5%

	NA	17	1,102
	NA	18	580
	NA	43	90
30	580	42	6

34 Alabama 1,832 ▼ -3.4%

	NA	14	1,768
	NA	15	680
	NA	45	64
26	680	45	4

31 Georgia 2,386 ▲ +11.3%

	NA	15	1,581
	NA	22	510
	NA	28	805
32	510	28	35

36 Florida 1,467 ▲ +19.2%

	NA	17	992
	NA	29	320
	NA	33	475
37	320	33	25

41 South Carolina 854 ▲ +21.0%

	NA	28	702
	NA	31	260
	NA	41	152
39	260	41	8

33 North Carolina 1,923 ▲ +4.2%

36	18	15	1,365
36	7	16	650
-1	2	30	540
28	657	29	30

23 Virginia 4,164 ▼ -3.9%

30	112	8	2,352
30	35	11	1,120
-1	6	21	1,700
15	1,155	18	100

37 West Virginia 1,204 ▼ -5.1%

34	31	17	1,020
34	10	17	600
NC	1	40	153
29	610	40	9

44 New Jersey 292 ▼ -6.8%

33	31	43	153
33	12	42	85
NC	2	42	108
43	97	42	6

28 Vermont 3,101 ▼ -2.8%

32	45	40	240
32	15	38	150
+1	3	25	1,360
41	165	21	80

45 New Hampshire 287 ▲ +3.2%

39	10	46	61
37	5	46	36
NC	1	38	216
46	41	37	12

43 Connecticut 432 ▼ -21.6%

38	11	44	82
37	5	45	48
NC	1	36	340
45	53	36	20

42 Maine 579 ▼ -14.6%

35	18	40	216
35	8	40	120
-1	1	35	345
42	128	34	23

5 New York 14,457 ▲ +6.4%

26	460	17	1,242
23	200	14	920
+10	70	4	8,600
16	1,120	3	430

46 Massachusetts 272 ▲ +2.7%

40	6	44	90
39	4	44	50
NC	1	39	176
44	54	38	11

48 Rhode Island 34 ▲ +10.9%

42	2	49	11
42	1	49	5
NC	0	48	21
49	6	48	1

7 Pennsylvania 12,006 ▲ +6.8%

20	810	8	2,418
19	270	13	930
NC	50	6	6,900
13	1,200	7	345

39 Maryland 1,029 ▼ -12.0%

29	135	32	384
29	45	37	160
-1	1	32	510
40	205	29	30

47 Delaware 84 ▼ -0.8%

37	13	48	21
39	4	48	8
+1	2	46	50
48	12	47	2

Source: *Crop Production 2023 Summary Report, USDA, NASS. Statistical ties are represented by the same numerical ranking.*

United States

279,179 ▲ +2.0%

49,872 ▲ +2.2%	68,796 ▲ +9.6%
15,634 ▲ +3.2%	37,187 ▲ +11.0%
1,743 ▲ +68	129,994 ▲ +1.3%
52,821 ▲ +6.5%	6,471 ▼ -5.5%

Total U.S. forage acres

in thousands of acres

Other hay	37,187	▲ +3,629
Alfalfa	15,634	▲ +481
Silage	6,471	▼ -380
Greenchop	3,449	▼ -533
Sorghum	384	▼ -141
Combined total	**63,125**	

Total U.S. tons harvested

in thousands of tons

Silage	20.1 *tons/acre*	129,994	▲ +1.3%
Other hay	1.9 *tons/acre*	68,796	▲ +9.6%
Alfalfa	3.2 *tons/acre*	49,872	▲ +2.2%
Greenchop	7.4 *tons/acre*	25,536	▼ -9.3%
Sorghum	13.0 *tons/acre*	4,981	▼ -12.0%
Combined total		**279,179**	

Legend

3 South Dakota 15,472 ▲ +35.3%

2	3,972	11	2,151
1	1,690	8	1,265
+25	95	3	8,840
4	2,955	2	520

State ranking-total forage production

All forage production *(in thousands of tons)*

State ranking-alfalfa yield

Alfalfa yield *(in thousands of tons)*

State ranking-alfalfa acres

Alfalfa acres *(in thousands of acres)*

Change in acres of new alfalfa plantings *(in thousands of acres)*

Alfalfa new plantings *(in thousands of acres)*

State ranking-total hay acres

Total hay acres *(in thousands of acres)*

Percentage increase/decrease in forage production 2022-2023

State ranking-other hay yield

Other hay yield *(in thousands of tons)*

State ranking-other hay acres

Other hay acres *(in thousands of acres)*

State ranking-corn silage yield

Corn silage yield *(in thousands of tons)*

State ranking-corn silage acres

Corn silage acres *(in thousands of acres)*

progressiveforage.com
238 West Nez Perce
PO Box 585, Jerome, ID 83338-0585
PHONE (208) 324-7513
FAX (208) 324-1133

PROGRESSIVE FORAGE
HAY | SILAGE | PASTURE