YARD & GARDEN REPORT

August 27, 2019 Vol. 7, No. 3

Time to Fertilize Your Lawn

Did you know the best time to fertilize your lawn is *nom?* It's true! The key to a healthy turf is a thick root system, and *nom* is when your turf focuses its energy on growing roots.

Let's compare fertilizing lawns in April versus now. After we fertilize our lawns in April we feel rewarded when the grass greens up. But this boost of new grass blades comes at the expense of a deeper root system. You have to mow your lawn more often, and your turf may become more vulnerable to drought stress in summer.

In contrast, fertilizing in fall will:

- Repair any damage that occurred to the lawn over summer.
- Lead to a thicker turf and a stronger root system this fall.
- Help the turf to tolerate stresses such as drought, diseases and winter.
- Lead to a quicker green-up next spring.

What are you waiting for? Let's get busy!

What type of fertilizer is best?

A fertilizer bag has three numbers, indicating the percentages of nitrogen, phosphate and potash. Nitrogen is the most important nutrient. Look for a fertilizer with at least 25% nitrogen. Select a fertilizer that contains some slow-release nitrogen (sulfur-coated urea, urea formaldehyde and IBDU). This will gradually feed the lawn this fall and next spring.



The second number, phosphate, is abundant in our soils and is rarely needed in established lawns. The third number, potash, will help our lawn to tolerate stresses, including our winters. Most winterizer fertilizers contain 5–10% potash.

Should I use a weed-and-feed fertilizer?

These fertilizers are *okay* at feeding lawns and *okay* at killing weeds, but not great at either. Here's why:

Bad timing. The best times to feed a lawn (late May and early September) are not the best times to control weeds, namely crabgrass (late April) and broadleaf weeds (mid to late September).

Bad for the environment. Landscapes (including trees) grow better when herbicides are sprayed only where needed on lawns. Using weed-and-

feed fertilizers puts toxic chemicals everywhere, even in areas with no weeds.

Bad control. Herbicides must be absorbed by weed leaves to work. Some small-leafed weeds such as black medic and clover cannot hold onto the granules and absorb the herbicide.

As an alternative, *spot sprays* of liquid herbicide applied directly onto weedy areas can be applied to kill weeds at the most effective time and in a more effective manner.

Inside This Issue

- Fertilize Your Lawn 1
- Plant Health Care
 - Trees and Shrubs, Fruits

3

- Vegetables
- ◆ Weather Almanac 4

Plant Health Care

Trees and Shrubs



Wetwood

Bacteria feed inside elm, cottonwood, willow and other trees. The slime damages bark and may attract insects. Wood is slightly weakened and growth is slowed. No treatment will cure it. Reduce other stresses and the tree may adapt to it.

Fruits

2



Harvesting Rhubarb in Fall

Harvest usually stops around July 4, but a few stalks from vigorous plants can be harvested now. These stalks may be a little tough. Don't harvest stalks if they have suffered frost damage.



Leaf Scorch

Notice the brown edges. Newly planted trees are especially sensitive. Irrigate deeply when needed. Rock mulches generate heat and should be avoided; shredded bark or wood chips are better.



Fall Webworm

Caterpillars eat leaves but cause minimal damage overall. The leaves were going to drop soon anyhow. Nests may be collected with a forked stick. Young larvae may be killed with *Bacillus thuringiensis*, carbaryl or a pyrethroid.



Aphids

Pry open the curled leaves to reveal the pests. Aphid excrement is sticky and glistens; it may attract ants. Aphids cause little damage. Leave them alone or spray them with a jet stream of water. Acephate may be justified for young trees.



Chlorosis on Silver Maple

Leaves yellow, often with green veins. Related to high pH and unavailability of iron. Foliar sprays, trunk implants and injections, and soil applications of iron chelates are used. Get soil tested to assess pH and long-term strategy.



Yellow Chokecherries

Not all chokecherries are purple. Wild and cultivated varieties of yellow chokecherries can be found. The golden fruits are edible and can be used just like the purple types.



Pear Slugs (Sawflies)

Slimy larvae skeletonize leaves of rose, chokeberry, pear and cherry. A jet spray of water is usually adequate; or control with insecticidal soap, neem, spinosad, pyrethroids or carbaryl.

Plant Health Care

Vegetables



Blossom End Rot

Early fruits are especially susceptible to this rot, which is caused by a calcium deficiency. Keep the soil evenly moist to get the calcium in the soil solution. Mulching helps. Do not damage roots when cultivating.



Sowing Radish

This is the season to grow radish. The roots will mature when temps are cool, leading to crisper, milder flesh. Springsown radish often tastes pungent and globular roots may fail to form.



Scorch on Tomato

Tissues directly exposed to sun will turn white and may wrinkle. This most often occurs with fruits growing on spindly vines. Promote healthy vine growth through fertilization and irrigation.



Poor Fruit Set

These fruitless flowers are *males*. They don't set fruit. Only female flowers of cucurbits have fruits attached. Female flowers may fail to set fruit if plants are under stress, not pollinated, or if the pollen died due to extreme heat.



Harvesting Onions

Harvest when tops have fallen over and shriveled. Keep in the garden for a couple days to dry. Shake off loose dirt and cure bulbs in a warm (80°F), airy spot until necks are withered (2–4 weeks).



Harvesting Basil

Flavorful oils peak in the morning after dew has dried. Harvest basil a few inches down the stem and above a new set of leaves. Extend the harvest by removing flower buds before they open.



Blights on Cucurbit Vines

Avoid getting foliage wet. Prevent the spread of diseases by spraying with chlorothalonil (Daconil, Bravo), mancozeb or copper. In the future, space your plants widely and sow modern, disease-resistant cultivars.



Black Nightshade

Solanum nigrum berries are toxic, especially when immature and green. Flowers are small, white and resemble pepper flowers. Its fruits turn black. Never eat mysterious fruits.



Beneficial Insects

Ladybug larvae and pupae (top and bottom of photo) are often mistaken for pests. Only use insecticides if you know the identity of the insect and if its level of damage warrants treatment.

Weather Almanac for August 19-25, 2019

	TEMPERATURE ¹					RAINFALL ^{1,4}				GROWING DEGREE DAYS ^{1,5}			
	August 19–25				Aug. 19–25		2019		Aug. 19–25		2019		
Site	Avg	Norm	Max	Min	Total	Norm	Total	Norm	Total	Norm	Total	Norm	
Bottineau	64	66	84	42	1.54	0.42	11.41	11.47	90	97	1555	1689	
Bowman	68	67	92	48	0.16	0.20	11.32	9.84	110	107	1529	1737	
Carrington	65	67	83	44	0.92	0.53	12.02	12.96	86	102	1627	1824	
Crosby	67	65	88	44	1.13	0.33	11.24	10.04	104	91	1518	1559	
Dickinson	69	67	88	53	0.03	0.31	10.93	11.11	112	101	1633	1715	
Fargo	67	68	86	51	1.11	0.68	14.75	12.87	97	110	1899	1959	
Grafton	64	66	83	44	0.17	0.73	6.03	12.63	89	94	1703	1696	
Grand Forks	65	66	84	48	0.99	0.68	13.41	12.66	87	98	1678	1747	
Hazen	68	69	86	49	0.00	0.36	13.47	11.29	104	111	1636	1890	
Hillsboro	64	68	84	47	2.37	0.59	14.08	13.01	81	105	1748	1852	
Jamestown	64	67	82	46	0.51	0.53	14.12	12.23	81	101	1595	1817	
Langdon	63	64	81	44	1.37	0.57	9.30	12.92	80	82	1468	1453	
Mandan	68	68	86	50	0.33	0.43	12.12	12.19	107	105	1680	1815	
Minot	65	66	86	41	0.72	0.44	9.18	11.49	95	98	1613	1662	
Mott	68	68	86	49	0.00	0.34	16.11	10.52	111	105	1598	1791	
Rugby	65	66	84	42	0.31	0.46	7.73	12.78	92	93	1609	1684	
Wahpeton	64	69	85	46	0.30	0.61	14.64	13.28	85	116	1820	2038	
Watford City	70	66	92	49	0.00	0.30	10.12	9.82	113	99	1667	1739	
Williston	70	70	92	50	0.01	0.36	11.48	9.56	117	117	1673	1956	
Wishek	65	66	82	52	0.00	0.45	16.13	11.11	91	96	1543	1647	

DAYLENGTH (Aug. 26, McClusky, ND)²

Sunrise: 6:52 AM Daylength: 13h 44m

Change since Aug. 19: –23m

LONG-TERM OUTLOOKS³

Aug. 31-Sep. 4: Temp.: Below Normal; Precip.: Above Normal

Sep. 2–8: Temp.: Below Normal; Precip.: Above Normal

Credits

Sunset: 8:36 PM

Sources

Bauer, S., P.G. Johnson and D.B. White. 2018. Fertilizing lawns. University of Minnesota Extension. https:// extension.umn.edu/lawn-care/fertilizing-lawns

Bricault, B. 2015. When should I fertilize my lawn during spring?

Michigan State University. https://www.canr.msu.edu/news/
when_should_i_fertilize_my_lawn_during_spring

Photos were made available under Creative Commons licenses specified by the photographers. Page 1: Gary Hymes, www.flickr.com/photos/garyhymes/278787987/. Page 2: Mike Schomaker, Colorado State Forest Service, Bugwood.org; Tom Kalb, NDSU (3); Whitney Cranshaw, Colorado St. Univ., Bugwood.org; Mary Keim, www.flickr.com/photos/38514062@N03/27183685591/; Hans Braxmeier from Pixabay; Julie Garden-Robinson, NDSU; Lesley Ingram, Bugwood.org, Page 3: Gerald Holmes, California Polytechnic State University at San Luis Obispo, Bugwood.org, Mark, www.flickr.com/photos/35387910@N04/6011378943/; Winsker from Pixabay; Tom

Kalb, NDSU; All-America Selections; Chiot's Run, www.flickr.com/photos/chiotsrun/7556496698/; Adam Grubb and Annie Raser-Roland, www.flickr.com/photos/87106229@N05/7981598105/; Missouri Botanical Garden; Jan Haerer from Pixabay; Ewan Pearce, www.flickr.com/photos/51039450@N02/4755638203/.

Written by Tom Kalb, who expresses gratitude to the NDSU educators who contributed to this report: Craig Askim, Lindy Berg, Brandon Biwer, Beth Burdolski, Anitha Chirumamilla, Calla Edwards, Julie Garden-Robinson, Renae Gress, Randy Grueneich, Harlene Hatterman-Valenti, Lezlee Johnson, Tessa Keller, Don Kinzler, Scott Knoke, Carrie Knutson, Devan Leo, Lindsay Maddock, Esther McGinnis, Penny Nester, Julianne Racine, Crystal Schaunaman, Rick Schmidt, Volanda Schmidt, Melissa Seykora, Jan Stankiewicz, Kathy Wiederholt and Joe Zeleznik.

The information given herein is for educational purposes only. References to commercial products or trade names are made with

the understanding that no discrimination is intended and no endorsement by North Dakota Extension is implied.

NDSU Extension, North Dakota State University of Agriculture and Applied Science, and the U.S. Department of Agriculture cooperating. Greg Lardy, Director, Fargo, North Dakota. Distributed in furtherance of the Acts of Congress of May 8 and June 30, 1914. We offer our programs and facilities to all persons regardless of race, color, national origin, sex, handicap, age, Vietnam era veterans status, or sexual orientation; and are an equal opportunity employer. This publication will be made available in alternative formats for people with disabilities upon request (701) 231-7881.



EXTENSION

^{1,2,3} Sources: North Dakota Agricultural Weather Network, www.sunrisesunset.com, and National Weather Service, respectively.

^{4,5} Rain data begin April 1. GDDs for garden vegetables are not available. GDD data in this table are for corn, which responds to temperature as most vegetables grown in gardens. Data begin May 1 with base minimum and maximum temperatures of 50 and 86°F, respectively.