



Soil Sampling for Home Lawns & Gardens

By Pauric Mc Groary, Ph.D

INTRODUCTION

Sample collection is the first critical step in soil testing. It is absolutely necessary to take care to assure that the soil sample that you send to the laboratory represents the area sampled. Please remember that only a few ounces of soil are being tested to determine the fertilizer and lime needs for what may be several thousand pounds of soil. Therefore, if your sample is not representative of the area you sampled, you may end up over or under applying fertilizer and lime leading to poor results. Finally, it is also important to remember that we cannot analyze potting media/compost or soil mixes with less than 50% soil using our standard testing methods, like a regular soil sample as these results will be unreliable. Please contact the lab to get the appropriate tests.

WHEN TO SAMPLE

Soil samples can be collected throughout much of the year. However, sampling should be avoided during times when the soil is excessively dry or wet. For established areas such as lawns, trees, and shrubbery samples should be taken once every two to three years. If new landscaping is being planned whether it's laying sod, starting a vegetable garden, putting in a flower bed or planting perennials, sampling should be carried out 6-7 months in advance to allow time for soil pH adjustments if needed. If a planting exhibits abnormal growth or discoloration, a sample can be taken from around the plant/area during the growing season for problem diagnosis. For recently

limed or fertilized areas, delay sampling at least eight to twelve weeks after application. If you suspect nematodes, a separate soil sample is needed.

TOOLS YOU WILL NEED

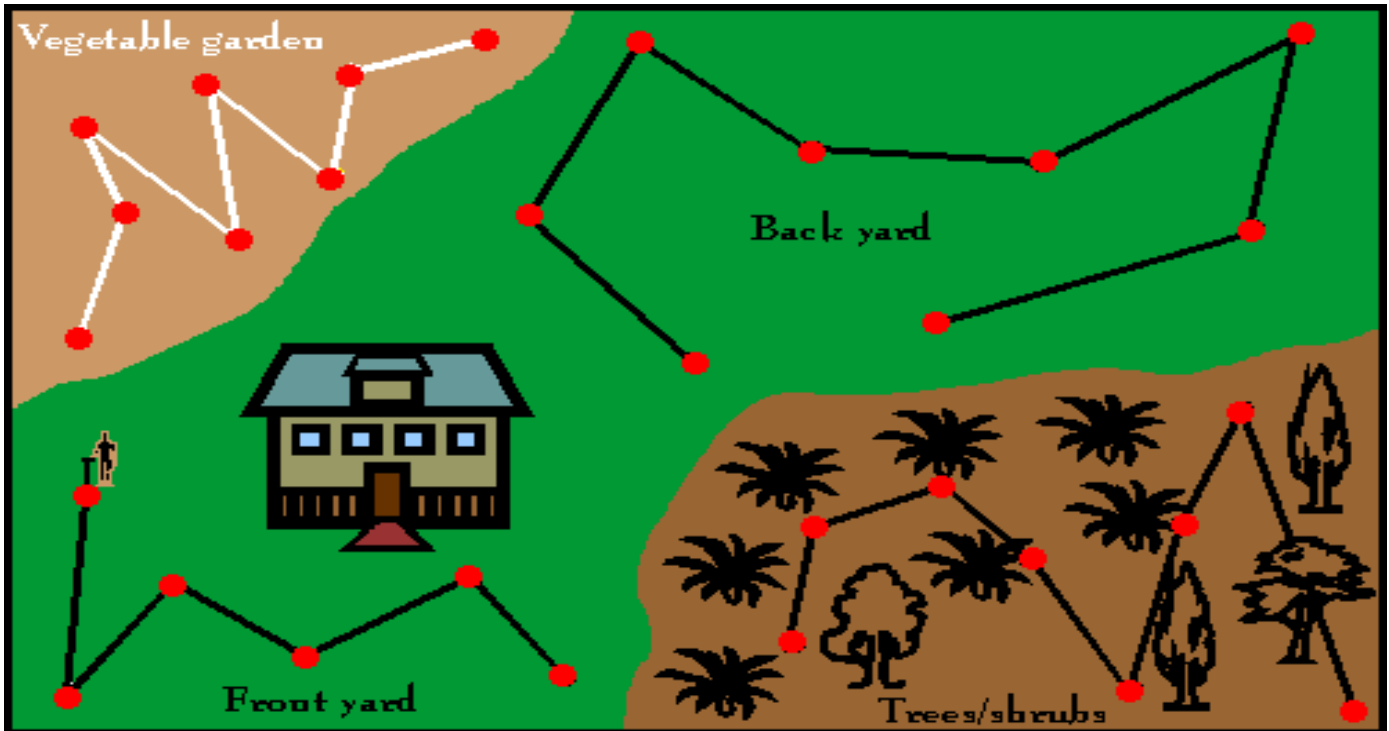
A soil probe, garden trowel or a spade are all the tools you need to take the individual cores that will make up a sample. In addition, you will need a clean, dry plastic bucket to mix the sample cores. **Do not** use brass, bronze or galvanized tools or buckets as they may contaminate the sample, causing misleading results. In order to mail the sample, soil sample bags and submittal forms will be needed. Soil sample bags and submittal forms can be obtained by calling the lab. However, to expedite the process a "quart sized ziploc bag" can be used instead, and a submittal form can be printed from our website under the lawn and garden tab.

GETTING STARTED

Once you have decided what time of year you need to sample, the next step is to decide how you are going to divide your yard/garden areas up so you get representative samples and results that are applicable to the soil and crop that you sample. Each sample should represent only one soil type or area-for example, a lawn, shrub beds or vegetable garden (Figure 1).

TAKING THE SAMPLE

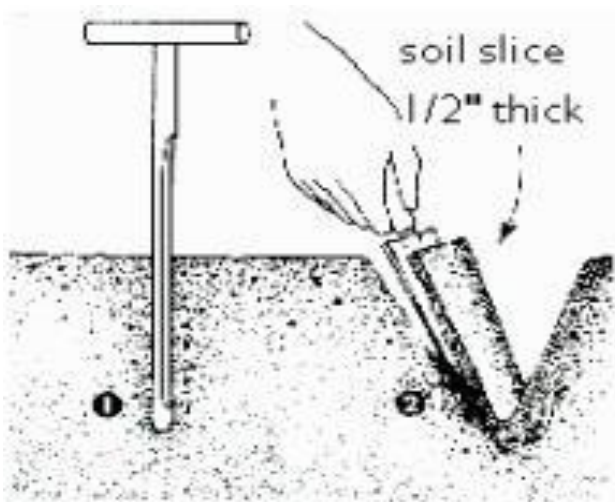
After identifying the different areas to sample, it's time to put your tools to use and



get dirty! You can take the sample with a soil probe, garden trowel or a spade. If using a:

(1) Soil probe: push the probe into the soil to the recommended depth (See next section). Repeat 10-15 times in a zigzag fashion within each sampling area and mix the sample together in a clean bucket.

(2) Shovel or spade: Dig a V shaped hole to sample depth, and then cut a thin slice as shown below.



Repeat 10-15 times in a zigzag fashion within each sampling area and mix the sample together in a clean bucket. Then

using one of A&L bags or a quart sized ziploc bag, fill bag with two cups of

soil. Don't forget to write on the bag an ID that you can identify with when you get the results back, e.g. "front yard", "back vegetable garden" etc.

SAMPLING DEPTHS

For lawns, sample to a depth of four to six inches, excluding any thatch, and sample in a zigzag pattern. Similarly, for a vegetable garden, sample to a depth of four to six inches in a zigzag pattern. For flower beds, remove any mulch, then sample to a depth of four to six inches in a zigzag pattern. Additionally, for trees and shrubs remove any mulch and sample to a six to 8 inch depth under the drip line of established trees (under the tips of the longest branches) all the way around the tree or just outside the root ball.

FILLING IN THE SAMPLE INFORMATION

This is one of the most important steps in taking and submitting a soil sample. If not filled in properly this may delay the results or lead to the wrong recommendations! In order to get the best experience it's

important that you make sure, your name, address, and phone number are legible. If you would like to receive your results by e-mail you need to also include your email address as shown in red on the form below. For payment you can include a check, or write your credit card number on the form.

After getting your personal information on the form the next step is to fill in the sample Id. As previously mentioned it's important you pick an Id that will help you remember where the sample came from e.g. front garden etc. Also, you need to make sure that the ID on the form matches the ID on the bag.


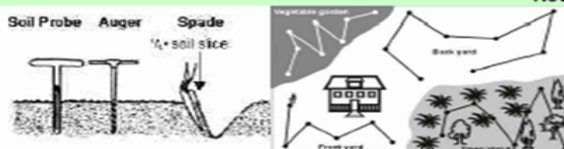
As far as choosing a test, the S1 will provide most homeowners with enough information to grow most lawns, shrubs, and vegetable gardens. But for those who may have problems or are novices in the yard/garden the S3 may provide more information for solving problems or increasing quality/yield.

Finally, in order to get the correct recommendations we need to know what crop you are growing. Under the "choose option below for fertility recommendations"

or "crop to be grown" please specify the crop you need recommendations for by choosing one of the codes or writing in the crop itself, e.g. lawn or vegetable garden etc.

WHAT'S NEXT?

After we receive your sample, you should get an e-mail confirmation if you have provided an e-mail address. On this notification will be your account number, report number, and number of samples submitted and the date when you should receive the results and when we received the sample. Generally, you should receive the results three days after receiving this confirmation. However, if you did not provide an e-mail address it takes about five to six days after we receive the sample for you to receive your results. If you do not receive your results within the above time frames please feel free to contact the lab. Finally, after getting the report back if you have any questions regarding the testing methods, nutrient ranges or recommendations please feel free to call the lab and ask to speak with our agronomist.

 LAWN & GARDEN SOIL SAMPLE SUBMITTAL FORM A&L Eastern Laboratories, Inc. 7621 Whitepine Road Richmond VA 23237 Tel: 804-743-9401 Fax: 804-271-6446 Email: office@al-labs-eastern.com Website: www.al-labs-eastern.com				Date:	Account #
Customer/Home owner information			Billing Information (For Dealer Or Consultant Use Only)		
Name Name and address			Name		
Street			Street		
City, State, Zip			City, State, Zip		
Phone# Phone No		FAX#	E-Mail E- Mail		Paperless: Yes: No
Sample ID Lab Number (Lab Use Only)		Test Desired	Choose Option Below For Fertility Recommendation		
Sample ID's		Test Desired	Crop to be grown or is being grown		
Test Code (for current fees visit our website)			Options To Be Grown (write in names if code is not listed)		
S1 - (suggested for Lawn) - Organic Matter, Phosphorus, Potassium, Magnesium, Calcium, Sulfur, pH, Lime and Fertility Recommendation S3 - (suggested for Garden) - The same as above plus Zinc, Manganese, Iron, Copper and Boron MEL1 - Same as S1 with color graphic report MEL2 - Same as S3 with color graphic report Soluble Salts - (suggested for overfertilized soils) Sodium - (suggested for beach soils)			500 Lawn*, New (Before seeding) 510 Lawn*, Existing * All cool season grass, fescue, blue grass etc. 514 Lawn, Centipede 515 Lawn, Bermuda 509 Athletic Field 214 Shrubs 301 Flower Beds 200 Garden, General 202 Azaleas 212 Roses Golf Course: 521 Green 523 Rough 522 Tee 524 Fairway		
How To Take A Soil Sample					
		Each sample should represent only one soil type or area—for example, a lawn, vegetable garden or perennial landscaped area. If one area of your yard seems healthy and another has bare or yellow areas, sample healthy and unhealthy areas separately even if both are lawn grasses or flower gardens, etc. For each unique area, take at least six to eight samples. Mix these 6-8 soil samples in a clean, plastic bucket. If the bucket has been used to hold fertilizer or other chemicals, wash it thoroughly before using it for soil samples. Take out 2 cups of the soil mixture, put into a Ziploc bag and labeled your ID with a water-resistant marker on each sample. Completely fill in the information required on this form and mail/ship with a sturdy bag or box. Please give your e-mail address to receive notification on sample arrival and lab report. Be environmental conscience by checking paperless for email only reporting.			
To take a soil sample, use a soil-sampling probe, an auger, a spade or shovel. If a shovel or a spade is used, dig a V-shaped hole to sample depth (4-6"), then cut a thin slice as shown on the above diagram.		Credit Card Information Please enclose proper payment or a charge account number (Visa or Master Card only). Card Number: _____ Expiration Date: _____ Security Code: _____			