## Adding Soil To Lawns

This is Gardening with Chuck on 1420 KJCK, I'm Chuck Otte, Geary County, K-State Research and Extension Ag & Natural Resources Agent. I routinely hear from gardeners or homeowners that they brought in a truck load of good black dirt for their garden or to spread on their lawn ahead of grass seeding. If you need to fill in some low spots or level out an area in the lawn then I can certainly understand why you would want to do that. But if you think that spreading soil over the yard is going to make a difference, you're in for a surprise. First of all, a thin layer of soil, especially if it is significantly different than what's already there, can really mess up water infiltration and root penetration. Soils of drastically varying densities or textures can create zones that water and roots have trouble passing. If you bring in six inches of soil then you can make a difference. Or if you thoroughly mix the new soil with the existing soil, you can sometimes help. Bringing in pure sand and mixing it in can make problems worse however. An acre foot of soil weighs roughly 2 million pounds which means that a cubic foot of soil weighs roughly 46 pounds. A cubic yard of soil, which is how you will normally buy topsoil is 1,240 pounds. If you are going to swap out or add 6 inches of soil, a cubic yard will cover 54 square feet. Are you seeing where this is headed? Neither the economics or the physics or the soil morphology on this is looking very good. Sure, you can bring in enough soil for small areas, but on a lawn size scale, you are better off to work with what you've got. If you want to add anything, add organic matter and work that in. That can make the biggest difference. But adding anything else is a waste! This has been Gardening with Chuck on the Talk of JC, 1420 KJCK,

I'm Chuck Otte.

## Planting Garlic

This is Gardening with Chuck on 1420 KJCK, I'm Chuck Otte, Geary County, K-State Research and Extension Ag & Natural Resources Agent. This is Kansas. We understand wheat. We know that you have to plant wheat in the fall so that the young plants can go through a cold treatment which then trips the switch to make them put up a seed stalk next spring. Garlic is kind of like that. We plant the individual clove of garlic. If that clove never goes through a cold treatment, it just keeps growing like an onion and never know that it needs to develop what are called daughter bulbs. Many people plant garlic in the spring and have no success in growing it. If you plant garlic now, even clear into early November, the roots will start to develop, it will get itself established and the cold treatment will trigger it and next spring it will develop those daughter bulbs, or cloves, that we like to use in our cooking! Or at least I do!! You need to order good high quality garlic bulbs from a reputable source. There are many different types of garlic and if you just use what you buy for cooking at the grocery store, you don't know what you are getting for sure. If you can't find garlic at a garden center, I can direct you to some good on line internet sources. Work your ground. It's often advisable to add fertilizer, like one pound of 12-12-12 per 100 square feet and work in when you till. When you have your seed garlic, as opposed to garlic seed, separate into individual cloves and plant them 1 to 2 inches deep about 6 inches apart. Then cover back up with soil. Water the area down well and consider mulching to hold the heat this fall as well as to keep it cool next year. Harvest will occur in June or July, depending on the weather. This has been Gardening with Chuck on the Talk of JC, 1420 KJCK, I'm Chuck Otte.

## Fall Planting of Trees

This is Gardening with Chuck on 1420 KJCK, I'm Chuck Otte, Geary County, K-State Research and Extension Ag & Natural Resources Agent. Fall, meaning anytime from now up into early December, can be a great time to plant trees. Trees are going dormant right now, they just haven't bothered to tell the leaves. Even though the trees are going dormant, the roots are still carrying on a lot of activity. Then late next winter, root activity starts much sooner than many people realize. If you transplant trees in the fall, especially October and early November, the soils are still warm enough that you can get some root growth, or at least you give the soil some time to settle in around the roots. It's important to get the tree replanted at the same depth that it was at it's previous location. Planting it deeper can cause root loss due to changes in oxygen levels. Tree roots are very sensitive to this. Planting it shallower can result in poor anchoring of the tree and possibly expose the crown of the plant to excessive weather variations. Also not a good thing. Get the tree planted water it down good and then keep it watered into November, but don't over water. Mulching the soil will also help retain warm soil temperatures and soil moisture. Often we don't need to stake smaller trees at all or larger trees until next spring. Avoid fertilizer for the first two years that a tree is in the ground. Over zealous application of fertilizer can result in root damage which will actually slow growth. A few tree species do not do well with fall planting. That list includes beech, birch, redbud, tulip poplar, scarlet, black, and willow, oak, as well as willows, dogwood, and magnolias. But white and red oaks and other species are fine to plant now! This has been Gardening with Chuck on the Talk of JC, 1420 KJCK, I'm

Chuck Otte.