This video will walk you through the steps for killing your grass by solarization.
Solarization uses an ultra-violet or UV plastic cover to trap the heat from the sun.
This steam sterilizes the lawn and the top three to four inches of soil. Solarization kills the lawn without harming beneficial microorganisms and insects in the soil.
It improves soil health, produces zero green waste and doesn’t require the use of heavy equipment or pesticides.
Solarization works best on green-in winter grasses such as Fescue or Bluegrass, which take about one month to kill. It may not be the best option for some types of grass like Bermuda because weeds can regrow from roots deeper than the heat can reach and kill. Brown-in-winter grasses such as St. Augustine, and patchy lawns take one to two months to die. Hot summer months are the optimal time to use solarization.
You will need a shovel to dig out the edges of your lawn, and a clear, poly greenhouse plastic cover. Clear plastic is the most effective material because the sun’s rays can pass through it and heat the soil below. Black plastic is less effective because it absorbs some of the heat rather than passing it through.
One millimeter thick plastic is the most effective because it transmits heat, however it can tear easily. **1.5 to 2 millimeter plastic also works well.** Rolls of 1 to 4 millimeter “painter’s” plastic are available at larger hardware stores and are easier to obtain.
They will last long enough for the 3 to 5 week period of solarization, before beginning to break down. The plastic sheets should be watched closely so they can be removed before deteriorating to the point where removal and disposal are difficult. If a longer solarization period is desired, small areas can be covered again with fresh plastic.
Any holes or tears should be patched with durable patching tape. In order to maintain the temperature necessary to kill the lawn, the plastic has to receive unrestricted sunlight for six to eight hours each day.
Step one: Prepare the lawn for the plastic cover.
This means you will need to remove all twigs, plants with thorns, or other material that could puncture the plastic.
Mow the lawn short and leave the grass clippings on the lawn.
Mark any sprinkler heads in the area to be solarized, to avoid damaging them and for future conversion to drip irrigation.
Step two: Water the area well before you begin.
Wet soil conducts heat best and makes weeds more susceptible to the heat. Your lawn should be soaked twelve inches deep.
Step three: Dig trenches at the edge of the lawn.
These trenches will use the soil, sand or rocks to seal the plastic layer over the lawn.
Dig trenches at the edge of the lawn six inches deep and three inches wide.
These trenches will use the soil, sand or rocks to seal the plastic layer over the lawn.
Step four: Lay out the plastic with one edge in the trench.
Pull it so it covers the entire area. Cover the plastic in the trench with soil, sand or rocks to hold it down. If the plastic does not cover the entire lawn and more than one sheet is needed, allow a six-inch overlap for any seam.
Seams and edges of the plastic are spaces where air might enter and the area may not get hot enough to kill the grass. Monitor these spots in the future for plant re-growth. If you see any, remove them quickly. Be vigilant and watch for Bermuda grass or other persistent weed sprouts for up to two years. It is easier to get rid of weeds when they are small.
SOLARIZATION : STEP 5
MAINTAINANCE

Step five: Maintenance.
Once the plastic cover is in place, limit people or pets from walking on it to prevent tears. If you find tears, use clear packing tape or duct tape to patch small holes. In order to maintain the seal on the edges, add sand, soil or rocks in the trenches or on seams as needed.
Step six: Once the lawn is dead, remove the plastic.
Try not to disturb the newly exposed soil to avoid raising viable seeds and underground stems and roots from below the solarized layer.
Next up is planting. The best time to plant is fall. In the fall the soil is still warm, but the days are cool so plant roots grow rapidly.