Hydroponics in the Garden?

by Rick Abrahamson, February 7, 2005

This week I have decided to share an article written by one of my colleges. The following article entitled *No Stoop Gardening* is brought to you complements of Jim Stordahl, former educator in Clay County and currently in Clearwater and Polk counties. I found this article interesting in that the idea of growing vegetables this way is similar to growing using hydroponics. This method uses no soil and all plant nutrients must be supplied as very little will be available from the growing media.

If you think that planting vegetables is too much work then you might want to consider growing vegetables in hay bales. Jim Stephens, a Vegetable Crop Specialist at the University of Florida came up with the idea of growing vegetables in hay bales and it really works. Although this concept is developed in an environment very different than ours, I think it would work well here. Hay bales provide a well-aerated, disease free growing medium that is perfect for growing vegetables. Plus, hay bales are elevated off the ground which makes them perfect for disabled gardeners or gardeners who have trouble bending down.

Straw, mixed grass or alfalfa hay bales will both work just fine for growing vegetables. However, older hay bales that have begun to rot tend to work best for this type of gardening.

In order for hay bales to be productive they will need special treatment beginning about ten days before planting time. First, keep the bales very wet for 3 days. Then apply 5 ounces (10 tablespoons) of ammonium nitrate fertilizer, followed by a couple more days of watering. On the seventh day, apply 2 ½ ounces (5 tablespoons) of ammonium nitrate, followed by watering for another 2 days. On the tenth day, apply 12 ounces (1 cup) of 13-13-13 (N-P-K) fertilizer and lightly water the fertilizer into the hay bale. On the eleventh day, apply a three inch layer of top soil or potting mix to serve as a bed for the plants or seed. Then, simply plant your vegetables, keep them watered and watch them grow. For tomatoes, just pull open the bales and bury the tomatoes up to the first set of leaves. Vegetables like tomatoes, peppers, squash, cucumbers and melons will all grow well using this technique.

Another option to adding inorganic fertilizer would be to spread composed manure on a straw windrow before baling to make your own "compost bales" for gardening. Once they are baled, just add water and plant!





I hope you enjoyed Jim’s thoughts on growing vegetables in hay bales.