

## Vital Earth



On 29<sup>th</sup> June the East Midlands Growers Society met at Vital Earth in the evening (no busy yard traffic) and were greeted by Steve Harper and Dr Arnie Rainbow.



The company takes the green waste from 300,000 homes and deals with 99,000 tonnes of waste in a year and naturally re cycles it into peat free composts and fertilisers.



Firstly we were taken to the reception shed where loads of brown bin waste are checked and accepted or rejected. The waste is lifted onto a conveyor and passes through a cabin where undesirable items, such as glass and plastics, are removed manually into a skip below. The conveyor then passes under magnets which remove ferrous items and the



waste is then shredded.

The waste is then loaded into specially designed large steel containers which are hooked up to electric fans to aerate it and a biofilter to remove odours.

Probes are inserted into the containers to check temperature (the material naturally heats up to 70C) which is monitored and controlled by a computer programme.

It is the spell at 70C which ensures all pathog



ens are killed and any weed seeds are killed off. The vessel is then emptied and the process repeated to ensure no cold spots are missed. Some containers take longer than others to break down, it is not necessarily the earliest vessel that is ready first.



The next stage has the containers emptied into windrows in the maturation shed. They are never turned



but the former waste is thoroughly aerated by powerful fans allowing friendly bacteria to develop as the compost matures and cools for 6-8 weeks. The atmosphere in the shed is warm, damp, and dusty.

The composted material is then passed along a long rotating drum with increasing mesh sizes. Plastics and other non-compostable wastes spill out of the far end. The compost, with various natural additives is made into several types of peat-free compost, fine for seeds and coarse for grow bags. The whole process takes 2 months. The 'product of the day' during

our visit was 'Green Roof Medium' which has compost mixed with virgin brick dust, this also has very good insulating properties.

Cardboard is not ideal for composting, as it requires more water than the other ingredients, and is valuable enough to be recycled separately.

Usually, the business runs a 12 hour day six days a week but in busy periods a 24 hr system is worked to keep pace with demand for the company's popular products.

Finally we inspected a selection of plants (some difficult) happily growing in media based on the compost but blended with composted bark and an organic nitrogen source.

Everyone found this evening most informative and enlightening regarding production of a very useful end product.

