CALU press release – 30 April 2008

Hydroponic Horticulture

By Kerrin Buckler - CALU

The land area available for food production is being squeezed. At the same time the population of the world and the number of mouths needing feeding is increasing. Couple this paradox with rising concerns about water security and fossil fuels and it is clear food production needs some new ideas.

Hydroponic production isn't really a new idea, it dates back to at least the 17th century. However, it is one that has never really taken off in the UK. Hydroponics is defined as the growth of plants with their roots in a mineral nutrient solution, rather than soil.

It may seem ironic that a water based system is actually more water efficient than an ordinary soil based system. But that is in fact the case. Hydroponic systems use only around 10% of the water an equivalent soil based system would.

Another advantage that a hydroponic system has is that it can utilise space very efficiently. Because plants do not need to be grown in the soil, multiple tiers of plants can be grown making use of vertical space. This also makes hydroponic systems ideal for urban situations, where space is limited. Local food production in an urban environment can be difficult to achieve. Space saving hydrponic systems may be one tool for local urban food production.

These are some of the facts that visitors to CALU's hydroponic workshop learned on Tuesday 28th April. The workshop was hosted by Philip and Rowena Mansfield who run the company Herbs from Wales, but are also pioneers of hydroponic (and aquaponic) systems in north Wales.

A range of different systems were shown including traditional Nutrient Film Technology (NFT), floating beds, aeroponics and a small aquaponic system.

Notes for editors:

CALU (the Centre for Alternative Land Use) is a partnership between Bangor University, ADAS, the Welsh College of Horticulture, Coed Cymru and Coleg Llysfasi. It is the Development Centre for Land Use in Wales.

Aquaponics – the integration of aquaculture (fish production) and hydroponics

Aeroponics – growing plants in a nutrient enriched mist without soil

www.calu.bangor.ac.uk

www.herbsfromwales.co.uk

For more information please contact Felizitas Rupp – 01248 680450 or e-mail calu@bangor.ac.uk