



Bruising risk assessment advice sheet - 8

Irrigation

Crops suffering from water-stress are more likely to be susceptible to bruising, therefore, availability of irrigation can help minimise bruising.

The level of soil moisture can influence nutrient uptake by crops, with crops on dry soils often having poor nutrient uptake. As discussed in advice sheet No. 7, levels of N & K can affect bruising susceptibility.

Dry soil conditions both at burning off and harvest are associated with bruising. Availability of irrigation will allow the soil moisture to be managed at these critical times.

Soil moisture should be monitored carefully. Saturated soils through either over irrigation or rainfall during harvest can lead to soft rotting, disease development, delayed skin set and tubers being more susceptible to shatter bruising.

Effect of irrigation - cv Cara

| | Bruising % |
|------------------------------|------------|
| Dry (no irrigation) | 82 |
| Scheduled irrigation (CUFIS) | 36 |
| Frequent irrigation | 36 |

Source: *Improving quality by minimising damage*, Hole 1999.

ACTION

- Where irrigation is not available, consider site selection carefully and choose moisture retentive soils
- Think carefully about positioning and planting of irrigation runs
- Crops are more prone to bruising in irrigation runs so consider segregating the harvested crop from these areas

For a report on BPC funded project 'Improving quality by minimising damage', telephone BPC publications on 01865 782222.

Potatoes are more likely to bruise.....

.....when grown under dry conditions.

Potatoes are less likely to bruise.....

.....when scheduled irrigation is available.

