



Honey

- Seasonal variations
- Composition
- Harvesting
- Treatment
- Storage/Selling/distributing

good honey production

- depends on

good forage

good weather

good bees

Forage variations

- Forage depends on
 - Soil
 - Season
 - Source
-and weather!

Honey

- Conversion of nectar comprising:
 complex sugars high in moisture
- to honey
 High in simple sugars
 low in moisture
 & containing antibacterial hydrogen peroxide
 Perfect for long-term storage

Nectar collected

Sucrose, fructose, glucose

Regurgitate with saliva enzymes

invertase

Glucose oxidase

Converts all

Converts some

sucrose

into

glucose

Fructose

Gluconic acid

Hydrogen peroxide

Honey produced

Honey

- Bees collect honey for themselves
- The beekeeper only takes the surplus

Harvesting

First super for the bees

Not always honey for the beekeeper

Harvest time

Depends on nectar source

- Rape in your supers? Early harvest essential

But Beware the 'June gap' after spring tree flows

July traditionally 'Harvest time',

Early August – 'treatment time'

Bees start winter preparations in August

- Near or going to Heather? Later harvest, later treatments

Ivy - a late-season nectar source for bees

Harvesting & Treatment

- comb honey
- Spun honey
- Pressed honey



Harvesting & Treatment

Scraped comb – simplest, least equipment
wax & honey scraped from foundation, bottled
or
scrapings strained through sieve, honey bottled

Cut comb honey – using thin unwired foundation
comb cut from frames, placed in cut-comb pots

Harvesting & Treatment

Spun Honey

- uncap
- Spin
- Stand
- Strain
- Contain

All equipment used **must** be food grade

Harvesting & Treatment

Pressed honey – Heather honey is the only liquid honey which doesn't flow (thixotropic) so can't be spun.

Scrape from foundation and either:

Place in muslin/ linen scrim bag, hang from hook over basin and squeeze. Bottle

or

Use Heather Press (or fruit press), place in linen scrim, press, bottle.

How to store

- airtight
- Cool – below 13c
- dark
- dry

granulation

- Honey -Super saturated solution
- Granulation – optimum 13c-15c
- Fructose more soluble than glucose
- High glucose - faster granulation
- Granulation initiated by –
pollen, wax, air bubbles, dust

fermentation

- Moisture content critical -17-19%
- Presence of osmophilic yeasts from wild yeasts in flowers
- Granulation raises moisture level
- Store cool and dark, below 13c

Temperature effect on honey

Heating and high-temperature storage:

- Destroys essential trace elements, aromatics natural yeasts & bacteria –
- Affects taste and benefits of natural honey

Selling / distribution

- Pot
- Seal
- Label

- Food product
- comply with health & hygiene regulations
- comply with Trading standards labelling regulations

Wax

DON'T WASTE IT!

- 750g wax required to make comb to hold 15kg honey – a full National super
- 5kg honey required to make 750g wax
- 20kg nectar required to make 750g wax