**WORKER POLICING**

The honey bee colony is a model of co-operation but there is still potential for conflict within the bee society.

**WORKER’S EGGS**

Worker bees, for example, have ovaries and can lay unfertilised, male eggs. However, if a worker bee lays an egg another worker bee normally eats this egg. This is known as “worker policing”.

Worker bees are able to discriminate between queen-laid and worker-laid eggs, because the queen marks her eggs with a special pheromone.

Research at LASI (Laboratory of Apiculture and Social Insects) at Sheffield University, has shown that worker bees rarely kill queen-laid eggs. In a few queenright bee colonies workers do lay a lot of eggs. (Eggs and drone brood can occasionally be seen above the queen excluder in a queenright hive - if you see this in one of your hives, please contact LASl so that we can study it.)

**ANARCHISTIC COLONIES**

These colonies are known as “anarchistic” because they lack the normal order in which the queen is

the only reproducing bee. Research at LASI, in collaboration with the NERC-funded Sheffield Molecular Genetics Facility, is studying the genetics of the bees that lay eggs in anarchistic

hives, including one hive donated by a beekeeper from Widnes in Lancashire. Research at LASI is

also investigating how it is that the eggs laid by anarchistic workers are not killed.

**ACCEPTABLE EGGS**

Anarchistic workers lay acceptable eggs - if their eggs are transferred to a normal beehive they

are still not eaten. This suggests that anarchistic workers lay eggs that mimic those laid by the

queen, probably by producing the same egg-marking pheromone.