

- Sometimes pick scabs and drink the blood
- Grazers could be unharmed by the insects the Oxpeckers eat

Mutualism benefits both species

- Coevolution: flowering plants and insects
 - *Ants and acacias
 - Acacias provide hollow thorns and food
 - Ants provide protection from herbivores

Not all ant and acacia relationships are mutualism

- In Kenya several species of ants live on acacias
 - *One species clips the acacia branches to prevent other ants from living in the tree
 - *Clipping branches sterilizes the tree
 - *A parasitic relationship

Parasitism benefits one species at the expense of another

- External parasites
 - *Ectoparasites: feed on the exterior surface of an organism
 - *Parasitoids: insects that lay eggs on living hosts
 - Wasps, whose larvae feed on the body of the host, killing it

External parasite: the yellow vines are the flowering plant dodder; it is a parasite that obtains

Internal parasites

- Endoparasites live inside the host
- Extreme specialization by the parasite as to which host it invades
- Structure of the parasites might be simplified but