



Small hive beetle (*Aethina tumida*) and predators (*Vespididae*)

Wolfgang Ritter

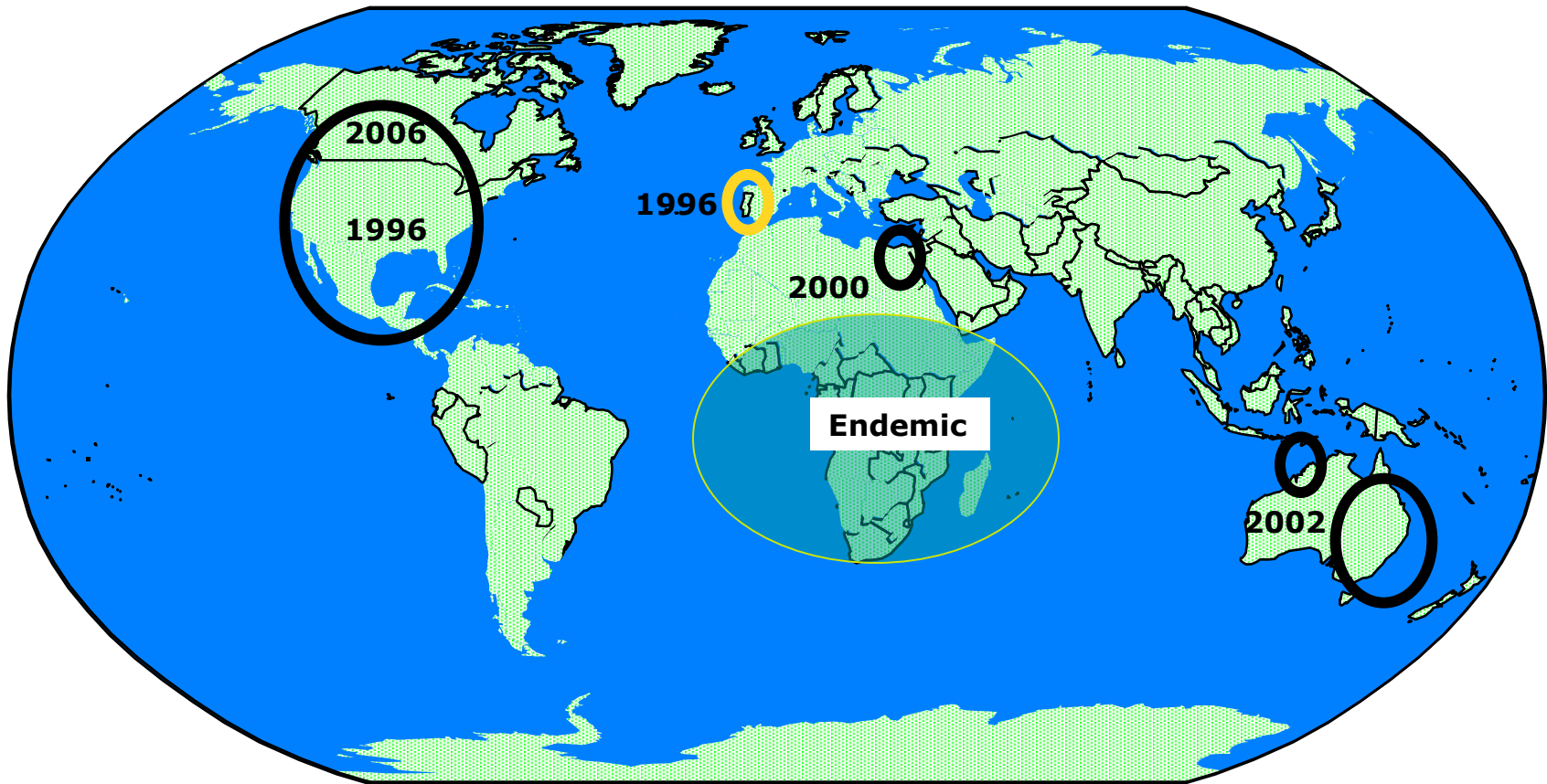
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Distribution of SHB



Distribution of *SHB*

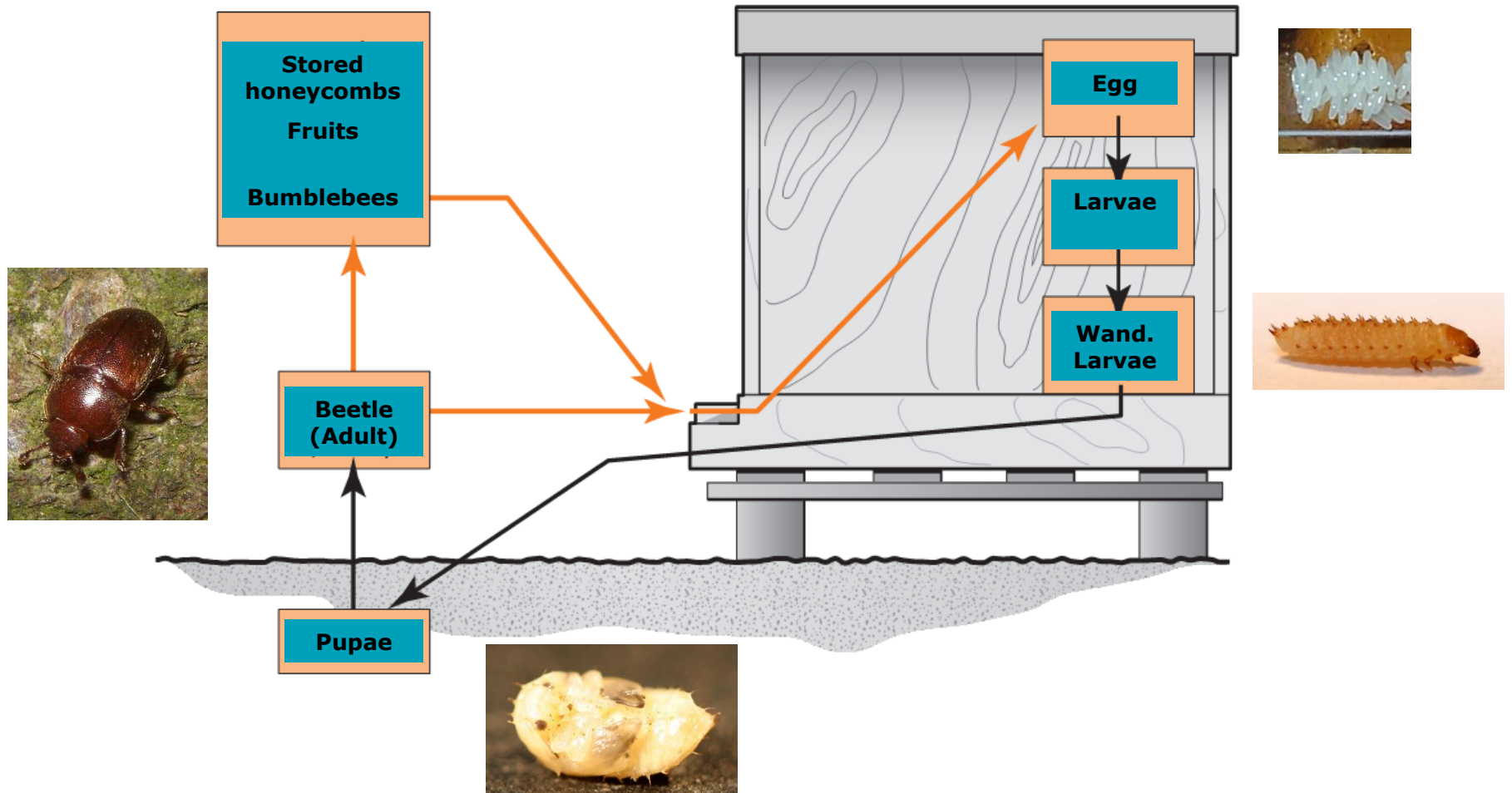


Biology of SHB



SHB in Sub-Saharan Africa





Egg



Larvae



**Wand.
Larvae**

Pupae



**Beetle
Adult**



Number of generations:
about 4 in mediteranean
climate
about 1-2 temperate climate

Temp.
>10°C

**14d to
3 months**

Diagnosis of SHB



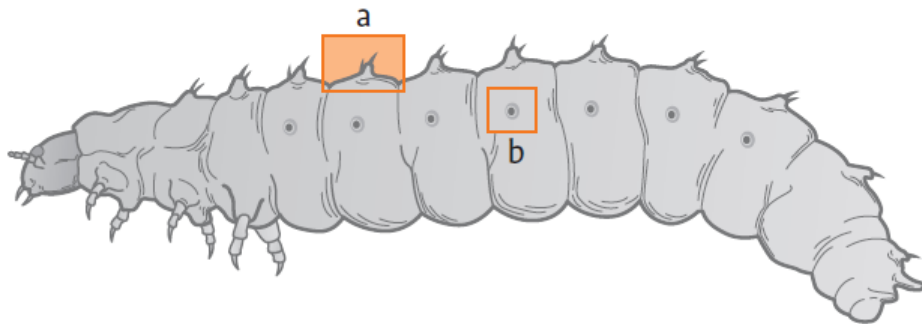


Larvae of Small hive beetle
(*Aethina tumida*)

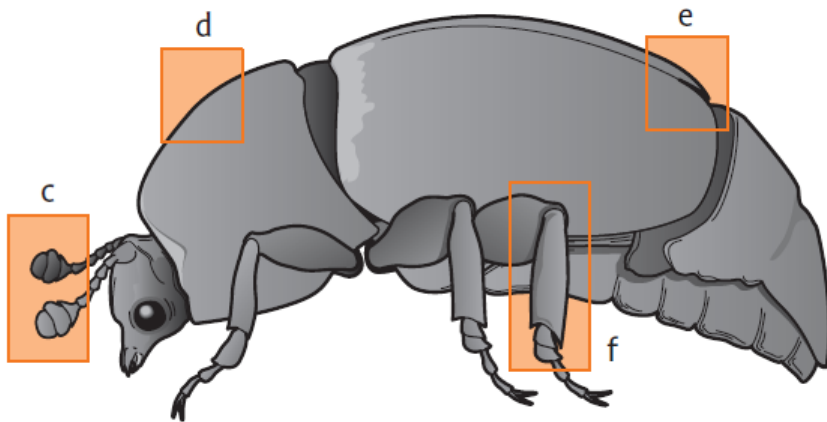


Waxmoth
(*Galleria mellonella*)





a dorsal bristle
b spiracle



c antenna
d shape of pronotum
e length of elytra
f shape of tibia

(O. Boeking)

Fam: Nitidulidae

Cychramus luteus



Aethina tumida



Diagnosis of SHB



Diagnosis with plastic strips



Diagnosis with plastic strips

$510 \times 75 \times 4.5$ [mm]



Diagnosis of SHB



Foto:
Michael Duncan

Diagnosis of SHB



Foto:
Michael Duncan

Diagnosis of SHB



Foto:
Michael Duncan

Diagnosis of SHB



Foto:
Michael Duncan

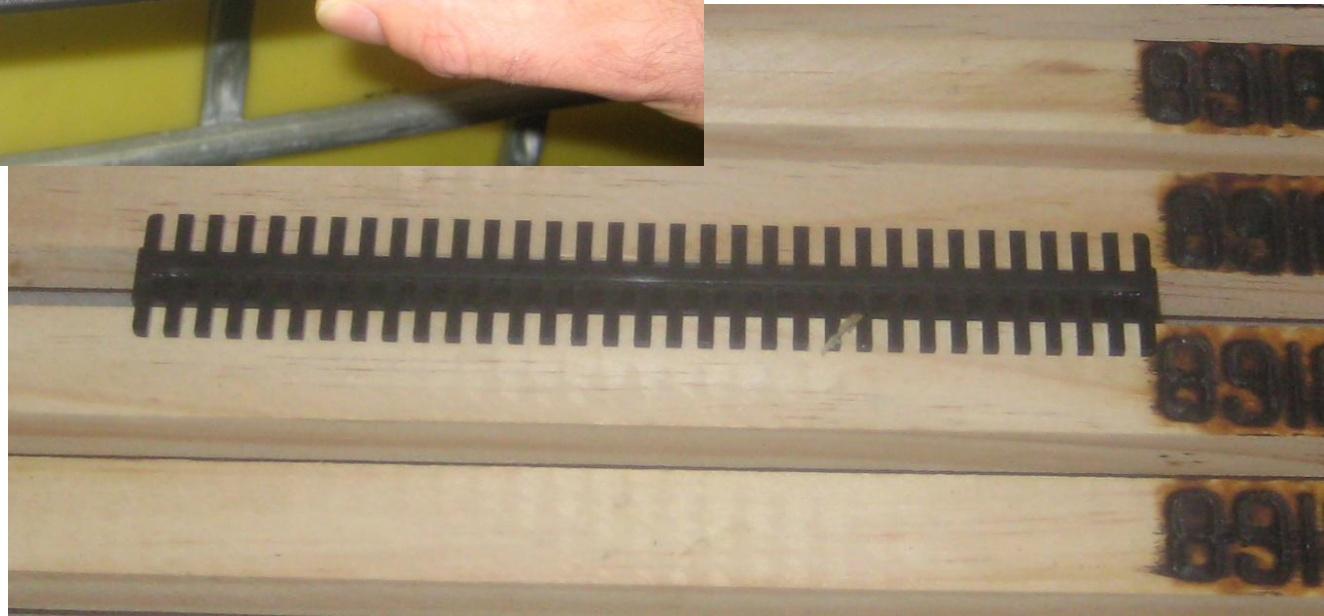
Control of SHB



Control of SHB



Control of SHB





Good Beekeeping Praxis

- **Cool storage of combs**
($<10^{\circ}\text{C}$)
- **Immediate honey processing after harvest**
(next day)
- **Strong colonies**
(control of diseases, queenright)

New distribution of *Vespa velutina*

