



# **Risk management for bee health**

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European  
Commission

# EU Animal Health Strategy 2007-2013 Honeybee Health 2010



A new **Animal Health Strategy**  
for the European Union (2007-2013) where  
“**Prevention is better than cure**”



Directorate-General for  
Health & Consumers

## Honeybee Health



Health and  
Consumers

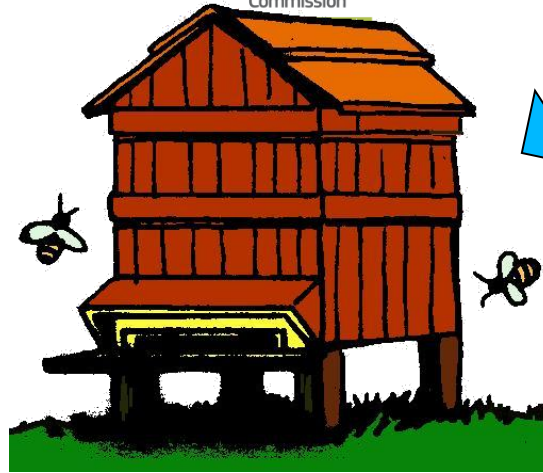
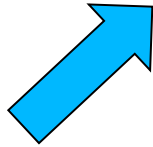
# Reasons and extent for losses:



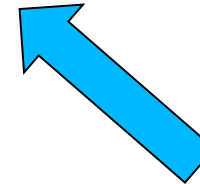
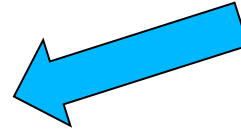
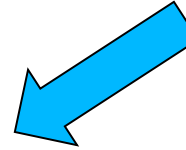
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# no clear picture

Seasons  
Genetics  
Physiology  
Behaviour



**CLIMATE**



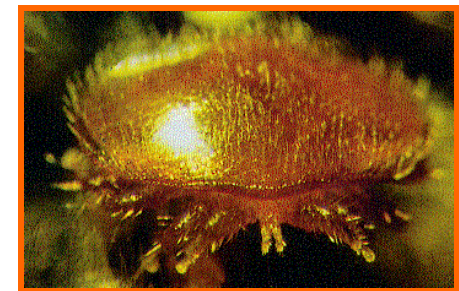
*Apiary management*



*Pesticides*



*Environment*



*Diseases*

Consumers

# Wide Commission inter-service group

## *DG SANCO*

- **Animal health: pathogens**
- **Pesticides**
- **Veterinary medicines**
- **Residues in honey**

## *DG Agriculture*

- **Honey production, apiculture programmes**
- **Environmental measures**

## *DG Environment*

- **Biodiversity**

## *DG Research*

- **Animal health**
- **Environmental**

## *Other DGs ...*

# Science and data sources

*European Food Safety Authority*

*European Reference Laboratory for bee health*

*Surveillance studies in 17 Member States*

*EU FP7 research projects*

- **BeeDoc, STEP etc.**
- **a new project on sustainable apiculture and natural resistance mechanisms to diseases: 2013**

*Any other source (COLOSS etc.)*

# Support for better risk management

## *Mandates to EFSA:*

- **animal health import rules: small hive beetle, Tropilaelaps**
- **Several pesticides issues**

## *EURL*

- **Annual meeting of national labs**
- **Coordination of the surveillance studies**

Electronic database

## *Bee health training for officials*

# Pathogens



## HYMENOPTERA *Vespa velutina* (Asian hornet)

**MITES**  
*Acarapis woodi* (Acariosis)  
*Varroa destructor*  
(Varroasis)  
*Tropilaelaps clareae*

**FUNGI**  
*Nosema apis* (Nosemosis)  
*Nosema ceranae* (Nosemosis)  
*Ascospaera apis* (Chalkbrood)  
*Aspergillus flavus* (Stonebrood)

**COLEOPTERA**  
*Aethina tumida*  
(Small hive beetle)

**DIPTERA**  
*Braula caeca* (Bee louse)

**VIRUSES**  
ABPV (Acute bee paralysis virus)  
BQCV (Black queen cell virus)  
CBPV (Chronic bee paralysis virus)  
DWV (Deformed wing virus)  
IAPV (Israeli acute paralysis virus)  
KBV (Kashmir bee virus)  
SBV (Sacbrood virus)  
SBPV (Slow bee paralysis virus)  
CWV (Cloudy wing virus)  
BVX (Virus X)  
BVY (Virus Y)  
FV (Filamentous virus)

**PROTOZOA**  
*Malpighamoeba mellifica*  
(Amibiasis)

**LEPIDOPTERA**  
*Galleria mellonella*  
*Achroea grisella*

**BACTERIA**  
*Paenibacillus larvae* (American Foulbrood)  
*Melissococcus plutonius* (European Foulbrood)  
*Paenibacillus alvei* Associative Agents  
*Enterococcus faecalis*  
*Achromobacter eurydice*  
*Brevibacillus laterosporus*  
*Pseudomonas apiseptica* (Septicemia)  
*Spiroplasma apis* (Spiroplasmosis)  
*Spiroplasma melliferum* (Spiroplasmosis)

# Difficulties for bee pathogen data collection

*EFSA in 2009*

*2 surveys by EURL in 2011-2012*

- **25 Member States, Norway, Kosovo**

*Beekeeping industry is poorly documented*

*High heterogeneity:*

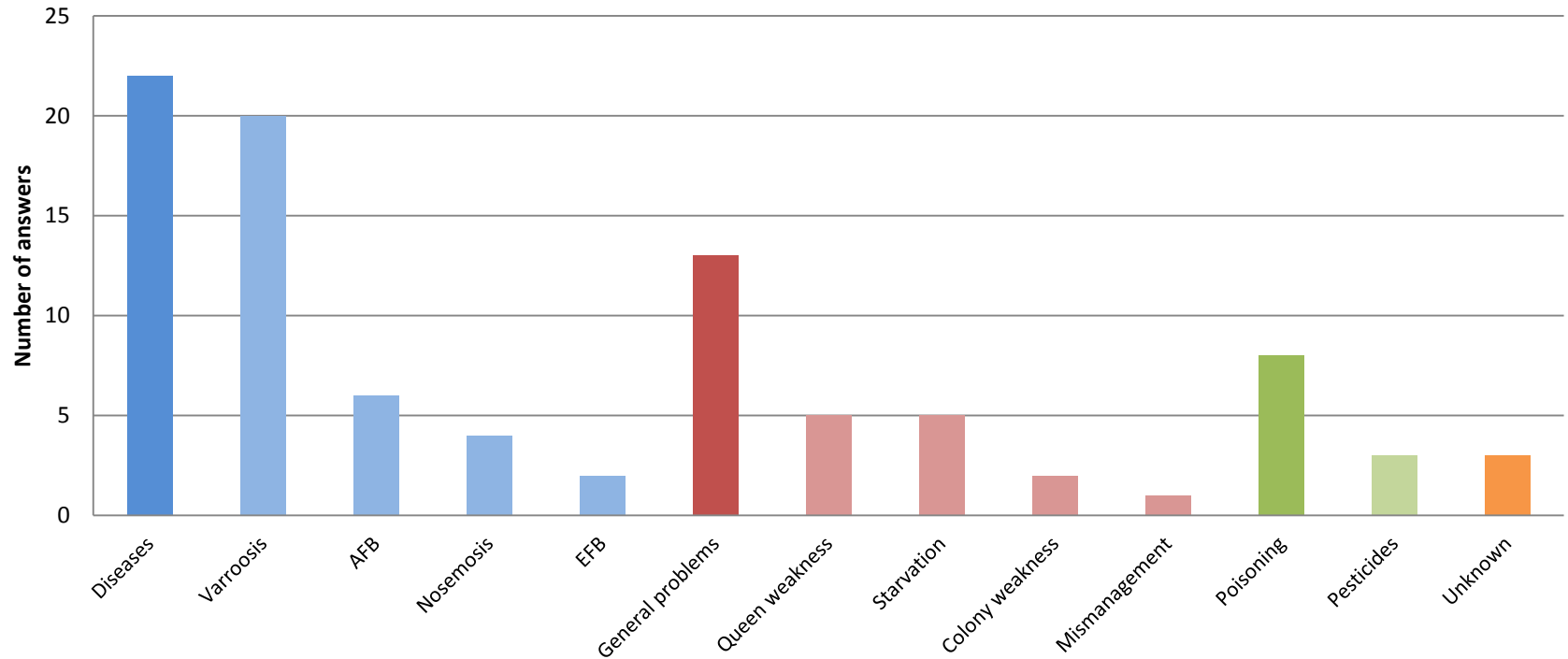
- **Comparability**
- **Between countries**
- **Between data from same country**

*High proportion of non-professionals*



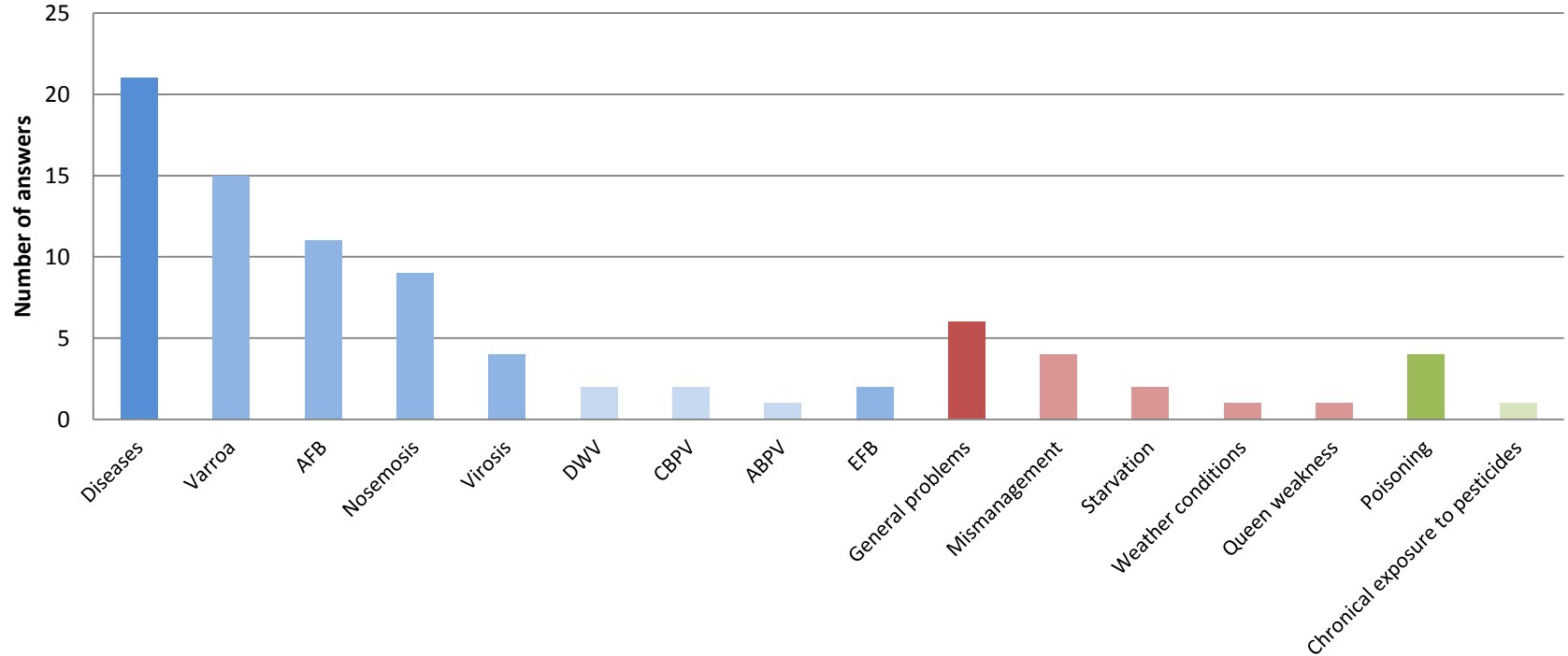
# Main causes of colony mortality reported by the beekeepers

Source: EURL



# Main causes of colony mortality reported by the laboratories

Source: EURL



# Pesticides, neonicotinoids

*New framework regulation since 2009*

*New implementing rules*

*Risk mitigation for specific substances since 2010*

*New risk assessment for bees*

*Improved data requirements*

*New guidance document*

*Several EFSA mandates on substances*

*Further regulatory measures under discussion*

# Key role for beekeepers:

*Good apiculture practices*

*Responsible use of medicines*

*Coordinated and effective Varroa control*

*Improved cooperation with:*

- **authorities (veterinary, plant protection, environmental etc.)**
- **plant protection beneficiaries (crop producers, horticulturalist, landowners etc.)**
- **pollination beneficiaries**

*Better awareness and specific training*

# Conclusions

*An EU framework is in place*

*Many of its elements can be fine-tuned*

*SANCO is protecting bee health*

*Always based on science and data*

*Constant monitoring, update*

*Possible measures on neonicotinoids under discussion*

*Proportionality and subsidiarity*

*No easy and/or quick risk management solutions*