

Concurrentie en competitie tussen bijen

#### 4. Ziekteverwekkers worden overgedragen, maar de betekenis daarvan is niet duidelijk

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##### Literatuur

1. Aubert, M., Ball, B., Fries, I., Moritz, R., Milani, N. en Bernardinelli, I., 2008. Virology and the honey bee. European Commission, pp, 458, ISBN 92-79-00586-3.
2. Bailes, E.J., Deutsch, K.R., Bagi, J., Rondissone, L., Brown, M.J.F. en Lewis, O.T., 2018. First detection of bee viruses in hoverfly (syrphid) pollinators. *Biology Letters* 14:20180001.
3. Chen, Y.P. en Siede, R., 2007. Honey bee viruses. *Advances in Virus Research* 70:33-80.
4. de Souza, F.S., Kevill, J.L., Correia-Oliveira, M.E., de Carvalho, C.A.L. en Martin, S.J., 2019. Occurrence of deformed wing virus variants in the stingless bee *Melipona subnitida* and honey bee *Apis mellifera* populations in Brazil. *Journal of General Virology* 2019 ? DOI 10.1099/jgv.0.001206.
5. de Sousa Pereira, K., Meeus, I. en Smagghe, G., 2019. Honey bee-collected pollen is a potential source of *Ascospaera apis* infection in managed bumble bees. *Scientific Reports* 9:4241.
6. Evison, S.E.F., Roberts, K.E., Laurenson, L., Pietravalle, S., Hui, J., Biesmeijer, J.C., Smith, J.E., Budge, G. en Hughes, W.O.H., 2012. Pervasiveness of parasites in pollinators. *PLoS ONE* 7(1):e30641.
7. Forzan, M., Sagona, S., Mazzei, M. en Felicioli, A., 2017. Detection of deformed wing virus in *Vespa crabro*. *Bulletin of Insectology* 70(2):261-265.
8. Fürst, M.A., McMahon, D.P., Osborne, J.L., Paxton, R.J. en Brown, M.J.F., 2014. Disease associations between honeybees and bumblebees as a threat to wild pollinators. *Nature* 506:364-366.
9. Gamboa, V., Ravoet, J., Brunain, M., Smagghe, G., Meeus, I., Figueroa, J., Riaño, D. en de Graaf, D.C., 2015. Bee pathogens found in *Bombus atratus* from Colombia: A case study. *Journal of Invertebrate Pathology* 129:36-39.
10. Genersch, E., 2008. Viren im Bienenvolk. *Deutsches Bienen-Journal* 16(2):52-53.
11. Grozinger, C.M. en Flenniken, M.L., 2019. Bee viruses: ecology, pathogenicity, and impacts. *Annual Review of Entomology* 64:205-226;2019
12. Gisder, S. en Genersch, E., 2017. Viruses of commercialized insect pollinators. *Journal of Invertebrate Pathology* 147:51-59.
13. Loope, K.J., Baty, J.W., Lester, P.J. en Wilson Rankin, E.E., 2019. Pathogen shifts in a honeybee predator following the arrival of the Varroa mite. *Proceedings of the Royal Society B* 286:20182499.
14. Mallinger, R.E., Gaines-Day, H.R. en Gratton, C., 2017. Do managed bees have negative effects on wild bees?: A systematic review of the literature. *PLoS ONE* 12(12):e0189268.
15. Manley, R., Boots, M. en Wilfert, L., 2015. Emerging viral disease risk to pollinating insects: ecological, evolutionary and anthropogenic factors. *Journal of Applied Ecology* 52:331-340.
16. Martin, S.J. en Brettell, L.E., 2019. Deformed wing virus in honeybees and other insects. *Annual Review of Virology* 6:12.1-12.21.
17. Melathopoulou, A., Ovinge, L., Wolf Veigac, P., Castillo, C., Ostermann, D. en Hoover, S., 2017. Viruses of managed alfalfa leafcutting bees (*Megachille rotundata* Fabricus) and honey bees (*Apis mellifera* L.) in Western Canada: Incidence, impacts, and prospects of cross-species viral transmission. *Journal of Invertebrate Pathology* 146:24-30.
18. Murray, E.A., Burand, J., Trikoz, N., Schnabel, J., Grab, H. en Danforth, B.N., 2019. Viral transmission in honey bees and native bees, supported by a global black queen cell virus phylogeny. *Environmental Microbiology* doi:10.1111/1462-2920.14501

19. Otterstatter, M.C. en Thomson, J.D., 2008. Does pathogen spillover from commercially reared bumble bees threaten wild pollinators? PLoS ONE 3(7):e2771.
20. Parmentier, L., Smagghe, G., de Graaf, D.C. en Meeus, I., 2016. Varroa destructor Macula-like virus, Lake Sinai virus and other new RNA viruses in wild bumblebee hosts (*Bombus pascuorum*, *Bombus lapidarius* and *Bombus pratorum*). Journal of Invertebrate Pathology 134:6-11.
21. Radzeviciute, R., Theodorou, P., Husemann, M., Japoshvili, G., Kirkitadze, G., Zhusupbaeva, A. en Paxton, R.J., 2017. Replication of honey bee-associated RNA viruses across multiple bee species in apple orchards of Georgia, Germany and Kyrgyzstan. Journal of Invertebrate Pathology 146:14-23.
22. Ravoet, J., De Smet, L., Meeus, I., Smagghe, G., Wenseleers, T. en de Graaf, D.C., 2014. Widespread occurrence of honey bee pathogens in solitary bees. Journal of Invertebrate Pathology 122:55–58.
23. Remnant, E.J., Shi, M., Buchmann, G., Blacquièrre, T., Holmes, E.C., Beekman, M. en Ashed, A., 2017. A diverse range of novel RNA viruses in geographically distinct honey bee populations. Journal of Virology 91(16):e00158-17.
24. Sebastien, A., Lester, P.J., Hall, R.J., Wang, J., Moore, N.E. en Gruber, M.A.M., 2015. Invasive ants carry novel viruses in their new range and form reservoirs for a honeybee pathogen. Biology Letters 11: 20150610.
25. Singh, R., Levitt, A.L., Rajotte, E.G., Holmes, E.C., Ostiguy, N., vanEngelsdorp, O., Lipkin, W.I., dePamphilis, C.W., Toth, A.L. en Cox-Foster, D.L., 2010. RNA Viruses in Hymenopteran pollinators: evidence of inter-taxa virus transmission via pollen and potential impact on non-Apis Hymenopteran species. PLoS ONE 5( 12): e14357.
26. Ward, L., Waite, R., Boonhem, N., Fisher, T., Pescod, K., Thompson, H., Chantawannakul, P. en Brown, M., 2007. First detection of Kashmir bee virus in the UK using real-time PCR. Apidologie 38:181-190.