# Jacobus C De Roode

List of Publications by Year
in descending order



| 67 | 4,133 | 147801 | 123424 |
|---|---|---|---|
| papers | citations | 31 h-index | 61 g-index |

| 67 | 67 | 67 | 4225 |
|---|---|---|---|
| all docs | docs citations | times ranked | citing authors |

| # | Article | IF | Citations |
|---|---|---|---|
| 1 | Virulence and competitive ability in genetically diverse malaria infections. Proceedings of the National Academy of Sciences of the United States of America, 2005, 102, 7624-7628. | 7.1 | 353 |
| 2 | Why infectious disease research needs community ecology. Science, 2015, 349, 1259504. | 12.6 | 330 |
| 3 | The genetics of monarch butterfly migration and warning colouration. Nature, 2014, 514, 317-321. | 27.8 | 264 |
| 4 | Virulence-transmission trade-offs and population divergence in virulence in a naturally occurring butterfly parasite. Proceedings of the National Academy of Sciences of the United States of America, 2008, 105, 7489-7494. | 7.1 | 245 |
| 5 | Self-Medication in Animals. Science, 2013, 340, 150-151. | 12.6 | 217 |
| 6 | WITHIN-HOST COMPETITION IN GENETICALLY DIVERSE MALARIA INFECTIONS: PARASITE VIRULENCE AND COMPETITIVE SUCCESS. Evolution; International Journal of Organic Evolution, 2006, 60, 1358-1371. | 2.3 | 209 |
| 7 | Behavioral Immunity in Insects. Insects, 2012, 3, 789-820. | 2.2 | 160 |
| 8 | Non-immunological defense in an evolutionary framework. Trends in Ecology and Evolution, 2011, 26, 242-248. | 8.7 | 152 |
| 9 | Monarch butterfly migration and parasite transmission in eastern North America. Ecology, 2011, 92, 342-351. | 3.2 | 146 |
| 10 | Evidence for transâ€generational medication in nature. Ecology Letters, 2010, 13, 1485-1493. | 6.4 | 113 |
| 11 | Host plant species affects virulence in monarch butterfly parasites. Journal of Animal Ecology, 2008, 77, 120-126. | 2.8 | 109 |
| 12 | FOOD PLANT DERIVED DISEASE TOLERANCE AND RESISTANCE IN A NATURAL BUTTERFLY-PLANT-PARASITE INTERACTIONS. Evolution; International Journal of Organic Evolution, 2012, 66, 3367-3376. | 2.3 | 109 |
| 13 | Ecological immunology and tolerance in plants and animals. Functional Ecology, 2011, 25, 18-28. | 3.6 | 94 |
| 14 | Demystifying Monarch Butterfly Migration. Current Biology, 2018, 28, R1009-R1022. | 3.9 | 92 |
| 15 | Lack of genetic differentiation between monarch butterflies with divergent migration destinations. Molecular Ecology, 2012, 21, 3433-3444. | 3.9 | 85 |
| 16 | HOST-PARASITE GENETIC INTERACTIONS AND VIRULENCE-TRANSMISSION RELATIONSHIPS IN NATURAL POPULATIONS OF MONARCH BUTTERFLIES. Evolution; International Journal of Organic Evolution, 2010, 64, 502-514. | 2.3 | 84 |
| 17 | Do Healthy Monarchs Migrate Farther? Tracking Natal Origins of Parasitized vs. Uninfected Monarch Butterflies Overwintering in Mexico. PLoS ONE, 2015, 10, e0141371. | 2.5 | 80 |
| 18 | Arbuscular mycorrhizal fungi affect plant tolerance andÂchemical defences to herbivory through different mechanisms. Journal of Ecology, 2016, 104, 561-571. | 4.0 | 75 |

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|---|---|---|---|
| 19 | Serial founder effects and genetic differentiation during worldwide range expansion of monarch butterflies. Proceedings of the Royal Society B: Biological Sciences, 2014, 281, 20142230. | 2.6 | 73 |
| 20 | Ecological and evolutionary approaches to managing honeybee disease. Nature Ecology and Evolution, 2017, 1, 1250-1262. | 7.8 | 73 |
| 21 | Strength in numbers: high parasite burdens increase transmission of a protozoan parasite of monarch butterflies (Danaus plexippus). Oecologia, 2009, 161, 67-75. | 2.0 | 70 |
| 22 | Genetic variation in resistance, but not tolerance, to a protozoan parasite in the monarch butterfly. Proceedings of the Royal Society B: Biological Sciences, 2011, 278, 751-759. | 2.6 | 68 |
| 23 | Behavioural resistance against a protozoan parasite in the monarch butterfly. Journal of Animal Ecology, 2012, 81, 70-79. | 2.8 | 59 |
| 24 | Aphids indirectly increase virulence and transmission potential of a monarch butterfly parasite by reducing defensive chemistry of a shared food plant. Ecology Letters, 2011, 14, 453-461. | 6.4 | 53 |
| 25 | Secondary Defense Chemicals in Milkweed Reduce Parasite Infection in Monarch Butterflies, Danaus plexippus. Journal of Chemical Ecology, 2015, 41, 520-523. | 1.8 | 52 |
| 26 | Within-host competition can delay evolution of drug resistance in malaria. PLoS Biology, 2018, 16, e2005712. | 5.6 | 51 |
| 27 | Within-host competition and drug resistance in the human malaria parasite Plasmodium falciparum. Proceedings of the Royal Society B: Biological Sciences, 2016, 283, 20153038. | 2.6 | 50 |
| 28 | Dietâ€“microbiomeâ€“disease: Investigating dietâ€™s influence on infectious disease resistance through alteration of the gut microbiome. PLoS Pathogens, 2019, 15, e1007891. | 4.7 | 49 |
| 29 | Migratory monarchs that encounter resident monarchs show lifeâ€history differences and higher rates of parasite infection. Ecology Letters, 2018, 21, 1670-1680. | 6.4 | 48 |
| 30 | Transcriptomics of monarch butterflies (Danaus plexippus) reveals that toxic host plants alter expression of detoxification genes and downâ€regulate a small number of immune genes. Molecular Ecology, 2019, 28, 4845-4863. | 3.9 | 40 |
| 31 | Fitness costs of animal medication: antiparasitic plant chemicals reduce fitness of monarch butterfly hosts. Journal of Animal Ecology, 2016, 85, 1246-1254. | 2.8 | 36 |
| 32 | Genomic evidence for gene flow between monarchs with divergent migratory phenotypes and flight performance. Molecular Ecology, 2020, 29, 2567-2582. | 3.9 | 35 |
| 33 | Phoresy. Current Biology, 2017, 27, R578-R580. | 3.9 | 34 |
| 34 | Fine scale population genetic structure of Varroa destructor, an ectoparasitic mite of the honey bee (Apis mellifera). Apidologie, 2017, 48, 93-101. | 2.0 | 32 |
| 35 | Variation in Forewing Size Linked to Migratory Status in Monarch Butterflies. Animal Migration, 2016, 3, 27-34. | 1.0 | 29 |
| 36 | Reduced density and visually complex apiaries reduce parasite load and promote honey production and overwintering survival in honey bees. PLoS ONE, 2019, 14, e0216286. | 2.5 | 29 |

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|---|---|---|---|
| 37 | Self-medication in insects: when altered behaviors of infected insects are a defense instead of a parasite manipulation. Current Opinion in Insect Science, 2019, 33, 1-6. | 4.4 | 27 |
| 38 | Elevated atmospheric concentrations of carbon dioxide reduce monarch tolerance and increase parasite virulence by altering the medicinal properties of milkweeds. Ecology Letters, 2018, 21, 1353-1363. | 6.4 | 26 |
| 39 | Of poisons and parasitesâ€"the defensive role of tetrodotoxin against infections in newts. Journal of Animal Ecology, 2018, 87, 1192-1204. | 2.8 | 24 |
| 40 | Host heterogeneity mitigates virulence evolution. Biology Letters, 2020, 16, 20190744. | 2.3 | 23 |
| 41 | Disease ecology across soil boundaries: effects of below-ground fungi on above-ground hostâ€"parasite interactions. Proceedings of the Royal Society B: Biological Sciences, 2015, 282, 20151993. | 2.6 | 20 |
| 42 | Transâ€generational parasite protection associated with paternal diet. Journal of Animal Ecology, 2015, 84, 310-321. | 2.8 | 20 |
| 43 | Effects of the parasite, Ophryocystis elektroscirrha, on wing characteristics important for migration in the monarch butterfly. Animal Migration, 2018, 5, 84-93. | 1.0 | 15 |
| 44 | Phytochemical changes in milkweed induced by elevated CO<sub>2</sub> alter wing morphology but not toxin sequestration in monarch butterflies. Functional Ecology, 2019, 33, 411-421. | 3.6 | 15 |
| 45 | Ethanol confers differential protection against generalist and specialist parasitoids of Drosophila melanogaster. PLoS ONE, 2017, 12, e0180182. | 2.5 | 14 |
| 46 | Parasite dynamics in North American monarchs predicted by host density and seasonal migratory culling. Journal of Animal Ecology, 2022, 91, 780-793. | 2.8 | 14 |
| 47 | Occurrence and host specificity of a neogregarine protozoan in four milkweed butterfly hosts (Danaus spp.). Journal of Invertebrate Pathology, 2016, 140, 75-82. | 3.2 | 13 |
| 48 | Are eastern and western monarch butterflies distinct populations? A review of evidence for ecological, phenotypic, and genetic differentiation and implications for conservation. Conservation Science and Practice, 2021, 3, e432. | 2.0 | 13 |
| 49 | Host Diet Affects the Morphology of Monarch Butterfly Parasites. Journal of Parasitology, 2017, 103, 228-236. | 0.7 | 12 |
| 50 | Extreme Heterogeneity in Parasitism Despite Low Population Genetic Structure among Monarch Butterflies Inhabiting the Hawaiian Islands. PLoS ONE, 2014, 9, e100061. | 2.5 | 11 |
| 51 | The Effects of Milkweed Induced Defense on Parasite Resistance in Monarch Butterflies, Danaus plexippus. Journal of Chemical Ecology, 2018, 44, 1040-1044. | 1.8 | 11 |
| 52 | Comparative genetics of Na<sup>+</sup>/K<sup>+</sup>-ATPase in monarch butterfly populations with varying host plant toxicity. Biological Journal of the Linnean Society, 2016, 119, 194-200. | 1.6 | 10 |
| 53 | Inbreeding depression in monarch butterflies. Journal of Insect Conservation, 2016, 20, 477-483. | 1.4 | 9 |
| 54 | Assessing virulence of Varroa destructor mites from different honey bee management regimes. Apidologie, 2020, 51, 276-289. | 2.0 | 9 |

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| 55 | Persistent effects of management history on honeybee colony virus abundances. Journal of Invertebrate Pathology, 2021, 179, 107520. | 3.2 | 9 |
| 56 | Self-Medication: A Learning Process?â€"Response. Science, 2013, 340, 1042-1042. | 12.6 | 8 |
| 57 | Thermal tolerance and environmental persistence of a protozoan parasite in monarch butterflies. Journal of Invertebrate Pathology, 2021, 183, 107544. | 3.2 | 7 |
| 58 | GRAPHITE: A graphical environment for scalable in situ video tracking of moving insects. Methods in Ecology and Evolution, 2018, 9, 956-964. | 5.2 | 6 |
| 59 | Effects of cardenolides of milkweed plants on immunity of the monarch butterfly. Arthropod-Plant Interactions, 2021, 15, 249-252. | 1.1 | 4 |
| 60 | Population genomics reveals variable patterns of immune gene evolution in monarch butterflies (Danaus plexippus). Molecular Ecology, 2021, 30, 4381-4391. | 3.9 | 4 |
| 61 | Elevated atmospheric concentrations of CO<sub>2</sub> increase endogenous immune function in a specialist herbivore. Journal of Animal Ecology, 2021, 90, 628-640. | 2.8 | 3 |
| 62 | Crowding does not affect monarch butterfliesâ€™ resistance to a protozoan parasite. Ecology and Evolution, 2022, 12, e8791. | 1.9 | 2 |
| 63 | Flying on empty: Reduced mitochondrial function and flight capacity in food-deprived monarch butterflies. Journal of Experimental Biology, 0, , . | 1.7 | 2 |
| 64 | Constant Light and Frequent Schedule Changes Do Not Impact Resistance to Parasites in Monarch Butterflies. Journal of Biological Rhythms, 2021, 36, 286-296. | 2.6 | 1 |
| 65 | An experimental test of parasite adaptation to common versus rare host genotypes. Biology Letters, 2020, 16, 20200210. | 2.3 | 1 |
| 66 | Lack of inbreeding avoidance during mate selection in migratory monarch butterflies. Behavioural Processes, 2022, 198, 104630. | 1.1 | 1 |
| 67 | Experimental Infection with a Naturally Occurring Protozoan Parasite Reduces Monarch Butterfly (Danaus plexippus) Mating Success. Journal of Parasitology, 2022, 108, . | 0.7 | 1 |