

**Supplementary material.** References used in the bibliometric analysis.

- Acosta, R. & Morrone, J.J. (2005). A new species of *Hystrichopsylla* Taschenberg (Siphonaptera: Hystrichopsyllidae) from the Mexican transition zone. *Zootaxa*, 1027, 55–63. <https://doi.org/10.11646/zootaxa.1027.1.4>
- Aguilar-Tomasini, M.A., Martin, M.D. & Speed, J.D.M. (2021). Assessing spatial patterns of phylogenetic diversity of Mexican mammals for biodiversity conservation. *Global Ecology and Conservation*, 31, e01834. <https://doi.org/10.1016/j.gecco.2021.e01834>
- Alvarado, F., Escobar, F. & Montero-Muñoz, J. (2014). Diversity and biogeographical makeup of the dung beetle communities inhabiting two mountains in the Mexican Transition Zone. *Organisms Diversity & Evolution*, 14, 105–114. <https://doi.org/10.1007/s13127-013-0148-0>
- Álvarez, F., Villalobos, J.L., Armendariz, G. & Hernández, C. (2012). Biogeographic relationship of freshwater crabs and crayfish along the Mexican transition zone: reevaluating Rodríguez (1986) hypothesis. *Revista Mexicana de Biodiversidad*, 83, 1073–1083. <https://doi.org/10.7550/rmb.28230>
- Andrés Hernández, A.R., Morrone, J.J., Terrazas, T. & López-Mata, L. (2006). Análisis de trazos de las especies mexicanas de *Rhus* subgénero *Lobadium* (Angiospermae : Anacardiaceae). *Interciencia*, 31, 900–904.
- Anguiano-Constante, M.A., Dean, E., Starbuck, T., Rodríguez, A. & Munguía-Lino, G. (2021a). Diversity, species richness distribution and centers of endemism of *Lycianthes* (Capsiceae, Solanaceae) in Mexico. *Phytotaxa*, 514, 39–60. <https://doi.org/10.11646/phytotaxa.514.1.3>
- Anguiano-Constante, M.A., Zamora-Tavares, P., Ruíz-Sánchez, E., Dean, E., Rodríguez, A. & Munguía-Lino, G. (2021b). Population differentiation and phylogeography in *Lycianthes moziniana* (Solanaceae: Capsiceae), a perennial herb endemic to the Mexican Transition Zone. *Biological Journal of the Linnean Society*, 132, 359–373. <https://doi.org/10.1093/biolinnean/blaa198>
- Aragón-Parada, J., Carrillo-Reyes, P., Rodríguez, A. & Munguía-Lino, G. (2019) Diversidad y distribución geográfica del género *Sedum* (Crassulaceae) en la Sierra Madre del Sur, México. *Revista Mexicana de Biodiversidad*, 90, e902921. <https://doi.org/10.22201/ib.20078706e.2019.90.2921>
- Aragón-Parada, J., Rodríguez, A., Munguía-Lino, G., De-Nova, J.A., Salinas-Rodríguez, M.M. & Carrillo-Reyes, P. (2021). Endemic vascular plants of the Sierra Madre del Sur, Mexico. *Botanical Sciences*, 99, 643–660. <https://doi.org/10.17129/botsci.2682>
- Arriaga-Jiménez, A., Moctezuma, V., Rossini, M., Zunino, M. & Halffter, G. (2016). A new species of *Onthophagus* (Scarabaeoidea: Scarabaeinae) from the Mexican Transition Zone, with remarks on its relationships and distribution. *Zootaxa*, 4072, 135–143. <https://doi.org/10.11646/zootaxa.4072.1.7>

Arriaga-Jiménez, A., Rös, M. & Halffter, G. (2018). High variability of dung beetle diversity patterns at four mountains of the Trans-Mexican Volcanic Belt. *PeerJ*, 6, e4468. <https://doi.org/10.7717/peerj.4468>

Barragán, F., Moreno, C.E., Escobar, F., Bueno-Villegas, J. & Halffter, G. (2014). The impact of grazing on dung beetle diversity depends on both biogeographical and ecological context. *Journal of Biogeography*, 41, 1991–2002. <https://doi.org/10.1111/jbi.12351>

Barrios-Izás, M.A. & Morrone, J.J. (2021). Systematics and biogeography of the New World genus *Plumolepilus* (Coleoptera: Curculionidae). *Diversity*, 13, 596. <https://doi.org/10.3390/d13110596>

Berniker, L. & Weirauch, C. (2012). New World biogeography and the evolution of polychromatism: evidence from the bee assassin genus *Apiomerus* (Heteroptera: Reduviidae: Harpactorinae). *Systematic Entomology*, 37, 32–54. <https://doi.org/10.1111/j.1365-3113.2011.00600.x>

Beron, P. (2018). Some peculiarities of the distribution of Arachnida. *Zoogeography of Arachnida*, 94, 625–832. [https://doi.org/10.1007/978-3-319-74418-6\\_8](https://doi.org/10.1007/978-3-319-74418-6_8)

Blair, C., Bryson, R.W., Jr., García-Vázquez, U.O., Nieto-Montes De Oca, A., Lazcano, D., McCormack, J.E. & Klicka, J. (2022). Phylogenomics of alligator lizards elucidate diversification patterns across the Mexican Transition Zone and support the recognition of a new genus. *Biological Journal of the Linnean Society*, 135, 25–39. <https://doi.org/10.1093/biolinnean/blab139>

Blancas-Calva, E., Navarro-Sigüenza, A.G. & Morrone, J.J. (2010). Patrones biogeográficos de la avifauna de la Sierra Madre del Sur. *Revista Mexicana de Biodiversidad*, 81, 561–568.

Bryson, R.W., Jr., García-Vázquez, U.O. & Riddle, B.R. (2011). Phylogeography of Middle American gophersnakes: mixed responses to biogeographical barriers across the Mexican Transition Zone. *Journal of Biogeography*, 38, 1570–1584. <https://doi.org/10.1111/j.1365-2699.2011.02508.x>

Cabrero-Sanudo, F.J., Trotta-Moreu, N. & Martínez M., I. (2007). Phenology, reproductive cycles, and species composition of a dung beetle community (Coleoptera: Scarabaeoidea) from a high mountain pasture system on the Oriental Neovolcanic Axis (Veracruz, Mexico). *Proceedings of the Entomological Society of Washington*, 109, 813–828.

Calderón-Patrón, J.M., Goyenechea, I., Ortiz-Pulido, R., Castillo-Cerón, J., Manríquez, N., Ramírez-Bautista, A., Rojas-Martínez, A.E., Sánchez-Rojas, G., Zuria, I. & Moreno, C.E. (2016). Beta diversity in a highly heterogeneous area: Disentangling species and taxonomic dissimilarity for terrestrial vertebrates. *PLOS ONE*, 11, e0160438. <https://doi.org/10.1371/journal.pone.0160438>

Camacho-Sanabria, J.M., Juan Perez, J.I., Pineda Jaimes, N.B., Cadena Vargas, E.G., Bravo Pena, L.C. & Sanchez Lopez, M. (2015). Cambios de cobertura/uso del suelo en una porción de la Zona de Transición Mexicana de Montaña. *Maderas y Bosques*, 21, 93–112.

Campos-Soldini, M.P., García, M.S. & Safenraiter, M.E. (2015). Track analysis of the North, Central, and South American species of the *Epicauta maculata* Group (Coleoptera: Meloidae). *Neotropical Entomology*, 44, 309–318. <https://doi.org/10.1007/s13744-015-0287-4>

Canales, G.M. & Goyenechea, I. (2022). Amphibian areas of endemism: A conservation priority in the threatened Mexican cloud forest. *Vertebrate Zoology*, 72, 235–244. <https://doi.org/10.3897/vz.72.e73534>

Cano, E.B., Schuster, J.C. & Morrone, J.J. (2018). Phylogenetics of *Ogyges* Kaup and the biogeography of Nuclear Central America (Coleoptera, Passalidae). *ZooKeys*, 737, 81–111. <https://doi.org/10.3897/zookeys.737.20741>

Carrasco-Ortiz, M., Munguía-Lino, G., Castro-Castro, A., Vargas-Amado, G., Harker, M. & Rodríguez, A. (2019). Riqueza, distribución geográfica y estado de conservación del género *Dahlia* (Asteraceae) en México. *Acta Botánica Mexicana*, 126, e1354. <https://doi.org/10.21829/abm126.2019.1354>

Castro-Castro, A., Vargas-Amado, G., Castaneda-Nava, J.J., Harker, M., Munguía-Lino, G., Santacruz-Ruvalcaba, F. & Rodríguez, A. (2017). Chromosomal numbers for three species of *Cosmos* section *Discopoda* (Asteraceae, Coreopsidæ), with cytogeographic notes. *Acta Botánica Mexicana*, 118, 41–51. <https://doi.org/10.21829/abm118.2017.1199>

Coelho, L.A., Molineri, C., Dos Santos, D.A. & Fiua Ferreira, P.S. (2016). Biogeography and areas of endemism of *Preops* Reuter (Heteroptera: Miridae). *Revista de Biología Tropical*, 64, 17–31. <https://doi.org/10.15517/rbt.v64i1.18229>

Contreras-Medina, R., Luna Vega, I. & Morrone, J.J. (2007). Gymnosperms and cladistic biogeography of the Mexican Transition Zone. *Taxon*, 56, 905–915. <https://doi.org/10.2307/25065872>

Corona, A.M. & Morrone, J.J. (2005). Track analysis of the species of *Lampetis* (Sphingoptera) Casey, 1909 (Coleoptera: Buprestidae) in North America, Central America, and the West Indies. *Caribbean Journal of Science*, 41, 37–41.

Corona, A.M. & Morrone, J.J. (2007). Phylogenetic analysis of the subgenus *Lampetis* (Sphingoptera) (Coleoptera: Buprestidae) of North and Central America, and the West Indies. *Journal of Natural History*, 41, 1035–1046. <https://doi.org/10.1080/00222930701403214>

Corona, A.M., Toledo, V.H. & Morrone, J.J. (2007). Does the Trans-mexican Volcanic Belt represent a natural biogeographical unit? An analysis of the distributional patterns of

Coleoptera. *Journal of Biogeography*, 34, 1008–1015. <https://doi.org/10.1111/j.1365-2699.2006.01666.x>

Corona, A.M., Toledo, V.H. & Morrone, J.J. (2009). Track analysis of the Mexican species of Buprestidae (Coleoptera): testing the complex nature of the Mexican Transition Zone. *Journal of Biogeography*, 36, 1730–1738. <https://doi.org/10.1111/j.1365-2699.2009.02126.x>

Corona-M, E. (2008). Zoogeographical affinities and the use of vertebrates in Xochicalco (Morelos, Mexico). *Quaternary International*, 180, 145–151. <https://doi.org/10.1016/j.quaint.2007.09.040>

Corral-Rosas, V. & Morrone, J.J. (2017). Analysing the assembly of cenocrons in the Mexican transition zone through a time-sliced cladistic biogeographic analysis. *Australian Systematic Botany*, 29, 489–501. <https://doi.org/10.1071/SB16048>

Coulleri, J.P. & Ferrucci, M.S. (2012). Biogeografía histórica de *Cardiospermum* y *Urvillea* (Sapindaceae) en América: Paralelismos geográficos e históricos con los bosques secos estacionales neotropicales. *Boletín de la Sociedad Argentina de Botánica*, 47, 103–117.

Cruz-Machuca, T.E. & Palacios-Aguilar, R. (2021). A new distributional record for the Martin del Campo's Arboreal Alligator Lizard (*Abronia martindelcampoi*) with comments on the biogeography of arboreal Alligator-lizards in the Sierra Madre del Sur, Mexico. *Neotropical Biodiversity*, 7, 503–506. <https://doi.org/10.1080/23766808.2021.2000301>

Dattilo, W., Vásquez-Bolaños, M., Ahuatzin, D.A., Antoniazzi, R., Chávez-González, E., Corro, E., Luna, P., Guevara, R., Villalobos, F., Madrigal-Chavero, R., Falcao, J.C. de F., Bonilla-Ramirez, A., Romero, A.R.G., de la Mora, A., Ramirez-Hernandez, A., Escalante-Jimenez, A.L., Martinez-Falcon, A.P., Villarreal, A.I., Sandoval, A.G.C., Aponte, B., Juarez-Juarez, B., Castillo-Guevara, C., Moreno, C.E., Albor, C., Martinez-Tlapa, D.L., Huber-Sannwald, E., Escobar, F., Montiel-Reyes, F.J., Varela-Hernandez, F., Castano-Meneses, G., Perez-Lachaud, G., Perez-Toledo, G.R., Alcala-Martinez, I., Rivera-Salinas, I.S., Chairez-Hernandez, I., Chamorro-Florescano, I.A., Hernandez-Flores, J., Toledo, J.M., Lachaud, J.-P., Reyes-Munoz, J.L., Valenzuela-Gonzalez, J.E., Horta-Vega, J.V., Cruz-Labana, J.D., Reynoso-Campos, J.J., Navarrete-Heredia, J.L., Rodriguez-Garza, J.A., Perez-Dominguez, J.F., Benitez-Malvido, J., Ennis, K.K., Saenz, L., Diaz-Montiel, L.A., Tarango-Arambula, L.A., Quiroz-Robedo, L.N., Rosas-Mejia, M., Villalvazo-Palacios, M., Gomez-Lazaga, M., Cuautle, M., Aguilar-Mendez, M.J., Baena, M.L., Madora-Astudillo, M., Rocha-Ortega, M., Pale, M., Garcia-Martinez, M.A., Soto-Cardenas, M.A., Correa-Ramirez, M.M., Janda, M., Rojas, P., Torres-Ricario, R., Jones, R.W., Coates, R., Gomez-Acevedo, S.L., Ugalde-Lezama, S., Philpott, S.M., Joaqui, T., Marques, T., Zamora-Gutierrez, V., Mandujano, V.M., Hajian-Forooshani, Z. & MacGregor-Fors, I. (2020). Mexico ants: incidence and abundance along the Nearctic-Neotropical interface. *Ecology*, 101, e02944. <https://doi.org/10.1002/ecy.2944>

Daza, J.M., Smith, E.N., Paez, V.P. & Parkinson, C.L. (2009). Complex evolution in the Neotropics: The origin and diversification of the widespread genus *Leptodeira* (Serpentes:

Colubridae). *Molecular Phylogenetics and Evolution*, 53, 653–667.  
<https://doi.org/10.1016/j.ympev.2009.07.022>

De Mendonca, L.H. & Ebach, M.C. (2020). A review of transition zones in biogeographical classification. *Biological Journal of the Linnean Society*, 131, 717–736.  
<https://doi.org/10.1093/biolinнейn/blaa120>

Escalante, T., Morrone, J.J. & Rodriguez-Tapia, G. (2013). Biogeographic regions of North American mammals based on endemism. *Biological Journal of the Linnean Society*, 110, 485–499. <https://doi.org/10.1111/bij.12142>

Escalante, T., Noguera-Urbano, E.A. & Corona, W. (2018). Track analysis of the Nearctic region: Identifying complex areas with mammals. *Journal of Zoological Systematics and Evolutionary Research*, 56, 466–477. <https://doi.org/10.1111/jzs.12211>

Escalante, T., Rodríguez, G., Cao, N., Ebach, M.C. & Morrone, J.J. (2007a). Cladistic biogeographic analysis suggests an early Caribbean diversification in Mexico. *Naturwissenschaften*, 94, 561–565. <https://doi.org/10.1007/s00114-007-0228-0>

Escalante, T., Rodríguez, G. & Morrone, J.J. (2004). The diversification of Nearctic mammals in the Mexican transition zone. *Biological Journal of the Linnean Society*, 83, 327–339.  
<https://doi.org/10.1111/j.1095-8312.2004.00386.x>

Escalante, T., Rodríguez-Tapia, G. & Morrone, J.J. (2021). Toward a biogeographic regionalization of the Nearctic region: Area nomenclature and digital map. *Zootaxa*, 5027, 351–375. <https://doi.org/10.11646/zootaxa.5027.3.3>

Escalante, T., Sánchez-Cordero, V., Morrone, J.J. & Linaje, M. (2007b). Deforestation affects biogeographical regionalization: a case study contrasting potential and extant distributions of Mexican terrestrial mammals. *Journal of Natural History*, 41, 965–984.  
<https://doi.org/10.1080/00222930701292062>

Escobar, F., Halffter, G. & Arellano, L. (2007). From forest to pasture: an evaluation of the influence of environment and biogeography on the structure of beetle (Scarabaeinae) assemblages along three altitudinal gradients in the Neotropical region. *Ecography*, 30, 193–208. <https://doi.org/10.1111/j.2007.0906-7590.04818.x>

Espinosa, D., Llorente, J. & Morrone, J.J. (2006). Historical biogeographical patterns of the species of *Bursera* (Burseraceae) and their taxonomic implications. *Journal of Biogeography*, 33, 1945–1958. <https://doi.org/10.1111/j.1365-2699.2006.01566.x>

Falcón-Ordaz, J., Monks, S., Pulido-Flores, G. & Rodríguez-Amador, R. (2014). A new species of *Aplectana* (Nematoda: Cosmocercidae) in *Ambystoma velasci* (Amphibia: Ambystomatidae) from Mexico. *Comparative Parasitology*, 81, 220–224.  
<https://doi.org/10.1654/4684.1>

Ferrari, A., Alvares, D.J., Buratto, P.M. & Barao, K.R. (2022). Distribution patterns of Triatominae (Hemiptera: Reduviidae) in the Americas: an analysis based on networks and endemicity. *Cladistics*, 38, 563–581. <https://doi.org/10.1111/cla.12500>

Ferro, I., Navarro-Sigüenza, A.G. & Morrone, J.J. (2017). Biogeographical transitions in the Sierra Madre Oriental, Mexico, shown by chorological and evolutionary biogeographical affinities of passerine birds (Aves: Passeriformes). *Journal of Biogeography*, 44, 2145–2160. <https://doi.org/10.1111/jbi.13015>

García-Navarrete, P.G. & Morrone, J.J. (2018). Testing the biogeographical regionalization of the Mexican Transition Zone based on the distribution of Curculionidae (Insecta: Coleoptera). *Zootaxa*, 4530, 1–99. <https://doi.org/10.11646/zootaxa.4530.1.1>

García-Sotelo, U.A., García-Vázquez, U.O. & Espinosa, D. (2021). Historical biogeography of the genus *Rhadinaea* (Squamata: Dipsadinae). *Ecology and Evolution*, 11, 12413–12428. <https://doi.org/10.1002/ece3.7988>

García-Vázquez, U.O., Nieto-Montes de Oca, A., Bryson, R.W., Jr., Schmidt-Ballardo, W. & Pavón-Vázquez, C.J. (2018). Molecular systematics and historical biogeography of the genus *Gerrhonotus* (Squamata: Anguidae). *Journal of Biogeography*, 45, 1640–1652. <https://doi.org/10.1111/jbi.13241>

Gomes, L.R.P. & Carvalho, C.J.B.D. (2021). Three new species of *Botanophila* Lioy (Diptera: Anthomyiidae) from the Mexican Transition Zone. *Zootaxa*, 5005, 317–328. <https://doi.org/10.11646/zootaxa.5005.3.6>

Gómez-Ortíz, Y., Domínguez-Vega, H. & Moreno, C.E. (2017). Spatial variation of mammal richness, functional and phylogenetic diversity in the Mexican Transition Zone. *Community Ecology*, 18, 121–127. <https://doi.org/10.1556/168.2017.18.2.1>

Gómez-Zurita, J. (2018). Systematic revision of Central American *Calligrapha* Chevrolat of the subgenus *Erythrographa* subgen. nov. (Coleoptera: Chrysomelidae, Chrysomelinae). *Zootaxa*, 4531, 1–58. <https://doi.org/10.11646/zootaxa.4531.1.1>

González-Gallegos, J.G., Castro-Castro, A. & Ávila-González, H. (2020). *Salvia rhizomatosa* (Lamiaceae) a new species from Sierra Madre Occidental in Durango, Mexico, with a synopsis of *Salvia* sect. *Brandegeia*. *Phytotaxa*, 434, 255–269. <https://doi.org/10.11646/phytotaxa.434.3.4>

Gray, L.N., Barley, A.J., Poe, S., Thomson, R.C., de Oca, A.N.-M. & Wang, I.J. (2019). Phylogeography of a widespread lizard complex reflects patterns of both geographic and ecological isolation. *Molecular Ecology*, 28, 644–657. <https://doi.org/10.1111/mec.14970>

Gutiérrez-Ortega, J.S., Salinas-Rodríguez, M.M., Martínez, J.F., Molina-Freaner, F., Pérez-Farrera, M.A., Vovides, A.P., Matsuki, Y., Suyama, Y., Ohsawa, T.A., Watano, Y. & Kajita, T. (2018). The phylogeography of the cycad genus *Dioon* (Zamiaceae) clarifies its

Cenozoic expansion and diversification in the Mexican transition zone. *Annals of Botany*, 121, 535–548. <https://doi.org/10.1093/aob/mcx165>

Gutiérrez-Rodríguez, J., Zaldívar-Riverón, A., Weissman, D.B. & Vandergast, A.G. (2022). Extensive species diversification and marked geographic phylogenetic structure in the Mesoamerican genus *Stenopelmatus* (Orthoptera: Stenopelmatidae: Stenopelmatinae) revealed by mitochondrial and nuclear 3RAD data. *Invertebrate Systematics*, 36, 1–21. <https://doi.org/10.1071/IS21022>

Gutiérrez-Velázquez, A., Rojas-Soto, O., Reyes-Castillo, P. & Halffter, G. (2013). The classic theory of Mexican Transition Zone revisited: the distributional congruence patterns of Passalidae (Coleoptera). *Invertebrate Systematics*, 27, 282–293. <https://doi.org/10.1071/IS12056>

Halffter, G. (1987). Biogeography of the montane entomofauna of Mexico and Central-America. *Annual Review of Entomology*, 32, 95–114. <https://doi.org/10.1146/annurev.ento.32.1.95>

Halffter, G., Espinosa de los Monteros, A., Nolasco-Soto, J., Arriaga-Jiménez, A. & Rivera-Gasperín, S. (2022). *Bajacanthon*, a new subgenus for the Mexican Deltochilini (Coleoptera: Scarabaeidae: Scarabaeinae) fauna. *Diversity*, 14, 109. <https://doi.org/10.3390/d14020109>

Halffter, G. & Morrone, J.J. (2017). An analytical review of Halffter's Mexican transition zone, and its relevance for evolutionary biogeography, ecology and biogeographical regionalization. *Zootaxa*, 4226, 1–46. <https://doi.org/10.11646/zootaxa.4226.1.1>

Halffter, G., Zunino, M., Moctezuma, V. & Sánchez-Huerta, J.L. (2019). The integration processes of the distributional patterns in the Mexican Transition Zone: Phyletic, paleogeographic and ecological factors of a case study. *Zootaxa*, 4586, 1–34. <https://doi.org/10.11646/zootaxa.4586.1.1>

Huidobro, L., Morrone, J.J., Villalobos, J.L. & Álvarez, F. (2006). Distributional patterns of freshwater taxa (fishes, crustaceans and plants) from the Mexican Transition Zone. *Journal of Biogeography*, 33, 731–741. <https://doi.org/10.1111/j.1365-2699.2005.01400.x>

Joaqui, T., Cultid-Medina, C.A., Dattilo, W. & Escobar, F. (2021). Different dung beetle diversity patterns emerge from overlapping biotas in a large mountain range of the Mexican Transition Zone. *Journal of Biogeography*, 48, 1284–1295. <https://doi.org/10.1111/jbi.14075>

Joaqui, T., Moctezuma, V., Sánchez-Huerta, J.L. & Escobar, F. (2019). The *Onthophagus fuscus* (Coleoptera: Scarabaeidae) species complex: an update and the description of a new species. *Zootaxa*, 4555, 151–186. <https://doi.org/10.11646/zootaxa.4555.2.1>

Juárez-Barrera, F., Espinosa, D., Morrone, J.J., Escalante, T. & Bueno-Hernández, A.A. (2020). La complejidad biótica de la Zona de Transición Mexicana y la evolución del pensamiento

biogeográfico de Gonzalo Halffter. *Revista Mexicana de Biodiversidad*, 91, 93402. <https://doi.org/10.22201/ib.20078706e.2020.91.3402>

Kaczmarek, L., Goldyn, B., McInnes, S.J. & Michalczyk, L. (2016). Diversity of limno-terrestrial tardigrades of the Americas in relation to the Great American Biotic Interchange hypothesis (GABI). *Zoological Journal of the Linnean Society*, 178, 737–746. <https://doi.org/10.1111/zoj.12422>

Kaczmarek, L. & Roszkowska, M. (2016). A new eutardigrade from Costa Rica with taxonomical and zoogeographical remarks on Costa Rican tardigrades. *New Zealand Journal of Zoology*, 43, 234–245. <https://doi.org/10.1080/03014223.2016.1156553>

Kobelkowsky-Vidrio, T., Ríos-Muñoz, C.A. & Navarro-Sigüenza, A.G. (2014). Biodiversity and biogeography of the avifauna of the Sierra Madre Occidental, Mexico. *Biodiversity and Conservation*, 23, 2087–2105. <https://doi.org/10.1007/s10531-014-0706-6>

Lamas, C.J.E., Nihei, S.S., Cunha, A.M. & Couri, M.S. (2014). Phylogeny and biogeography of *Heterostylum* (Diptera: Bombyliidae): Evidence for an ancient Caribbean diversification model. *Florida Entomologist*, 97, 952–966. <https://doi.org/10.1653/024.097.0353>

Ledesma-Miramontes, A., Ramírez-Díaz, J.L., Vidal-Martínez, V.A., Pena-Ramos, A., Ruiz-Corral, J.A., Salinas-Moreno, Y. & Preciado-Ortiz, R.E. (2015). Propuesta para integrar un patrón heterótico de maíz de grano amarillo para la zona de transición de México II. Evaluación de mestizos y cruzas. *Revista Fitotecnia Mexicana*, 38, 133–143. <https://doi.org/10.35196/rfm.2015.2.133>

López-García, M.M. & Morrone, J.J. (2022). Geodispersal of the typical Neotropical cenocron from South America to the Mexican Transition Zone: a cladistic biogeographical test. *Biological Journal of the Linnean Society*, 135, 242–250. <https://doi.org/10.1093/biolinnean/blab161>

Luna-Vega, I. & Contreras-Medina, R. (2012). Contributions of Cladistic Biogeography to the Mexican Transition Zone. In: L. Stevens (Ed.), *Global Advances in Biogeography* (pp. 157–168). Rijeka: Intech Europe. <https://doi.org/10.5772/37761>

Luna-Vega, I., Espinosa, D., Rivas, G. & Contreras-Medina, R. (2013). Geographical patterns and determinants of species richness in Mexico across selected families of vascular plants: implications for conservation. *Systematics and Biodiversity*, 11, 237–256. <https://doi.org/10.1080/14772000.2013.797517>

Marshall, C.J. & Liebherr, J.K. (2000). Cladistic biogeography of the Mexican transition zone. *Journal of Biogeography*, 27, 203–216. <https://doi.org/10.1046/j.1365-2699.2000.00388.x>

Martínez-Falcón, A.P., Zurita, G.A., Ortega-Martínez, I.J. & Moreno, C.E. (2018). Populations and assemblages living on the edge: dung beetles responses to forests-pasture ecotones. *PeerJ*, 6, e6148. <https://doi.org/10.7717/peerj.6148>

Martín-Piera, F. & Lobo, J.M. (1993). Altitudinal distribution patterns on copro-necrophage Scarabaeoidea (Coleoptera) in Veracruz, Mexico. *Coleopterists Bulletin*, 47, 321–334.

Mason, N.A., Olvera-Vital, A., Lovette, I.J. & Navarro-Sigüenza, A.G. (2018). Hidden endemism, deep polyphyly, and repeated dispersal across the Isthmus of Tehuantepec: Diversification of the White-collared Seedeater complex (Thraupidae: *Sporophila torqueola*). *Ecology and Evolution*, 8, 1867–1881. <https://doi.org/10.1002/ece3.3799>

Maya-Morales, J., Jiménez, M.L. & Morrone, J.J. (2018). Track analysis of the funnel-web spiders (Araneae: Agelenidae) of Mexico. *Revista Mexicana de Biodiversidad*, 89, 530–540. <https://doi.org/10.22201/ib.20078706e.2018.2.2367>

McDonough, M.M., Ferguson, A.W., Dowler, R.C., Gompper, M.E. & Maldonado, J.E. (2022). Phylogenomic systematics of the spotted skunks (Carnivora, Mephitidae, Spilogale): Additional species diversity and Pleistocene climate change as a major driver of diversification. *Molecular Phylogenetics and Evolution*, 167, 107266. <https://doi.org/10.1016/j.ympev.2021.107266>

Mercado-Salas, N.F., Pozo, C., Morrone, J.J. & Suarez-Morales, E. (2012). Distribution patterns of the American species of the freshwater genus *Eucyclops* (Copepoda: Cyclopoida). *Journal of Crustacean Biology*, 32, 457–464. <https://doi.org/10.1163/193724012X626502>

Miguez-Gutiérrez, A., Castillo, J., Márquez, J. & Goyenechea, I. (2013). Biogeography of the Mexican Transition Zone based on a reconciled trees analysis. *Revista Mexicana de Biodiversidad*, 84, 215–224. <https://doi.org/10.7550/rmb.32119>

Moctezuma, V., Deloya, C., Sánchez-Huerta, J.L. & Halffter, G. (2019). A new species of the *Phanaeus endymion* species group (Coleoptera: Scarabaeidae: Scarabaeinae), with comments on ecology and distribution. *Annales de la Societe Entomologique de France*, 55, 249–254. <https://doi.org/10.1080/00379271.2019.1577170>

Moctezuma, V. & Halffter, G. (2019). New biogeographical makeup for colonisation of the Baja California Peninsula, with the description of a new *Onthophagus* (Coleoptera: Scarabaeidae: Scarabaeinae). *Journal of Natural History*, 53, 2057–2071. <https://doi.org/10.1080/00222933.2019.1685694>

Moctezuma, V. & Halffter, G. (2020). New species and redescriptions of the *Onthophagus chevrolati* species complex (Coleoptera: Scarabaeoidea: Scarabaeidae). *Annales Zoologici*, 70, 245–261. <https://doi.org/10.3161/00034541ANZ2020.70.2.005>

Moctezuma, V., Halffter, G. & Escobar, F. (2016a). Response of copronecrophagous beetle communities to habitat disturbance in two mountains of the Mexican Transition Zone: influence of historical and ecological factors. *Journal of Insect Conservation*, 20, 945–956. <https://doi.org/10.1007/s10841-016-9923-5>

Moctezuma, V., Rossini, M., Zunino, M. & Halffter, G. (2016b). A contribution to the knowledge of the mountain entomofauna of Mexico with a description of two new species

of *Onthophagus* Latreille, 1802 (Coleoptera, Scarabaeidae, Scarabaeinae). *ZooKeys*, 572, 23–50. <https://doi.org/10.3897/zookeys.572.6763>

Moctezuma, V., Sánchez-Huerta, J.L. & Halffter, G. (2017). Two new species of the *Phanaeus endymion* species group (Coleoptera, Scarabaeidae, Scarabaeinae). *ZooKeys*, 702, 113–135. <https://doi.org/10.3897/zookeys.702.14728>

Moctezuma, V., Sánchez-Huerta, J.L. & Halffter, G. (2018). Two new species of *Ateuchus* with remarks on ecology, distributions, and evolutionary relationships (Coleoptera, Scarabaeidae, Scarabaeinae). *ZooKeys*, 747, 71–86. <https://doi.org/10.3897/zookeys.747.22731>

Montañez, D., Noordeloos, M.E., Rodríguez, O., Vargas, O. & Guzmán-Dávalos, L. (2016). Notes on the genus *Entoloma* (Basidiomycota, Agaricales) in two volcanic areas of Jalisco, Mexico. *Phytotaxa*, 277, 211–236. <https://doi.org/10.11646/phytotaxa.277.3.1>

Morrone, J.J. (2006). Biogeographic areas and transition zones of Latin America and the Caribbean islands based on panbiogeographic and cladistic analyses of the entomofauna. *Annual Review of Entomology*, 51, 467–494. <https://doi.org/10.1146/annurev.ento.50.071803.130447>

Morrone, J.J. (2010). Fundamental biogeographic patterns across the Mexican Transition Zone: an evolutionary approach. *Ecography*, 33, 355–361. <https://doi.org/10.1111/j.1600-0587.2010.06266.x>

Morrone, J.J. (2014). Biogeographical regionalisation of the Neotropical region. *Zootaxa*, 3782, 1–110. <https://doi.org/10.11646/zootaxa.3782.1.1>

Morrone, J.J. (2015). Halffter's Mexican transition zone (1962–2014), cenocrons and evolutionary biogeography. *Journal of Zoological Systematics and Evolutionary Research*, 53, 249–257. <https://doi.org/10.1111/jzs.12098>

Morrone, J.J. (2017). Biogeographic regionalization of the Sierra Madre del Sur province, Mexico. *Revista Mexicana de Biodiversidad*, 88, 710–714. <https://doi.org/10.1016/j.rmb.2017.07.012>

Morrone, J.J. (2019). Regionalización biogeográfica y evolución biótica de México: encrucijada de la biodiversidad del Nuevo Mundo. *Revista Mexicana de Biodiversidad*, 90, e902980. <https://doi.org/10.22201/ib.20078706e.2019.90.2980>

Morrone, J.J. & Acosta, R. (2006). A synopsis of the fleas (Insecta: Siphonaptera) parasitizing New World species of Soricidae (Mammalia: Insectivora). *Zootaxa*, 1354, 1–30. <https://doi.org/10.11646/zootaxa.1354.1.1>

Morrone, J.J. & Gutiérrez, A. (2005). Do fleas (Insecta: Siphonaptera) parallel their mammal host diversification in the Mexican transition zone? *Journal of Biogeography*, 32, 1315–1325. <https://doi.org/10.1111/j.1365-2699.2005.01285.x>

Morrone, J.J. & Márquez, J. (2001). Halffter's Mexican Transition Zone, beetle generalized tracks, and geographical homology. *Journal of Biogeography*, 28, 635–650.  
<https://doi.org/10.1046/j.1365-2699.2001.00571.x>

Nolasco-Soto, J., González-Astorga, J., Espinosa de los Monteros, A., Galante-Patino, E. & Favila, M.E. (2017). Phylogeographic structure of *Canthon cyanellus* (Coleoptera: Scarabaeidae), a Neotropical dung beetle in the Mexican Transition Zone: Insights on its origin and the impacts of Pleistocene climatic fluctuations on population dynamics. *Molecular Phylogenetics and Evolution*, 109, 180–190.  
<https://doi.org/10.1016/j.ympev.2017.01.004>

Ortega-Martínez, I.J., Moreno, C.E. & Escobar, F. (2016). A dirty job: manure removal by dung beetles in both a cattle ranch and laboratory setting. *Entomologia Experimentalis et Applicata*, 161, 70–78. <https://doi.org/10.1111/eea.12488>

Ortiz-Brunel, J.P., Munguía-Lino, G., Castro-Castro, A. & Rodríguez, A. (2021). Biogeographic analysis of the American genus *Echeandia* (Agavoideae: Asparagaceae). *Revista Mexicana de Biodiversidad*, 92, e923739. <https://doi.org/10.22201/ib.20078706e.2021.92.3739>

Pereira Gomes, L.R., Fogaca, J.M. & Barros de Carvalho, C.J. (2021). New genus of Muscidae: Coenosiinae (Diptera) from the Mexican Transition Zone and its phylogenetic position based on morphological evidence. *Insect Systematics and Evolution*, 52, 110–124.  
<https://doi.org/10.1163/1876312X-bja10003>

Pérez-Hernández, C.X., Zaragoza-Caballero, S. & Romo-Galicia, A. (2019). Checklist of net-winged beetles (Coleoptera: Lycidae) from Mexico. *Zootaxa*, 4623, 239–260.  
<https://doi.org/10.11646/zootaxa.4623.2.2>

Pérez-Hernández, C.X., Zaragoza-Caballero, S. & Romo-Galicia, A. (2022). Updated checklist of the fireflies (Coleoptera: Lampyridae) of Mexico. *Zootaxa*, 5092, 291–317.  
<https://doi.org/10.11646/zootaxa.5092.3.3>

Pérez-Miranda, F., Mejía, O., López, B. & Rican, O. (2020). Molecular clocks, biogeography and species diversity in *Herichthys* with evaluation of the role of Punta del Morro as a vicariant brake along the Mexican Transition Zone in the context of local and global time frame of cichlid diversification. *PeerJ*, 8, e8818. <https://doi.org/10.7717/peerj.8818>

Phillips-Rodríguez, E. & Powell, J.A. (2007). Phylogenetic relationships, systematics, and biology of the species of *Amorbia* Clemens (Lepidoptera: Tortricidae: Sparganothini). *Zootaxa*, 1670, 1–109. <https://doi.org/10.11646/zootaxa.1670.1.1>

Pinedo-Escatel, J.A., Aragón-Parada, J., Dietrich, C.H., Moya-Raygoza, G., Zahniser, J.N. & Portillo, L. (2021). Biogeographical evaluation and conservation assessment of arboreal leafhoppers in the Mexican Transition Zone biodiversity hotspot. *Diversity and Distributions*, 27, 1051–1065. <https://doi.org/10.1111/ddi.13254>

Pinilla-Buitrago, G.E., Escalante, T., Gutiérrez-Velázquez, A., Reyes-Castillo, P. & Rojas-Soto, O.R. (2018). Areas of endemism persist through time: A palaeoclimatic analysis in the Mexican Transition Zone. *Journal of Biogeography*, 45, 952–961.  
<https://doi.org/10.1111/jbi.13172>

Ramírez Díaz, J.L., Vidal Martínez, V.A., Ledesma Miramontes, A., Chuela Bonaparte, M., Peña Ramos, A., Ruiz Corral, J.A. & Ron Parra, J. (2013). Propuesta para integrar un patrón heterótico de maíz de grano amarillo para la zona de transición de México. I. Método y formación de poblaciones. *Revista Fitotecnia Mexicana*, 36, 189–199.  
<https://doi.org/10.35196/rfm.2013.3.189>

Razo-González, M., Márquez, J., Castaño-Meneses, G. & Novelo-Gutiérrez, R. (2021). La complejidad biogeográfica de la Sierra de Juárez, Oaxaca, México, revelada a través del análisis de parsimonia de endemismos de especies de tricópteros (Insecta: Trichoptera). *Revista Mexicana de Biodiversidad*, 92, e923808.  
<https://doi.org/10.22201/ib.20078706e.2021.92.3808>

Rengifo-Correa, L., Brailovsky, H., Henry, T.J. & Morrone, J.J. (2014). Phylogenetics and evolutionary morphology of the Neotropical true bug genus *Epipolops* (Hemiptera: Heteroptera: Geocoridae). *Systematic Entomology*, 39, 127–140.  
<https://doi.org/10.1111/syen.12039>

Ríos-Díaz, C.L., Moreno, C.E., Ortega-Martínez, I.J., Zuria, I., Escobar, F. & Castellanos, I. (2021). Sheep herding in small grasslands promotes dung beetle diversity in a mountain forest landscape. *Journal of Insect Conservation*, 25, 13–26. <https://doi.org/10.1007/s10841-020-00277-5>

Rivera-Martínez, R., Ramírez-Morillo, I.M., De-Nova, J.A., Carnevali, G., Pinzón, J.P., Romero-Soler, K.J. & Raigoza, N. (2022). Spatial phylogenetics in Hechtioideae (Bromeliaceae) reveals recent diversification and dispersal. *Botanical Sciences*, 100, 692–709. <https://doi.org/10.17129/botsci.2975>

Rodríguez, A., Castro-Castro, A., Vargas-Amado, G., Vargas-Ponce, O., Zamora-Tavares, P., González-Gallegos, J., Carrillo-Reyes, P., Anguiano-Constance, M., Carrasco-Ortiz, M., García-Martínez, M., Gutiérrez-Rodríguez, B., Aragón-Parada, J., Valdes-Ibarra, C. & Munguía-Lino, G. (2018). Richness, geographic distribution patterns, and areas of endemism of selected angiosperm groups in Mexico. *Journal of Systematics and Evolution*, 56, 537–549. <https://doi.org/10.1111/jse.12457>

Rodríguez, A. & Ortiz-Brunel, J.P. (2019). *Echeandia jaliscensis* (Asparagaceae) a new species from Jalisco, Mexico. *Phytotaxa*, 414, 29–34. <https://doi.org/10.11646/phytotaxa.414.1.3>

Rodríguez, A. & Ortiz-Brunel, J.P. (2021). *Echeandia cholulensis* (Asparagaceae), a new species from central Mexico. *Acta Botánica Mexicana*, 128, e1915.  
<https://doi.org/10.21829/abm128.2021.1915>

Rodríguez-Correa, H., Oyama, K., MacGregor-Fors, I. & Gonzalez-Rodriguez, A. (2015). How are oaks distributed in the Neotropics? A perspective from species turnover, areas of endemism, and climatic niches. *International Journal of Plant Science*, 176, 222–231.  
<https://doi.org/10.1086/679904>

Rodríguez-Gómez, F. & Francisco Ornelas, J. (2015). At the passing gate: past introgression in the process of species formation between *Amazilia violiceps* and *A. viridifrons* hummingbirds along the Mexican Transition Zone. *Journal of Biogeography*, 42, 1305–1318. <https://doi.org/10.1111/jbi.12506>

Rös, M., Escobar, F. & Halffter, G. (2012). How dung beetles respond to a human-modified variegated landscape in Mexican cloud forest: a study of biodiversity integrating ecological and biogeographical perspectives. *Diversity and Distributions*, 18, 377–389.  
<https://doi.org/10.1111/j.1472-4642.2011.00834.x>

de la Rosa-Manzano, E., Mendieta-Leiva, G., Guerra-Pérez, A., Aguilar-Dorantes, K.M., Arellano-Méndez, L.U. & Torres-Castillo, J.A. (2019). Vascular epiphytic diversity in a Neotropical Transition Zone is driven by environmental and structural heterogeneity. *Tropical Conservation Science*, 12, 1940082919882203.  
<https://doi.org/10.1177/1940082919882203>

Rosas, M.V., del Rio, M.G., Lanteri, A.A. & Morrone, J.J. (2011) Track analysis of the North and Central American species of the *Pantomorus-Naupactus* complex (Coleoptera: Curculionidae). *Journal of Zoological Systematics and Evolutionary Research*, 49, 309–314. <https://doi.org/10.1111/j.1439-0469.2011.00631.x>

Rossini, M., Vaz-de-Mello, F.Z. & Zunino, M. (2018a). A taxonomic revision of the New World *Onthophagus* Latreille, 1802 (Coleoptera: Scarabaeidae: Scarabaeinae) of the *osculatii* species-complex, with description of two new species from South America. *Journal of Natural History*, 52, 541–586. <https://doi.org/10.1080/00222933.2018.1437230>

Rossini, M., Vaz-De-Mello, F.Z. & Zunino, M. (2018b). Toward a comprehensive taxonomic revision of the “hirculus” group of American *Onthophagus* Latreille, 1802 (Coleoptera, Scarabaeidae, Scarabaeinae). *European Journal of Taxonomy*, 432, 1–21.  
<https://doi.org/10.5852/ejt.2018.432>

Salomão, R.P., Arriaga-Jiménez, A. & Kohlmann, B. (2021). The relationship between altitudinal gradients, diversity, and body size in a dung beetle (Coleoptera: Scarabaeinae: *Onthophagus*) model system. *Canadian Journal of Zoology*, 99, 33–43.  
<https://doi.org/10.1139/cjz-2020.0072>

Sánchez-Chávez, E., Rodríguez, A., Castro-Castro, A., Pérez-Farrera, M.A. & Sosa, V. (2019). Spatio-temporal evolution of climbing habit in the *Dahlia-Hidalgoa* group (Coreopsidae, Asteraceae). *Molecular Phylogenetics and Evolution*, 135, 166–176.  
<https://doi.org/10.1016/j.ympev.2019.03.012>

Sánchez-Huerta, J.L., Zunino, M. & Halffter, G. (2018). A new species of American *Ontophagus* Latreille (Coleoptera: Scarabaeidae: Scarabaeinae) associated with rodent (Geomyidae) burrows. *Coleopterists Bulletin*, 72, 407–416. <https://doi.org/10.1649/0010-065X-72.3.407>

Sangines-Franco, C., Luna-Vega, I., Contreras-Medina, R., Espinosa, D., Tejero-Diez, J.D. & Rivas, G. (2015). Diversity, endemism and conservation of ferns (Polypodiales) in the Mexican Mountain Component. *Journal of Mountain Science*, 12, 891–904. <https://doi.org/10.1007/s11629-014-3070-9>

Schramm, F.D., Valdés-Mondragón, A. & Prendini, L. (2021). Volcanism and palaeoclimate change drive diversification of the world's largest whip spider (Amblypygi). *Molecular Ecology*, 30, 2872–2890. <https://doi.org/10.1111/mec.15924>

Suárez-García, O., López-Osorio, E. & Rös, M. (2020). Breeding in the cold? A White-eared Hummingbird (*Basilinna leucotis*) winter nest record from the mountains of Southern Oaxaca, Mexico. *Wilson Journal of Ornithology*, 132, 755–761. <https://doi.org/10.1676/20-17>

Symmank, L., Samain, M.-S., Smith, J.F., Pino, G., Stoll, A., Goetghebeur, P., Neinhuis, C. & Wanke, S. (2011). The extraordinary journey of *Peperomia* subgenus *Tildenia* (Piperaceae): insights into diversification and colonization patterns from its cradle in Peru to the Trans-Mexican Volcanic Belt. *Journal of Biogeography*, 38, 2337–2349. <https://doi.org/10.1111/j.1365-2699.2011.02586.x>

Toledo, V.H., Corona, A.M. & Morrone, J.J. (2007). Track analysis of the Mexican species of Cerambycidae (Insecta, Coleoptera). *Revista Brasileira de Entomologia*, 51, 131–137. <https://doi.org/10.1590/S0085-56262007000200002>

Vázquez-Franco, C.M. & Morrone, J.J. (2022). The genus *Pheidole* (Hymenoptera: Formicidae: Myrmicinae) in Puebla, Mexico. *Revista Mexicana de Biodiversidad*, 93, e933820. <https://doi.org/10.22201/ib.20078706e.2022.93.3820>

Vega-Badillo, V., Zaragoza-Caballero, S., Ochoterena-Booth, H. & Morrone, J.J. (2021). Phylogenetic analysis and evolutionary morphology of wings in the genus *Cenophengus* LeConte, 1881 (Coleoptera: Phengodidae: Mastinocerinae) based on morphological characters. *Zoologischer Anzeiger*, 293, 168–181. <https://doi.org/10.1016/j.jcz.2021.06.007>

Villaseñor, J.L., Ortiz, E., Delgadillo-Moya, C. & Juárez, D. (2020). The breadth of the Mexican Transition Zone as defined by its flowering plant generic flora. *PLOS ONE*, 15, e0235267. <https://doi.org/10.1371/journal.pone.0235267>

Waldren, G.C., Williams, K.A., Cambra, R.A. & Pitts, J.P. (2020). Systematic revision of the North American velvet ant genus *Invreiella* Suarez (Hymenoptera: Mutillidae) with description of eleven new species. *Zootaxa*, 4894, 151–205. <https://doi.org/10.11646/zootaxa.4894.2.1>

Zamora-Tavares, M. del P., Martínez, M., Magallón, S., Guzmán-Dávalos, L. & Vargas-Ponce, O. (2016). Physalis and physaloids: A recent and complex evolutionary history. *Molecular Phylogenetics and Evolution*, 100, 41–50. <https://doi.org/10.1016/j.ympev.2016.03.032>