1. Record Nr. UNINA9910409705703321

Titolo	Latin American Dendroecology : Combining Tree-Ring Sciences and Ecology in a Megadiverse Territory / / edited by Marín Pompa-García, J. Julio Camarero
Pubbl/distr/stampa	Cham : , : Springer International Publishing : , : Imprint : Springer, , 2020
ISBN	3-030-36930-7
Edizione	[1st ed. 2020.]
Descrizione fisica	1 online resource (XVII, 381 p. 119 illus., 92 illus. in color.)
Disciplina	577.30980913
Soggetti	Trees Forest products Forest management Environmental management Tree Biology Wood Science & Technology Forestry Management Environmental Management Gestió forestal Dendroecologia Arbres Llibres electrònics Amèrica Llatina
Lingua di pubblicazione	Inglese
Formato	Materiale a stampa
Livello bibliografico	Monografia
Nota di contenuto	Chapter 1 - Dendroecology investigation of Magnolia vovidesii, a threatened Mexican Cloud Forest tree species endemic to eastern Mexico -- Chapter 2 - Drought is a driving factor of seasonal growth of Pinus strobiformis Engelm. in northern Mexico -- Chapter 3 - Dendroecological studies with Cedrela odorata L., Northeastern Brazil -- Chapter 4 - Xylogenesis explains climate- growth relationships in a Mexican conifer -- Chapter 5 - Dendrochronological potential of tree species from America's rainiest region -- Chapter 6 - Potential of

Tropical Dry Forest trees species: anatomy, chronologies and environment -- Chapter 7 - Tree-growth variations along environmental gradients in tropical montane forests of South America -- Chapter 8 - Forest dynamics in the Patagonian Andes: Lessons learned from dendroecology -- Chapter 9 - Historical fire regimes in high-elevation tropical forests -- Chapter 10 - Patterns of tree establishment following glacier-induced floods in southern Patagonia -- Chapter 11 - Dendrochronological reconstruction of Ormiscodes amphimone outbreaks in Nothofagus pumilio forests from Southern Patagonia, Argentina -- Chapter 12 - Dendroecology in Polylepis forests in the tropical Andes: modeling of the radial growth of the last centuries and its implications for its conservation -- Chapter 13 - Dendrochronological study of the xeric and mesic Araucaria araucana forests of northern Patagonia: implications for the Ecology and Conservation -- Chapter 14 - Dendroecology applied to silvicultural management in the Southern Patagonian forests: a case of study from an experimental forest in Tierra del Fuego, Argentina -- Chapter 15 - Reconstructing land use changes through ring-width variations in Nothofagus antarctica chronologies from Southern Patagonia -- Chapter 16 - Long-term decoupling between growth and water-use efficiency and its implications for the conservation of old-growth conifer forests in southern Chileong-term decoupling between growth and water-use efficiency and its implications for the conservation of old-growth conifer forests in southern Chile.

Sommario/riassunto

Latin America is a megadiverse territory hosting several hotspots of plant diversity and many types of forest biomes, ecosystems and climate types, from tropical rainforest to semi-arid woodlands. This combination of diverse forests and climates generates multiple responses to ecological changes affecting the structure and functioning of forest ecosystems. Recently, there have been major efforts to improve our understanding of such impacts on ecosystems processes. However, there is a dearth of studies focused on Latin-American forest ecosystems that could provide novel insights into the patterns and mechanisms of ecological processes in response to environmental stress. The abundance of “New World” tree species with dendrochronological potential constitutes an ideal opportunity to improve the ecological state of knowledge regarding these diverse forest types, which are often threatened by several impacts such as logging or conversion to agricultural lands. Thus, detailed information on the dendroecology of these species will improve our understanding of forests in the face of global change. Accordingly, this book identifies numerous relevant ecological processes and scales, ranging from tree species to populations and communities, and from both dendrochronological and dendroecological perspectives. It offers a valuable reference guide for the exploration of long-term ecological interactions between trees and their environmental conditions, and will foster further research and international projects on the continent and elsewhere.