

Ecology and importance of the Conservation from Specie Buritizinho (*Mauritiella Armata* (Mart) Burret - Arecaceae.)

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ABSTRACT

The aim of this work is to bring information about a key species for the conservation of Veredas that is virtually unknown in scientific research term because lacks basic data, making a review of their biology and ecology. The species *Mauritiella armata* popularly known as palm trees of the family of Arecaceae. The *M. armata* usage capabilities for various purposes have been addressed in some jobs where it was possible to use a potential to all parts of this plant, however it is difficult to find scientific articles publications about this specie indicating a need to carry out research in ecology *M. armata*, in order to bring useful information in the conservation strategies of this species.

Keywords: autoecology, ecology of populations, natural history, swamp forests.

INTRODUCTION

One of the major problems that have in plant ecology is the absence of basic data about the species, which results in enormous difficulties in the implementation of degraded land reclamation projects, and the lower the knowledge of physiographic environment studied, higher are the obstacles that have in preparing recovery plans of these areas, since the knowledge of an area in terms of vegetation should begin at first by floristic survey.

Thus, many recovery plantations or restoration of degraded areas end up being made incorrectly by the lack of information about the species to be planted, such as dispersal strategies, pollination, level of tolerance to light and shadow etc. aspects, which in turn prevents the plantations are made based on knowledge of how species act in attracting dispersers and pollinators, as well as the interactions between the set of species planted which in turn brings predictions of coexistence strategies between different groups of planted species.

The Veredas are moist subsystems classified as a physiognomy of the Cerrado biome, whose ecology is directly linked to the upwelling of water from the water table. Occur in the lower

part of the Cerrado, in areas where water recharge present hydromorphic soils and landscape marked by the dominance of *Mauritia flexuosa*, popularly known as Buriti.

Being an environment with natural abundance of water in a region characterized by water scarcity, and for occurrence in vegetation of the species with potential forextrativism, the management often inappropriate silvicultural plantations is pressure anthropic on Veredas, has generated great degradation of these ecosystems. The objective of this work is to bring information about a key species for conservation of this ecosystem that is virtually unknown in scientific research term because lacks basic data, making a review of their biology and autoecológicos.

METHODOLOGY

The methodology of this work consisted of a search of information regarding the specie in question, through the main sites of searches of scientific information of plants, such as spatialized journals and indexed databases, as well as in other non scientific means, but which provide information on the popular uses of plants by traditional communities. The species *Mauritiella armata* is part of the known

Arecaceae family popularly as palm trees. This group is among the oldest of the entire planet flora, studies of the historical development of plant groups suggest that this family of plants existed for more than 120 million years on Earth (Lorenzi, 2004) and that their records palynological indicate the beginning of the formation of forest environments (Bauermann et al, 2010). The Arecaceae is an family angiosperms monocots represented by about 2,700 species and over 240 genres that currently are more concentrated way in the globe tropical regions also occurring in the subtropics (Lorenzi, 2010; MARTINS, 2012). In the Americas are found in around 67 genera and approximately 1,440 species, of which about 380 species and 39 genera of native and exotic place in Brazil (Alves & CARVALHO, 2010; Lorenzi et al, 2004) and that Lorenzi (et al, 2010) recognize 34 genera and 334 species as native palm trees. In Brazil there is a high species richness of this family (Nascimento, 2009) that are distributed unevenly between the various formations of the country (Lorenzi, 2010). The preferred habitat of the Arecaceae are the humid environments where there is a predominance of genera and species (Bauermann et al, 2010) which, according to Nascimento (2010) may vary depending on the structure of the vegetation dominant species at each site. The Arecaceae occur more often in forests, but many are also found in other vegetation types (Nascimento, 2009).

The *Mauritiella* gender according to Martins (2012) is phylogenetically very close to *Mauritia* where its nomenclature originated therefore share both some ecological and morphological characteristics in leaves, fruits and preference as to habitat that includes Footpaths and other humid environments. This genre is represented by only three species that preferentially inhabit the lower areas of relief in periodically flooded plains (Lorenzi, 2010; MARTINS, 2012).

M. armata is an specie popularly known as caraná, caraná, Buritirana and Buriti-Mirim among other popular names usually given by traditional communities (MARTINS, 2012) is a plant that occurs in the states of Acre, Amazonas, Bahia, Goiás, Mato Grosso, Minas Gerais, Pará, Pernambuco, Piauí and Roraima.

The center of origin of this species is probably the Amazon rainforest (ITTO RO-LAC, 2014; Absy & SILVA, 2009; ARASATO &

AMARAL, 2013) can be found in Brazil also in Atlantic Forest formations, Cerrado and Caatinga according to Oliveira -son (2010). *M. armata* has associated with wet soils and saturated in water, annual precipitation rates between 2000-2800 mm with a tolerance to drought of two to three months, in areas where there can form dense and extensive plantations in the form of clumps (ITTO RO -LAC, 2014). According to Barbosa (et al, 2011) *M. armata* can be considered an indicator species of degraded environments in the areas flooded in the ecotones between the Cerrado and the Amazon rainforest. In addition, some phytosociological studies found high importance value indices for *M. armata* in tropical rainforests (BARBOSA, 2011; VIDOTTO, 2007). Flowers and fruits have possibility of occur between October and December (MARTINS, 2012). The fruiting period is concentrated in late winter and can reproduce by seeds and vegetative propagation, whose seeds have low germination rates because long periods of dormancy, but after establishing the species rapidly growing subject to the availability of light, being tolerant at low temperatures. It has autochorous dispersion and also zoochorous (Lorenzi, 2010; ITTO RO-LAC, 2014).

CONCLUSION

The *M. armata* usage capabilities for various purposes have been addressed in some jobs where it was possible to use one potential to all parts of this plant (MARTINS, 2012; ITTO RO-LAC, 2014), however it is difficult to find articles published scientific about this specie indicating a need to carry out research in ecology *M. armata* population so that the characteristics of the biology and ecology of the species are better known in order to bring useful information in the development of this species conservation strategies live in ecosystems important to the preservation.

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