Detection of non-homogeneities in daily precipitation series in central and southern Chile Detección de inhomogeneidades en series de precipitación diaria en la región centro-sur de Chile

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Continental Chile presents a large climate diversity due to its latitudinal spread, from 17°S to 56°S. In some areas of the country, precipitation represents a determinant factor for the development of some human activities, such as agriculture or mining. That is why having access to quality meteorological datasets is a first order necessity so as to be able to identify, within the variability of the dataset, what data corresponds to the natural variability of climate, and what corresponds to matters related to the instrumental matters and man-induced modifications. In order to evaluate this, different indices were applied to detect non-homogeneities to 152 datasets: von Neumann test, Thom test and Real Precision Index (RPI). These three tests evaluate different aspects of the series that they are applied to, so the series that are homogeneous for one of them not necessarily have to be homogeneous to another. Only 73 of the 152 datasets presented a good to tolerable quality according t