

---

[Download](#)

Keep in mind

The series Working Papers on Economics is published by the Office for Economic Studies at the *Banco de la República* (Central Bank of *Colombia*). The works published are provisional, and their authors are fully responsible for the opinions expressed in them, as well as for possible mistakes. The opinions expressed herein are those of the authors and do not necessarily reflect the views of Banco de la República or its Board of Directors.

#### AUTHOR OR EDITOR

Martínez-Ventura, Constanza

Mariño-Martínez, Ricardo

Miguélez-Márquez, Javier

The series [Borradores de Economía \(Working Papers on Economics\)](#) contributes to the dissemination and promotion of the work by researchers from the institution. On multiple occasions, these works have been the result of collaborative work with individuals from other national or international institutions. This series is indexed at Research Papers in Economics (RePEc). The opinions contained in this document

---

---

are the sole responsibility of the author and do not commit Banco de la República or its Board of Directors.

Publication Date:

Wednesday, 31 August 2022

## **Abstract**

The concept of centrality has been widely used to monitor systems with a network structure because it allows identifying their most influential participants. This monitoring task can be difficult if the number of system participants is considerably large or if the wide variety of centrality measures currently available produce non-coincident (or mixed) signals. This document uses principal component analysis to evaluate a set of centrality measures calculated for the financial institutions that participate in four financial market infrastructures of Colombia. The results obtained are used to construct general indices of centrality, using the strongest measures of centrality as inputs, and leaving aside those considered redundant.