

# Multi-criteria analysis of economic complexity transition in emerging economies: The case of Paraguay

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## Abstract

Like many emerging economies, the productive structure of the Paraguayan economy is not complex. It relies extensively on low value-added activities in the primary sector such as agriculture and cattle ranching. These activities have a lower return in terms of economic and social benefits than other potential productive activities and do not contribute to increasing capability accumulation. In this paper we present a tool to support the identification of strategic sectors and products which if taken advantage of, could leverage development through the accumulation of productive capabilities. Our guiding question is: Which productive sectors should be promoted to foster economic development in Paraguay through a transition towards a more complex economy? To answer this question, we use concepts from the Economic Complexity theory to identify new products and cluster them based on the Product Space methodology for the determination of potential products and combine it with the Analytic Hierarchy Process (AHP) for multicriteria analysis considering multiple criteria. In doing so, our proposed methodology contributes to both the Economic Complexity and the AHP literature. Through this combination, we tackle the multiplicity of juxtaposed criteria, which should be considered at the prioritization stage in the crafting of economic restructuring measures according to the country's capabilities. Our evaluation showed that the combination of the approaches is useful, and for Paraguay's case, it helped identify sectors, which, if promoted by policymakers, could help boost economic development through complexity and capability accumulation.