Understanding the Factors That Enable Logistics Integration in the Port Sector: Evidence from Iranian Seaport Sector

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Abstract : The main purpose of this research is to propose a conceptual framework to analyze port logistics integration in general and for the Iranian port sector in particular, including consideration of the challenges, outcomes, and opportunities in implementing port logistics integration. First, a literature review of studies on logistics integration in seaports and terminals is conducted. Second, a new conceptual framework for port logistics integration is proposed to incorporate the role of the new variables emerging from the recent developments in the global business environment. The literature review has found the logistics process and operations, information integration, value-added services, and logistics practices, organizational activities, resource sharing and institutional support being influential to logistics integration. The study used survey method to test the proposed conceptual framework. Both online and self-administrative survey have been used to collect data from port official staffs in Iranian seaports and their associations (internal port stakeholders) as well as other experts in various actors. In the study, the questionnaire was first validated using exploratory factor analysis (EFA) and then by confirmatory factor analysis (CFA). The results of the EFA and CFA confirmed the finding from the literature review. Research results and conceptual framework shed the lights on port logistics integration concept and suggest guidelines and procedures improve port logistics integration.

Keywords: maritime logistics, logistics integration, port management, EFA, CFA

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