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ABSTRACT

Successful information systems careers require continuous learning due to the constant emergence of new technologies and new applications of existing technologies. Because of this, building a network of complementary skills may allow information systems professionals to create sustainable career competitive advantage. We call such an approach skill networks. The skill network is based on a synthesis of the notion of skill stacking with Porter's concept of activity systems as a means of organizational competitive advantage. We describe how the activity systems concept can be adapted and applied to information systems careers and call for educators to embrace the idea to enhance their students' careers.

Keywords

Careers, information systems education, career competitive advantage, skill networks, skill stacking

EXTENDED ABSTRACT

A successful information systems (IS) career requires ongoing learning. Although this can be said of many careers, the need for constant learning is pronounced in IS. New technologies, methods, languages and other tools emerge on a seemingly constant basis. Yesterday's knowledge and skills are not sufficient for tomorrow's success. This need for constant learning is both blessing and curse for IS professionals. While ongoing learning is burdensome to professionals' time, energy, and effort, it also leads to high levels of a meta-skill - knowing how to learn – which can be leveraged to create an ongoing career competitive advantage using an approach we call skill networks.

Skill stacking, which is the pursuit of complementary skills to create a distinct skill portfolio, is a method for creating career competitive advantage (Deards & Lo, 2019). The basic logic behind skill stacking is that while it may be highly unlikely for an individual to be among the best for any single skill, it is feasible for them to be among the best with a particular combination of skills. Despite the current view that skill stacking is new, the idea is not new in IS, although skill acquisition often occurs on a relatively ad hoc basis. A focused strategic view of skill stacking may be more effective for developing career competitive advantage.

We can apply Porter's (1996) activity system idea to the basic notion of skill stacking to form a theoretically sound method for creating ongoing career competitive advantage. Porter's thesis is that competitive advantage comes from creating systems of activities that fit together well, are (ideally) self-reinforcing, and as a composite are unique and difficult to imitate even if the individual activities are common and/or imitable. We contend that career competitive advantage can be analogously created and sustained, by building networks of skills that complement one another and, in total, meet the criteria of value, rarity, and inimitability necessary for competitive advantage. For example, an IS professional may gain skills in Python coding, data visualization, and persuasive communication; although many individuals may have strong skills in any one of these areas, few will be sufficiently skilled in all of them. When skill networks are constructed such that they are valuable to employers and adaptable to emerging opportunities, the networks provide a relatively sustainable career competitive advantage.

We contend that IS programs should embrace the idea of skill networks and position their graduates to be able to create sustainable career competitive advantage through skill networks. We will discuss how the idea differs from the current conception of skill stacking and from other career models (e.g. T-shaped professional), and how skill networks provide sustainable competitive advantage. Additionally, we will discuss how IS programs can enable their students to build meta-skills and knowledge that will allow them to leverage well-designed, distinctive skill networks. We will also describe how micro-

credentials can be used to communicate skill networks to employers. Finally, we will provide a preliminary research agenda related to skill networks.

REFERENCES

1. Deards, K. & Lo, L. (2019). Plan your impact: Stacking your skills to make yourself irreplaceable. In M. Hodge (Ed.), *The Future Academic Librarian's Toolkit: Finding Success on the Job Hunt and in Your First Job*, Association of College and Research Libraries.
2. Porter, M. (1996). What is strategy? *Harvard Business Review*, November-December, 61-78.