

A READINESS APPROACH TO PROFILING A NATION AS AN ATTRACTIVE DESTINATION FOR SOFTWARE DEVELOPMENT OFFSHORING: THE CASE OF IRAN

Rachna Kumar, Alliant International University, 10455 Pomerado Road, San Diego, CA 92131, 858-635-4551, rkumar@alliant.edu

René Naert, Alliant International University, 10455 Pomerado Road, San Diego, CA 92131, 858-635-4803, rnaert@alliant.edu

ABSTRACT

This research goes beyond assessing the IT infrastructure and technical skills present in a nation and develops a broader perspective for evaluating the attractiveness of a foreign nation as a destination for software development offshoring. The research uses the concept of “readiness for disciplined software development” to define the *whole system* involved in software development. The ‘whole system’ refers to not just the technical skills, but also organizational, cultural and emotional skills of software development teams. This research uses popular software development approaches such as CMMI as the basis for constructing the details of this readiness profile. We use these concepts and early data from 20 sites to describe an initial profile for Iran and its readiness as a destination for software development offshoring.

RESEARCH DEVELOPMENT

A recent trend has been the offshore outsourcing of software development. Certain nations have become attractive offshore destinations and others are struggling to position themselves as desirable offshore locations for software development. Nations such as India, China and Russia have been the more popular destinations of this decade for offshore software development by offering low development costs and high development capability. And yet, companies that want to offshore are faced with a dilemma. There are several nations which have a low cost of development, but it is hard to assess the overall development capability of the country. The overall capability profile of the nation matters because the infrastructure, the available talents, and cultural affinity for development to match the source country’s development culture are all crucial to a successful offshoring project. Even after a nation is chosen as the offshore location, there is still the question of which company within that nation to pick as the offshore development partner. Often, the credibility of an offshore software development organization can be established by assessing their adherence to established and disciplined approaches to software development such as the Balanced Score Card (BSC) or CMMI from the Software Engineering Institute. Certain assurances about the quality of deliverables and commitments can be made based on the organization’s rating on such standard development models and processes.

The authors have developed an instrument to collect data on 132 characteristics of a software development organization using the CMMI and the BSC dimensions as well as other characteristics in the areas of organizational, cultural and emotional skills of software development teams. This paper describes some early results of collecting data in 20 software development companies in Iran. Early results show strengths in the organizational characteristics and some gaps in the communication characteristics. Hofstede’s dimensions of national culture are utilized for understanding these results and as a way to develop training programs for improving the readiness profile of the organization.