Chapter 4

The Role of Culture in Business Intelligence

Jore Park
IndaSea, Inc., USA

Wylci Fables
IndaSea, Inc., USA

Kevin R. Parker
Idaho State University, USA

Philip S. Nitse
Idaho State University, USA

ABSTRACT

Global business intelligence will struggle to live up to its potential if it fails to take into account, and accurately interpret, cultural differences. This paper supports this assertion by considering the concept of culture, explaining its importance in the business intelligence process, especially in foreign markets, and demonstrating that attention to culture is currently inadequate in most international business intelligence efforts. Without a tool capable of modeling social interaction in disparate cultures, BI efforts will underperform when extended to the global arena. The Cultural Simulation Modeler is examined as a means of enhancing essential cultural awareness. The core components of the modeler are explained, as are the limitations of automated information gathering and analysis systems.

INTRODUCTION

Enhanced technology, travel, communications, and economic globalization contribute to making the world seem as if it is becoming smaller. As a result, events manifest at a faster pace and are affected by a wider variety of circumstances and conditions.

One aspect of internationalization is that organizations now deal with a variety of national and regional cultures. Organizations often think they understand the cultures with which they interact, but they frequently fail to grasp the subtle nuances and resulting consequences of foreign cultures. Culture has a very deep and implicit influence on behavior whether managers are aware of it or not (Bensoussan & Densham, 2004). Cultural
The Role of Culture in Business Intelligence

differences affect planning, problem detection, situation awareness, uncertainty management, and decision making. Cultural differences in cognition and in world view can seriously impede expansion into foreign markets (Klein, Pongonis, & Klein, 2002) and companies often fail in their ventures into these markets due to serious errors and misjudgments concerning the social, cultural, and political environment (Tian & Tobar, 2004).

Another aspect of our changing world is that organizations must be constantly aware not only of cultural issues, but of all factors in their operating environment that might present threats or opportunities. Organizations that fail to monitor their environment to determine the conditions under which they must operate court disaster (Mitroff, 1985). Identification of key economic, social, and technological issues that affect the organization, its life cycle stages, and their relevance to each other helps managers allocate attention and resources to them. One tool through which this is accomplished is business intelligence gathering and analysis. Business intelligence gathering and analysis is a fundamental step in the chain of perceptions and actions that permit an organization to adapt to its environment. Organizational adaptation, survival, and competence in the face of increasingly discontinuous environmental change require access to timely and accurate information, as well as tools to constantly monitor, analyze, and interpret that information (Malhotra, 1998).

Cultural bias is a real phenomenon and must be considered in intelligence gathering and analysis. Note that this applies not only to business intelligence but also to intelligence gathered on behalf of governments. Hence, the Cultural Simulation Modeler (CSM) was developed by IndaSea, Inc. under the auspices of the United States Defense Threat Reduction Agency as a terrorism threat assessment tool. The CSM is a software system that monitors multicultural interaction in order to anticipate threats and opportunities as they emerge from complex situations (IndaSea, 2004). The premise for the system is that increased understanding can be obtained by viewing a situation from multiple, culturally specific, empathetic points of view (Fables & Park, 2005). When academics were consulted to independently assess the tool they immediately recognized that the tool had the potential to be applied equally well to business intelligence gathering. Hence, the goal of this paper is to first make the case for the inclusion of cultural considerations in the gathering and analysis of business intelligence, then to present a discussion of the design of the CSM and how it operates, and finally to consider the limitations of automated information gathering and analysis systems.

BUSINESS INTELLIGENCE

The terms business intelligence (BI), competitive intelligence (CI), market intelligence, and even environmental scanning are often used interchangeably (Bouthillier & Jin, 2006). However, while some may consider it overly punctilious, many make a distinction between BI and CI (Fleisher, 2003). In keeping with that differentiation, we will use the term business intelligence. According to Frates and Sharp (2005) BI reflects a broader strategic orientation and use for information than does the more narrow definition of CI. Competitive intelligence is often limited to competitor intelligence, focusing on identifying, monitoring, and understanding specific current competitors, whereas BI targets any information in the business universe that affects a firm’s ability to compete. This broader perspective targets developments beyond the current competitors and the immediate industry to anticipate significant marketplace changes that affect both a given industry and a particular competitive market arena. Therefore BI is becoming an accepted means of gathering and analyzing information for use in developing global strategies.

Organizations use the BI process to gather information, to add value to it through analysis,
Related Content

Searching for Herbert Simon: Extending the Reach and Impact of Business Intelligence Research Through Analytics
Michael F. Gorman, Donald E. Wynn and William David Salisbury (2013). International Journal of Business Intelligence Research (pp. 1-12).
www.igi-global.com/article/searching-herbert-simon/76908?camid=4v1a

Intelligent Systems to Support Human Decision Making
www.igi-global.com/chapter/intelligent-systems-to-support-human-decision-making/107327?camid=4v1a

Advanced Methodologies Descriptions and Applications
Brad Morantz (2014). Encyclopedia of Business Analytics and Optimization (pp. 57-65).
www.igi-global.com/chapter/advanced-methodologies-descriptions-and-applications/107214?camid=4v1a

An Introduction to Information Technology and Business Intelligence
www.igi-global.com/chapter/introduction-information-technology-business-intelligence/7502?camid=4v1a