APPLICATION OF THE AHP/ANP IN FOOD QUALITY MANAGEMENT

Anna Greda
Warsaw University
Department of Management
Warsaw, Poland
E-mail: akgreda2004@yahoo.com

ABSTRACT

The objective of the present study is to demonstrate the application of multicriteria decision making methods in selecting the most efficient option of quality management system in food industry. Most studies concentrate on single aspects of quality management, instead of looking at the problem more holistically by analysing all factors and often complex relations between them. In response to this shortage, the present study proposes a more holistic model of successful quality management of food products. The Analytic Hierarchy/Network Process (AHP/ANP) were applied to build and analyse the problem. The successful quality management has been defined here as a goal of *improving the quality of food products and increasing the company management effectiveness*. The overall model comprises Benefits, Opportunities, Costs and Risks and consider a range of various factors influencing the decision problem. The AHP/ANP results are based on empirical survey (questionnaire interviews) carried out with managers in three leading food enterprises in Poland. The problem presented in this paper is very important not only in Poland. B,O,C,R models of *improving the quality of food products and increasing the company management effectiveness* can be successfully applied by food enterprises to choose the most appropriate quality management systems. Other methods applied to solve this problem would likely fail to analyse these dependencies so thoroughly. Last but not least, the rules of building the B,O,C,R models to select the best option of quality management system in food industry can also be applied in other than food companies.

Keywords: quality management, food products, BOCR analysis, AHP/ANP