AN ARCHITECTURAL FRAMEWORK FOR GENERATING FOOD SAFETY KEY PERFORMANCE INDICATOR

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Abstract

Information Technology proved its effectiveness in all industry fields, taking the competition to unexpectedly high levels. Identifying the essential parameters is vital to success. In different fields, business processes monitoring is also essential. In the food industry, for example, food hazards may occur in any stage of generating food, from agriculture to serving. This research uses data mining techniques to propose an architectural framework that can be utilized as a guide for food contamination prevention. The proposed framework aims at detecting the current food status, determining the suitability of the current conditions compared with the required conditions, and alerting users of near-threshold conditions. The framework predicts the available parameters for maintaining the foodøs acceptability and includes a plan to follow. The research provides a prototype with a benchmark dataset for proving the applicability of the proposed framework.