



5S applications in furniture manufacturing environment

Abdullah Sütçü^{1,*}, Seçil Cansu Binici¹

¹ Department of Forest Industrial Engineering, Forestry Faculty, University of Süleyman Demirel, Isparta, Türkiye

* Corresponding author: abdullahsutcu@sdu.edu.tr

Abstract: Turkey's forest products sector grows continuously and is a sector that seeks to gain a significant share in international markets. While Turkey is the largest producer of wood based board industry in European markets, the furniture industry is growing more and more every year with an average growth of around 13%. It is necessary for the sector to increase its efficiency and effectiveness so that these advantages can continue and improve. And it also necessary to use advanced production systems applied in manufacturing sectors more effectively in global markets. The 5S system is a key component of a Japanese original philosophy known as the Toyota Production System (TPS) or the lean manufacturing system, based on eliminating all the wastes in the production area. The 5S application is a systematic approach aimed at creating a regular work environment and making sustainable management style. It is the whole of the (sort, set in order, shine, standardize, sustain) activities expressed by the combination of the English initials activities that should be repeatedly applied in 5 steps in order to enable the work and production to operate in a certain system and in certain flow and order. This system also introduces a corporate culture created a regular and organized work environment in organizations. This culture offers opportunities for improving the quality, efficiency and efficiency levels of the business by combining motivation and discipline in the working environment. The purpose of this study is; to observe the activities that 7 enterprises applying lean manufacturing system in Turkish furniture industry as 5S applications and to determine good practices by exemplifying ones selected from these activities. Thus, for the furniture industry enterprises that want to increase their efficiency and effectiveness, a road map was created to follow in 5S applications Under this road map, the steps of sorting, set in order, sweep, standardize and sustain have been examined by photographing with good practices from different enterprises. Obtained gains are expressed by post-pre-analysis. Observational data obtained as a result of the study will contribute not only to furniture industry enterprises but also increase efficiency and effectiveness, to provide competitive advantage and to spread these gains for small and medium scale production workshop type manufacturing enterprises.

Keywords: 5S, Toyota production system, Furniture industry, Productivity