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Sustainable Human Resource Development in logistics services for ASEAN Member States

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Chapter 4 – Palletizing

Objective and Introduction

4.1 Type of Pallets

4.2 Palletizing of cartons boxes





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Objective

Students should be conversant on the use of pallets in unitization of cargo. Students will also understand the types of pallets commonly use throughout the world.



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4.1 Type of Pallets

Although pallets come in all manner of sizes and configurations, all pallets fall into two very broad categories: "stringer" pallets and "block" pallets. Various software packages exist to assist the pallet maker in designing an appropriate pallet for a specific load, and to evaluate wood options to reduce costs.

Most pallets are wooden but pallets can also be made of plastic, metal, paper and recycled materials.

- a) **Stringer pallet**
- b) **Block pallet**
- c) **Perimeter base pallet**



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4.2 Palletizing of cartons boxes

Because most products are shipped in corrugated fiberboard boxes of various designs, sizes, and shapes, the following discussion is for the most part about the preparation of unit loads of corrugated fiberboard boxes. Unitized loads may, in fact, consist of almost anything, from corrugated fiberboard boxes, sacks, bags, drums, pails, and trays to individual items such as stoves, refrigerators, washing machines, and clothes dryers. Each of these types of container or product presents its own peculiar unitization problems.



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The essential steps in unitizing are, first, stacking the load on pallets or slipsheets, and then stabilizing the load by one of several methods. Antiskid or adhesive treatment may be applied to prevent movement of individual parts of the load. Strapping may be attached around the load, using a tensioner to tighten the strap and a seal (applied by crimp or notch sealer) to secure it in place, or using a combination tensioning-and-sealing tool. The load may be wrapped in shrink film and heat applied to shrink the film close about the load, or it may be wrapped in stretch film or stretch netting under tension so that it clings to the load.

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Conclusion:

Palletizing is the best known method thus far to put together small packages as one unit. This method makes handling goods safer, faster and more efficient.

Human contact is lessened by usage of forklift and any other material handling equipment.



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