

LOAD SENSE

By Mike Barton, Managing Director B&B Attachments

When goods have to be handled along the internal and external logistic supply chain, from incoming raw materials through their manufacturing process and up to their delivery to the end user, pallets are practically indispensable.

Therefore, the forks that pick up pallets are the typical standard attachments preselected by forklift truck OEMs. But what are the alternatives when:

Expensive production pallets (such as those made from stainless steel or plastic for hygiene reasons) must be returned.

Wooden pallets have to be exchanged (because of a growing number of countries no longer allow the import of unfumigated wooden packaging materials)

A cheaper, one-way pallet is used to reduce packaging costs, resulting in a more attractive price for customers

Transport volume in containers, trailers and railway wagons is to be optimised

Load carriers have to be eliminated because the recipient of the goods will not accept the related cost.

Nowadays, palletless transportation of certain loads can be achieved with standard fork clamps with relevant slip-on arms that embrace the load, usually with dedicated attachments such as block and brick clamps, bale clamps, drum clamps and roll clamps.

Large Surface Clamp

The ideal attachment for palletless handling of carton-boxed goods is large-surface clamps – their large rubber-coated arms grab cubed loads from the side.

Applications for these clamps include handling white and brown goods. Now, companies such as Kaup have met the industry's efficiency demand of handling even bigger cubes by creating innovative telescopic profiles for clamps. Instead of using the same clamp attachment, it is possible to handle either one household appliance at a time or up to 16 units in one go. The ability to load a full container or trailer width (2,400-2,500mm) at a time substantially increases the efficiency of handling such cargo.

Using A Pusher

Some goods cannot be grabbed from the sides, e.g. bagged goods containing coffee, sugar or plastic chips. These can be depalleted by means of a pusher, which consists of the carrying part – usually a plate – and a hydraulically operated pushing grate that moves the load to the front.

Pallet Turnover Clamps

One method of repalletising is the pallet turnover clamp. This attachment features a rotating arm with fork pairs on both arms. An empty one-way shipping pallet is loaded onto the first (upper) fork pair, and after being rotated 180°, the clamp opens so that the lower fork pair can insert the production pallet under the stack. After closing the clamp and rotating back 180°, the load is then placed on the shipping pallet. By opening the clamp, the production pallet stays on the upper forks and can then be placed on the floor to be returned into the work cycle.

Push-pull Handling

In cases where goods are likely to be shipped without pallets, or where comparatively expensive pallets are to be replaced with a cheaper variety, slips sheets can be taken into consideration.

A push-pull is similar to the pusher system but features a hydraulically operated gripper bar at the bottom of the pushing grate, which grabs the flap of the slip-sheet.

Standard forks are the lift-truck OEM's traditionally supplied attachment, but the trend towards depalletising, repalletising and palletless handling calls for other solutions. Whichever the system handling is preferred; there is an attachment that can provide all the required configurations.

