

STATUS REPORT: Warehousing/Material Handling

CASE STUDY: PROCTER &amp; GAMBLE CO.

## Case Pick System Cuts Damage Rate, Speeds Training

CPG manufacturer sees 'automatic' gains in unsaleables and staff turnover.

By Alan Robinson

The folks at Procter & Gamble's manufacturing and distribution center operation in Iowa City, IA, take their hair care products personally. As they do mouthwash, diapers, soap, cough medicine and even women's hygiene products.

They handle more than 1,300 different brand codes at the Iowa City manufacturing plant and distribution hub, so they are concerned that products leaving the DC make it to the store shelves unencumbered and undamaged. Cincinnati-based Procter & Gamble, which over the years has made great strides in reducing the cost of unsaleable goods, learned early on that accurate case picking and pallet making went a long way toward keeping shipments free of damage.

P&G implemented the AutoPalletP3 system eight years ago to enhance its case pick operation. Since then, the company has created opportunities to ship damage-free and in more efficient truckloads. Simultaneously, P&G has dramatically cut down training time for case pickers.

"AutoPalletP3 is an add-on to a warehouse management system (WMS) that helps case pickers work more efficiently," says Thomas Moore, principal, Moore and Associates Inc., Franklin, TN, which developed P3 with Procter & Gamble.

Procter & Gamble has agreed to let Moore and Associates license AutoPalletP3 on its own. It's also encouraging retail and wholesale customers to implement P3 so they can reduce damage rates. P&G chose the Iowa City DC to implement P3 because it's an intensive case pick operation



**TIME SAVER:** AutoPalletP3 helps P&G cut its training time for case pickers from four weeks to two or three days.

with high employee turnover.

P&G manufactures a number of health and beauty care (HBC) products at its Iowa City plant. "We make all the Scope mouthwash for North America, along with Pantene, Vidal Sassoon, Head and Shoulders, Pert, Ivory and Physique, a new shampoo that was launched just a few months ago," says Dean Anderson, a systems/logistics technician at the 350,000-square-foot DC.

The DC, located down the road from the plant, also serves as a distribution hub for other P&G manufacturing plants.

The facility is in operation 24 hours a day, Monday through Friday, with three eight-hour shifts of 70 to 80 case pickers. "We usually run one shift on Saturday, depending on the time of the year," he says.

P&G contracts out its labor in Iowa City. "With contract employees we have a pretty big turnover, and it takes three to four weeks to train a new worker," says Judy Miller, a technician who oversees case pick operations and P3.

Since contract work tends to be seasonal, Miller points

out, high turnover and training creates a new set of problems. P3 has helped speed up the training process, in addition to building better pallets and reducing damages.

"Some of the pick orders we get here would be scrambled with odd cases and even layers," Miller explains. "It takes an experienced case picker to figure out where to start to build and where to stop, and then put in another pallet and continue."

Untrained case pickers have a tendency to build pallets that don't reach their full height capacity or, at the opposite extreme, they build them so high they won't fit through the dock door, says Miller.

"A person coming in the door now will spend about two to three days with a trainer, just to get the feel of driving a forklift and the layout of the case pick areas," she says. "Then they are turned loose on their own because P3 will go through and tell them step by step when to pick, when to put a pallet in, and when to finish an order.

"It's reduced our training time from four weeks to two to three days," she says.

Hair care products like Pantene aren't shipped in quantities like Tide detergent. They tend to be smaller orders, rarely shipped in full pallet loads.

"Most of our shampoos are 24 cases to a layer, 96 cases to a unit," Miller explains. "So if a customer orders 30 cases, which is a layer plus six odds, P3 will go through and pick that layer and then pick six odds for the top.

"Some customers order in even layers, but most do not," she says. "They will order a 'layer plus 10' or a 'layer plus five.' P3 will put those odd cases together to form layers, so you still have a level set."

P3 has dramatically cut the damage rate at Iowa City. "Before, you pretty much had to be a rocket scientist to be efficient and pick a good, damage-free unit to ship to a customer," says Anderson.

The system includes weights and measurements for each brand code. P3 runs off the measurements of those boxes. Each brand code is also assigned a "crush value," based on density.

"We get the specs from corporate but we go through the process of measuring the products ourselves just to be more exact," says Miller.

Since implementing P3, the damage rate at Iowa City has been cut by 75 percent. P3 has also improved load planning for truckload shipments, since it can accurately assess combination loads of heavier products like soaps and shampoos, which tend to weigh out a truck, and lighter paper products that will cube out.

For information, go to: Moore & Associates  
[www.AutoPalletP3.com](http://www.AutoPalletP3.com)