Case Study PalletQuilt® Protects Drums of Frozen Cranberry Puree From Thawing on International Airfreight Shipments

Challenge

When it comes to temperature controlled airfreight, limited capacity and high costs are not uncommon. A global export company was looking for an alternative solution to reduce temperature exchange for their international shipment. The goal, keeping drums of frozen cranberry puree from thawing during transit, without temperature control. The high density of this commodity packed in four 55gal drums per pallet, coupled with a 24-36 hour transit window, allowed an opportunity for the right passive thermal solution to protect the cargo during transport from origin to destination. An additional challenge was presented with the export company's lack of warehouse space and personnel. This required the additional service of applying the thermal covers to the shipment, prior to arrival at the airport for loading.

Solution

Enter QProducts & Services' PalletQuilt®. The PalletQuilt® is an insulated pallet cover used as a viable alternative to refrigerated transportation. PalletQuilt® captures the existing environment of temperature sensitive freight and helps maintain a safe temperature range throughout the transportation process. The application is easy, and the "quilts" can be applied in under a minute, much like a toaster cover going over a toaster. Based on the parameters of the airfreight shipment, PalletQuilt thermal covers were the recommended solution for the job. With respect to the application requirement, the load of frozen cranberry pallets were rerouted to the QProducts & Services facility where their team unloaded, covered, and reloaded all pallets in under an hour. The protected load of frozen drums then made it's way to O'Hare International airport for departure.



"One-man" application process

PalletQuilt® covers slip over four drum pallets and tote tanks, complete with tightening straps and BOL windows







Route: Chicago to Scotland



Challenge: Maintain Frozen



PalletQuilt® insulates frozen drums to minimize temperature

exchange during transit

Solution:



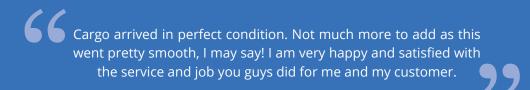
Watch Application: on.mjmc.com/cranberries



Test Results

Once the product was offloaded at the airport, the cranberries were removed from the temperature controlled environment, being protected only by the PalletQuilt® solution. Exposure on the tarmac was mitigated, and in flight, the temperature exchange was drastically reduced by the quilt's insulating performance. Upon inspection at destination, the drums were still frozen and the product integrity was preserved. The customer realized a sizable cost savings, but more importantly, was able to move their product when temperature controlled airfreight was not available. Supply chain disruptions were avoided and the end customer was very pleased with the process from A to Z.





— Logistics Manager, Export Company



