**Title**: End-to-end Integration

**Subtitle**: *In the era of digitisation and the Internet of Things, AW Rostamani Lifestyle has adapted AI, machine learning and robotics to be a showcase of integration between the front and back-end of the supply chain at its new American Rag store in Dubai Mall.*

When AW Rostamani Lifestyle began putting together the logistics and supply chain plans for its new American Rag store, which was opened at Dubai Mall in October, it knew that the new, uber-millennial brand was going to need a more advanced back-end logistics operation than anything that had come before it. “The whole shape of retail is changing, omnichannel is the future. Brick and mortar retail outlets aren’t dying, but they are evolving,” says Greig Fowler, CEO of AW Rostamani Lifestyle. “When it comes to the millennial customer, they want the digital and the retail experience under one roof. The next generation of retail customer has more trust in the digital than the human.”

According to Fowler, this is because the future retail customer knows that computers don’t lie. “Millennials are wary of sales staff, but they know that computer will give them a direct answer, either the product is in stock or it isn’t, either it can be delivered today or it can’t.” It’s for this reason that AW Rostamani Lifestyle has integrated AI and e-commerce simultaneously into the format of American Rag.

They partnered with actiMirror so that all the mirrors in store have a barcode reading functionality. The mirrors will be able to give customers more information about the product they’re trying on. “It’ll tell you the price, the size, the style, but it’ll also make recommendations on what completes the outfit and will tell you whether these other items are in the store or in the warehouse,” says Fowler. “If it isn’t available in the store you can order it to your home.”

Another partnership came in the form of Pepper, the humanoid robot from SoftBank. While Pepper has been used to some extent as a customer-facing chatbot by banks, airports and even government departments, she’s never been deployed to this extent. “Pepper has never been used in a retail setting as a fully transactional e-commerce module,” says Fowler. “She’ll known every product in the store and where it is, she’ll be able to make recommendations and she’ll be able to take orders and have products delivered to the customers home.”

Pepper is also able to accept payment directly there in the store and have products dispatched from the distribution centre before the customer has even left the mall. These systems enable AW Rostamani Lifestyle to use the store as a warehouse, showroom and retail hub all in one. “We’re thinking ahead of the curve in terms of how our retail supply chain works,” says Fowler. “You have to constantly reinvent your proposition for the customer and the front-end, the store or website, and the logistics back-end can no longer be two separate entities.”

In the coming months Fowler also wants to introduce a pre-order capability to AW Rostamani’s e-commerce platforms, and its customer-facing AI and robotics systems. “So if a product isn’t in the store but is enroute, you’ll be able to order it while it’s in transit, and then have it delivered to your home, or do a click-and-collect,” he explains.

“What we’re doing is re-working the logistics of our purchase order program. So when we place a buy for a new vendor, we create the purchase order and the item master and they can take a picture of the item and it’ll automatically populate all the fields in advance. As soon as we get a shipper receipt, it’ll populate on our system automatically,” he says.

So no matter which system AWR’s customer is using (the store mirror, the e-com platform or Pepper) those systems will be able to show the customer items that still match the product they’re viewing (a t-shirt that goes with a certain pair of jeans for example) and the customer will be able to buy that before it’s even reached the store or DC.

“All of this is indicative of the shape that retail is taking,” says Fowler, but he adds that this is just one reason that AW Rostamani Lifestyle was interested in integrating its platforms. “Another huge advantage is recommendation engines,” he says. “You’re using real-time customer data to help drive more sales and I think that’s the more sensible way. They retain thousands of styles of data, you don’t have to spend a year training a member of staff, which is a major benefit. You also get accurate stock data. But more than that it also helps you with tracking customer engagement, so the mirror can tell you which items have been tried on, and you can correlate that against sales to figure out whether there are some products that just aren’t selling.”

“It will also help with inventory counting and tracking. It’s basically Blockchain technology, as soon as there’s a sale, all platforms are updated,” Fowler adds. And this will boost revenue by eliminating or vastly reducing the retail trend of discount bins at the end of a season. “If every platform always has access to every point of stock then you’ll always sell down to the last items, rather than having some stores that are over-allocated smalls or mediums and have to do a sale to shift excess inventory.”

By next summer AW Rostamani Lifestyle plans to have the recommendation engines feeding into its merchandising reports, so rather than having reports that humans analyse, they’ll make recommendations on purchasing, pricing, replenishment and so on. All of this required significant investment, including the establishment of a new 22,000sqm distribution centre in Dubai Industrial City, from which five of AWR’s retail and lifestyle brands are distributed. It also required changes to the existing logistics processes.

“We’ve had to line up the consolidations because we have many different brands, one of which is American Rag. The manual intervention of consolidating orders was the greatest impact,” says Fowler. “We want to make sure the customer doesn’t have double handling. So if the customer orders two items in store and one in transit, we want to consolidate that and provide one delivery.”

AW Rostamani Lifestyle is the first retailer in the region to be doing all this, says Fowler. “Customers are using robotics at the moment for data acquisition and fun, but we’re the first to make robotics transactional, you can pay in store, check stock acquisitioning, or make an order for delivery,” he explains. “For this reason, by May next year we will without doubt be the most advanced, integrated AI and robotics retailer in the Middle East.”

**AW Rostamani Lifestyle’s new Distribution Centre**

The warehouse in DIC is 22,000 sqft, operating 5 brands, but has been developed for future expansion. “There are three more warehouses that we can grow into,” says Greig Fowler, CEO, AW Rostamani Lifestyle. “We’re doubling our logistics fleet for UAE deliveries and we’re also expanding our sister companies AWR Logistics and Kar Freight & Forwarding.”

The warehouse was designed and built with the plans for American Rag in mind, with the bin locations and racking systems built around that. “It’s an extremely flexible system because of the wide range of products that we have stored there. It can hold up to 75,000 to 80,000 units. It’s operated in a similar way to an e-commerce warehouse and also has separate sections for dangerous goods like candles and household fragrances,” says Fowler. “The WMS system has a virtual bin setup so that we can separate retail, e-com and wholesale distribution”

**Operating a GCC-wide fulfilment operation**

AW Rostamani Lifestyle has had to adapt its operations to get around some of the bureaucratic hurdles that come with cross-border deliveries. With Saudi Arabia accounting for around 40% of its online sales turnover, it became essential to reduce the delivery time between the UAE and the Kingdom. “Fulfilment requirements are the biggest challenge to running an online retail operation in the GCC. Initially when the big brands were doing e-com several years ago it was acceptable to deliver in three to five days,” says Greig Fowler, CEO, AW Rostamani Lifestyle. “Now, in the UK, they’re delivering within hours. There’s a move toward better quality and quicker turnaround, but the customs set-up across the GCC is a huge impediment to that.”

AWR got around it by setting up multiple hubs, following SOUQ and Noon.com’s example. “Without a dedicated hub in Saudi Arabia for example, you’re looking at possibly 7 days to get an item from the DC in Dubai to the customer in Jeddah or Riyadh,” says Fowler. “This year we’re going to implement two control hubs in the region, one in Kuwait and one in Saudi Arabia, so that we can do stock movement across border but with our own logistics company. We have two logistics companies at the moment, AWR Logistics, and Kar Freight & Forwarding. So they will collect from the DC and do a B2B cross border and then a B2C delivery to the client.”

This will take the delivery time for AW Rostamani Lifestyle from 5 days to 3 days, says Fowler. “The UAE is easy because we have our own drivers and our own fleet, so for most orders we’re able to do same-day delivery across the UAE,” he adds.