

Emerging Trends in US Logistics



At the first event for the 2010 year in Sydney, Lisa Brown, 2009 Logistics Development Award (LDA) winner, gave a

presentation on Emerging Trends in United States Logistics. Her insights were gathered at the annual Council of Supply Chain Management Professionals (CSCMP) Conference, held in Chicago in September 2009, as well as her participation in a range of best practice tours including CHEP's Innovation centre in Orlando, Florida.

Lisa is a Logistics Officer in the Royal Australian Air Force posted to Aerospace Systems Division (ASD), a Division of the Defence Materiel Organisation. A member of ASD's Directorate of Logistics, Lisa is currently posted to an In-Service Support role responsible for examining ASD's inventory management performance reporting systems.

Trends in U.S. Logistics

The over-riding driver of trends in both the CSCMP's 20th Annual State of Logistics Report and annual conference was the Global Financial Crisis (GFC).

Over the 2008/2009 FY the U.S. experienced:

- Low growth rates (close to 2001 recession levels),
- High unemployment (which during the period rose to a 25 year high),
- Plummeting retail sales resulting in a sharp decrease in purchasing and ordering, and
- Inventory levels unable to be adjusted quick enough to cope with the sudden decrease in demand.

As a result volumes shipped plummeted and abundant capacity, particularly in trucking and ocean shipping, pushed rates down, often below costs.

In terms of industry turbulence, the 20th Annual State of Logistics Report, stated that the Transportation and Warehousing Industry was among those hit the hardest, with 300,000 jobs lost and more than 3,000 trucking companies going under since the beginning of 2008 (equating to approximately 7% of U.S trucking capacity).

For FY 08/09, U.S. Business Logistics Costs were equal to 9.4% of nominal GDP (a decrease of \$49b over the previous FY's figures).

All of this economic turbulence added up to a massive Supply versus Demand imbalance and a fairly volatile industry, struggling to shrink inventory levels in line with market shifts and stay afloat.

What does all of this mean to the USA now? According to the CSCMP 20th Annual State of Logistics Report, the USA is entering a period of stabilisation and the stabilisation period is likely to be a protracted one with the U.S. unlikely to return to pre-recession levels until 2011 timeframe (some say beyond). Even so, there are already some positive signs being seen to indicate the U.S. market and indeed the U.S. logistics industry is stabilising with evidence of many in the industry beginning to put into place more focused and sustainable plans and find new ways of coping with decreased demand (for many, this has meant diversification and/or an increased focus on service provision and the services sector). In warehousing, for example, this has translated to an increase in value-added service. Many others are placing a renewed focus on LEAN and

technologies that aid optimisation, efficiency and overall productivity and there is also the Obama Administration's Federal Stimulus (American Recovery and Reinvestment Act of 2009) which is said (by some) to be making an impact, of which \$45 billion of the package has been dedicated to transportation infrastructure-related projects.

All of these things are contributing to the recovery; they are not a silver bullet but a start which will eventually bring about stabilisation and hopefully a not-too-distant-return to pre-recession levels.

Key Trends

With the industry still reeling from such economic turmoil, the key 'take away' message from both the CSCMP 20th Annual State of Logistics Report and the CSCMP conference was sustainability. It is therefore not surprising that many of the trends for 2010 are focused towards building more sustainable and resilient supply chains for the future.

Seven major themes or trends stood out - all relating to achieving improved sustainability. These trends have a 'back to fundamentals' flavour which is likely be present for some time as those within the industry re-group and consolidate the supply chain lessons learned over the last 12-18 months.

The key trends highlighted were:

1. Improved Risk Management. Better understanding and calculation of risks and development of contingency plans.
2. Renewed Commitment to Collaboration and Partnerships. In the words of Ann Drake, CEO of DSC Logistics, and one of the speakers at the CSCMP Conference, "collaboration is the currency of this century...across companies, across geographies and across silos". Furthermore on this particular trend, an interesting case study written and presented by Lincoln Wood from the University of Auckland at the CSCMP examined collaboration – not just between suppliers and suppliers of

suppliers, but between competitors (in the context of the NZ oyster industry). His study found it was not cost nor profit prohibitive to collaborate with competitors provided barriers such as trust etc could be overcome. New paradigms are beginning to emerge challenging the way we have traditionally thought about collaboration and partnerships.

3. Optimisation. Harnessing technologies which aid in improved optimisation, efficiency and overall productivity.
4. Validation of Supply Chain Design and Sourcing. Taking steps to redesign supply chains in order to improve bottlenecks and friction points – this includes taking a fresh view of distribution networks, freight flows as well as potential sources of supply.
5. Process Improvement. Striving for better ways of doing business and devolving ownership of process improvement as much as possible.
6. Monitoring Up and Downstream of the Supply Chain. At CHEP, they use the phrase "chain of custody" when describing monitoring up and downstream of the supply chain, starting at the origin with the lumber source by ensuring all timber is sourced from sustainably managed forests. CHEP ensures the integrity of supply chain inputs through a combination of strong partnerships with their suppliers and a robust due diligence framework.
7. Improved Sustainability.

Case Studies

In demonstrating the seven trends above, two case studies were highlighted in Lisa's presentation: Walmart and Johnson Controls (a leader in automotive interior systems and batteries).

Walmart

Walmart's keynote presentation at the CSCMP was delivered by Mr Gary Maxwell, Senior Vice President of International Supply Chain for Walmart.

Gary Maxwell passed on three key messages.

Firstly, he discussed Walmart's Supply chain design always starting with the customer. According to Walmart, 'bottom up' is the key to building best-in-market supply chains with managers being empowered to set the goals.

In particular, he discussed supply chains fitting and aligning with market maturity and used the India versus Japan context as a framing example, whereby market maturity differs to the extreme based on levers such as: customer expectations, leadership development, infrastructure, land and labour costs, asset allocation and risks, and laws and regulations. Using the information derived from in-depth analysis of these levers, Walmart ensures its supply chains align with market maturity.

In the words of Gary Maxwell of Walmart, the way to achieve best-in-market supply chains is to:

1. Think like a customer,
2. Be compliant,
3. Fit the market's maturity curve,
4. Set high expectations for low cost, and
5. Be sustainable.

Secondly, Gary Maxwell announced Walmart's plan to develop a worldwide sustainable product index. The index is in response to increasing customer demand for knowledge about the lifecycle of the products they are buying. In partnership with suppliers, universities and others, Walmart hopes to create a global database assessing the lifecycle of products – from raw materials to disposal – by applying a rating to such things as product ingredients, how it has been produced and what it does environmentally when it is consumed. The index project is a big investment on the part of Walmart and illustrates they are paving the way when it comes to supply chain leadership, collaboration and supply chain sustainability initiatives.

Finally, Gary Maxwell's thoughts about optimisation were that inventory was often "the overlooked cost" and that

"a supply chain design that treats inventory as a fixed variable will miss transformational opportunities".

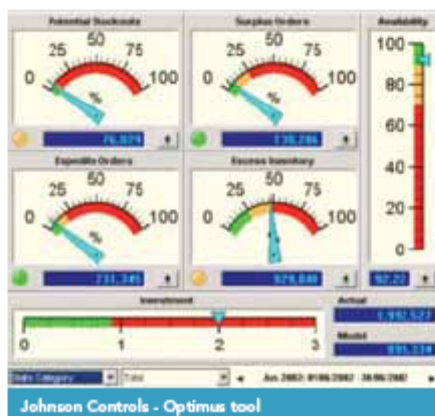
Johnson Controls

Johnson Control's presentation at the CSCMP conference, delivered by Mr Michael Maltz, focused on one of the common challenges experienced by many in the industry: minimising inventory while optimizing supply/production and maximising product available. Examining gaps and broken links in processes was the key to overcoming these challenges at Johnson Controls.

In the Johnson Control's example, the solution implemented was a global materials management approach linking together sales, marketing, engineering and production in order to refine forecasts and achieve Key Performance Indicators (KPIs) such as Daily Inventory On Hand and On-Time Delivery.

The tool Johnson Controls used to help them achieve this was Barloworld's Optimus, used strategically for forecasting and tactically to reduce inventory and highlight orders requiring expediting. The Optimus tool provides Johnson Controls with a cockpit-type visual representation of: potential stockouts, surplus orders, expedite orders, excess inventory, availability and investment.

According to Johnson Controls, having access to this information in readily accessible and easy to read format, assisted strategic and plant level SKU managers (as well as suppliers who are



given read only access to the system on a weekly basis) to achieve their targets.

The point delivered by Johnson Controls was that simplicity is the key, "the process may be complex but breaking it down into a simple intuitive methodology is extremely important if people are going to understand and make use of the information".

Australian Trends

Although Australia fared the GFC a little better than the U.S., comparatively, there is no doubt we have also experienced a slowing down of our economy which has had a trickle down effect to our own logistics industry. Many, if not all, of the trends impacting the U.S. at the current time therefore resonate with the Australian experience.

The opportunities created by the GFC are similar also. Like the U.S., the Australian logistics industry should be using the current slow down as an opportunity to review supply chain fundamentals and to make sure what we are doing is as efficient as it possibly can be and sustainable for the long term.

Like Walmart, and others, we also need to be forward looking and always thinking about new ways of doing logistics and designing supply chains. As Ann Drake said, "the future of supply chains is that you think you are thirsty and a coke appears in your hand". Ann Drake's vision resonated with the CSCMP audience because it aptly described the way that supply chains are not intended to be seen by the end user. The time and effort we invest in supply chain fundamentals is absolutely crucial to getting the seamlessness of our activity right.

To summarise, the aftermath of the GFC has made it inevitable that the global logistics community re-group and consolidate the lessons we have learned. To do so, many in the industry will be looking at leveraging from the U.S. experience. The U.S. Logistics industry does not want to see a repeat of FY 08/09 and the way to avoid that is to: better understand risks, develop plans to

mitigate them, strengthen relationships with suppliers, suppliers of suppliers and even competitors, re-validate supply chain design, develop quality processes and ensure cross-company knowledge of them, devolve authority for process improvement, reduce excess inventory/waste/overheads, monitor and communicate. Hopefully with all of these activities occurring in unison, under the umbrella of an enduring framework, supply chains will indeed be more resilient and sustainable in the future.

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(l-r) Rob Spencer, CHEP Asia-Pacific; Lisa Brown, 2009 LDA Winner; Brad Harrison, LAA President.



LAA Members and guests at the LDA 2010 launch/ breakfast meeting in Sydney.