

Supply Collaboration Is a Reality – But Proceed with Caution

<http://peterson.ascet.com>

Karen Peterson
Lora Cecere
 Gartner Group

Gartner Group examines key functionality, industry trends, and the future direction of collaborative supply chain processes.

Introduction

Although collaboration has been the dream of Supply Chain Management for more than five years, 2000 was the year when it finally became a reality. The collaborative solution set centers on the sharing of time-phased data based on Supply Chain Planning time

actively, smaller trading partners are supporting standards to reduce the cost of implementation, as multiple masters drive dissimilar semantics and processes. Active pilots are starting between businesses at industry pinch points for singular processes (see Figure 1).

Process		
Differing Goals ↑ Common Goals	Complementary	Coercive
	Manufacturers collaborate for leverage	Channel master dictating the use of CPFR
	Same organization using internal collaboration	Channel master forcing the use of deduction services for perfect invoices

Figure 1 – Supply Chain Collaboration Matrix

definitions (see Note: 1) at an agreed upon frequency (most current pilots are weekly comparisons). There are currently more than 100 pilots using Supply Chain Planning in combination with collaboration products.

Current collaborative products are immature and rapidly changing. Although such initiatives as CPFR (Collaborative Planning, Forecasting and Replenishment) within the retail and consumer goods industries have been “under construction” for over four years, only recently have large channel masters begun driving pilots. In 2001, most Type A (see Note: 2) enterprises will participate in between two and five collaborative pilots, with channel masters focused on singular processes at industry pinch points (0.9 probability). As large enterprises are striving

Supply-Chain Collaboration Product Definition

A collaborative supply chain solution set centers on sharing time-phased data based on Supply Chain Planning time definitions at a set frequency (most pilots are weekly comparisons). In contrast to the e-marketplace focus of transactional activities, supply-chain collaboration products structure events or data for consensus. They can be

deployed within an enterprise to unite functional or geographical areas, or among trading partners for future decisions.

Key considerations for users that are endeavoring to deploy collaborative technologies include the following elements:

Configurable Calendaring

Each trading partner will have different calendar requirements for period (weekly, monthly, yearly) start times, holidays, and shift start times. Due to a current lack of flexibility in the offerings, channel masters are dictating the calendars based on their calendar definitions, resulting in disparate views for a trading partner managing many relationships. Syncra, Manugistics’ NetWORKS Collaborate, and i2 Technologies Rhythm Collaborative Planner lead with flexible calendaring options.

Scalability

Although early systems were hampered by slow response and thick-client architectures for collaboration on the Web and within a hosting environment, progress is underway towards scalability advances and robust browser-based solutions. Users should ask for benchmark data, references (if available), and host a pilot before making a vendor commitment.

Data Aggregation and Hierarchy Flexibility

Flexible aggregation and hierarchy definitions are key to data sharing. Since neither

Karen Peterson is a Research Director for Gartner’s Research and Advisory Services in the Enterprise and Supply Chain Management (ESCM) research center. Ms. Peterson conducts research on Supply Chain Management trends and technologies, focusing on how to select, implement, and maintain supply chain collaboration and Supply Chain Planning applications.

Lora Cecere is a research director for Gartner’s Research and Advisory Services in the Integrated Logistics Strategies (ILS) research center. Ms. Cecere conducts research on supply chain planning trends and technologies, focusing on how to select, implement, and gain competitive advantage in c-commerce.

trading partner will have similar hierarchies for viewing/processing time-phased data, the software must have flexibility on aggregation and hierarchies to meet the needs of each partner. The flexibility should extend to both calendar as well as product axes.

Process Mapping and Workflow

Although early collaboration was based on simple processes (e.g., showing static data on a Web page and allowing trading partners to input responses), collaborative workflow is now being offered for multistep processes with templates and decision alerts. The workflow also extends beyond the traditional static front end to enable integration with enterprise back-office applications. One example is E3's six-step workflow process for promotion planning with options, approvals, and integration.

Traditional supply chain planning vendors are seeing competition in this area from traditional integration vendors such as Extricity and eXcelon.

Media Integration

Collaboration includes input media to aid decisions. Examples include advertising or promotion plans based on media options for promotion plan collaboration or the sharing of design documents and quality standards with graphical rotation of parts for manufacturing processes. Consensus agreements are contingent on review and agreement with the options as attachments.

Exception Message Handling

The software is exception-based, with flexibility for each trading partner to determine the threshold values by role and geography. With ever-changing roles, it needs to rapidly flex for multi-organizational requirements. Integration of collaboration exceptions into the Supply Chain Planning framework should be considered for ease of use.

Semantics

Trading partners differ in definitional data for item, price, and time, so data must be filtered through a semantic layer for communication. Vendors such as Manugistics and J.D. Edwards use third-party integration products to facilitate integration and data consistency.

Use of Standards and Synchronized Data

Standards bodies are defining processes and data standards for collaborative workflow within given industries. Voluntary Interdisciplinary Committee for Standards' CPFR and RosettaNet's PIPs (Partner Interface Protocols) are examples of collaborative process standards that are in progress. There will be exponential growth of these standards for industry-specific requirements. Enterprises should actively work with standards committees to shape the future of collaboration within a given industry as cross-industry standards are still many years away.

Selection of services or licensed offerings should be based on review of these eight elements. Some of the current vendors solutions are:

- Vendors offering collaboration as a packaged solution with supply chain optimization include Adexa, E3, i2, Logility, Manugistics, Oracle, and webPLAN.
- Vendors offering collaboration products as a future extension of SCP include Aspen Technologies, Demantra, SynQuest, PeopleSoft, Xelus, and SAP.
- Vendors offering collaboration as a stand-alone offering include Syncra Systems, Eqos Systems, and Lombardi.
- Vendors offering a hosted solution include E3, Logility, Manugistics, Nonstop Solutions, and Syncra.

more on the web

Find further analysis regarding the integration of collaboration in Frank Quinn's white paper at <http://quinn.ascet.com>

The Bottom Line

Supply collaboration has become a reality. Although the technologies are immature, aggressive pilot work will set the boundaries and definitions for trading relationships. Users should buy incrementally, realizing the market will change. Use of hosting and third-party services can help mitigate risks.

Additional Notes

Note 1:

SCP Time Fence Compliance

Collaborative applications compare time-phased data sets – one-to-one, one-to-many and many-to-many – with edit rules for the freeze period, operational, tactical, and strategic views. During the freeze duration, data cannot be altered by either party. Rules are established in advance for the recognition of the data set that will dominate if consensus is not reached before the calendar rolls to the freeze duration. Operational data is typically one to three weeks and is typically viewed in daily "buckets." Tactical data is typically of one-month to four-month duration and is frequently viewed in weekly increments. Strategic data is three to 24 months, with views often in months or quarters. Calendaring and flexible editing of the time fence is essential to ensure flexibility for differences in each trading relationship for accurate representation.

Note 2:

Type A, Type B, and Type C Enterprises

Enterprises are identified as Type A, B, or C, based on the aggressiveness with which they adopt and use technology. Type A enterprises are technology-driven and risk using cutting-edge technologies to gain a competitive edge. Type B enterprises are moderate technology adopters that tend to implement new technologies once they have entered the mainstream. Type C enterprises are technologically risk-averse and cost-conscious and are generally among the last to adopt a technology. ■