



### GDSN – Driving adoption: Looking back, moving forward

There is little debate over the value of data synchronisation and the GDSN, and there is agreement on the benefits and the need to engage. However, in 2007, two years after launching the GDSN, there was a tremendous amount of frustration due to the complexities and hard work associated with fully realising the benefits. Project Etoile was launched that year and has been the premier GDSN adoption programme, backed by the Boards of GCI, GS1 and GDSN, Inc., since then.

Four years of hard work have paid off, and the lessons learned from Project Etoile will help pave the way to greater global expansion of the GDSN.

The GDSN Board is currently developing a renewed GDSN strategy, and the lessons learned from Project Etoile are an integral part of this exercise. A new adoption programme for the Retail CPG sector will be set up to be more scalable and provide a comprehensive roadmap to successful engagement of the community at the local level.

This report is intended to share the lessons learned of Phase 2 of Project Etoile.



## Background

### About GDSN

The GS1 Global Data Synchronisation Network (GDSN) is built around the GS1 Global Registry, GDSN-certified data pools, the GS1 Data Quality Framework and GS1 Global Product Classification, which when combined provide a powerful environment for secure and continuous synchronisation of accurate data. With GDSN, trading partners always have the latest information in their systems, and any changes made to one company's database are automatically and immediately provided to all of the other companies who do business with them.



The vision for Global Data Synchronisation (GDS) is a “one to many” model that allows a single company to universally communicate standard information with all trading partners globally, thus ensuring a “single source of the truth” on product information while still allowing individual trading partners to customise their service to the target consumer.

### About Project Etoile

There is little debate over the value of data synchronisation and the GDSN, and there is agreement on the benefits and the need to engage. However, in 2007, two years after launching the GDSN, there was a tremendous amount of frustration due to the complexities and hard work associated with fully realising the benefits. Implementation challenges were not clearly understood, data pool interoperability was questioned, and there was divergence on global versus local needs. It was then agreed that GDSN was in the ideal position to lead an initiative to help / gain better understanding of implementation processes, challenges and barriers while facilitating progress and resolution of identified barriers. That initiative was backed by the GCI, GS1 and GDSN Boards and named Project Etoile.



In its first phase (2007), Etoile demonstrated that the GS1 GDSN infrastructure is in place and that it works: trading partners who are internally aligned and focused on executing data synchronisation through the GDSN see results. The integrity of the network and data pool interoperability was proven. Implementation and interoperability barriers, both real and perceived, were documented, and solutions were developed by the participants which propagated into best practices for the entire network.

For more information – download the report “Etoile 2007: Lessons Learned”:  
[http://www.gs1.org/docs/gdsn/Etoile\\_2007\\_Report\\_Lessons\\_Learned\\_GDSN\\_and\\_Interoperability.pdf](http://www.gs1.org/docs/gdsn/Etoile_2007_Report_Lessons_Learned_GDSN_and_Interoperability.pdf)

During Phase 2 (2008-2009) of Etoile, the project continued to focus on connectivity and interoperability, but also formally addressed two other important areas: Data Quality KPIs, and Business Process Optimisation. Furthermore, Etoile also expanded to other countries.

## Etoile Phase 2

### Scope

Etoile Phase 2's focus and agreed to goals and measures were to:

1. Continue data synchronisation and interoperability activities in the identified geographic areas of: France, Germany, Netherlands, Spain, the UK, USA and expand to include Belgium/Luxembourg and China;
2. Testing the Data Quality Framework to ensure trading partner's ability to deliver accurate data;
3. Document and share Business Process Optimisation ideas through use of GDSN by improving internal trading partner processes (e.g. reduction of manual processes, improvement in types of manual processes such as automation of manual inputs).

### Accomplishments

Over the course of 2009, 8 GDSN Certified data pools, 20 retailers and 23 manufacturers in 9 countries (Australia, Belgium, China, France, Germany, Netherlands, Spain, UK and USA) participated in Etoile Phase 2.

Etoile Phase 2 was successful in:

- Increasing the number of GDSN connections between participating trading partners from 98 to over 170
- Expanding reporting of data synchronisation activities in Belgium/Luxembourg
- Engaging Australia and China
- Integrating with the Data Quality initiative
- Automating connection status and improved reporting
- Better understanding of the scope of business process automation



### Key learnings

1. Synchronising one or two items only confirms the interoperability between data pools and trading partners. Participants felt that in order for data synchronisation to create value for their companies' entire categories or product lines needed to be synchronised. The higher the volume of accurate synchronised data being exchanged between trading partners the better.
2. GS1 Member Organisations play an important role globally to expand data synchronisation market activities to add value to regional companies beginning data synchronisation activities.
3. Data synchronisation and data quality go hand in hand and you cannot effectively do one without the other.
4. Business Process Automation (BPA) means different things to different companies, and in order to successfully link BPA success to data synchronisation the project needed to realign the scope to meet the diverse needs of the community.

Suppliers engaged in Etoile Phase 2 reported that:

- Etoile was instrumental in engaging trading partners in data synchronisation
- Technical barriers to interoperability have been overcome
- This project has raised the profile of quality data in organisations
- Sharing information/lessons learned between industry peers is invaluable
- Tools and reports from project Etoile are helpful inside of their organisations

Retailers engaged in Etoile Phase 2 reported that:

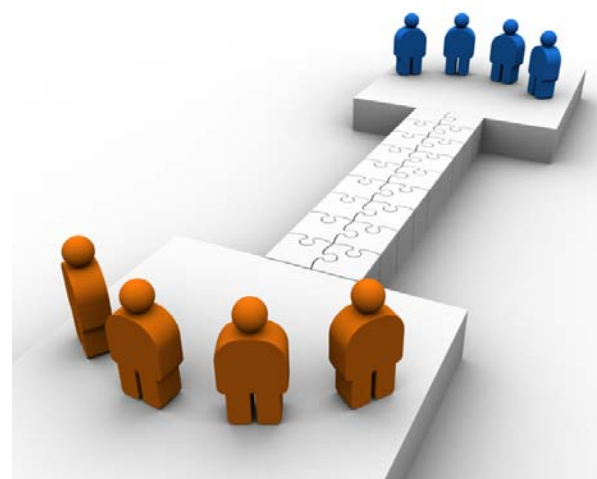
- Quality data is key to driving benefits
- Etoile can help with the expansion into participating regions
- A focused program like Etoile helps drive the integration of data into backend systems
- To successfully implement GDSN the entire organisation must engage
- The Etoile program accelerates supplier data synchronisation connections

Data Pools engaged in Etoile Phase 2 reported that:

- Tracking implementation progress and status was simplified for participants
- Interaction between users was key to maintaining momentum on this project
- Key trading partner contact personnel at meetings/calls help to facilitate regional adoption
- Sharing experiences is the best way to learn
- Projects like this help to develop the global identity of data synchronisation

Etoile Phase 2 did identify several ongoing challenges:

- Trading partner internal and external preparation and alignment for data synchronisation remains difficult
- GDSN is everyone's priority but no one's top priority
- Limited reporting minimises all of the data synchronisation activity that is really occurring in the marketplace
- Leveraging GS1 Membership Organisations (MO's) that are not a part of Etoile
- Data Quality issues are highlighted by data synchronisation
- Limited resources affected the ability to participate
- Lack of critical mass in data synchronisation leads to lower than expected ROI
- Expanding project Etoile is needed to drive benefits
- Need a more comprehensive programme to focus on two key areas.
- Coordinated expansion to new countries
- Providing tools and use case examples which show how to get greater value from data synchronisation.



## Data Synchronisation

### Reporting of connections

To better manage existing and new data synchronisation connections, improved reporting tools were developed as well as a web-based toolkit to assist the GDSN community in developing similar projects based on the Etoile learning's.

In order to effectively track connections between participants each company was encouraged monthly to report all activity with Etoile participants. A spreadsheet was developed to track each relationship. Only business relationships between trading partners that actively traded products was considered for reporting. However, to reflect all their data synchronisation activity, Etoile participants started using Etoile type templates to report on all of their data synchronisation activities inside of their organisations.

To enhance project management and knowledge sharing, the manual process was replaced with a more automated process to generate reports providing insights into activities by regions, supply chain role, and potential for future connections.

### Geographic expansion

With strong support from their management, transitioning Belgium/Luxembourg into project Etoile was made easy due to the intricate knowledge of data synchronisation of their staff. GS1 Spain worked with GS1 Belgium/Luxembourg to offer any advice and assistance. Belgium/Luxembourg quickly understood the project and goals and worked to get 2 retailers to agree to participate in Project Etoile.



GS1 China first conducted internal pilots for data synchronisation, and has recently announced that they have confirmed a regional retailer in China that has agreed to synchronise data with Etoile participants.

To enable local communities to start a local project Etoile, a Toolkit for Data Pools and MO's was developed with the help of the Etoile participants. The toolkit condensed the essence of project Etoile into three steps, 1. Getting started, 2. Collaborating and synchronising 3. Reporting and expanding. Each of these steps contains guides, references and tools needed to develop a program similar to project Etoile.

## Data Quality

Achieving – and maintaining – a continuous high-quality data output requires a series of measures and actions from an organisation and its trading partners as data quality is ultimately a collaboration: information providers are responsible for producing top-notch data, while information recipients are responsible for maintaining the integrity of the data they receive from trading partners when they integrate it to their processes.

In 2005, GS1, along with AIM, CIES, ECR Europe, FMI, GCI and GMA had developed a comprehensive best practice guide for the improvement of data quality for global data quality, called the Data Quality Framework. In 2006, GS1 was given stewardship over the Data Quality Framework; GS1



has been since responsible not only for maintaining the Data Quality framework updated and relevant for the industry, but also for its roll-out and adoption among the industry. To achieve this, GS1 established a Steering Committee for Data Quality within the umbrella of the GDSN Board of Directors.

In 2008, GS1 launched a successful pilot called the “Data Quality Challenge”, which tested the use of the Data Quality Framework as a means to enhance collaboration on data quality between trading partners. Many of the Etoile participants have participated in the Data Quality Challenge. The lessons learned from that pilot have led to a new version of the Data Quality Framework, which was released earlier this year.

## **Business Process Optimisation**

A sub group was set up to develop a toolkit that could assist a company in identifying opportunities to automate manual processes once GDSN has been introduced to a company. METRO, with some experience in Business Process Optimisation inside of their organisation, volunteered to lead that sub group.

Business Process Optimisation (BPO) has been defined as using GDSN as a foundation to:

- Reduce paper or other media based processes;
- Gain efficiencies by eliminating, not transferring, manual processes between trading partners;
- Identify and standardise existing business processes so they can be performed electronically;
- Drive more efficient processes by eliminating disruptions so trading partners can share in the gains of supply chain improvements.

Through the automation of existing manual business processes, companies will be able to improve overall customer satisfaction both internally and externally.

Because of its considerable scope, the Etoile participants decided to open up the BPO work group to any stakeholder that was using GDSN.

Participants worked to identify business process improvement information in order to assist the industry in understanding the importance of GDS in gaining efficiencies in their businesses. However, a few challenges have also identified:

- Some participants felt that sharing this type of information was like giving away their competitive advantage on improvements and techniques they had to learn through trial and error in order to achieve the success that they had today.
- Originally, the toolkit was named Business Process Automation. Participants however agreed that this was not correct. Automation for the sake of automation is not always an improvement. Examples of how a manual process is sometimes the most efficient and cost effective solution were discussed. BPO unlike BPA allows a more open discussion in more generic terms as it relates to improving processes, whether they are manual or already automated.

## Conclusion

Today, over 25,000 leading companies have made the Global Data Synchronisation Network (GDSN) a cornerstone of their master data management programme, increasing efficiencies and lowering supply chain costs. Over six million items have been registered, and GS1 anticipates that growth will continue to be accelerated through the 28 GDSN-certified data pools active in over 90 countries across multiple sectors including Consumer Goods and Healthcare.

Four years of Project Etoile have contributed significantly to this success. In its first phase (2007), Etoile demonstrated that the GS1 GDSN infrastructure is in place and that it works. Etoile Phase 2 was successful in increasing the number of GDSN connections between participating trading partners, integrating with the Data Quality initiative, and gaining a better understanding of the scope of business process automation. The GDSN Board is currently developing a renewed GDSN strategy, and the lessons learned from Project Etoile are an integral part of this exercise. A new adoption programme for the Retail CPG sector will be set up to be more scalable and provide a comprehensive roadmap to successful engagement of the community at the local level.

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- |                   |                   |                 |             |
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| ▪ Ahold           | ▪ GS1 DAS         | ▪ Nestle        | ▪ Tesco     |
| ▪ ASDA            | ▪ GS1 France      | ▪ P&G           | ▪ Unilever  |
| ▪ Carrefour       | ▪ Henkel          | ▪ PepsiCo       | ▪ Walmart   |
| ▪ Carrefour Spain | ▪ J&J             | ▪ Philips       | ▪ Wegmans   |
| ▪ Coca Cola       | ▪ Kimberly Clark  | ▪ Provera       |             |
| ▪ Colgate         | ▪ Kraft           | ▪ Reckitt       |             |
| ▪ Colruyt         | ▪ Lavazza France  | ▪ Benckiser     |             |
| ▪ Consum          | ▪ L'Oreal         | ▪ Sa2 Worldsync |             |
| ▪ Cora            | ▪ Lutece B.V      | ▪ Sara Lee      |             |
| ▪ Danone          | ▪ Mars            | ▪ SC Johnson    |             |