Chapter 2

Getting Started

Scope

This implementation guide addresses issues common among trading partners. The intention is to accommodate the varied systems that NAGASA Business Partners are using and to work with trading partners to assist them in electronic commerce processing. Transaction sets included are: 810 Invoice, 820 Payment Order/Remittance Advice, 832 Price/Sales Catalog, 849 Response to Product Transfer Account Adjustment, 850 Purchase Order, 855 Purchase Order Acknowledgment, 856 Advance Shipping Notice, 867 Dealer Sell Thru, and 997 Functional Acknowledgment.

This industry implementation guide was developed for NAGASA using Version 3040 of the ANSI ASC X12 standard. This guide was developed using a subset of each document defined below. The original syntax notes from the ANSI standard have been left within this document. If complete transaction details are needed, each company may purchase the ANSI ASC X12 VERSION 3040 Standard by calling:

DISA (DISA is the Secretariate for the ASC X12)
1800 Diagonal Road, Suite 355
Alexandria, VA 22314-2852
Voice: 703-548-7005
Fax: 703-548-5738

EDI Support Services (Printer that provides documents.)
P.O. Box 203
Chardon, OH 44024-023
Order Desk: 800-334-4912
Fax: 216-974-7655
CompuServe ID: 74750, 3454

Washington Publishing Company (The official publishing company for the standard.)
806 West Diamond Avenue, Suite 400
Gaithersburg, MD 20878
Voice: 301-590-9337
Fax: 301-869-9460
CompuServe ID: 71501, 1521
MCI Mail ID: 490-4228

New Trading Partner Checklist

For GEIS to assist you in getting started with the NAGASA Electronic Commerce initiative, the following tasks should be completed by each new Trading Partner to insure the smooth implementation of the EDI process:

Profitability, Accuracy & Efficiency

- ❏ Contact GEIS
  - — Call 1-800-334-5669, press 4
  - — Order your EDI Translation Software (if necessary)
  - — Request an EDI*EXPRESS Mail Box
- ❏ Select your first trading partner
- ❏ Identify Trading Partner Technical Contact
  - — Install your EDI Product Option
  - — Ready your processing environment
- ❏ Complete Trading Partner Profile
- ❏ Build transaction set requirements
  - — Data Elements
  - — Timing / Frequency
- ❏ Establish communication process between your organization and your Trading Partner
- ❏ Conduct EDI testing with GEIS and your Trading Partner
- ❏ Move process to production

The following steps for implementation are necessary to get started with your EDI program. Review these steps and let GEIS help you get started in the NAGASA Electronic Commerce initiative.

Implementation Overview

If you are responding to trading partner requirements before you have fully developed your EDI plan, our advice is to implement only what you need to in order to satisfy your trading partner. Then you can proceed with the implementation according to your plan.

Four steps to implementing the EDI plan:

1. Educate the EDI implementation team.

2. Select and implement EDI technology.

3. Pilot a transaction with a trading partner.

4. Implement the full-scale EDI plan.

Step 1: Educate the EDI Implementation Team.

Step 1: Educate the EDI Implementation Team. Provide general education about EDI similar to that provided to the steering committee. In addition, offer technical education regarding EDI for those members of the implementation team who will be responsible for the technical aspects of implementation.

Step 2: Select and Implement EDI Technology.

Step 2: Select and Implement EDI Technology. The following is an overview of implementation steps regarding hardware and software:

● *Evaluate hardware platform alternatives.* EDI can be implemented on a personal, mini or mainframe computer. Many commercial EDI software products are available for all three environments. The NAGASA preferred value added network, GE Information Services, will work with you to facilitate the conversion between internal company formats and standard formats. The following factors should be considered during the conversion process:

— Current computer platform / environment

— Resource availability — both human and technical

— Need for application changes to support the NAGASA standard

— Timing requirements for implementation

— Estimated transaction volume

— Complexity of internal systems and EDI integration

— Uniqueness of trading partner requirements

- *Evaluate, select and install transaction software.* Once the decision to use EDI has been made, you must decide which translation software package to use. There are three major types of translation software:

  - In-house developed
  - Purchased for your operating platform (e.g., midrange)
  - Network based translation

  Vendor translator software offerings that execute on your hardware should be examined and evaluated based upon your requirements. The translator software should include an application interface, translation function, reporting, and may include communications software.

  NAGASA suggests purchasing a translation software package which best fits your operating platform. Special translation software package pricing has been negotiated by NAGASA with GE Information Services, Inc. If, however, you need to select another vendor translation software package the following features should be considered and selected to best suit your needs:

  - Translate ASC X12, and EDIFACT (current or future)
  - Process multiple versions
  - Document routing, tracking, audit trail, and statistics
  - Human-readable output of the EDI data
  - Error and exception reporting
  - Trading partner profile data, including version by transaction set being sent or received, electronic mailbox identification, and ability to customize by trading partner
  - Generate envelope control numbers by trading partner
  - Generate functional acknowledgments
  - Backup and recovery capability
  - Automatic dial up capability, unattended operation, and automatic transmissions
  - Multiple mailbox access capability
  - 800 technical support number
  - Applications interface for defining input/output from/to the translator and application
  - Complete operational documentation

- Security features
- Operate in test mode capability
- Import / export file access for PC
- Software package maintenance / updates

For additional translation software items see Code of Practice, Chapter 3, page 9.

EDI can be done with most types and brands of computer hardware. Initially, you may choose to "pilot" using a personal computer and after you gain experience, implement EDI on your main computer. Ultimately, you will want to fully integrate EDI into your application systems.

Once you have purchased and received your selected translation software package you will need to:

— Install

— Learn its operating procedures

— Learn its application interface rules

● *Create EDI document maps and interface file layouts.* For the transaction planned, perform a thorough review or "mapping" of the business document against NAGASA's standard format. This process will enable you to determine whether your internal systems contains all of the required data. This process is simplified by the work of the NAGASA Electronic Commerce Committee, which developed standard transaction sets for each business document.

● *Evaluate and implement communication.* Transactions between trading partners are usually transmitted via a third-party communication service or value-added network (VAN). The VAN serves as an electronic post office, with senders and receivers accessing the network a number of times each day. One major advantage of using VAN technology is that a VAN offers "store and forward" service. This allows anyone to initiate communications at any time of the day or night. Trading partners call for their message at their convenience. This accommodates their own computer equipment's capabilities. The VAN is capable of receiving, translating, copying, transmitting, and storing.

NAGASA has chosen and negotiated with GE Information Services to provide VAN services for the printing and imaging distribution channel. Working with the NAGASA Electronic Commerce Committee, GE Information Services developed a full-range of VAN services including software packages — competitively priced and discounted — to the NAGASA membership. GEIS EDI*EXPRESS is currently the largest EDI VAN and offers many services including EDI software with the maps necessary to trade with other NAGASA, trading partners.

After contracting with the value-added network provider, the next step is to install the required communication hardware and software. Often, the communications software is a module included in the translation software.

● *Conduct systems tests for the value-added network connection.* Extensive system testing should be done prior to the implementation. During the system testing you will want to verify the process for sending and receiving documents.

VANs offer a validation facility, enabling you to send an EDI transmission into the network and have it sent back to you for validation.

For additional information concerning VAN selection see Code of Practice, Chapter 3, page 12.

Step 3: Pilot a Transaction with a Trading Partner.

Step 3: Pilot a Transaction with a Trading Partner.

● *Choosing your trading partners.* Whether you pilot with a dealer, manufacturer, or customer, it's recommended that you select a trading partner with EDI experience, one who is willing to work with you and share expertise. You can then leverage this experience to shorten your own learning curve and implementation cycle.

Pursue EDI only with those trading partners where it makes business sense to do so. The following criteria may be helpful:

— *Strength of current or potential business.* What is the annual sales volume or trading partner ranking? Is it substantial enough for EDI to make an impact?

— *Quality of the business relationship.* Can it be strengthened by EDI? Is it strong enough to risk process change?

— *Trading partner's EDI capability.* How many transaction sets are implemented? Which transaction sets is the partner interested in exchanging? What is the trading partner's experience with EDI?

— *Business strategy.* Is the trading partner interested in integrating EDI into system applications and improving business processes?

It makes good business sense to select trading partners who can contribute to achieving mutual EDI benefits — eliminating errors, reducing costs, improving quality, and streamlining processes.

● *Confirm capabilities and plan with one trading partner.* After you have spoken to your key trading partners and compiled the results of the survey, choose the trading partner with whom you will conduct your EDI pilot. If the pilot trading partner has already been selected by the steering committee, confirm your EDI plan with your trading partner at this time. Review and operate within the NAGASA *Code of Practice for Electronic Commerce* (NAGASA Standard 1995-3).

Discuss with your potential EDI trading partner which EDI documents you wish to use. Be sure to review the transaction set definitions prior to making this decision. If your pilot trading partner has already "mapped" the data that will be sent to you or received from you, start with the trading partner's definition of the data. (You will repeat this process with every transaction sent or received with individual trading partners.)

It is important that you understand the content of these business documents. There are three suggested methods for communicating this information to your trading partners:

- Face-to-Face Meetings

You personally explain your program, define the next steps with your business trading partners and answer questions.

- Teleconferences

Similar to face-to-face meeting, except conducted over the telephone.

- Mailings

These mailings usually are of two types: one for those users who are already EDI knowledgeable; and one for those who are new to EDI. These can provide the same information as above, but in written form.

● *Exchange trading partner information.* Tell your trading partners about your EDI plans. A trading partnership is simply an agreement between your company and the other NAGASA members describing the terms and conditions for commercial transactions via an electronic medium. NAGASA developed a Code of Practice to facilitate this agreement process.

You must sign the *Signatory Letter* (page 2-9) and return to NAGASA in order to begin trading with the NAGASA community.

Complete a *Letter of Intent* (page 2-10) for each company. Select your best option. It can be useful for future companies as you gear up. Send it to the company you want to conduct EDI business.

Complete a *Trading Partner Profile* (page 2-11). It is an internal worksheet to help clarify companies that you should conduct a trading relationship.

● *Conduct the pilot with your trading partner.*

— Generate a list of your company's ship to and sold addresses with their corresponding location identifier codes. NAGASA has elected to use the DUNS number for this identifier code.

— Contact your network and provide them with the information needed to complete the trading partnership on their network.

— Enter the trading partnership information required for your system. After the trading partnership is established, we will begin the testing phase. This phase ensures that you and your trading partner can interpret the information being exchanged and test communications. GEIS, as your network provider, will work with you and your trading partner to ensure you can get your EDI documents to the network and they are properly forwarded to your business trading partner.

— Test sending and receiving transmissions to and from your trading partner through the network.

— Translate documents to and from the NAGASA standard format.

— Generate a functional acknowledgement (required within the NAGASA standard format.)

● *Initiate parallel operation.* When both trading partners are satisfied with testing, it's recommended that you begin a parallel production phase. During this phase, every EDI document is followed by a corresponding paper document. This parallel phase continues until both trading partners are comfortable and all operations are smoothly coordinated. The duration of this phase varies depending on the complexity of each system and the frequency that documents are exchanged. Once the parallel phase is underway, a target date to discontinue paper, telephone, or fax transmissions is established.

Step 4: Implement the Full Scale EDI Plan.

Step 4: Implement the Full-Scale EDI Plan.

● *Implement the EDI transaction.* Once paper documents are discontinued, your company will be in the production phase of EDI. From this point you may increase the number of different documents that you are exchanging with this trading partner or expand this process with other NAGASA members.

● *Evaluate the pilot and expand trading partners and transaction sets.* Hold frequent progress discussions with your trading partner(s) and assign a specific individual to manage each EDI relationship. Define a methodology to handle exceptions and problems.

● *Monitor activities and measure performance.* Collect data during the first few months of implementing each transaction for use in assessing the return on investment to your company. This information will be useful to management and to new trading partners. Publish EDI successes throughout the company. As the printing and imaging distribution channel moves into electronic commerce NAGASA will conduct an industry study to determine and track benefits.

Provide additional education as appropriate. As EDI implementation expands, bring new people into the EDI process. Provide education and training, internally and externally, as needed.

SIGNATORY LETTER

TO: NAGASA
1720 Florida Avenue NW
Washington DC 20009-2660
Voice: (202) 328-8442
Fax: (202) 328-8513
E-mail: nagasa@smart.net

FROM: ______________________________ (My company name and address)
____
____

On behalf of my company, we agree to become a signatory to the North American Graphic Arts Suppliers Association (NAGASA) Electronic Commerce Code of Practice and to abide by its provisions to facilitate the exchange of electronic data in standard formats.

We recognize this provides a set of rules which set out minimum standards with which parties trading electronically will comply. We intend to use this tool in lieu of trading partner agreements and recognize that additional operating information will still need to be agreed upon, and documented, between Trading Partners.

NAGASA maintains and periodically publishes the list of signatories.

Our Designated Contact: ______________________________
Title: ______________________________
Voice: ______________________________
Fax: ______________________________
E-mail: ______________________________

Initiated by:______________________________
(Signature)

____
(Please Print Your Name)

Title:______________________________

Date:______________________________

LETTER OF INTENT TO ENGAGE IN ELECTRONIC COMMERCE

TO: ______________________ (My Trading Partner name and address)
______________________ Voice: ______________________
______________________ Fax: ______________________
Contact: ______________________ E-mail: ______________________

FROM: ______________________ (My company name and address)
______________________ Voice: ______________________
______________________ Fax: ______________________
Contact: ______________________ E-mail: ______________________
Customer # ______________________ (or similar identifier to trading partner)

My company is a signatory to the North American Graphic Arts Suppliers Association (NAGASA) Electronic Commerce Code of Practice and will abide by its provisions to facilitate the exchange of electronic data in standard formats.

My Third Party Electronic Clearinghouse (Value Added Network)* is:
______________________ (My VAN Name and address)
____
____
Mail Box identifier ______________________

* NAGASA has selected GE Information Services as the preferred value-added network for the printing and imaging distribution channel.

I intend to use the following ANSI ASC X12 Transaction Sets to trade NAGASA formatted documents with you (please mark):

_____ 810 Invoice
_____ 820 Remittance Advice
_____ 830 Planning Schedule
_____ 832 Price Catalog
_____ 844 Rebate
_____ 849 Rebate Response
_____ 850 Purchase Order
_____ 855 Purchase Order Acknowledgement
_____ 856 Advanced Ship Notice
_____ 867 Resale Report (“Sell Through Data”)
_____ 869 Order Status Inquiry
_____ 870 Order Status Report
_____ 997 Functional Acknowledgement (Required)

Other Transaction Sets:

	#	Description
_____	_____	______________________
_____	_____	______________________

I initially intend to use the following:
Hardware: ______________________
Communications Software: ______________________
Translator: ______________________

Initiated by: ______________________ Date: __________

EDI Trading Partner Profile

Date ____

Company Name ____

Company Address ____

Contact Information

Contact ____

Title ______________________ Phone (______)__________

E-mail Address ______________________Fax (______)__________

Contact ____

Title ______________________ Phone (______)__________

E-mail Address ______________________Fax (______)__________

Enveloping Information

ISA - Sender information

	Qualifier	Number
Test	____	____________
Production	____	____________

GS - Sender information

	Number
Test	____________
Production	____________

Value Added Network(s)

____

____

Direct your business questions to NAGASA, consultants and GEIS.

EDI Resources

NAGASA's Preferred Value Added Network (VAN): GE Information Services

Sales support and service
800-334-5669
home page: http://www.geis.com

Wanda Ford
GE Information Services
Consultant
401 North Washington Street, Suite V-3
Rockville, MD 20850
Phone: 301-340-5854
FAX: 301-340-5501
E-mail: wanda.ford@geis.ge.com

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