



IBM Software Group

# ***IBM WebSphere® Data Interchange V3.3***

## ***EDI Standards***



@business on demand.

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This presentation will review Electronic Data Interchange (EDI) Standards.

## Agenda

- Review mapping steps
- Describe EDI Standards



The presentation will review the steps for mapping and describe EDI Standards.

## EDI Standards

- Mapping steps
  - ▶ Load Standard – Electronic Data Interchange (EDI) standards
  - ▶ Create Data Format (DF) – Application data definition or metadata
  - ▶ Load XML – DTDs and Schemas
  - ▶ Select Map type
    - Data Transformation
      - For Translation
      - Functional Acknowledgement
      - Validation
    - Send or Receive
  - ▶ Create Map – Relationship of source and target document
  - ▶ Setup Trading Partner Rules and Usages – Map execution



Before you can use WebSphere Data Interchange (WDI) to translate data, or to send or receive transactions, messages, or files, you must define certain information. This information describes how your system sends and receives data, how data is formatted in your application files and to a standard, to whom you send data and from whom you receive data, and other pertinent information. A WebSphere Data Interchange map relates a source document to a target document. In WebSphere Data Interchange you can create or import document definitions for the source and target documents, and then create a map which relates the elements in the source document to elements in the target document.

## EDI Standards

- Pre-defined business document
- Provides the building blocks for electronic versions of common business documents.
- Developed and maintained by Standards Organization
- Designed to work across industry boundaries



An EDI standard is a set of pre-defined business documents and provides the building blocks for electronic versions of common business documents. The EDI standards are developed and maintained by Standards Organizations for example, Accredited Standards Committee (ASC) X12 and UN/CEFACT. The standards are designed to work across industry and company boundaries.

## EDI Standards

- Business Document Definitions
  - ▶ Transaction Sets or Messages
    - Segments and looping segments
      - Compound elements
        - Simple elements
      - Simple elements
      - Code Lists



The business document definitions are referred to as Transaction Sets and Messages. Examples of messages are invoices or purchase orders. Each message contains a set of Segments and looping segments. Each line of a business document corresponds to a EDI standard segment in the EDI standard transaction set . Each segment can contain compound elements which are simple elements that are logically related. A Simple element represents the individual units of data found in business documents, such as quantity ordered or unit price. Some elements also have a code list associated with the element. A code list contains valid values for the element.

# EDI Standards

The screenshot displays the 'WebSphere Data Interchange for Multiplatforms V3.3' interface. The title bar indicates the current map is 'WDICONFLB2\_S850T'. The main workspace is divided into three panes:

- Top Left (Source):** Shows the source document structure:
  - Source: Data Format\WDILAB1\_DICTIONARY\WDILAB1
  - HEADER [Header Record WDI User Conference 2006 - Lab 1]
  - LINEITEMS [LineItems Record WDI User Conference 2006 - Lab 1]
  - TRAILER [Trailer Record WDI User Conference 2006 - Lab 1]
- Top Right (Target):** Shows the target document structure:
  - Target: EDI Standard Transaction\X12V4R1\S50
  - Table 1
  - 20 M BEG [Beginning Segment for Purchase Order]
    - 1 M 353 [Transaction Set Purpose Code]
    - 2 M 92 [Purchase Order Type Code]
    - 3 M 324 [Purchase Order Number]
    - 4 O 328 [Release Number]
    - 5 M 373 [Date]
- Bottom Left (Mapping):** A tree view showing the mapping between source and target elements. For example, '20 M BEG' is mapped to '20 M BEG', and '1 M 353' is mapped to '1 M 353'. It also shows complex mappings like 'MapFrom (HEADER\TYPECODE\)' and 'DateCnv (HEADER\PODATE\, "DDMMCCYY", "CCYYMMDD")'.
- Bottom Right (Global Variables):** A table with columns for 'Global Variable Name', 'Scope', and 'Local Variab...'. It lists variables such as 'TotalNumEmployees', 'svzerrorcount', 'EmployeeCnt', 'tranerror', 'SNPType5', and 'clmerrorcount'.

The bottom of the window shows a Windows taskbar with the date 'Tuesday 3/13/2007' and the time '2:17 PM'. The footer of the application window contains the text 'EDI Standards' and '© 2007 IBM Corporation'.

This is an example of a Data Transformation (DT) map. The source document is in the top left window and the target document is in the top right window. The mapping commands are in the bottom left window. This map is an application data format to EDI Standard map and is a target based map. The EDI Standard target document contains all the segment and element definitions for this business document.

# EDI Standards

The screenshot displays the WebSphere Data Interchange for Multiplatforms V3.3 interface. The window title is "WebSphere Data Interchange for Multiplatforms V3.3 - [WDI33Server - Send Map - WDI33CONFLAB1\_S850]". The interface is divided into two main panes:

- Left Pane (Source Document):** Shows a tree view of the source document structure:
  - WDILAB1 [WDI User Conference 2006 - Lab 1]
    - HEADER [Header Record WDI User Conference 2006 - Lab 1]
    - LINEITEMS [LineItems Record WDI User Conference 2006 - Lab 1]
    - TRAILER [Trailer Record WDI User Conference 2006 - Lab 1]
- Right Pane (Target Document):** Shows a tree view of the target EDI standard structure:
  - 850 [Purchase Order]
    - 20 M BEG [Beginning Segment for Purchase Order]
      - 1 M 353 [Transaction Set Purpose Code]
        - Literal of: 00
      - 2 M 92 [Purchase Order Type Code]
        - TYPECODE in HEADER
      - 3 M 324 [Purchase Order Number]
        - PONUMBER in HEADER
        - Literal of: 8SET SPONUMBER 8E(CHAR(SPONUMBER) SC 5.6)
        - Literal of: 8SET SPONUMBER 8E('4' + CHAR(SPONUMBER))
        - Literal of: 8USE SPONUMBER
      - 4 O 328 [Release Number]
      - 5 M 373 [Date]
        - Literal of: 8SET DIEXPTRACE 1
        - Literal of: 8SET DIVARTRACE 1
        - PODATE in HEADER
        - Literal of: 8E (DATE FD "DDMMCCYY" TD "CCYYMMDD")
      - 6 O 367 [Contract Number]
      - 7 O 587 [Acknowledgment Type]
      - 8 O 1019 [Invoice Type Code]
      - 9 O 1166 [Contract Type Code]
      - 10 O 1232 [Purchase Category]
      - 11 O 706 [Security Level Code]
      - 12 O 640 [Transaction Type Code]
      - 40 O CUR [Currency]
      - 50 O REF [Reference Identification]
      - 60 O PER [Administrative Communications Contact]
      - 70 O TAX [Tax Reference]
      - 80 O FOB [F.O.B. Related Instructions]
      - 90 O CTP [Pricing Information]
      - 95 O PAM [Period Amount]

The bottom of the window shows the Windows taskbar with the Start button, system tray, and clock displaying 2:21 PM on Tuesday, 3/13/2007. The footer of the slide contains "EDI Standards" and "© 2007 IBM Corporation".

This is an example of a Send map. The source document is in the left window and the target document is in the right window. The mapping commands are in the target document on the right. This map is an application data format to EDI Standard map. The EDI Standard target document contains all the segment and element definitions for this business document.

## Reference

- More information can be found in the WDI V3.3 Mapping Guide



More information can be found in the WebSphere Data Interchange Version 3.3 Mapping Guide.



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