How TO Get Started: EDI Step-BY-Step

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My Experiences with EDI

• Member SPEEDE Committee since April 2005.
• Using EDI Transcript Exchange since 1995.
  ▪ Currently feeding EDI into DARS
  ▪ Beta Tester for CCCTran Project
• Current Main Trading Partners
  ▪ DeAnza, Foothill, Community College of San Francisco, College of Marin, Southwestern Community College.
Session Objectives

- Steps to EDI Implementation:
- Understanding EDI
- Evaluate Your Situation
- Identify Trading Partners
- Develop Project Plan

Steps are the same for XML!
Session Objective (Cont.)

- Define Your EDI Process
- **Choose** EDI Translation Software
- **Mapping Data** To and From EDI
- **Application Development, Integration, and Automation**
- **Establishing** Trading Partner Agreements
- **EDI Testing**
- **EDI Implementation**

*Steps are the same for XML!*
Get to Know EDI (Cont.)

- Attend Sessions
- WEB Sites
- ListServes
- SPEEDE Implementation Guides
- Understanding Acronyms
Acronyms

- **EDE** – Electronic Data Exchange
- **EDI** – Electronic Data Interchange
- **SPEED** – Standardization of Postsecondary Education Electronic Data Exchange
  - both an AACRAO committee and the standards the committee created
- **EXPRESS** – EXchange of Permanent Records Electronically for Students and Schools
  - secondary school data
- **ANSI** – American National Standards Institute
- **X12** – ANSI Committee responsible for electronic data standards … it comes after X11
• **PESC** – Postsecondary Electronic Standards Council
• **XML** – eXtensible Mark-up Language
• **AACRAO** – American Association of Collegiate Registrars and Admissions Officers
• More E-Commerce Terms in Handout!
Electronic Data Interchange

- Computer-to-computer exchange of standardized business documents
- An electronic replacement for Mail, Fax, Courier
- Eliminates or reduces Delays, Re-keying of Data, Errors (both in keying and interpretation)
Standardization of Postsecondary Education Electronic Data Exchange

The *standards* are the key … they act like a common language.
Evaluate Your Situation

- Institutional Commitment
  - Management
  - Technical
  - End User
- Determine Benefits
  - Cost Analysis
Evaluate Your Situation (Cont.)

- Assess Student Information System
  - EDI Capable? To what extent?
    - Data Extraction/Data Mapping (EDI or XML?)
    - Communication Capabilities
    - Document Management
    - Reporting Capabilities
Identify Trading Partners

- Top 10 Feeder Schools
- Regional Project
- EDI Internet Server Registrant Table
- AACRAO Activity List
- State EDI Status Report and Contact Report
Develop Project Plan

- Staffing
  - EDI Coordinator?
  - Part-time?
- Roles, Responsibilities, Deliverables, Timelines, etc.
- Testing
- Ongoing Operations Maintenance
Define Your EDI Process

• Define the Scope of Your Project
  • Identify Documents to Exchange
    ▪ Transcripts, Applications, Etc.
  • Will You Send?
    ▪ Less labor intensive
  • Will You Receive?
    ▪ Print and/or Update Student Information System
Define Your EDI Process (Cont.)

• How will documents be exchanged?

  • Transmission Methods/Protocols to consider
    ▪ Dial Up
    ▪ Leased Line
    ▪ Van
    ▪ Internet
    ▪ EDI Internet Server
      • Email
      • FTP
Choose EDI Translation Software

• What is Translation Software?
  • Bridges the gap between EDI (or XML) and your Application Software
    ▪ Translates transactions in/out of EDI format
    ▪ Provides the electronic envelope
    ▪ Provides Transmission Capability
    ▪ Manages EDI Documents
      • Receives/Reconciles Acknowledgments
      • Reports
      • Archiving
Choose EDI Translation Software

- **Build** EDI Translation Software?
  - Time and Resource Intensive
  - Vulnerable to Staff Turnover
  - Version Updates
Choose EDI Translation Software

• **Buy** EDI Translation Software?
  • Can be costly
  • Training/Support
  • Hardware Issues
Choose EDI Translation Software

- Criteria for Vendor Selection
  - Years of Experience
  - Stability of Company
  - Support/Help Line
  - Reports
  - Document Management Capabilities
Choose EDI Translation Software (Cont.)

- Criteria for Vendor Selection (Cont.)
  - Supported Transaction Sets
  - Standards/Version Updates
    - Method and Time
  - Communication Protocols Supported
    - Internet (FTP or e-mail) or Dial Up
  - Reconcile outgoing documents with incoming Acknowledgments
  - References
Choose EDI Translation Software (Cont.)

- EDI Translation Software Vendors
  - SCT EDI Smart
    - Integrated into SCT Banner, SCT Banner Plus
    - Can be used with other SIS
  - PeopleSoft (partially integrated)
  - Inovis (TrustedLink)
    - Standalone
  - 1 EDI Source
    - Standalone
  - UT Austin (Quick ‘N Easy Software)
Mapping Data

• Process of associating your data with the EDI (or XML) Standard and vice versa

• If You Are Sending Documents
  ▪ Map your data to EDI (or XML) Standard

• If You Are Receiving Documents
  ▪ Equate EDI (or XML) Transaction Set to your data and/or print format
  ▪ More complex
Mapping Data (Cont.)

- Time and Resource Intensive
- Critical to success of project
- Crosswalk Table/Institution Codes (FICE, ETS, ACT, etc.)
Application Development, Integration, And Automation

- Example: Integration into your system
  - Flag Institution as EDI partner in database
  - Existing transcript program writes data to separate flat file for these institutions rather than to print file
  - Flat file loads into Translation Software
  - Translation Software produces EDI file
• Automate Process
  • Send
    ▪ Data Extraction to Flat File
    ▪ Translate Flat File to EDI
    ▪ Send EDI data
    ▪ Receive Acknowledgments
    ▪ Reconcile Acknowledgments
    ▪ Report/Archive
Application Development, Integration, And Automation (Cont.)

- Automate Process
- Receive
  - Receive EDI Data
  - Translate EDI data to Flat File
  - Upload into SIS and/or Print Transactions
  - Generate and Send Acknowledgments
Application Development, Integration, And Automation (Cont.)

- Security Issues
  - Authentication
  - Acknowledgements (131’s and 997’s)
    - Identify process for reconciling your transcripts
  - Site Security
  - Privacy
  - Encryption
Establishing Trading Partner Agreements

- Agree that document is ‘official’
- Define the decision making process
  - Determine which version should be used
  - Identify problem resolution
- Include Mapping Issues specific to the trading partners involved
- List version, protocol, security, etc. used
Testing

• Test Scenarios
  • Create document identifying all the different test cases…

• Test Period
• Identify Transactions as ‘TEST’ during this period

• Test Agreement
Implementation

• Parallel Processing
• Ongoing Operations Management
  • Send/Receive documents
  • Reconcile acknowledgments
  • Review error and activity reports
• Final Trading Partner Agreement
Session Review

- **Steps to EDI (or XML) Implementation:**
  - **Understanding** EDI
  - **Evaluate** Your Situation
  - **Identify** Trading Partners
  - **Develop** Project Plan
Session Review (Cont.)

• **Define** Your EDI Process
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• **EDI Testing**
• **EDI Implementation**
Web Sites

• AACRAO SPEEDE
  • http://www.aacrao.org/speede
    ▪ Who is is doing SPEEDE
    ▪ SPEEDE State Contacts
    ▪ SPEEDE State Status
    ▪ SPEEDE-L Listserv

• Postsecondary Electronic Standards Council
  • http://www.pesc.org
    ▪ Implementation Guides (‘Standards & Info’)


More Web Sites

• Internet EDI (UT Austin) Server

http://www.utexas.edu/student/giac/speede/ediserv.html

• ‘Quick ‘N Easy Software’
• White Papers on EDI
• PGP Beginners Guide
• Recommended Best Practices (‘RIPS’)

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Thank you!  
Please Fill Out Evaluation Forms!  

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