

# *TECHNOLOGY STANDARDS*

XML DEVELOPMENT STATUS

August 13, 2002

## *Our Goals*

- To develop XML standards for electronic tax and revenue administration
- Specifically, to develop XML schemas for electronic filing of tax returns

## *Why XML?*

- Software developers: the fastest growing segment of tax software is Web filing, and the best way to build Web applications is XML.
- Tax agencies: schema validation moves input edits out of the legacy system and closer to the input.

## *Target Dates*

- Defined by two key IRS programs
  - Form 941 Quarterly Wage Withholding  
January 2003
  - Form 1120 Corporate Income Tax Filing  
January 2004
- Specifications already in the hands of the software developers for form 941

## *Message Transport Architecture*

- Based on SOAP With Attachments – will be SOAP Version 1.2
- Allows MIME attachments to be enveloped together with XML documents
- Not incompatible with ebXML – those standards are not available yet

## *Reusable Type Libraries*

- Apply to multiple state and federal tax filings
- Generic data types such as “Amount15Type” for 15 digit monetary amounts
- Tax specific data types such as ReturnIDType, TaxpayerIDType, SignatureType

## *Tax Type Specific Data Elements*

- Tag names built for forms 941 and 1120
- Tag names being built for state wage withholding, unemployment insurance, sales, and motor fuel taxes
- Draft X12 design rules do not specify how to build tag name taxonomies from core components

## *Schema Development*

- Supports both single and batch filings
- Modular approach for forms and schedules that comprise a filing
- IRS forms 941 and 1120, state withholding, unemployment insurance, and motor fuel
- Schemas both for filing and for acknowledgements

## *Best Practices*

- We plan to retrofit to X12 XML design rules as they are finalized
- Core components will be contributed from data types
- Our experiences will provide valuable input for future standards development
- We can't wait!

## *Contacts*

- Terry Garber  
[Garbert@sctax.org](mailto:Garbert@sctax.org)  
Ph. 803-898-5521

- Jonathan Lyon  
[Jonathan.Lyon@taxadmin.org](mailto:Jonathan.Lyon@taxadmin.org)  
Ph. 202/624-5894

*More info:*

<http://www.taxadmin.org/fta/edi/1205ann.html>

## *2-D Barcoding Standards for Tax*

- ✿ Background
- ✿ Experience
- ✿ Guidance
- ✿ Process

## *Background*

- ✿ 1999 Indiana introduced 2-D for IT-40
- ✿ Successful - 135,000+ returns processed
- ✿ Knew participation and cooperation of software developers essential
- ✿ July 1999 - hosted meeting on standards
- ✿ States, software developers, integrators, symbology provider

## *Background for Standards*

- FTA/NACTP sponsored
- Brainstormed 2-D processing environment
- Data format, forms design, testing, etc.
- Much adapted from NACTP/State existing practice
- Created & published draft guidance

## *2-D Standards*

- General Recommendations
- Forms Design
- Barcode Technical Matters
- File Format
- Testing Processes & Approval
- Specifications and Version Control
- Appendix: Vendor ID List

## *Experience*

- 4 Additional PIT states in 2000
  - DE, IL, MO, RI
- Season experience generally positive
- Existing PIT applications/new ones
- Expanded SW developer cadre
- Re-visited draft 2-D guidance

## 2-D Standards

- Published Guidance for 2001 on FTA web page
- URL: [www.taxadmin.org/fta/edi/2-dcurrent.html](http://www.taxadmin.org/fta/edi/2-dcurrent.html)
- Also further background, survey, revision process, call minutes
- Standards Version: [www.taxadmin.org/fta/edi/rev2-d.html](http://www.taxadmin.org/fta/edi/rev2-d.html)

## *Additional 2001-02 Experience*

- Great potential/variety of applications
- 11 states implemented in 2001 - 2 Million+ barcode returns processed
- 17 states in 2002 - likely 4M+ will be received
- Growing interest in business tax filing
- New issues - hi-speed transport, multiple barcode processing
- Need continued input from interested users/implementers

## *2-D Guidance Document*

- “How-To” document needed
- FAQs
- Advisories
- Checklists
- Glossary
- <http://www.taxadmin.org/fta/edi/2-dbackg02.html>

## *Standards Process*

- Regular, open conference calls
- 2-D Standards, Roster, and Call/Meeting notices posted on Web
- Standards are published for comment
- Revision finalization mid-year
- Take off your industry/state hat, and consider good of all
- Info: <http://www.taxadmin.org/fta/edi/2-dcurrent.html>

Jonathan Lyon  
jonathan.lyon@taxadmin.org  
Ph. 202/624-5894  
[www.taxadmin.org](http://www.taxadmin.org)

Janice Krueger  
jkrueger@nelcomail.com  
920-337-1000  
[www.nactp.org](http://www.nactp.org)

# *Wireless Database Task Force*

Standards Status Report

## *What is the Wireless Database Task Force?*

- 8-Member Task Force appointed by MTC and FTA
- Authority is found in the MTSA federal legislation (P.L. 106-252)
- Charged with “approving” a standard numeric code to identify various applicable taxing jurisdictions.

## *What is the MTSA?*

- Mobile Telecommunications Sourcing Act (the MTSA) provides a uniform rule for determining the location of the sale and purchase of mobile telecommunications (wireless) services.
- Establishes where the sale and purchase subject to state or local tax is occurring.

## *What does it do?*

- Provides that wireless calls will be located for tax purposes in the jurisdiction(s) of the customer's *place of primary use* (PPU).
- PPU means either the customer's residence or primary business street address that is within the licensed service area of the wireless provider with which the customer contracts for wireless services.

## *Identifying the PPU*

- Act provides that a State can elect, from time to time, to make a database available to wireless providers that would match a specific street address to the applicable taxing jurisdiction(s).
- Permits wireless providers to determine the applicable taxes of the jurisdiction(s).

## *So what?*

- Can be used as a uniform source of data for billing activities by the wireless industry.
- If the wireless provider uses a database provided by a State, the State may not assess the provider for taxes not paid as a result of errors or omissions in the database!

## *Requirements of the Database*

- Designate for each street address in the state the appropriate taxing jurisdictions and the appropriate code for each taxing district.
- Designation must be by one nationwide standard numeric code for each level of taxing jurisdiction.
- Must be provided in a format “approved” by ANSI’s Accredited Standards Committee (ASC) X-12.

## *Requirements of the Standard Numeric Code*

- Shall contain uniform number of digits.
- Each digit (or combination of digits) shall refer to the same level of taxing jurisdiction throughout the US.
- Shall use a format similar to FIPS 55-3, as approved by FTA and MTC.
- Each address shall be in standard USPS format.

## *Wireless Database Task Force “Principles”*

- Emphasis is on Format, not Content.
- Attempt to incorporate existing ASC X12 transactional data elements rather than create new ones.
- Use address ranges rather than specific single street addresses to preserve anonymity, flexibility and efficiency.

## *Other Principles:*

- Standard numeric code will build off existing FIPS 55-3; a “FIPS +” code.
- Actual tax rates will be kept in separate reference tables:
  - Better management of rate changes
  - Allows expanding this effort to other projects (SSTP)
- PPU language is consistent with SSTP Telecom Sourcing Workgroup.

## *Additional Features:*

- Support for unlimited number of special taxing districts, with each state maintaining its own code reference.
- Inclusion of Longitude and Latitude elements in the database for future linkage with GIS.
- Strict adherence to USPS standard address format.

## *About FIPS 55-3*

- Federal Information Processing Standard (FIPS) created and maintained by the US Census Bureau.
- A 12-digit code that identifies known localities in the US.
  - 2-digit State Code
  - 3-digit County Code
  - 5-digit Place Number (Municipality) Code
  - 2-digit Place Class (Jurisdiction) Code

## *ASC X12 Approval Timeline*

- Oct. 1-4, 2001 – Draft database elements submitted to ASC X12 organization, Miami.
- Dec. 3-5, 2001 – Revisions and suggestion made during X12 Technical Assessment Committee, San Diego.
- Feb. 4-5, 2002 – Final revision submitted for approval for X12 ballot, Seattle.
- June, 2002 - Final approval by ASC as X12 standard, Minneapolis.

## *Adoption by MTC*

- March 13, 2002 – Resolution approved to adopt Public Hearing Notice, appoint Hearing Officer
- April, 2002 – Notice of Public Hearing published
- May 21, 2002 – Public Hearing, Washington, DC
- June, 2002 – Request to Consider Resolution (By-Law 7) Survey of member states
- July 31, 2002 – Final Consideration of Formal Resolution, MTC Annual Meeting, Madison, WI

## *Adoption by FTA*

- June 1, 2002 - Draft Resolution presented to FTA Executive Board of Directors, Nashville, TN
- June 3, 2002 - Draft Resolution reviewed by FTA Resolutions Committee, Nashville, TN
- June 5, 2002 - Vote on Final Resolution by FTA Membership, Nashville, TN

## *Contacts*

MTC Staff Contact:

*Elliott Dubin, 202-508-3871*

*<[edubin@mtc.gov](mailto:edubin@mtc.gov)>*

FTA Staff Contact:

*Jonathan Lyon, 202-624-5894*

*<[jonathan.lyon@taxadmin.org](mailto:jonathan.lyon@taxadmin.org)>*

*More Info:*

<http://www.taxadmin.org/fta/edi/wireless.html>