
**OASIS TAX XML TC
XML POSITION PAPER FOR TAX ADMINISTRATIONS**

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OASIS Tax XML TC

XML Position Paper for Tax Administrations

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Preface

Historically, tax administrations have exchanged information with customers using millions of paper forms and documents each year. They now face the challenge of transforming their services in order to keep up with changes in technology, business and management practices, to improve their capability to exchange information in support of international taxation agreements, and to assist in compliance activities. Realising this, the OECD Tax Administration eServices sub-group established a committee within the framework of OASIS – the Tax XML Technical Committee – to provide direction to tax administrations on building services based upon open standards.

This document provides the first set of recommendations of the Tax XML Technical Committee. The standards discussed in this paper will play an important role in enabling efficient exchange of tax data, reducing the administrative burden on companies and facilitating more effective compliance.

This paper provides directions to tax administrations to be used in the future development of new services. It is expected that plans for adoption within each administration will be developed and reported on through the OASIS committee. Only broad adoption of these standards will allow many of the perceived benefits to be realised, particularly the interoperability goals.

In conjunction with these recommendations, this paper also provides a two-year strategic vision demonstrating the possibilities of an open and interoperable environment, and a list of challenges the Tax XML Technical Committee will face to achieve this vision. On behalf of the committee, I ask you to take the time to read this paper and seek your support and involvement in our effort to create an interoperable environment.

Harm Jan van Burg
Chair OASIS Tax XML Technical Committee

Glossary

Term	Definition/explanation
CIQ	Customer Information Quality - An international, XML-based standard for specifying customer details that has been developed under the auspices of OASIS
Customer	An external person or organisation who deals with tax administrations (customer, constituent)
Interface Standard	The published description of OASIS Tax XML TC's standards for online interfaces (under development).
OASIS	Organization for the Advancement of Structured Information Standards, a thought leader in XML standards
OASIS Tax XML TC	The OASIS Tax XML Technical Committee Referred to as "The Committee" in this document
OECD	Organisation for Economic Co-operation and Development
Ontology	An ontology defines the common words and concepts (meanings) used to describe and represent an area of knowledge, and so standardizes the meaning. [put in definition from UBL – from Alex]
SAF	Standard Audit File OECD specification used for tax auditing purposes
STF	Standard Transmission Format (OECD) used to transfer one or more electronic records between tax jurisdictions
Taxonomy	A classification scheme – a collection of concepts, definitions, and interrelationships in an area being defined.. In XBRL, taxonomies are normally represented using XML schemas and XML links.
UBL	Universal Business Language. A template and component framework for business documents. Common document types that the OASIS UBL Technical Committee has implemented include: Order, Invoice and Despatch Note.
XBRL	eXtensible Business Reporting Language, an XML-based standard for identifying and communicating financial information in company reports.
XML	Extensible Markup Language, a standard for creating common data formats for the web environment (see www.xml.org). Has widespread support as a data interchange standard.
XML instance document	A self-contained stream of XML-formatted data such as a message or a company's financial details.
XML schema	Means of defining structure, content, and semantics of XML documents.
Xlink	Allows elements to be inserted into XML documents in order to create and describe links between resources.



1 Executive Summary

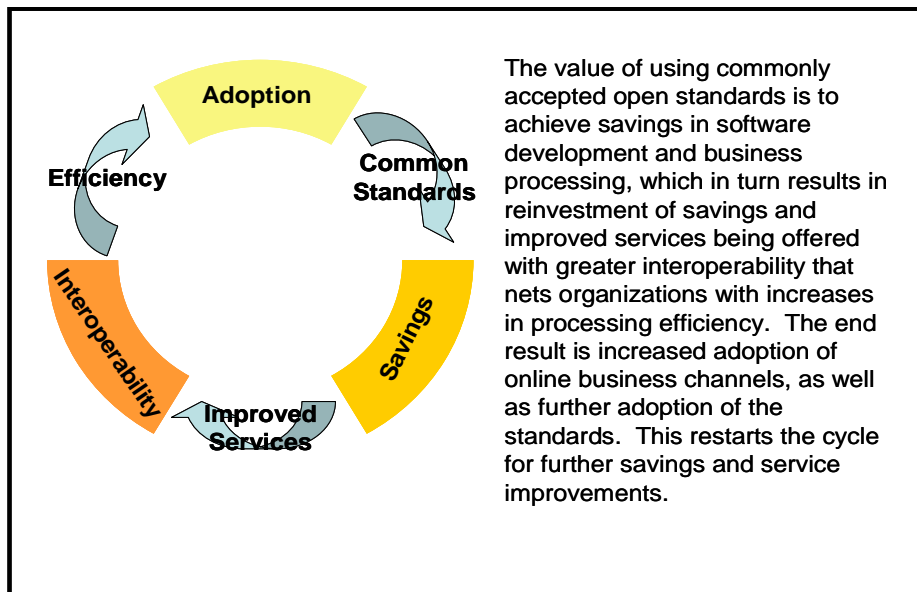
The OASIS Tax XML Technical Committee (The Committee) has been established to analyse, research and create a framework for XML standards to be used by tax administrations. The key to achieving a free flow of information between organizations is to standardize the exchange of information between them. Without such standardization, history shows that multiple definitions of information will be developed for specific purposes. This greatly increases the development and maintenance effort.

In accord with international practice, the OECD identified XML as the central standard for the exchange and mark-up of tax related data. The OECD requested that OASIS establish a Tax XML TC to define the XML framework within which tax administrations, accountancies and software developers, each in their area of responsibility, would work in regards to the exchange of tax-related information.

OASIS established the Tax XML TC in December 2002. The mandate of The Committee is to define and agree on a framework for tax administrations that will facilitate interoperability in a way that is open, flexible and international in scope.

Tax related information spans many business interests and is mostly either an extension of common business documents or a repackaging of business information for tax compliance purposes. Existing or in-progress standards for business information are being examined, influenced and incorporated as appropriate.

The benefits envisioned by The Committee include reductions in development of jurisdictionally specific interchange standards for software developers and tax administrations. Tax paying constituents will benefit from richer e-service products from tax administrations and service providers due to more flexible interchange formats and reduced development efforts. Administrations will also benefit from increased online interactions, which will improve business efficiency. Customers benefit from increased choices and streamlined business processes. Lastly, software developers will see reduced development costs and schedules when integrating their systems with tax reporting and compliance systems across jurisdictions.



All major software developers involved in e-commerce support XML. The Committee is composed of tax administrations from Australia, Europe and North America, worldwide premier software solution providers, and international consulting and accountancy firms. A detailed list of membership can be found at Attachment 8.0.

1.1 XML

Extensible Markup Language (XML) is a technology that promises to free business and tax data from application infrastructure. The data-centric approach of XML allows the communication of data regardless of the platform, operating system or underlying technology of existing systems. A large number of XML-based standards now exist, each promoted for certain purposes and scenarios. This paper identifies selected XML-based standards relevant to The Committee, and recommends the position to be taken on each one of them. To maximize the benefits, The Committee advises positions on relevant, widely supported and long-lasting standards.

1.2 Recommendations

The following summarises the recommendations discussed in this document. This is not a definitive list of XML standards that tax administrations may require. Rather, it provides a starting point upon which to base further analysis and decision making for the ultimate aim of achieving interoperability.

XBRL (eXtensible Business Reporting Language)

Recommend XBRL as a central standard for exchange of business/financial information for tax purposes.

Committee Activities

- Analyse the tax-specific extensions to XBRL needed to support the requirements of tax administrations. Advocate these to XBRL International to have them included in the standard.
- Seek adoption from tax administrations of the extended XBRL standard as the standard for tax reporting.
- Provide support to other OECD groups and revenue agencies to further develop opportunities where XBRL can enable improved taxpayer experience and automated audit and compliance activities.
- Create a standard framework in which tax administrations can utilise and extend XBRL.
- Develop and agree on standards and guides for tax administrations to use in creating sub-schemas/extensions to existing (base) XBRL schemas.

UBL (Universal Business Language)

Recommend that UBL be monitored, as it could provide a coordinated set of XML grammatical components that will allow tax-specific business documents to be exchanged in a particular business.

Committee Activities

- Monitor the progress of UBL.
- Assess if UBL has matured enough for the efficient and effective development of tax documents.

OAGIS (Open Applications Group Integration Specification)

Recommend that OAGIS be monitored, as it could be used to enhance interoperability between tax administrations through the exchange of pre-defined tax-specific documents.

Committee Activities

- Monitor the progress of OAGIS.
- Assess if OAGIS has matured enough for the efficient and effective development of tax documents.

CIQ (Customer Information Quality)

Recommend that CIQ be monitored, as it could provide the foundation for customer identity information, to be used in conjunction with other standards under review.

Committee Activities

- Monitor the progress of CIQ.
- Assess if CIQ has matured enough for the efficient and effective development of tax documents.
- Work on proof of concept to determine usefulness of CIQ within the tax context.

SAF (Standard Audit File)

Recommend that OECD change the name of SAF to better reflect the intended use, not only for audit, but also for tax compliance activities.

Committee Activities

- Continue to work with the OECD and other tax jurisdictions on development of the standard.

STF (Standard Transmission Format)

Recommend that the Committee support the further development of STF as the primary standard for electronic transfer of tax information between jurisdictions by assisting its extension and its convergence with the direction outlined in this paper.

Committee Activities

- Continue to work with the OECD and tax jurisdictions on completion and implementation of the standard.

1.3 Conclusion

This Position Paper outlines the standards that The Committee has determined will have the greatest and longest impact on improving the exchange of information. The Committee's conclusions are:

- XML is applicable to tax administrations already represented on The Committee. XML is likely to be applicable to other tax administrations also.
- The Committee does not necessarily seek to define a “Tax XML” standard. Rather it will utilise and influence other XML standards and determine how tax administrations should use them.
- It is expected that more tax administrations (particularly from OECD member countries) will become involved in The Committee.

2 Introduction

2.1 Document purpose

This document is in response to an OECD request to the OASIS Tax XML Technical Committee to provide a high level view of XML standards that are relevant to tax administrations and the proposed positioning for use of those standards. The paper addresses the key role of XML and XML-based standards in achieving standardized and re-useable interfaces. This will facilitate widespread uptake and avoid the high costs inherent in developing interfaces for specific purposes. Such positioning will improve tax administrations' electronic interaction with their customers.

This Committee recognizes the benefit of using open standards, and recommends their use to facilitate interoperability.

This paper aims to be readable rather than exhaustive. While this paper represents The Committee's agreements for future direction, this paper does not necessarily represent, in all aspects, the current position of all tax administrations from The Committee.

2.2 Background

Tax administrations around the world face the challenge of transforming services to keep up with changes in technology, business, and management practices. Member organizations of the Committee have been consistently at the forefront of these efforts.

The OASIS Tax XML Technical Committee was formed within OASIS in late 2002. The mandate of The Committee is to research and analyze personal and business tax reporting and compliance information, and to define a framework that will facilitate interoperability in a way that is open, flexible and international in scope.

All government members of The Committee participate actively in international organizations like the Organization for Economic Co-operation and Development (OECD).

2.3 Business Drivers

Historically, tax administrations have exchanged information with customers using millions of paper forms and documents each year. There are strong business drivers to replace this with electronic methods as can be seen in the different tax administrations' eService results. Customers are looking for government services that are secure, reliable, and easy to access at times that are convenient for them. To meet these needs, governments around the world have committed to have their most commonly used programs and services online.

Many tax administrations already offer electronic options for their taxes and are continuing to expand these services. The key benefits to these tax administrations are reduced handling costs and improved compliance rates. Clients also benefit from simplified processes and certainty of outcome (they receive real-time responses).

Without improved information exchange, cost reductions will not be fully achieved and customers will remain with manual processes.

Standard XML interfaces have a key role for systems development within tax administrations. The task of linking major software applications has much in common with linking different organizations. The current state is typical of many large organizations; there are a wide range of special-purpose interfaces. Apart from high costs, these impose constraints on any substantial change. Standardized and re-usable interfaces and exchange formats will reduce costs and allow tax administrations to make changes while supporting business needs.

Standardization of data that enables it to be communicated electronically without ambiguity will change the processes of tax preparation.

Data can be provided electronically in a format that will be readable by customers, software developers, and the tax administration. The information can be automatically exchanged between systems to eliminate the errors that can occur during manual entry. Matching data in a tax return with the same information sent to the tax administration becomes a nearly fail-safe task.

3 XML

3.1 XML Overview

XML is a standard way of expressing any data as a self-describing, structured string of characters known as an “XML instance document”. XML instance documents are composed of content “marked up” by tags describing that content; the tags are “metadata”, or data that describes other data. Applications designed to interpret data based on agreed-upon tags can share data independently from applications, operating systems and database structures.

XML provides all of the content and all of the necessary context without the constraints of a single presentation format. Because it frees data from presentation formats, applications and systems, XML allows for repurposing of data – one XML instance document can be reused for many purposes.

XML instance documents can be transmitted by many methods including electronic messages, files on disk, or even on paper. Due to its flexibility and wide applicability, XML has become the preferred standard for data exchange worldwide, and it underpins many current interoperability initiatives.

XML is six years old, and most recent versions of applications, including popular desktop applications, have incorporated XML as import/export formats or in some other way. However, older applications still in service today do not include XML capabilities, and will have to be replaced or upgraded over time to achieve the benefits that XML promises.

3.2 Why further XML standards?

XML is an agreement on how to build metadata tags and files with marked up content, but the agreement on the terms inside those tags must come from groups that come together to agree on how to exchange information. XML provides many options in how to express data items but still leaves great flexibility. In order for a message to be interpreted correctly, further standards are required to define how the message is carried and how its content is structured. In XML, and in the tax reporting context, a layered “stack” of standards is actually needed.

All the standards discussed in this paper are based on XML. The Committee recognizes that these standards are in early stages of adoption and evolving; tax administrations will need to be prepared to evolve their usage accordingly. Of course, this situation is little different than that of adoption of other technology, systems and language standards by tax administrations over the last 30 years. One major difference with XML standards is that many more groups and jurisdictions are jointly involved in defining them, with the result being that a much larger community will be able to share and reuse information electronically. The Committee will take into consideration the risks of rapid change and recommend well defined and internationally accepted standards as potentially more stable and well-supported.

The stack of standards as delineated by the XML community in general is large, with a number of areas such as core XML technologies, security, transport and handling that we will leave for future position papers. The standards we discuss in this document are primarily for message content, what a message contains. These standards can be categorized in many ways, among them:

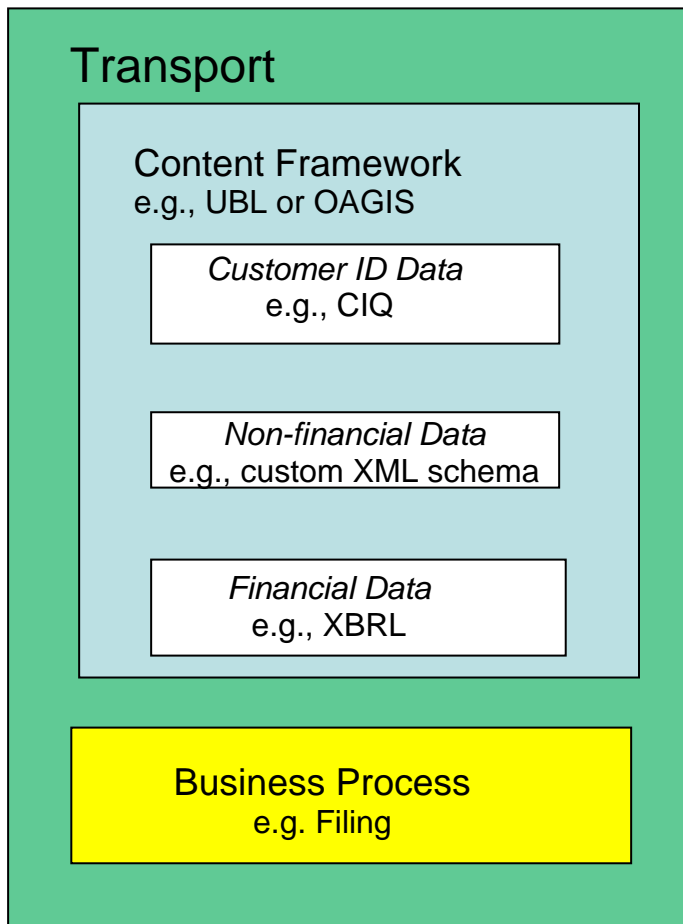
1. Direct or indirect applicability to taxation requirements,
2. Complete messages in themselves or being reusable representations of tax or tax-related information to be incorporated into other messages
3. Specifications or implementations based on XML or generic information that can be represented using different file formats or agreements on specification.

The tax-specific content standards are:

- XBRL
- UBL (only indirect tax components)
- OAGIS (only indirect tax components)

3.3 Standards coverage

The following diagram depicts The Committee's view on requirements for message definition for taxation. The Committee's needs will be met by using internationally accepted standards as often as possible, and supplementing them with standards-consistent extensions where necessary. The standards under review in this paper mainly fall under the content domain.



Tax-related OECD recommendations relevant to the Committee's work are:

- SAF
- STF

Business document interoperability:

- UBL
- OAGIS

Customer Detail:

- CIQ

These, along with the tax-specific content standards mentioned above, are discussed individually in the following sections.

4 XML Standards Under Review

4.1 XBRL (eXtensible Business Reporting Language)

XBRL enables the reporting of information *content* while capturing the relevant information *context*.¹ Although XBRL taxonomies have been mostly designed for business/financial reporting rather than tax reporting, it provides a formal specification that can be used to create taxonomies that classify tax users' information requirements. XBRL taxonomies already exist, but the XBRL specification provides a standard way to help define extensions to these taxonomies or to create new taxonomies. This gives it great flexibility, which tax administrations can make use of by defining tax-specific elements that use the existing XBRL structure.

Industry support is strong. The XBRL standard is unique in having the support of professional accounting bodies. The UK Inland Revenue is in the process of implementing e-filing applications using XBRL.

Many tax administrations have joined the country-specific XBRL standards group that is affiliated to XBRL International.

Recommendation

Recommend XBRL as a central standard for exchange of business/financial information for tax purposes.

Committee Activities

- Work within the framework of the Tax XML TC - XBRL Subcommittee and analyse the tax-specific extensions to XBRL needed to support the requirements of tax administrations. Advocate these to XBRL International to have them included in the standard.
- Seek adoption by tax administrations of the extended XBRL standard as the standard for business tax reporting.
- Provide support to other OECD groups and revenue agencies to further develop opportunities where XBRL can enable improved taxpayer experience and automated audit and compliance activities.
- Create a standard framework for agencies to utilise and extend XBRL.
- Develop and agree standards for tax administrations to use in creating sub-schemas/extensions to existing (base) XBRL schemas

¹ Improving Regulatory Reporting – Realising the Benefits of XBRL, KPMG LLP UK Copyright 2004

4.2 UBL (Universal Business Language)

UBL is a content standard for describing generic business documents such as Orders, Despatch Notes and Invoices. UBL v1.0 provides a framework in which document templates can be defined and combined with reusable components to produce structured documents that follow a well-defined set of composition rules. Individual components may be built with other standards such as CIQ or even XBRL, as appropriate. The UBL standard is intended, ultimately, to cover all common business documents, although v1.0 only covers supply chain documents. However, this includes a complete set of standard components for indirect taxation.

Subsequent versions of UBL will provide a context mechanism that allows generic components to be extended in specific and context-sensitive ways. For instance, a local addressing standard (in place of CIQ) could be used in a designatory component and denoted with an appropriate geo-political context.

Recommendation

Recommend that UBL be monitored as it could provide a coordinated set of XML grammatical components that will allow tax-specific business documents to be exchanged in a particular business.

Committee Activities

- Monitor the progress of UBL
- Assess if UBL has matured enough for the effective and efficient development of tax documents.

4.3 OAGIS (Open Applications Group Interface Specification)

The Open Applications Group is an industry consortium that periodically publishes an Interface Specification (OAGIS) that supports interoperability between disparate systems.

The specifications define a set of terms and definitions, which in turn are assembled into Overlays for use in Business Object Documents (BODs). BODs include such transactions as Invoices, Purchase Orders, and Shipments. Overlays allow these specifications to incorporate information specific to vertical industries. These specifications are used to map 'local' information about a document to a single common taxonomy that represents typical information about the same type of document. Thus, BODs facilitate exchange of data between disparate systems and business models.

The OAG specifications' chief benefit is in acting as a common model, thus reducing the cost of programmatically mapping each 'local' representation of a document separately (a many to many relationship).

As with UBL, standard components for indirect taxation have already been incorporated into existing BODs. OAGIS also provides, in the same context as UBL, a specification methodology for the development and publication of new BODs.

Recommendation

Recommend that OAGIS be monitored, as it could be used to enhance interoperability between tax administrations through the exchange of pre-defined tax-specific documents.

Committee Activities

- Monitor the progress of OAGIS.
- Assess if OAGIS has matured enough for the efficient and effective development of tax documents.

4.4 CIQ (Customer Information Quality)

CIQ delivers XML standards for customer (a.k.a. Party) profile information. The CIQ family of specifications include name and address information, supplementary information (such as telephone, email, id card and account) and customer relationship information. They are designed to handle customer/party data of any country at an abstract or detailed level.

The objective is to achieve interoperability of customer information within and throughout an organization. The approach is to use a "single base customer information standard" throughout the organization to define and represent customer data that can support different application requirements.

Recommendation

Recommend that CIQ be monitored, as it could provide the foundation for customer identity information, to be used in conjunction with other standards under review.

Committee Activities

- Monitor the progress of CIQ.
- Assess if CIQ has matured enough for the efficient and effective development of tax documents.
- Work on proof of concept to determine usefulness of CIQ within the tax context.

4.5 SAF (Standard Audit File)

The Committee is very interested in the development of the OECD SAF. The SAF facilitates businesses meeting their record-keeping obligations and also supports tax authorities' verification of transactions, especially with small and medium enterprises. While the SAF could be produced in any one of the common, non-proprietary or "open" data interchange formats, it is expected that XML will become one of the more popular, frequently used formats.

In the past few decades, the use of accounting and business software has increased dramatically. However inadequate attention has been paid to access, as well as reliability of financial information created and processed by these systems. Both tax auditors and taxpayers are forced to spend resources to extract and reformat business records in order to access, review and verify business transactions. The proposed SAF and related software developer guidance is expected to reduce the compliance burden on taxpayers and verification burden on tax auditors.

The Committee recognizes that the incorporation of export capabilities in business software will simplify and reduce the cost and time taken to audit business transactions. The benefit will be the avoidance of time-consuming work and will optimize the tasks related to tracing business transactions to the tax return.

The work underway at the OECD level will ensure accounting software is able to create, upon request, a file of ALL transactions in a common data interchange format – XML, CSV, etc.

This work will also address the related issue of reliability, internal control and audit trails, because the system will follow basic reliability and integrity requirements.

The Committee recommends that OECD change the name of SAF to better reflect the intended use, not only for audit, but also for tax compliance activities.

Recommendation

Recommend that OECD change the name of SAF to better reflect the intended use, not only for audit, but also for tax compliance activities.

Committee Activities

- Continue to work with the OECD and other tax jurisdictions on development of the standard.

4.6 STF (Standard Transmission Format)

The Committee is very interested in the development of the OECD STF. The STF makes it easier for tax administrations to exchange tax information with each other.

STF is part of the SEIT framework of standardized formats and procedures for exchange of information in taxation. It is the successor of the 1997 revised Standard Magnetic Format (SMF), an OECD recommendation by C(97)30/FINAL. The latter is still applicable for existing exchanges, but not recommended for exchange procedures that are to be newly developed.

STF is an extensible collection of XML schemas. Thus it describes the format of documents. It says nothing about the means of transporting the data formatted according to its rules.

Recommendation

Recommend that the Committee support the further development of STF as the primary standard for electronic transfer of tax information between jurisdictions by assisting its extension and its convergence with the direction outlined in this paper.

Committee Activities

- Continue to work with the OECD and tax administrations on completion and implementation of the standard.

5 Conclusions

- XML is applicable to tax administrations already represented on The Committee. It is also likely to be applicable to other tax administrations.
- The Committee does not necessarily seek to define a “Tax XML” standard. Rather it will utilise and influence other XML standards and determine how they should be used by tax administrations.
- It is expected that more tax administrations (particularly from OECD member countries) will become involved in The Committee.

5.1 Summary of Recommendations

1. Recommend XBRL as a central standard for exchange of business/financial information for tax purposes.
2. Recommend that UBL be monitored, as it could provide a coordinated set of XML grammatical components that will allow tax-specific business documents to be exchanged in a particular business
3. Recommend that OAGIS be monitored, as it could be used to enhance interoperability between tax administrations through the exchange of pre-defined tax-specific documents
4. Recommend that CIQ be monitored, as it could provide the foundation for customer identity information, and could be used in conjunction with other standards under review.
5. Recommend that OECD change the name of SAF to better reflect the intended use, not only for audit, but also for tax compliance activities.
6. Recommend that the Committee support the further development of STF as the primary standard for electronic transfer of tax information between administrations by assisting its extension and its convergence with the direction outlined in this paper.

Attachment 1: XBRL

XBRL 2.1 Specification is an XML-based standard that is designed for exchanging, analysing and reporting business and financial reporting information. It is formulated by XBRL International, Inc., a worldwide consortium of major accounting firms, regulators and technology suppliers. XBRL stands for eXtensible Business Reporting Language; although the Specification can be used to represent almost any area of interest, it is specifically designed for business reporting.

XBRL focuses on content and is completely neutral with respect to the technical means by which e-reporting is accomplished. Major accounting firms have invested effort in XBRL's development and have lobbied strongly to adopt the standard. The international community has also shown strong support. There are no other standards that have the widespread support of accounting professional societies.

The XBRL Specification has been used by various organizations and accounting groups to create jurisdictional taxonomies representing various areas of business reporting including US financial reporting, IFRS financial reporting, bank and friendly association reports, and other capital market and regulatory reports. In addition, XBRL GL is a framework of interlocking taxonomies that describe an extensible representation of the information found in operational and accounting databases.

An example of the concepts that would be covered by an XBRL taxonomy in the financial reporting space might include:

- Total Sales and Income
- Exports
- Capital Acquisitions
- Business Number (BN)
- Accounting Policy Note to the Financial Statements

A taxonomy designed specifically for financial reporting could be extended using the eXtensibility of XBRL to meet additional information requirements of tax administrations, such as:

- Statement Due Date
- Payment Due Date
- Tax File Number (TFN)

The United Kingdom Inland Revenue Service and many other organizations are already in the process of implementing applications using XBRL. Some of the software developers that The Committee works with (such as Blast Radius) are developing reports in XBRL. Gartner believes that XBRL will take between two and five years to be fully adopted².

² Hype Cycle for XML Technologies, 2003, Gartner corp. 30/05/2003

XBRL has a sophisticated implementation which carries hints for applications to aid presentation for human readability, and the calculation relationship between elements (e.g., line items aggregating to a sub-total) within the taxonomy. This sophistication is not apparent when the instance document is considered in the context of the taxonomy's schema alone, but requires proper interpretation of the taxonomy's linkbases, which hold that additional information

Attachment 2: UBL

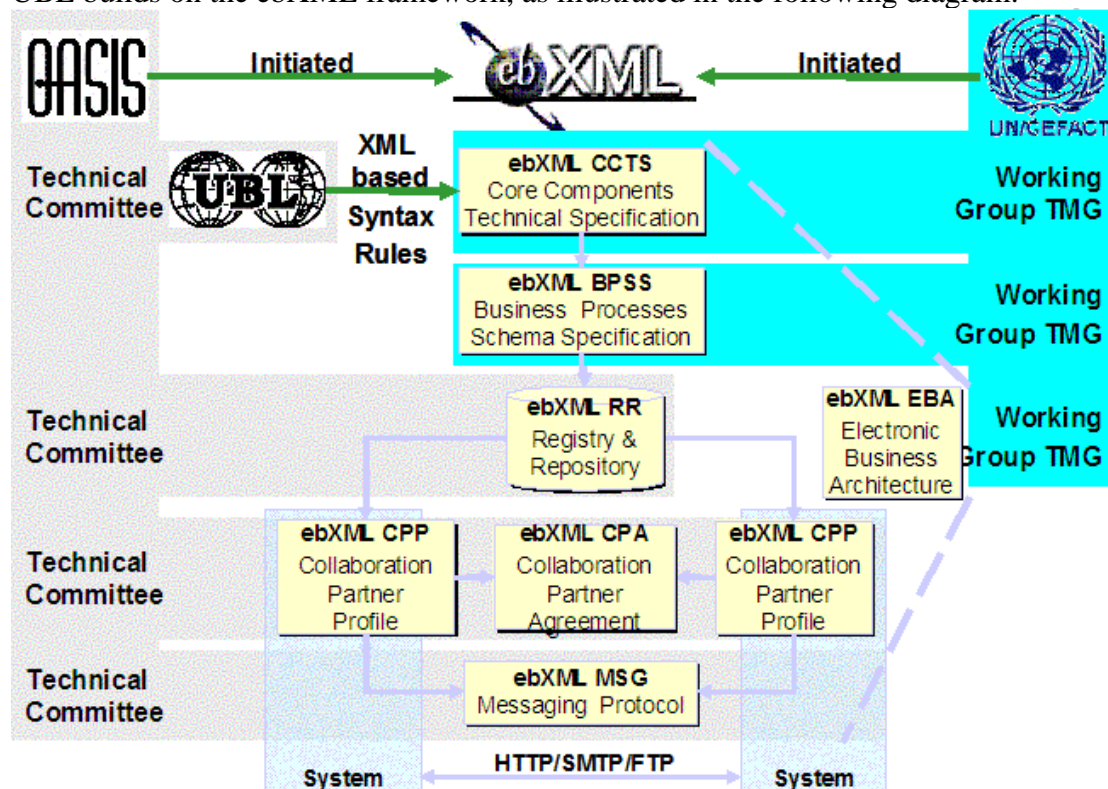
The Universal Business Language (UBL) is a standard describing the content of XML documents. The purpose of UBL is to standardize common business documents (e.g. invoices and purchase orders). By developing a framework for document templates and reusable components, consistent XML schemas can be developed. This standardisation of XML schemas will allow many different industries to exchange essential documents with one another without worrying about formats or implementing their own XML schemas.

The result of UBL is:

- An XML-based business standard
- Cooperatively with ebXML, creates a better form of e-commerce by enhancing Business-to-Business (B2B) concepts and technologies
- Applicable to all industries to adopt and exchange data
- Modular, reusable and extensible
- Non-proprietary and royalty-free
- Intention to become an international standard

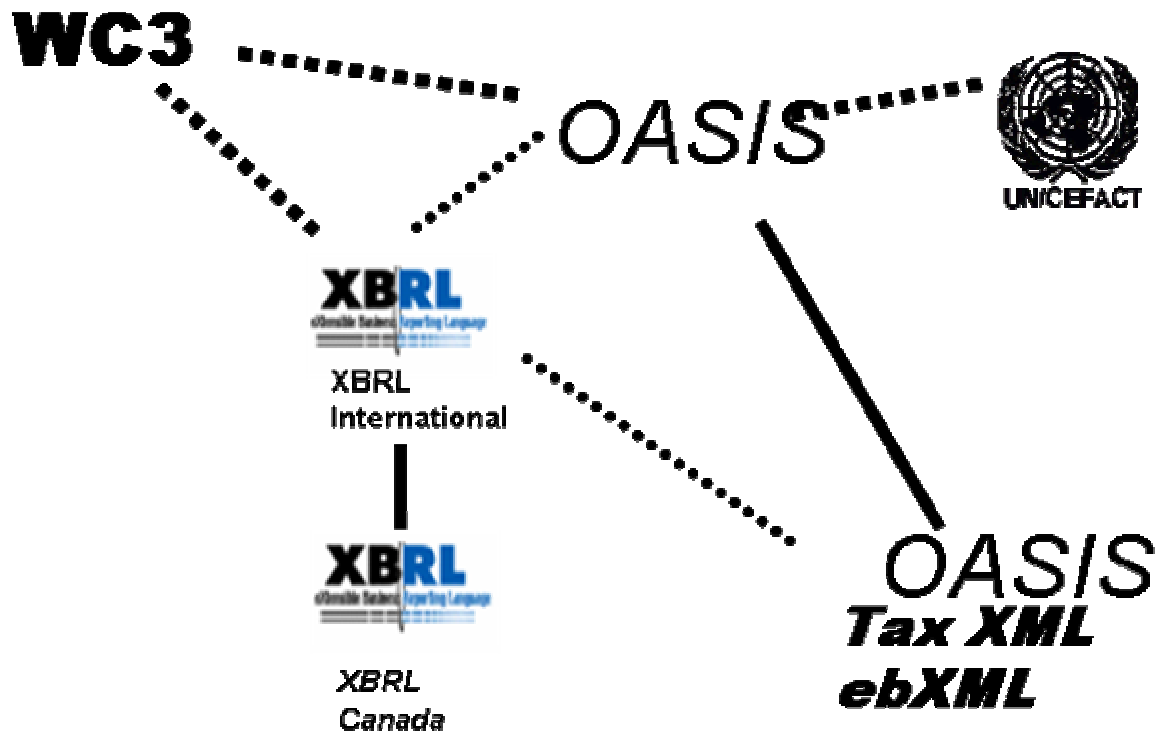
At present only supply chain documents such as order, invoice, despatch note, etc. have been defined in UBL. The intent is to extend to all generic business documents.

UBL builds on the ebXML framework, as illustrated in the following diagram:



Attachment 3: Standards bodies

The following diagram illustrates the relationships among XML standards organizations.



Attachment 4: XML SAF Digital source information for tax audit purposes

An auditfile is a database in which the most important accounting data required for tax and other external purposes is stored. The database holds a standard statement of all transactions put into the ledgers of the business. Auditors can easily import the data to their own computer and run standardized audit routines, saving significant time for all parties.

The auditfile concept: why?

Generally some 90% of businesses now use a computer for bookkeeping and accounting. Small and medium businesses often use standard accounting software packages. As a result almost every business has digital transaction data.

Under business and tax laws, businesses should store and provide the data in the format requested (these days often a digital format), unless their books and records are extremely small, in which case hard copies can easily be audited.

The business will be able to produce the auditfile by making its choice in the software menu of the standard software.

Advantages

Many tax audits are still paper-oriented. Such approaches mean that the advantages of digital data are not realised by both by the tax administration and the business.

Advantages of the auditfile are threefold:

- saved time: for tax audit purposes, the business will not have to explain the way in which books and records are kept.
- simplification: no conversion of data
- standardisation: independent of ledger software

Standard for software

XML SAF has been developed as a standard for industry to handle the exchange of financial data. The actual version is restricted to the exchange of transactions in the general ledger and a restricted set of relevant connected data.



Attachment 5: An example of XML

A customer tax submission, in valid XML but simplified for readability.

```
<!--header information deleted-->
  <Sender>
    <SoftwareNameStr>ExampleAccountingPackage</SoftwareNameStr>
  </Sender>

  <Client>
    <OrganisationNameDetails>
      <OrganisationName>Canada Customs and Revenue Tax Administrations</OrganisationName>
      <Address>
        <AddressLine1>2 Constitution Ave</AddressLine1>
        <CountryCode>CAN</CountryCode>
        <Postcode>J5Y7R4</Postcode>
        <ProvinceCode>QC</ProvinceCode>
      </Address>
      <EMail>
        <EmailAddressStr>ccratest@ccra-acri.gc.ca</EmailAddressStr>
      </EMail>
    </OrganisationNameDetails>
    <IdentificationDetails>
      <BN>12345678901</BN>
      <TFN>098765432101</TFN>
    </IdentificationDetails>
  </Client>

  <ClientStatement>
    <DIN>1234567890</DIN>
    <FormNameStr>Business Activity Statement</FormNameStr>
    <FilingDueDate>2003-07-21</FilingDueDate>
    <PaymentDueDate>2003-07-21</PaymentDueDate>
    <PeriodFromDate>2003-04-01</PeriodFromDate>
    <PeriodToDate>2003-06-30</PeriodToDate>
  </ClientStatement>

  <Obligations>
    <GST>
      <GSTOASIS Tax XML TCCalculatedInstalmentAmt>12345</GSTOASIS Tax XML
TCCalculatedInstalmentAmt>
      <GSTCapitalPurchasesAmt>1500</GSTCapitalPurchasesAmt>
      <GSTEimatedNetInstalmentAmt>12345</GSTEimatedNetInstalmentAmt>
      <GSTNonCapitalPurchasesAmt>7358</GSTNonCapitalPurchasesAmt>
      <GSTTotalSalesAmt>22000</GSTTotalSalesAmt>
      <TotalSalesIncludeGSTInd>Y</TotalSalesIncludeGSTInd>
      <GSTReportPeriodFromDate>2003-06-01</GSTReportPeriodFromDate>
      <GSTReportPeriodToDate>2003-06-30</GSTReportPeriodToDate>
    </GST>
    <!--other obligations would go here-->
  </Obligations>

  <PaymentDetails>
    <PaymentReferenceNum>00000000000001231</PaymentReferenceNum>
    <CreditTransferDetails>
      <AccountID>022223333</AccountID>
      <AccountNameStr>OASIS Tax XML TC</AccountNameStr>
      <FirstAgentIdentification>
        <BSB>111222</BSB>
        <NameOfInstitutionStr>Reserve Bank of Canada</NameOfInstitutionStr>
      </FirstAgentIdentification>
    </CreditTransferDetails>
  </PaymentDetails>
</ClientTaxSubmission>
```

Attachment 6: Tax XML Technical Committee

The following statement of purpose was the original statement of purpose when the committee was formed.

Statement of Purpose

Tax XML is an initiative to research and analyze personal and business tax reporting & compliance information, represented in XML, to facilitate interoperability in a way that is open, flexible and international in scope. The products of Tax XML will include a vocabulary of terms, a repository of artifacts including XML templates, documents exchanged for tax compliance, best practices, guidelines and recommendations for practical implementation. It will focus on developing a common vocabulary that will allow participants to unambiguously identify the tax related information exchanged within a particular business context.

The benefits envisioned will include dramatic reductions in development of jurisdictionally specific applications and interchange standards for software vendors and tax agencies alike. Also, tax paying constituents will benefit from increased services from tax agencies and service providers due to more flexible interchange formats and reduced development efforts. Lastly, CRM, payroll, financial and other system developers will enjoy reduced development costs and schedules when integrating their systems with tax reporting and compliance systems.

Tax XML will rely heavily on incorporating the XML standards that are defined for the common business vocabulary. Since tax related information spans many business interests and is mostly either an extension of common business documents or a repackaging of business information for tax compliance documents, any existing or in progress standards for business information will be examined and incorporated as appropriate. It is expected that this coordination and collaboration will be conducted with XBRL (The Extensible Business Reporting Language), and other leading initiatives as needed.

The interchange of information for tax compliance involves many participants including businesses, governments, financial institutions, legal services, solution providers, etc. that are involved in one or more of the many aspects that make up the tax compliance domain. This domain can be organized into several categories of activity:

- Tax Legislation - Enacting tax laws that create or alter tax liability requirements
- Tax Planning - Analysis and planning for the minimization of tax liability.
- Tax Registration - Registration with a tax authority for certification or rights to collect taxes within the authority's jurisdiction.
- Tax Calculation - Calculation of the tax liability of events and circumstances that are defined as taxable under the law.
- Tax Filing - Submitting reports of events and circumstances based on tax collected within a period of time to a tax authority.
- Tax Remittance - Submitting payment for outstanding tax collected and tax liability.



- Tax Distribution - Distributing tax funds collected to tax jurisdictions
- Tax Audit - Examining taxpayer compliance with tax liability requirements.

Each of these categories of tax compliance may be addressed as a separate sub-committee within Tax XML.

Attachment 7. Strategic View

In 2 years time

- The directional standards of the OASIS Tax XML Committee, such as XBRL for reporting of financial/business data, will have been substantially adopted by the member countries.
- CIQ will have been adopted by all member countries for client identification data.
- Countries that have adopted open interoperability standards such as XBRL will be able to exchange data simply and at a reduced cost, with a more effective audit program as a result.
- Tax accounting software for businesses will be largely XBRL compatible.
- Ongoing schemas developed by software developers, tax intermediaries and tax administrations will be developed in close collaboration.
- Most accounting software will have the ability to derive tax reporting data from business/financial reporting information.
- The cost for businesses to meet their tax reporting obligations will be reduced due to the software capability.
- The cost of development and redevelopment of accounting/tax software will be reduced due to the reusability that will exist within the software.
- There will be large shared repositories for schemas for tax purposes, and as they are referenced and continually populated, internationally common schemas can be identified.
- International businesses and accounting firms will be able to develop a more accurate overall picture of the business accounts and local and international tax obligations.
- More tax administrations will join OASIS so that they too can benefit from the information and knowledge sharing, and access to and understanding of the schema repository.
- Even if a new standard comes along, it will likely build upon the open standards that are available now – not the agency-specific standards.

Implications of not adopting these standards

- Countries which have not adopted open interoperability standards will continue to have costly data exchanges with other countries, coupled with a less effective compliance result from those exchanges.
- To adopt these later will be more costly as time goes on.
- If only 2 countries have adopted these standards, the benefits are limited and the cost may not have been worth it.
- Countries that did not adopt these standards may gain the benefits by simply creating converters that allow better data sharing (based on information in the schema repository).
- The cost of developing and redeveloping tax accounting and reporting software will continue to rise with the increasing complexity of the tax systems.
- The ongoing demand to share data across jurisdictions will continue to get supported by costly, slow and ineffective closed standards.
- Countries that have defined all forms labels in country-specific XML schemas will face rising costs to keep these up to date annually, and eventually the year-specific schemas will be come useless.

What are the Challenges? – Why wouldn't this happen ?

- Major countries do not adopt these standards.
- Expertise in this field is limited and the knowledge and understanding is shallow in some countries.
- Some countries cannot see the benefits and therefore cannot turn the benefits into business terms, and business leaders do not understand the proposal and cannot agree.
- Unable to get agreement to the directional standards.
- Some software developers will claim that this will simply cost them, and they will pass this on to the business community.

Attachment 8. OASIS Tax XML TC Membership

Person	Organization
Charles Myers	Adobe Systems
Christine Beasley	Australian Taxation Office
Bruce Handel	Canada Revenue Agency
Leslie-Ann Scott	Canada Revenue Agency
Arndt Liesen	Federal Ministry of Finance, Germany
Kevin Belden	IBM
Thomas Guinan	IBM
Philip Allen	Decision Soft
Cynthia Barr	PricewaterhouseCoopers
George Farkas	XBISoft
Alexander Foote	Canada Revenue Agency
Edwin Glover	Individual
Walter Hamscher	PricewaterhouseCoopers
Michael Pongracz	Individual
Timur Taluy	FileYourTaxes.Com
Marc van Hilvoorde	PricewaterhouseCoopers
Sylvia Webb	Individual
Andrew Webber	Canada Revenue Agency
Ken Jaslow	KPMG LLP
Peter Horsburgh	Microsoft Corporation
Peter DeCastro	Mitre Corporation
Doraiswamy ('Raj') Rajagopal	Mitre Corporation
Peter Lehr	Netherlands Tax and Customs Administration
Harm-Jan van Burg	Netherlands Tax and Customs Administration
Alex Fiteni	Oracle
Oliver Kroneisen	SAP
Hong-Eng Koh	Sun Microsystems
Dave Chambers	UK Inland Revenue eService Programme
Andy Greener	UK Inland Revenue eService Programme
Susan Smoter	US IRS, Internet Development Service
John Glaubitz	Vertex
Michael Roytman	Vertex

End of document