LEDES98BI V2 (98B INTERNATIONAL Version 2)

AS APPROVED BY THE LEDES OVERSIGHT COMMITTEE ("LOC") MARCH, 2006 AND MODIFIED APRIL 2008

The LEDES™ (Legal Electronic Data Exchange Standard) file format is intended to serve as a standard file format to be used by the legal industry for the electronic exchange of information.

THE LEDES98BI V2 FORMAT SPECIFIED HEREIN IS INTENDED TO ACCOMMODATE LEGAL BILLS GENERATED BY LAW FIRMS FOR USE BY CORPORATE LEGAL DEPARTMENTS OUTSIDE OF THE U.S. LAW FIRMS MAY CONTINUE TO USE THE EXISTING STANDARDS (LEDES 1998B, LEDES 2000, LEDES XML VER. 2.0 and LEDES XML VER. 2.1). FOR LAW FIRMS SUBMITTING BILLS OUTSIDE THE U.S., THIS NEW STANDARD ADDS TO THE FIELDS IN LEDES98B AND IS INTENDED TO EXPAND EXISTING DEFINITIONS AND FIELDS TO ACCOMMODATE CURRENTLY KNOWN INTERNATIONAL REQUIREMENTS. IT MAY BE MODIFIED IN THE FUTURE AS ADDITIONAL REQUIREMENTS FOR INTERNATIONAL LEGAL BILLS ARE IDENTIFIED.

Background

For many years, corporate law departments have desired to implement task-based billing. Their goal was to perform sophisticated analyses on their legal bills. In lieu of any generally accepted standards, each of several corporations developed its own custom set of task codes and its own custom electronic billing formats which they required their law firms to utilize. While this seemed to meet the corporation's needs, the prospect of law firms having to meet the demands of several such clients, each with its own mutually incompatible code sets and electronic billing format, became a significant barrier to implementation. The situation begged for industry standards.

In 1994 and 1995, a tripartite initiative of the American Bar Association Section of Litigation, the American Corporate Counsel Association, and a sponsoring group of major corporate law departments and law firms coordinated and supported by Price Waterhouse LLP ("Price Waterhouse") developed the Uniform Task Based Management System, a standard set of task, activity, and expense codes for use in the legal industry.

In parallel with the successful UTBMS effort, in 1995, Price Waterhouse convened a consortium of leading legal industry time and billing system and case management system vendors in order to define a standard electronic billing format for use in the legal industry. The consortium approved two format standards for use:

- The ASC X12 EDI standard (the national standard for EDI (Electronic Data Interchange), widely used in several industries)
- A Delimited ASCII standard defined by the consortium

The ASC X12 standard has, to our knowledge, never been used in the legal industry, due largely to its enormous syntactic complexity. At least one custom format, however, was based on the ASC X12 format.

The Delimited ASCII standard has been used, in slightly modified form, by several organizations (e.g., those using the PeerPoint and Data Clearinghouse products). The LEDES format defined herein improves on that Delimited ASCII EDI standard, with the experience of actual implementation efforts considered.

LEDES Format History

The LEDES1998B standard was originally developed in 1998 by PricewaterhouseCoopers and the American Bar Association, who have now placed it in the charge of the LOC (LEDES Oversight Committee), a voluntary body consisting of industry representatives. Below is a history of the LEDES formats that have been previously adopted by LOC:

- LEDES1998B: Released to the public in January 1999. This was the first public version of the standard. The LEDES 1998B format was retired by the LOC in 2006.[1]
- LEDES2000: Released to the public in April 2000. This is an XML version, which is separate from the LEDES 1998B format (i.e. the LEDES2000 standard does not replace the LEDES 1998B format). The LEDES 2000 format was retired by the LOC in 2006.[1]
- LEDES XML Ebilling Ver. 2.0: Ratified by the LOC membership in 2006, this XML version, based on LEDES 2000, was set forth to meet the expanded requirements for global e-billing. This documentation for version was modified in 2008 and the format retired.[1]
- LEDES XML Ebilling Ver. 2.1: Ratified by the LOC membership in 2008, this XML format, based on LEDES XML Ebilling Ver. 2.0 more contains additional information to more fully meet global ebilling requirements.

NOTE: In addition to the LEDES98BI V2 format described below, the LOC has also adopted a new LEDES XML budgeting and timekeeper attribute format. All of the specifications mentioned can be found at www.ledes.org, in addition to the format described here.

Background about the LEDES98BI V2 standard

In 2004, LITIG (Legal IT Innovators Group) proposed an e-billing standard for the United Kingdom's legal services industry that builds on the LEDES1998B format. Specifically, LITIG proposed adding nine additional fields to the LEDES 1998B standard:

1. **PO_NUMBER**: This is the client-assigned Purchase Order Number for the job being billed (field can be null).

[1] "Retired" is a term used to indicate that this format is not intended to ever again be modified. The continued usage of this format by law firms, ebilling systems and law department is fully intended.

2. **CLIENT_TAX_ID** : The client's Tax ID Number or in UK the VAT number (field can be null)
3. **MATTER_NAME** : This is the name of the matter to which the invoice relates (field can be null)
4. **INVOICE_TAX_TOTAL** : The sum of all tax line items in the invoice (field can be null)
5. **INVOICE_NET_TOTAL**: Sum of the LINE_ITEM_TOTAL minus INVOICE_TAX_TOTAL (field can be null)
6. **INVOICE _CURRENCY**: The currency of the invoice denoted by the 3 character ISO currency code (required)
7. **TIMEKEEPER_LAST_NAME**: Only required for fee-line items
8. **TIMEKEEPER_FIRST_NAME**: Only required for fee-line items
9. **ACCOUNT_TYPE** This would indicate whether an invoice is own account ("O") or a third party account ("T").

In addition, it was proposed that the TIMEKEEPER_CLASSIFICATION field include the following additional timekeeper classifications:

SI: Summer Intern

PL: Paralegal

SE: Secretary or Clerk

NP: Non-Legal Professional

Finally, it was proposed that the EXP/FEE/INV_ADJ_TYPE be expanded to accept two additional line-item types – "T" is a tax line-item, "IT" is an invoice-level adjustment on tax.

The LOC, after several meetings and consultation with LITIG, approved this LEDES98BI beta standard, which incorporated the additions to the LEDES 1998B standard noted above. The LOC adopted the LEDES98BI beta standard with the following notes and principles:

- The LEDES98BI beta standard is a beta release to be used for an interim period of one year and reevaluated then.
- The LEDES98BI beta standard is intended to be an international e-billing standard. It is expected that other countries will provide additional comments and request additions to the LEDES98BI beta standard, and that those will be incorporated into the LEDES98BI final standard every six to twelve months by the LOC.
- The LOC recommended that the original LITIG standard (which was slightly different than described above), not be supported, and that all vendors and law firms work to support the LEDES98BI standard, first in beta and then in final form.

- The LEDES98BI beta standard is an extension to the LEDES1998B standard, but does not replace the LEDES 1998B standard. The LEDES1998B standard remains in existence for use by clients, law firms, and vendors in the United States and elsewhere

- Except for the changes noted above, the LEDES98BI beta standard uses all of the same rules, format, and conventions of the LEDES1998B standard. The new fields in the LEDES98BI standard were appended to the end of the LEDES1998B standard to facilitate easier adoption and backward compatibility.

The LEDES98BI Beta standard was publically available from January, 2005 until February, 2006. During this time a great deal was learned about the requirements of an internationally acceptable legal invoice. In the autumn of 2005, a group of companies, law firms and vendors collected this experience and submitted it as a recommendation for changes to the LEDES98BI Beta then in place. The changes that were recommended revolved primarily around line item VAT and other tax calculations at the line item level, as well as sender and receiver identification data elements required of an invoice moving cross-border, primarily in Europe. The result is what follows, the LEDES98BI file format adopted by the LOC in March of 2006 and as modified in April 2008.

LEDES98BI: FINAL FORM

Following adoption, the LEDES98BI beta has undergone additional changes based on recommendations from the international legal community. Of the original principles noted above, the following remain and apply to LEDES98BI in this, its final form:

- The LEDES98BI standard is intended to be an international e-billing standard. It is expected that other countries will provide additional comments and request additions to the LEDES98BI standard, and that those will be incorporated into the standard every six to twelve months by the LOC.

- The LOC recommended that the original LITIG standard (which was slightly different than described above), not be supported, and that all vendors and law firms work to support the LEDES98BI standard, first in beta and then in final form. LITIG has ceased support for the LITIG standard and has urged the international legal community to fully support LEDES98BI.

- The LEDES98BI standard is an extension to the LEDES1998B standard, but does not replace the LEDES 1998B standard. The LEDES1998B standard remains in existence for use by clients, law firms, and vendors in the United States and elsewhere

- Except for the changes noted herein, the LEDES98BI standard uses all of the same rules, format, and conventions of the LEDES1998B standard. The new fields in the LEDES98BI standard were appended to the end of the LEDES1998B standard to facilitate easier adoption and backward compatibility.

LEDES98BI V2:

Note also that the LEDES98BI standard was modified in April 2008 by the LOC membership and is know known as LEDES98BI V2. Additional language was included for the INVOICE_TAX_TOTAL field and two additional fields were added: INVOICE_REPORTED_TAX_TOTAL and INVOICE_TAX_CURRENCY. Those modifications are incorporated herein and this wholly replaces the previous LEDES 98BI standard.

Version

For the purposes of the Version Header Record (see below), this version of the LEDES format is identified as "LEDES98BI V2".

File Specification

Field Delimiter

Fields are delimited by the "|" character (ASCII hex 7C), also known as the "pipe" character. The "|" cannot be used for any purpose other than as field delimiter (i.e., it cannot appear in a text field). In other words, the "|" character must appear *between* any two fields. The "|" symbol must *not* appear after the last field in a record.

Record Delimiter

Records are delimited by the "[]" characters (ASCII hex 5B 5D), also known as the "left square bracket" and "right square bracket" characters used in that sequence. The "[]" as a pair cannot be used for any purpose other than as record delimiter (i.e., they cannot appear in a text field). A "[" must be immediately followed by a "]" in order to signify a record delimiter. In other words, the "[]" characters must appear at the end of any and all records, including the last record in a file.

Carriage Returns/Line Feeds

Carriage Returns and Line Feeds (ASCII hex 0D 0A) in a LEDES file are ignored. For readability, and ease of programming, most applications will probably (but not necessarily) include a carriage return-line feed pair following each record delimiter.

Version Header Record

The first record of all LEDES files must contain a version identifier to indicate conformance with a particular version of this specification (i.e., for this version, "LEDES98BI V2" would be used). Since future versions are not ruled out, this construct is provided as a means to allow the possibility of automatic version recognition, should it become necessary. Processors may signal an error if they receive files labeled with versions they do not support. To minimize the possibility of such errors, processors are encouraged to support all versions of this format (i.e., the most current, in addition to all previous).

As an example, the version header record must match the following text exactly:

LEDES98BI V2[]

The version header record must appear only once in any LEDES file (as the first record).

Field Header Record

The second record of all LEDES files must contain the names of the fields used in subsequent data records in the order that those fields appear in the data records.

The present LEDES format requires that the fields be in a specified order and, therefore, the field header record must match the following text exactly (the "[]" shown represents the record delimiter, as described in the "record delimiter" section of this specification above):

```
INVOICE_DATE|INVOICE_NUMBER|CLIENT_ID|LAW_FIRM_MATTER_ID|INVOICE_TOTAL|BILLI
NG_START_DATE|BILLING_END_DATE|INVOICE_DESCRIPTION|LINE_ITEM_NUMBER|EXP/FEE/
INV_ADJ_TYPE|LINE_ITEM_NUMBER_OF_UNITS|LINE_ITEM_ADJUSTMENT_AMOUNT|LINE_ITEM
_TOTAL|LINE_ITEM_DATE|LINE_ITEM_TASK_CODE|LINE_ITEM_EXPENSE_CODE|LINE_ITEM_A
CTIVITY_CODE|TIMEKEEPER_ID|LINE_ITEM_DESCRIPTION|LAW_FIRM_ID|LINE_ITEM_UNIT_
COST|TIMEKEEPER_NAME|TIMEKEEPER_CLASSIFICATION|CLIENT_MATTER_ID|PO_NUMBER|CL
IENT_TAX_ID|MATTER_NAME|INVOICE_TAX_TOTAL|INVOICE_NET_TOTAL|INVOICE_CURRENCY
|TIMEKEEPER_LAST_NAME|TIMEKEEPER_FIRST_NAME|ACCOUNT_TYPE|LAW_FIRM_NAME|LAW_F
IRM_ADDRESS_1|LAW_FIRM_ADDRESS_2|LAW_FIRM_CITY|LAW_FIRM_STATEorREGION|LAW_FI
RM_POSTCODE|LAW_FIRM_COUNTRY|CLIENT_NAME|CLIENT_ADDRESS_1|CLIENT_ADDRESS_2|C
LIENT_CITY|CLIENT_STATEorREGION|CLIENT_POSTCODE|CLIENT_COUNTRY|LINE_ITEM_TAX
_RATE|LINE_ITEM_TAX_TOTAL|LINE_ITEM_TAX_TYPE|INVOICE_REPORTED_TAX_TOTAL|INVO
ICE_TAX_CURRENCY[]
```

Every record following the field header record is a data record and must comply with the requirements for data records. The field header record must appear only once in any LEDES file (as the second record).

Mandatory Fields

The LEDES98BI V2 file specification document shows the mandatory fields. Specifically, if the specification states that “A null value ("") would be an error,” this means that the field is mandatory. For example, in the data “Field_1_data||Field_3_data|…" the second field is null. If the field is a mandatory field, a null value will not be compliant with the LEDES98BI V2 standard.

Formatting Data Within a Field

Leading and trailing blanks (i.e., "space" characters) in character fields are acceptable.

Date fields must be in the format YYYYMMDD. Only digits 0 to 9 are allowed in date fields.

Numeric fields and currency fields may contain only digits 0 to 9, decimal point ("."), and dash ("-"). In other words, no "space" characters or any other characters except those mentioned above are allowed in numeric and currency fields. Negative numbers, where permitted, must be indicated with a leading dash. When used, the dash character must be the first character in the field. Field lengths for numeric and currency fields represent the number of digits allowed in the field, to the left and the right of the decimal point. For example, "10.4" indicates a number in the range "-9999999999.9999" to "9999999999.9999". A number specified to the right of the decimal point indicates the maximum number of decimal places permitted. Leading zeros are acceptable (for negative numbers, however, they must follow the "dash" character).

Adjustment

Adjustments on individual line items are indicated in the LINE_ITEM_ADJUSTMENT_AMOUNT field. For example, if a timekeeper had a billing rate of $200 per hour and they worked on a matter for two hours, but the client is entitled to a ten percent discount on that person’s time, the associated field values (among others) would be as follows:

Field Name	Field Value	Formula
LINE_ITEM_NUMBER_OF_UNITS	"2"	
LINE_ITEM_UNIT_COST	"200"	
LINE_ITEM_ADJUSTMENT_AMOUNT	"-40"	(2*200*-0.1)
LINE_ITEM_TAX_TOTAL	“0”	
LINE_ITEM_TOTAL	"360"	((2*200) - 40 + 0)

Invoice-level adjustments must be entered as a line item with the EXP/FEE/INV_ADJ_TYPE indicating either an invoice-level adjustment to fees ("IF"), an invoice-level adjustment to expenses ("IE"), or an invoice-level adjustment to taxes (“IT”) and the value for the adjustment entered in the LINE_ITEM_ADJUSTMENT_AMOUNT field. Thus, an invoice-level adjustment of -$4000 on fees (i.e., an invoice-level discount on fees) would have the following field values (among others):

Field Name	Field Value
EXP/FEE/INV_ADJ_TYPE	"IF"
LINE_ITEM_ADJUSTMENT_AMOUNT	"-4000"
LINE_ITEM_TAX_TOTAL	“0”
LINE_ITEM_TOTAL	"-4000"

There would usually be a LINE_ITEM_DESCRIPTION accompanying an invoice-level adjustment to explain the reason for the adjustment.

Alternative Billing Arrangements

The legal industry is increasingly moving towards use of alternative billing arrangements. The LEDES format, however, is principally geared towards conventional hourly fees. It is, however, possible, to execute most, if not all, alternative billing arrangements using LEDES.

As an example, if a fixed fee had been agreed to, there are a variety of ways that the LEDES file can be prepared:

- Each time entry might be prepared with a corresponding LINE_ITEM_ADJUSTMENT_AMOUNT. The fixed fee would be billed as a single (positive) invoice-level adjustment.

- Each time entry could be charged at the normal rate with an invoice-level adjustment which adjusted the INVOICE_TOTAL value to zero, or the fixed fee amount.

LEDES98BI V2 File Specification

A LEDES98BI V2 format specification document (LEDES98BI V2 04-2008.xls) is provided herewith.

Notes

1. Several of the fields in the specification contain information which applies to many, if not all, entries in an invoice. This allows the possibility that the sending application might err by having some of the information change from record to record. For example, for each INVOICE_NUMBER, there should be a single INVOICE_DATE, which is repeated on each line item for that invoice. However, since INVOICE_DATE is required to be reported on each line, the possibility exists that the sending application might mistakenly report two or more different INVOICE_DATE for a single INVOICE_NUMBER. While that would clearly be an error, the receiving application must have an unambiguous means of interpreting the information. Therefore, in order to provide that unambiguous interpretation, the following interpretational guidelines are in effect:

   a. For each INVOICE_NUMBER, only the first INVOICE_DATE appearing for that INVOICE_NUMBER is valid (i.e., all others after the first can be disregarded).

   b. For each LAW_FIRM_MATTER_ID, only the first CLIENT_ID appearing for that LAW_FIRM_MATTER_ID is valid (i.e., all others after the first can be disregarded).

   c. For each INVOICE_NUMBER, only the first INVOICE_TOTAL appearing for that INVOICE_NUMBER is valid (i.e., all others after the first can be disregarded).

   d. For each INVOICE_NUMBER, only the first BILLING_START_DATE appearing for that INVOICE_NUMBER is valid (i.e., all others after the first can be disregarded).

   e. For each INVOICE_NUMBER, only the first BILLING_END_DATE appearing for that INVOICE_NUMBER is valid (i.e., all others after the first can be disregarded).

   f. For each INVOICE_NUMBER, only the first INVOICE_DESCRIPTION appearing for that INVOICE_NUMBER is valid (i.e., all others after the first can be disregarded).

2. LAW_FIRM_ID and CLIENT_ID are included as fields in order to enable automatic bill routing, should that be desired.

3. LAW_FIRM_MATTER_ID and CLIENT_MATTER_ID are included in order to provide a key for differentiating between various matters being billed. The LAW_FIRM_MATTER_ID is the law firm's key and the CLIENT_MATTER_ID is the client's key. Both must be included, if available. The only situation where CLIENT_MATTER_ID would not be reported by a law firm is if that client does not have its own independent system for identifying matters.

4. Because INVOICE_TOTAL is defined as the sum of the LINE_ITEM_TOTAL for that INVOICE_NUMBER, there exists the possibility that the sending application may make an arithmetic mistake when calculating INVOICE_TOTAL. The receiving application is encouraged to verify that INVOICE_TOTAL is equal to the sum of that Invoice's LINE_ITEM_TOTALs, within a reasonable variance to account for rounding errors that may have been made when the sending application calculated the individual LINE_ITEM_TOTALs. If the INVOICE_TOTAL is not within a reasonable variance (e.g., 1%) of the sum of the LINE_ITEM_TOTALs, there is clearly an error that must be resolved by the sending law firm before payment.

5. The LINE_ITEM_TOTAL is defined as the algebraic result of the following formula: (LINE_ITEM_UNIT_COST * LINE_ITEM_NUMBER_OF_UNITS) + LINE_ITEM_ADJUSTMENT_AMOUNT + LINE_ITEM_TAX_TOTAL

6. It is sometimes the case that between the sending and receiving system amounts may be rounded differently, or to fewer or more decimal places, than intended by the billing party. The receiving party should make every attempt to round using the same method as the sending party. Realizing that rounding errors will sometimes occur, the sending and receiving parties should mutually agree to an acceptable rounding error below which the sending party will accept payment as complete.

   There exists the possibility that the sending application may make an arithmetic mistake when calculating LINE_ITEM_TOTAL. The receiving application is encouraged to verify that LINE_ITEM_TOTAL is properly calculated, within a reasonable variance to account for rounding errors that may have been made when the sending application calculated it. If the LINE_ITEM_TOTAL is not within a reasonable variance (e.g., .1%) of the value specified by the formula above, there is clearly an error that must be resolved by the sending law firm before payment.

7. The TIMEKEEPER_NAME, TIMEKEEPER_LAST_NAME, TIMEKEEPER_FIRST_NAME and TIMEKEEPER_CLASSIFICATION fields are provided for information only. The receiving application must not use these fields as a primary key for timekeeper. Use of these fields is mandatory for fee line items in order to preclude the need for a separate look-up table of timekeeper names and classifications in the receiving application.

Common Errors to Avoid

- Algebraically incorrect INVOICE_TOTAL (i.e., INVOICE_TOTAL not equal to the sum of the LINE_ITEM_TOTAL)
- Algebraically incorrect LINE_ITEM_TOTAL
- Invalid dates (e.g., not in YYYYMMDD format)
- Invalid header line (e.g., missing fields, improper field names)
- ASCII character 1Ah (i.e., Crtl-Z) at the end of the file
- Line item number not unique for a given invoice
- Missing LINE_ITEM_NUMBER_OF_UNITS

- Missing LINE_ITEM_UNIT_COST
- Mandatory fields missing data
- Fields presented in improper order
- No TIMEKEEPER_ID listed for fee line items
- Missing fields or too many fields

Other errors may be client specific and should be examined under the rules specified by that client. These errors include such things as LINE_ITEM_DATE not within the period covered by BILLING_START_DATE and BILLING_END_DATE.

LEDES98BI V2 Sample File

A sample LEDES98BI V2 invoice file (LEDES98BI V2 Sample File 04-2008.txt) is provided herewith.