

The use of attachments to invoices

This text applies to PEPPOL BIS Billing 3 implemented with UBL 2.1 syntax. Unless otherwise specifically mentioned the term “invoice” may cover both invoice and credit note.

1. General

The data model in EN 16931 suggests three ways of providing information about supporting documents that substantiate claims in the invoice: (a) by referencing a document known to both parties, (b) by embedding a document in the invoice, and (c) by providing reference to an external document. The information about such documents is given in *BG-24 Additional supporting documents* [in UBL syntax: `AdditionalDocumentReference`]. There may be more than one BG-24 in an instance of an invoice, and the three options for providing information on supporting documents may be mixed within an invoice.

Implementers and users are cautioned that attachments and referenced documents may form part of the bookkeeping material. In particular, documents that are referenced may require special attention by the receiving organisation in order to secure that archiving requirements are met.

The sections below outline the options of using embedded documents, external documents, and referenced document, respectively, in the capacity of providing specification(s) to the invoice.

Note – This guide covers specifications to the invoice. For these, the UBL binding of BG-24 is always to `AdditionalDocumentReference`. Document references with a purpose other than invoice specification are dealt with in a separate guide on general reference mechanisms.

Important note regarding attaching the supplier’s image of the invoice (invoice copy)

A copy of the supplier’s visualisation of the invoice, or the stylesheet used by the supplier for visualisation, should never be included as an attachment to the invoice. The EN 16931 data model defines the content of invoices without any visualisation, and PEPPOL BIS Billing 3 clearly states that an image format of the invoice should not be attached – see section 6.2.10 of <https://docs.peppol.eu/poacc/billing/3.0/bis/>

As a background to SFTI’s position on invoice copies: An image of an invoice may modify, intentionally or not, the understanding of the electronic invoice. For the receiver the combination of e-invoice and invoice image would require additional validation, and the receiver may not disregard one of the invoice representations unless it has been established that no accounting information will be lost or compromised. Further, if such a non-compliant invoice is received by a buyer in Swedish public sector the two forms of invoice should together be regarded as “public document”.

For more information see “SFTI’s råd avseende E-faktura och fakturakopia” that can be downloaded from www.sfti.se (available in Swedish only).

2. Embedded attachments

Embedded attachments are part of the standard: the use of attachments does not require advance agreement. IN PEPPOL BIS Billing 3 the embedded document is placed in in *BT-125 Attached document* [UBL: AdditionalDocumentReference/ Attachment/ EmbeddedDocumentBinaryObject].

Attachments have to follow the following principles:

- The attachment is to be embedded as a binary object, with BASE64 encoding
- The attachment requires two attributes: @mimeCode and @filename
- Attribute @mimeCode is to show the mediatype of the attachment. The following values are allowed for @mimeCode:
 - Document: text/csv, application/pdf,
 - Image: image/png, image/jpeg,
 - Cell structured: application/vnd.openxmlformats-officedocument.spreadsheetml.sheet
application/vnd.oasis.opendocument.spreadsheet
- Attribute @filename is provided by, or on behalf of, the sender of the invoice. The receive should not assume that the name in @filename will be unique in the receiver's system.

It is good practice for receivers to set up a quarantine mechanism for attachments, where they can be checked for harmful code before they are progressed to the business application.

Example, in UBL syntax, referring to an embedded document (attachment):

```
<cac:AdditionalDocumentReference> <!-- BG-24, Additional supporting documents -->
  <cbc:ID>4444441</cbc:ID> <!-- BT-122, Supporting document reference -->
  <cbc:DocumentDescription>Consumption report</cbc:DocumentDescription>
  <cac:Attachment> <!-- BT-125, Attached document: -->
    <cbc:EmbeddedDocumentBinaryObject mimeCode="text/csv" filename="testfile1.abc">
      01234567
    </cbc:EmbeddedDocumentBinaryObject>
  </cac:Attachment>
</cac:AdditionalDocumentReference>
```

There is no limit to the number of embedded attachments, nor to the size of an individual attachment – EN 16931 merely remarks that “length limitations may apply”. It is believed that file size capabilities will increase as technology develops so, rather than setting a fixed size, it is suggested to take guidance from the size of attachments normally handled, over time, via email.

3. Reference to an external document

Embedded document is the preferred method for attaching documents to invoices but in some cases reference to external document may be a better option. The European standard identifies two situations where external document could be of use: to separate sensitive information from the invoice itself or to accommodate for large attachments. The use of external documents needs to be agreed in advance, among things to consider are file format, media type and mechanism for safe access to the document.

The external document is referenced by a URL that is placed in *BT-124 External document location* [UBL: AdditionalDocumentReference/Attachment/ExternalReference/URI]. The corresponding document identifier is placed in *BT-122 Supporting document reference* [UBL: AdditionalDocumentReference/ID].

Example, in UBL syntax, referring to an external document:

```
<cac:AdditionalDocumentReference> <!-- BG-24, Additional supporting documents -->
  <cbc:ID>555555551</cbc:ID> <!-- BT-122, Supporting document reference -->
  <cbc:DocumentDescription>Consumption report, itemized </cbc:DocumentDescription>
  <cac:Attachment>
    <cac:ExternalReference> <!-- BT-124, External document location -->
      <cbc:URI>http://www.example.com/index/A/1.html</cbc:URI>
    </cac:ExternalReference>
  </cac:Attachment>
</cac:AdditionalDocumentReference>
```

4. Reference to a document known to both parties

BG-24 Additional supporting documents [in UBL syntax: AdditionalDocumentReference] may refer to an invoice specification that is known to both parties. BG-24 then includes merely *BT-122 Supporting document reference* [UBL: AdditionalDocumentReference/ID], with no scheme identifier, and *BT-123 Supporting document description* [UBL: AdditionalDocumentReference/DocumentDescription].

SFTI has so far identified just one such case; its current scope is for use within Sweden only – the use case can be summarised as follows. In Sweden each region is responsible the provision of health care to its residents. Normally resources available within the region would accommodate for this but if healthcare services are provided by another region, under agreement, a reporting mechanism is in place to specify the services provided, and to whom. An interregional healthcare services report is exchanged, between the regions concerned, in the form of a structured electronic document drawn up to serve healthcare monitoring and statistics. As such reports hold classified data on patients, care and costs, they are handled in a secure environment involving a secure network, systems with access restrictions and authorised staff.

The interregional healthcare services report additionally functions as the basis for claims for compensation by the executing region. The invoice, then, merely refers to the healthcare service report as its invoice specification (which, among other things, means that the invoice can be exchanged without security restrictions). SFTI has reserved "ZVF Fakturaunderlag utomlänsvård" as a fixed text string to be used as AdditionalDocumentReference/DocumentDescription when reference is made from the invoice to an interregional healthcare services report.

Example, in UBL syntax, referring to healthcare report no. ZVF32100013121706000001:

```
<cac:AdditionalDocumentReference> <!-- BG-24, Additional supporting documents -->
  <cbc:ID>ZVF32100013121706000001</cbc:ID> <!-- ID of the document known to both -->
  <cbc:DocumentDescription>ZVF Fakturaunderlag utomlänsvård</cbc:DocumentDescription>
</cac:AdditionalDocumentReference>
```