



**REWE INTERNATIONAL STANDARD**  
**INVOIC – Consolidated invoice**  
**with Delivery note details and**  
**Security segments for Digital Signature**  
**Message definition**  
**EANCOM 2002 Syntax 4**

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## 1. Introduction

This document describes the electronic exchange of invoices with digital signature based on the Header/Trailer approach in EANCOM format for REWE International.

The intention is to transmit the invoice data and the digital signature in one Interchange using Syntax Version 4.

For this purpose first the invoice itself is generated in EANCOM format. After that the first 4 security segments are added and then through these segments the digital signature is generated.

This document begins with description of INVOIC message, followed by a detailed description of the security segments. The document ends with an example of a whole interchange.

Before legislative regulations regarding electronic invoicing were created for pre-tax allowance purposes only invoices in paper form and handed over personally, per fax or by mail were allowed.

It was already possible to exchange invoices electronically but only for the purposes of the automatic data processing. By this reason the electronic exchange of invoices was practised mostly only by long term business partners.

By this approach it was necessary at the end of each invoicing period to create one additional collective invoice in paper form. According to the EU regulations it is also allowed to provide invoices in electronic form on condition that the receiver accepts this. However authenticity and integrity of the data must be ensured.

The digital signature serves in this legal context as a seal for digital data generated by using a private key. Through a related public signature key marked with a signature key certificate of the security party it lets recognize the authenticity of the signature key holder and the integrity of the data.

The purpose of the digital signature is therefore to protect the electronic data against manipulations or to make eventual changes recognizable.

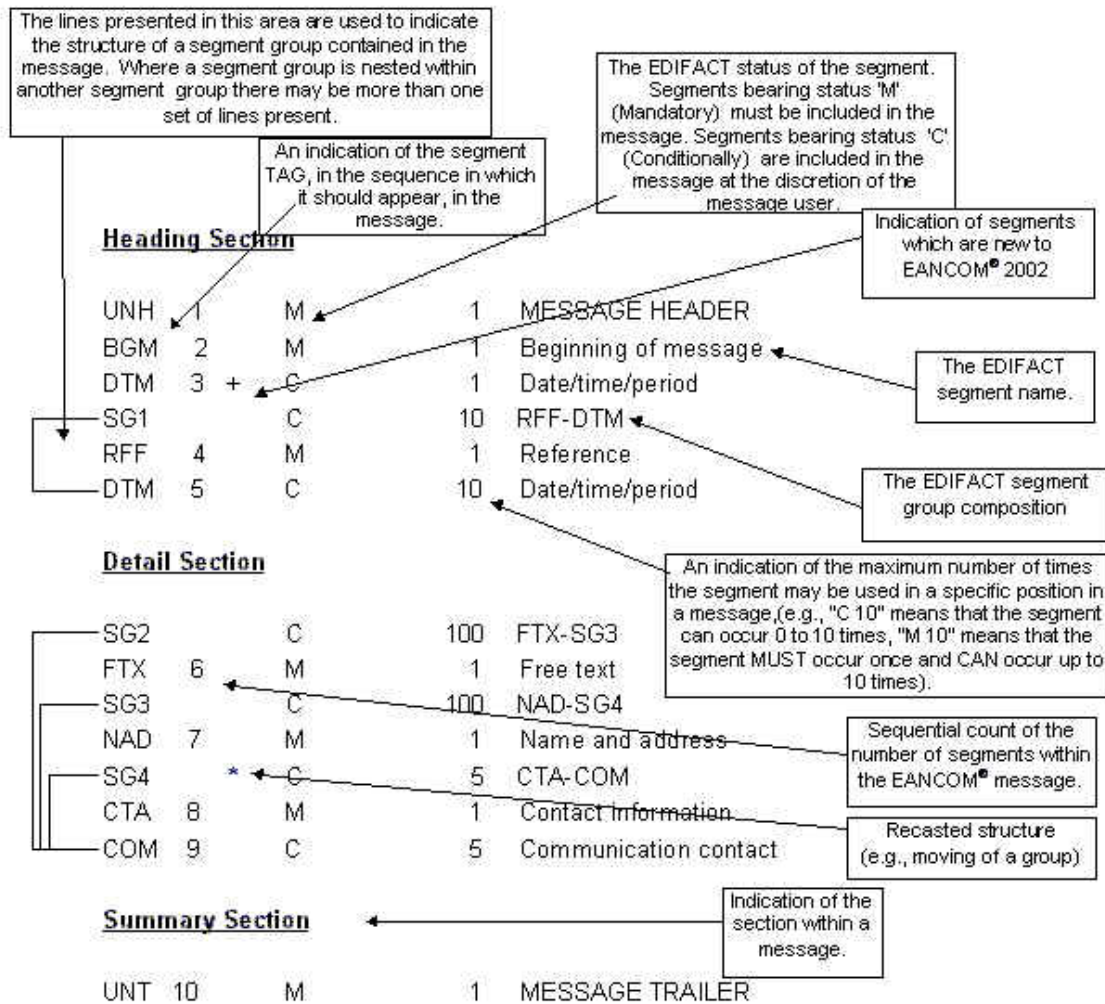
## Document structure

1. Message structure
2. Business Terms
3. Segment description

## Message Structure Chart

Within every EANCOM® message a diagram is presented which explains the structure of the message. The message structure chart is a sequential chart which presents the message in the sequence in which it must be formatted for transmission. Every message is structured and consists of three sections; a header, detail, and summary section.

Example of a message structure chart:



## 2. Message structure INVOIC

### Invoice message

UNA	1	C	1	Service string advice
UNB	2	M	1	Interchange header
UNH	3	M	1	Message header
BGM	4	M	1	Beginning of message
DTM	5	M	2	Date/time/period
FTX	6	C	6	Free text
SG1		C	1	RFF
RFF	7	M	1	Reference
SG2		M	4	NAD-SG3
NAD	8	M	1	Name and address
SG3		C	1	RFF
RFF	9	M	1	Reference
SG7		M	1	CUX
CUX	10	M	1	Currencies
SG26		M	999999	LIN-IMD-QTY-DTM-SG27-SG29-SG30-SG34-SG35
LIN	11	M	1	Line item
IMD	12	M	4	Item description
QTY	13	M	2	Quantity
DTM	14	M	1	Date/time/period
SG27		M	1	MOA
MOA	15	M	1	Monetary amount
SG29		M	1	PRI
PRI	16	M	1	Price details
SG30		M	5	RFF-DTM
RFF	17	M	1	Reference
DTM	18	C	1	Date/time/period
SG34		M	3	TAX-MOA
TAX	19	M	1	Duty/tax/fee details
MOA	20	C	1	Monetary amount
SG35		M	3	NAD
NAD	21	M	1	Name and address
UNS	22	M	1	Section control
SG50		M	5	MOA
MOA	23	M	1	Monetary amount
SG52		M	10	TAX-MOA
TAX	24	M	1	Duty/tax/fee details
MOA	25	M	9	Monetary amount
UNT	26	M	1	Message trailer
UNZ	27	M	1	Interchange trailer

### 3. Business Terms

Business term	Description	Status	Format	Segment		Data element	
Consolidated invoice / consolidated credit note		M	A/N 3	BGM		C002	1001 Document name code
Invoice/credit note number		M	A/N 16	BGM		C106	1004 Document identifier
Message date		M	D 8	DTM		C507	2380 Date or time or period value
Invoicing period	By Invoice	M	D 17	DTM		C507	2380 Date or time or period value
Invoicing period	By Credit note	O	D 17	DTM		C507	2380 Date or time or period value
Coded text reference	average tax rate, intra-community delivery, tax exempt export delivery etc.	O	A/N 3	FTX		C107	4441 Free text value code
Organic control number	Organic control number of the supplier	O	A/N 35	SG1	RFF	C506	1154 Reference identifier
Buyer	GLN	M	N 13	SG2	NAD	C082	3039 Party identifier
Supplier	GLN	M	N 13	SG2	NAD	C082	3039 Party identifier
Invoicee	GLN, only if not identical with the buyer	O	N 13	SG2	NAD	C082	3039 Party identifier
Issuer of invoice	Only if not identical with the supplier	O	N 13	SG2	NAD	C082	3039 Party identifier

Business term	Description	Status	Format	Segment	Data element
Company name	By SU,BY, IV and II	M	A/N 3x35	SG2 NAD	C080 3036 Party name
Street	By SU,BY, IV and II	M	A/N 2x35	SG2 NAD	C059 3042 Street and number or post office b
Location	By SU,BY, IV and II	M	A/N 35	SG2 NAD	3164 City name
Postal code	By SU,BY, IV and II	M	A/N 17	SG2 NAD	3251 Postal identification code
Country name coded		O	A/N 3	SG2 NAD	3207 Country name code
VAT registration number	By SU,BY, IV and II	M	A/N 20	SG3 RFF	C506 1154 Reference identifier
Currency		M	A/N 3	SG7 CUX	C504 6345 Currency identification code
Article	EAN	M	N 14	SG26 LIN	C212 7140 Item identifier
Identification of mixed assortment		O	A/N 3	SG26 IMD	C273 7009 Item description code
Identification of returnable containers		O	A/N 3	SG26 IMD	C273 7009 Item description code
Identification of consumer units		O	A/N 3	SG26 IMD	C273 7009 Item description code
Article description		M	A/N70	SG26 IMD	C273 7008 Item description
Invoiced quantity	Delivered quantity, that is being invoiced, related to EAN	M	N 7+3	SG26 QTY	C186 6060 Quantity
Free goods quantity	Delivered quantity that is not being invoiced, related to EAN	M	N 7+3	SG26 QTY	C186 6060 Quantity

Business term	Description	Status	Format	Segment	Data element
Number of units in higher packaging or configuration level		O	N 7+3	SG26 QTY	C186 6060 Quantity
Measurement unit	Only used for variable quantity products (unit is not equal piece)	O	A/N 3	SG26 QTY	C186 6411 Measurement unit code
Delivery date		M	D 8	SG26 DTM	C507 2380 Date or time or period value
Line item amount	=delivered quantity x net – net price Einkaufspreis	M	N 10+3	SG27 MOA	C516 5004 Monetary amount
Net price	Net – net price	M	N 7+3	SG29 PRI	C509 5118 Price amount
Order number (buyer)	Optional by credit note	M	A/N 16	SG30 RFF	C506 1154 Reference identifier
Delivery note number		M	A/N 16	SG30 RFF	C506 1154 Reference identifier
Reference invoice number	Reference invoice number by credit notes	O	A/N 16	SG30 RFF	C506 1154 Reference identifier
Receiving advice number		O	A/N 16	SG30 RFF	C506 1154 Reference identifier
Reference number	Number of instruction for returns	O	A/N 16	SG30 RFF	C506 1154 Reference identifier
Order date	Date of order	O	D8	SG30 DTM	C507 2380 Date or time or period value
VAT rate	As percentage	M	N 2+2	SG34 TAX	C243 5278 Duty or tax or fee rate
Producer fee as percentage	Beer, sparkling wine, etc.	O	N 2+2	SG34 TAX	C243 5278 Duty or tax or fee rate



Business term	Description	Status	Format	Segment	Data element
Tax amount	Producer fees as monetary amount	O	N 7+3	SG34 MOA	C516 5004 Monetary amount
Delivery party	GLN and optional address	M	N 13	SG35 NAD	C082 3039 Party identifier
Ultimate consignee	GLN, only if not identical with delivery party (Cross-docking)	O	N 13	SG35 NAD	C082 3039 Party identifier
Ordered by	GLN, only if not identical with the buyer	K	N 13	SG35 NAD	C082 3039 Party identifier
Total line item amount	Sum of all line item amounts	M	N 11+2	SG50 MOA	C516 5004 Monetary amount
Goods and service total amount		M	N 11+2	SG50 MOA	C516 5004 Monetary amount
Total returnable items deposit amount		M	N 11+2	SG50 MOA	C516 5004 Monetary amount
Message total duty/tax/fee amount		O	N 11+2	SG50 MOA	C516 5004 Monetary amount
Invoice amount		M	N 11+2	SG50 MOA	C516 5004 Monetary amount
VAT		M	N 2+2	SG52 TAX	C243 5278 Duty or tax or fee rate
Producer fees	As percentage	M	N 2+2	SG52 TAX	C243 5278 Duty or tax or fee rate
Taxable amount		M	N 11+2	SG52 MOA	C516 5004 Monetary amount
Tax amount		M	N 11+2	SG52 MOA	C516 5004 Monetary amount

## 4. Segment description INVOIC

UNA - C		1 - Service string advice			
Function :		The service string advice shall begin with the upper case characters UNA immediately followed by six characters in the order shown below. The space character shall not be used in positions 010, 020, 040, 050 or 060. The same character shall not be used in more than one position of the UNA.			
Segment number :		1			
Data element group/Data element	EDIFACT	ANW	*	Description	
<b>UNA1 Component data element separator</b>	M an1	<b>M</b>	*	Used as a separator between component data elements contained within a composite data element (default value: ":")	
<b>UNA2 Data elemen separator</b>	M an1	<b>M</b>	*	Used as a separator between two simple or composite data elements (default value: "+")	
<b>UNA3 Decimal mark</b>	M an1	<b>M</b>	*	Used to indicate the character used for decimal notation (default value: "." )	
<b>UNA4 Release character</b>	M an1	<b>M</b>	*	Used to restore separator and terminator signs to their normal meaning (value: "?") .	
<b>UNA5 Repetition separator</b>	M an1	<b>M</b>	*	Separator sign ("*")	
<b>UNA6 Segment terminator</b>	M an1	<b>M</b>	*	Used to indicate the end of a segment (default value: "' ' ")	
<u>Segment Notes</u>					
<p>This segment is used to inform the receiver of the interchange that a set of service string characters which are different to the default characters are being used.</p> <p>When using the default set of service characters, the UNA segment need not be sent. If it is sent, it must immediately precede the UNB segment and contain the four service string characters (positions UNA1, UNA2, UNA4 and UNA6) selected by the interchange sender.</p> <p>Regardless of whether or not all of the service string characters are being changed every data element within this segment must be filled, (i.e. if some default values are being used together with user-defined values then both the default and the user-defined values must be specified).</p> <p>When expressing the service string characters in the UNA segment, it is not necessary to include any element separators.</p> <p>The use of the UNA segment is required when a character set other than level A is being used.</p> <p>Example: UNA:+.?*</p>					

UNB - M 1 - Interchange header				
Function : To identify an interchange.				
Segment number : 2				
Data element group / Data element	EDIFACT	ANW	*	Description
<b>S001 Syntax identifier</b>	M	<b>M</b>		
0001 Syntax identifier	M a4	<b>M</b>	*	See code list
0002 Syntax version number	M an1	<b>M</b>	*	4 = Version 4
0080 Service Code list directory version number	C an..6	<b>N</b>		
0133 Character encoding, coded	C an..3	<b>N</b>		
<b>S002 Interchange sender</b>	M	<b>M</b>		
0004 Interchange sender identification	M an..35	<b>M</b>		GLN (n13)
0007 Identification code qualifier	C an..4	<b>R</b>	*	14 = EAN International.
0008 Interchange sender internal identification	C an..35	<b>N</b>		
0042 Interchange sender internal sub-identification	C an..35	<b>N</b>		
<b>S003 Interchange recipient</b>	M	<b>M</b>		
0010 Interchange recipient identification	M an..35	<b>M</b>		GLN (n13)
0007 Identification code qualifier	C an..4	<b>R</b>	*	14 = EAN International.
0014 Interchange recipient internal identification	C an..35	<b>N</b>		
0046 Interchange recipient internal sub-identification	C an..35	<b>N</b>		
<b>S004 Date and time of preparation</b>	M	<b>M</b>		
0017 Date	M n8	<b>M</b>		CCYYMMDD
0019 Time	M n4	<b>M</b>		HHMM
<b>0020 Interchange control reference</b>	M an..14	<b>M</b>		Unique Interchange reference assigned by the sender
<b>S005 Recipient reference password details</b>	C	<b>N</b>		
0022 Recipient reference/password	M an..14			
0025 Recipient reference/password qualifier	C an2			
<b>0026 Application reference</b>	C an..14	<b>O</b>		
<b>0029 Processing priority code</b>	C a1	<b>N</b>		

<b>0031</b>	<b>Acknowledgement request</b>	C n1	<b>N</b>	
<b>0032</b>	<b>Interchange agreement identifier</b>	C an..35	<b>M</b>	EANCOM-DISI = Indicator for Digital Signature
<b>0035</b>	<b>Test indicator</b>	C n1	<b>O</b>	1 = Interchange is a test

Segment Notes

The UNB segment is used to envelope the interchange and also to identify the party for whom the interchange is intended and the party who has sent the interchange. The principle of the UNB segment is the same as a physical envelope which covers one or more letters or documents and which details the address where delivery is to take place and the address from where the envelope has come.

DE 0001: The recommended (default) character set for use in EANCOM® for international exchanges is character set A (UNOA). Should users wish to use character sets other than A, an agreement on which set to use should be reached on a bilateral basis before communications begin.

DE 0004 and 0010: Within EANCOM® the Global Location Number (GLN) is recommended for the identification of the interchange sender and recipient.

DE 0008: The address for reverse routing is provided by the interchange sender to inform the interchange recipient of the address within the sender's system to which responding interchanges must be sent. It is recommended that the GLN be used for this purpose.

DE 0014: The address for routing, formerly provided by the interchange recipient, is used by the interchange sender to inform the recipient of the internal address within the recipient's system, to which the interchange should be routed. It is recommended that the GLN be used for this purpose.

DE S004: The date and time at which the sender prepared the interchange. This date and time may not necessarily be the same as the date and time of contained messages.

DE 0020: The interchange control reference number is generated by the interchange sender and is used to identify uniquely each interchange. Should the sender wish to re-use interchange control reference numbers, it is recommended that each number is held for a period of at least three months before being re-used. In order to guarantee uniqueness, the interchange control reference number should always be linked to the sender's identification (DE 0004).

DE S005: Any use of passwords must first be agreed bilaterally by the parties to the exchange.

DE 0026: This data element is used to identify the application on the recipient's system to which the interchange is directed. This data element may be used if, and only if, the interchange contains only one type of message, e.g. invoices. The reference used in this data element is assigned by the interchange sender.

DE 0031: This data element is used to indicate whether an acknowledgement to the interchange is required or not. The EANCOM® APERAK or CONTRL message should be used to provide acknowledgement of interchange receipt. In addition the EANCOM® CONTRL message may be used to indicate when an interchange has been rejected due to syntactical errors.

DE 0032: This data element contains an indicator for Digital Signature in order to facilitate the automatic processing of the interchange.

Example:

UNB+UNOC:4+9099999300314:14+8798765432106:14+20060102:1000+1234555++++EANCOM-DISI'

UNH - M		1 - Message header			
Function :		To head, identify and specify a message			
Segment number :		3			
Data element group/Data element	EDIFACT	ANW	*	Description	
<b>0062 Message reference number</b>	M an..14	<b>M</b>		Sender's unique message reference. Sequence number of the messages in the interchange. DE 0062 in the UNT will be exactly the same. Sender generated.	
<b>S009 Message identifier</b>	M	<b>M</b>			
0065 Message type	M an..6	<b>M</b>	*	INVOIC = Invoice message	
0052 Message version number	M an..3	<b>M</b>	*	D = Draft version/UN/EDIFACT Directory	
0054 Message release number	M an..3	<b>M</b>	*	01B = Release 2001 - B	
0051 Controlling agency, coded	M an..3	<b>M</b>	*	UN = UN/CEFACT	
0057 Association assigned code	C an..6	<b>R</b>	*	EAN010 = EAN Version number	
0110 Code list directory version number	C an..6	<b>O</b>		Code list version	
0113 Message type sub-function identification	C an..6	<b>N</b>			
<b>0068 Common access reference</b>	C an..35	<b>N</b>			
<b>S010 Status of the transfer</b>	C	<b>N</b>			
0070 Sequence of transfers	M n..2				
0073 First and last transfer	C a1				
<b>S016 Message subset identification</b>	C	<b>N</b>			
0115 Message subset identification	M an..14				
0116 Message subset version number	C an..3				
0118 Message subset release number	C an..3				
0051 Controlling agency, coded	C an..3				
<b>S017 Message implementation guideline identification</b>	C				
0121 Message implementation guideline identification	M an..14	<b>N</b>			
0122 Message implementation guideline version number	C an..3				
0124 Message implementation guideline release number	C an..3				
0051 Controlling agency, coded	C an..3				

Data element group/Data element	EDIFACT	ANW	*	Description
<b>S018 Scenario identification</b>	C	<b>N</b>		
0127 Scenario identification	M an..14			
0128 Scenario version number	C an..3			
0130 Scenario release number	C an..3			
0051 Controlling agency, coded	C an..3			
<u>Segment Notes</u>				
Example: UNH+ME00001+INVOIC:D:01B:UN:EAN010'				

BGM - M		1 - Beginning of message			
Function :		To indicate the type and function of a message and to transmit the identifying number.			
Segment number :		4			
Data element group / Data element	EDIFACT	ANW	*	Description	
<b>C002 Document/message name</b>	C	<b>R</b>			
1001 Document name code	C an..3	<b>R</b>	*	385 = Consolidated invoice 262 = Consolidated credit note – goods and services	
1131 Code list identification code	C an..17	<b>N</b>			
3055 Code list responsible agency code	C an..3	<b>N</b>			
1000 Document name	C an..35	<b>N</b>			
<b>C106 Document/message identification</b>	C	<b>R</b>			
1004 Document identifier	C an..35	<b>R</b>		Invoice/credit note number, assigned by the document sender.	
1056 Version identifier	C an..9	<b>N</b>			
1060 Revision identifier	C an..6	<b>N</b>			
<b>1225 Message function code</b>	C an..3	<b>R</b>	*	9 = Original	
<b>4343 Response type code</b>	C an..3	<b>N</b>			
<u>Segment Notes</u>					
<p>- Message type - Consolidated invoice (DE1001 = 385), Mandatory *); A/N 3          - Invoice number (DE1004); Mandatory; A/N 16          BGM+385+200099+9'</p> <p>- Message type - Consolidated credit note (DE1001 =262); Mandatory *); A/N 3          - Credit note number (DE1004); Mandatory; A/N 16          BGM+262+300200+9'</p> <p>*) One of these message types (together with the message number) must be set. The INVOIC serves as both: Consolidated invoice and Consolidated credit note.</p>					

DTM - M                    2 - Date/time/period				
Function                    :            To specify date and/or time or period				
Segment number : 5				
Data element group / Data element	EDIFACT	ANW	*	Description
<b>C507    Date/time/period</b>	M	<b>M</b>		
2005    Date or time or period function code qualifier	M an..3	<b>M</b>	*	137 = Document/message date/time 263 = Invoicing period
2380    Date or time or period value	C an..35	<b>R</b>		
2379    Date or time or period format code	C an..3	<b>R</b>	*	102 = CCYYMMDD 718 = CCYYMMDD-CCYYMMDD
<u>Segment Notes</u>				
- Message date (DE2005 = 137); Mandatory; D 8 DTM+137:20060522:102'				
- Invoicing period (DE2005 = 263); Mandatory by invoice (Qualifier=385); Optional by credit note (Qualifier=262); D 17 DTM+263:2006061520060630:718'				



FTX - C 6 - Free text				
Function : To provide free form or coded text information				
Segment number : 6				
Data element group/Data element	EDIFACT	ANW	*	Description
<b>4451 Text subject code qualifier</b>	M an..3	<b>M</b>	*	REG = Regulatory information
<b>4453 Free text function code</b>	C an..3	<b>M</b>	*	1 = Text for subsequent use
<b>C107 Text reference</b>	C	<b>M</b>		
4441 Free text value code	M an..17	<b>M</b>	*	DSS = Average tax rate according to § 22 paragraph 1 / Value Added Tax Act S67 = Tax exempt according to § 6 paragraph 1 Z 27 / Value Added Tax Act S69 = Tax exempt according to § 6 paragraph 1 Z 9 / Value Added Tax Act IGL = Intra-community deliveries according to article 6 paragraph 1 / Value Added Tax Act RCH = Reverse Charge according to § 19 paragraph 1 / Value Added Tax Act SA7 = Tax-exempt export delivery according to § 7 / Value Added Tax Act
1131 Code list identification code	C an..17	<b>N</b>		
3055 Code list responsible agency code	C an..3	<b>M</b>	*	294 = GS1 Austria
<b>C108 Text literal</b>	C	<b>N</b>		
4440 Free text value	M an..512			
4440 Free text value	C an..512			
4440 Free text value	C an..512			
4440 Free text value	C an..512			
4440 Free text value	C an..512			
<b>3453 Language name code</b>	C an..3	<b>N</b>		
<b>4447 Free text format code</b>	C an..3	<b>N</b>		

Segment Notes

Use of this segment in free form is not recommended since in most cases it inhibits automatic processing of the Invoice.

Coded references to standard texts is an available functionality which enables automatic processing and reduces transmission and processing overheads. Standard texts should be mutually defined among trading partners and can be used to cover legal and other requirements.

The codes in DE 4451 are maintained by GS1 Austria (DE3055 = 294) and are defined as following:

DSS = Average tax rate according to § 22 paragraph 1 / Value Added Tax Act  
Average tax rate (12%) applied by flat rate farmers  
FTX+REG+1+DSS::294'

S67 = Tax exempt according to § 6 paragraph 1 Z 27 / Value Added Tax Act  
Tax exempt (below the VAT threshold): According to § 6 paragraph 1 Z 27 the delivery/service is tax exempt  
FTX+REG+1+S67::294'

S69 = Tax exempt according to § 6 paragraph 1 Z 9 / Value Added Tax Act  
Tax exempt (gambling turnovers, brake-open tickets): According to § 6 paragraph 1 Z 9 the delivery/service is tax exempt  
FTX+REG+1+S69::294'

IGL = Intra-community deliveries according to article 6 paragraph 1 / Value Added Tax Act  
Intra-community delivery: Tax exempt intra-community delivery according to article 6 paragraph 1 Value Added Tax Act  
FTX+REG+1+IGL::294'

RCH = Reverse Charge according to § 19 paragraph 1 / Value Added Tax Act  
FTX+REG+1+RCH::294'

SA7 = Tax-exempt export delivery according to § 7 / Value Added Tax Act  
By export in third country (outside the EU)  
FTX+REG+1+SA7::294':

SG1 - C                    1 - RFF				
RFF - M                    1 - Reference				
Function :                To specify a reference.				
Segment number : 7				
Data element group/Data element	EDIFACT	ANW	*	Description
<b>C506 Reference</b>	M			
1153 Reference code qualifier	M an..3	<b>M</b>	*	XC1 = Product certification number (EAN-Code)
1154 Reference identifier	C an..70	<b>R</b>		
1156 Document line identifier	C an..6	<b>N</b>		
4000 Reference version identifier	C an..35	<b>N</b>		
1060 Revision identifier	C an..6	<b>N</b>		
<u>Segment Notes</u>				
- Organic control number of the supplier (DE1153 = XC1); Optional; A/N 35 RFF+XC1: AT-N-01-BIO'				

SG2 - M		4 - NAD-SG3			
NAD - M		1 - Name and address			
Function :		To specify the name/address and their related function, either by C082 only and/orly unstructured by C058 or structured by C080 thru 3207.			
Segment number :		8			
Data element group/Data element	EDIFACT	ANW	*	Description	
<b>3035 Party function code qualifier</b>	M an..3	<b>M</b>	*	BY = Buyer SU = Supplier IV = Invoicee II = Issuer of invoice	
<b>C082 Party identification details</b>	C	<b>R</b>			
3039 Party identifier	M an..35	<b>M</b>		GLN - Format n13	
1131 Code list identification code	C an..17	<b>N</b>			
3055 Code list responsible agency code	C an..3	<b>R</b>	*	9 = EAN (International Article Numbering Association)	
<b>C058 Name and address</b>	C	<b>N</b>			
3124 Name and address description	M an..35				
3124 Name and address description	C an..35				
3124 Name and address description	C an..35				
3124 Name and address description	C an..35				
3124 Name and address description	C an..35				
<b>C080 Party name</b>	C	<b>D</b>			
3036 Party name	M an..35	<b>M</b>			
3036 Party name	C an..35	<b>O</b>			
3036 Party name	C an..35	<b>O</b>			
3036 Party name	C an..35	<b>N</b>			
3036 Party name	C an..35	<b>N</b>			
3045 Party name format code	C an..3	<b>N</b>			
<b>C059 Street</b>	C	<b>D</b>			
3042 Street and number or post office box identifier	M an..35	<b>M</b>			
3042 Street and number or post office box identifier	C an..35	<b>O</b>			
3042 Street and number or post office box identifier	C an..35	<b>N</b>			

3042	Street and number or post office box identifier	C an..35	<b>N</b>	
<b>3164</b>	<b>City name</b>	C an..35	<b>D</b>	
<b>C819</b>	<b>Country sub-entity details</b>	C	<b>N</b>	
3229	Country sub-entity name code	C an..9		
1131	Code list identification code	C an..17		
3055	Code list responsible agency	C an..3		
3228	Country sub-entity name	C an..70		
<b>3251</b>	<b>Postal identification code</b>	C an..17	<b>D</b>	
<b>3207</b>	<b>Country name code</b>	C an..3	<b>D</b>	

Segment Notes

- Buyer (DE3035 = BY); Mandatory \*); N 13

NAD+BY+9012345000004::9++Buyer-Name: Buyer -Name: Buyer -Name+MUSTERPLATZ 5+WIEN++1190+AT'

**\*) For invoices with digital signature the indication of buyer GLN and invoice address in structured form is mandatory.**

- Supplier (DE3035 = SU); Mandatory \*\*); N 13

NAD+SU+9012345000011::9++Supplier-Name: Supplier -Name: Supplier -Name+MUSTERPLATZ 12+WIEN++1160+AT'

**\*\*\*) For invoices with digital signature the indication of supplier GLN and invoice address in structured form is mandatory.**

- Invoicee (DE3035 = IV); Optional; N 13

NAD+IV+9012345000059::9++Invoicee-Name: Invoicee -Name: Invoicee -Name+MUSTERPLATZ 5+WIEN++1190+AT'

This qualifier is only used, when the invoicee is different from the buyer (BY).

- Issuer of invoice (DE3035 = II); Kannfeld; N 13

NAD+II+9099999300414::9++Issuer of invoice-Name: Issuer of invoice -Name: Issuer of invoice -Name+MUSTERPLATZ

5+WIEN++1190+AT'

This qualifier is only used, when the issuer of invoice is different from the supplier (SU).

DE3039: For partner identification use exclusively the GLN.

SG2 - M	4 - NAD-SG3			
SG3 - C	1 - RFF			
RFF - M	1 - Reference			
Function :	To specify a reference			
Segment number :	9			
Data element group/Data element	EDIFACT	ANW	*	Description
<b>C506 Reference</b>	M	<b>M</b>		
1153 Reference code qualifier	M an..3	<b>M</b>	*	VA = VAT registration number
1154 Reference identifier	C an..70	<b>R</b>		
1156 Document line identifier	C an..6	<b>N</b>		
4000 Reference version identifier	C an..35	<b>N</b>		
1060 Revision identifier	C an..6	<b>N</b>		
<u>Segment Notes</u>				
- VAT registration number, in connection with BY, SU, IV and II (DE1154); Mandatory; A/N 20				
RFF+VA:AT3929292'				

SG7 - M 1 - CUX				
CUX - M 1 - Currencies				
Function : To specify currencies used in the transaction and relevant details for the rate of exchange.				
Segment number : 10				
Data element group/Data element	EDIFACT	ANW	*	Description
<b>C504 Currency details</b>	C	<b>R</b>		
6347 Currency usage code qualifier	M an..3	<b>M</b>	*	2 = Reference currency
6345 Currency identification code	C an..3	<b>R</b>		EUR = Euro (EAN-Code)
6343 Currency type code qualifier	C an..3	<b>R</b>	*	4 = Invoicing currency
6348 Currency rate value	C n..4	<b>N</b>		
<b>C504 Currency details</b>	C	<b>N</b>		
6347 Currency usage code qualifier	M an..3			
6345 Currency identification code	C an..3			
6343 Currency type code qualifier	C an..3			
6348 Currency rate value	C n..4			
<b>5402 Currency exchange rate</b>	C n..12	<b>N</b>		
<b>6341 Exchange rate currency market identifier</b>	C an..3	<b>N</b>		
<u>Segment Notes</u>				
- Currency; Mandatory; A/N 3 CUX+2:EUR:4'				

SG26 - M 9999999 - LIN-IMD-QTY-DTM-SG27-SG29-SG30-SG34-SG35					
LIN - M 1 - Line item					
Function : To identify a line item and configuration					
Segment number : 11					
Data element group/Data element	EDIFACT	ANW	*	Description	
<b>1082 Line item identifier</b>	C an..6	<b>R</b>		Application generated number of the count of the order lines. The number must be unique and ascending within the message.	
<b>1229 Action request/notification description code</b>	C an..3	<b>N</b>			
<b>C212 Item number identification</b>	C	<b>R</b>			
7140 Item identifier	C an..35	<b>R</b>			Format n..14
7143 Item type identification code	C an..3	<b>R</b>	*		SRV = GS1 Global Trade Item Number
1131 Code list identification code	C an..17	<b>N</b>			
3055 Code list responsible agency code	C an..3	<b>N</b>			
<b>C829 Sub-line information</b>	C	<b>N</b>			
5495 Sub-line indicator code	C an..3				
1082 Line item identifier	C an..6				
<b>1222 Configuration level number</b>	C n..2	<b>N</b>			
<b>7083 Configuration operation code</b>	C an..3	<b>N</b>			
<u>Segment Notes</u>					
- Article identification EAN (DE7140); Mandatory; N 14 LIN+1++9012345000103:SRV'					
The LIN-Segment indicates the beginning of the detail section within the Invoice and is used to identify the item being invoiced.					



SG26 - M 9999999 - LIN-IMD-QTY-DTM-SG27-SG29-SG30-SG34-SG35				
IMD - M 4 - Item description				
Function : To describe an item in either an industry or free format				
Segment number : 12				
Data element group/Data element	EDIFACT	ANW	*	Description
<b>7077 Description format code</b>	C an..3	<b>M</b>	*	A = Free-form long description C = Code (from industry code list)
<b>C272 Item characteristic</b>	C	<b>N</b>		
7081 Item characteristic code	C an..3			
1131 Code list identification code	C an..17			
3055 Code list responsible agency code	C an..3			
<b>C273 Item description</b>	C	<b>M</b>		
7009 Item description code	C an..17	<b>O</b>	*	SG = Standard group of products (mixed assortment) (EAN-Code) RC = Returnable container (EAN-Code) CU = Consumer unit (EAN-Code)
1131 Code list identification code	C an..17	<b>N</b>		
3055 Code list responsible agency code	C an..3	<b>D</b>	*	9 = EAN (International Article Numbering Association) Max. 70 symbols
7008 Item description	C an..256	<b>O</b>		
7008 Item description	C an..256	<b>N</b>		
3453 Language name code	C an..3	<b>N</b>		
<b>7383 Surface or layer code</b>	C an..3	<b>N</b>		

Segment Notes

- Indicator for mixed assortment (DE7009=SG); Optional; A/N 3  
IMD+C++SG::9'

- Article description (DE7008); Mandatory ; A/N 70  
IMD+A+:::ARTIKELTEXT1'

Representation of returnable containers in INVOIC:

Basically there are 2 types of returnable containers to be differed:

1) bounded returnable container: the returnable container is sent together with content (full item)

Approach:

- Both content (full item) and returnable container should be represented as main positions
- Returnable container is additionally identified by the qualifier RC
- all returnable containers related to the full item should be sent immediate after the full item and not as a sum of all positions at the end

2) unbounded returnable container: the returnable container is sent without content (full item), e.g. by ordering of an "empty" case

Approach:

- Returnable container is represented as a normal article
- The qualifier RC is not sent

- Identification of Returnable container / empties (DE7009=RC); Optional; A/N 3  
IMD+C++RC::9'

- Identification of Consumer unit (DE7009=CU); Optional; A/N 3  
IMD+C++CU::9'

SG26 - M 9999999 - LIN-IMD-QTY-DTM-SG27-SG29-SG30-SG34-SG35				
QTY - M 2- Quantity				
Function : To specify a pertinent quantity.				
Segment number : 13				
Data element group/Data element	EDIFACT	ANW	*	Description
<b>C186 Quantity details</b>	M	<b>M</b>		
6063 Quantity type code qualifier	M an..3	<b>M</b>	*	47 = Invoiced quantity 192 = Free goods quantity 45E = Number of units in higher packaging or configuration level (EAN-Code)
6060 Quantity	M an..35	<b>M</b>		
6411 Measurement unit code	C an..3	<b>D</b>		KGM = Kilogram
<u>Segment Notes</u>				
- Invoiced quantity (DE6063 = 47); Mandatory*); N 7+3 QTY+47:250'				
- Free goods quantity (DE6063 = 192); Mandatory*); N 7+3 QTY+192:100'				
*) One of these quantity types must be set, both can also appear at the same time.				
- Number of units in higher packaging or configuration level (mixed assortment); Optional; N 7+3 In the qualifier 45E must be displayed the total quantity of the sub positions (Quantity main position x number of the sub-positions within the main position = total quantity) QTY+45E:10'				
DE 6411: Measurement unit for variable quantity products (unit not equal piece); for further codes see code list				

SG26 - M 9999999 - LIN-IMD-QTY-DTM-SG27-SG29-SG30-SG34-SG35				
DTM - M 1 - Date/time/period				
Function : To specify date and/or time or period				
Segment number : 14				
Data element group/Data element	EDIFACT	ANW	*	Description
<b>C507 Date/time/period</b>	M	<b>M</b>		
2005 Date or time or period function code qualifier	M an..3	<b>M</b>	*	35 = Delivery date/time, actual
2380 Date or time or period value	C an..35	<b>R</b>		
2379 Date or time or period format code	C an..3	<b>R</b>	*	102 = CCYYMMDD
<u>Segment Notes</u>				
- Delivery date/time, actual (DE2005 = 35); Mandatory; D 8 DTM+35:20060615:102'				

SG26 - M 9999999 - LIN-IMD-QTY-DTM-SG27-SG29-SG30-SG34-SG35

SG27 - M 1 - MOA

MOA - M 1 - Monetary amount

Function : To specify a monetary amount.

Segment number : 15

Data element group/Data element	EDIFACT	ANW	*	Description
<b>C516 Monetary amount</b>	M	<b>M</b>		
5025 Monetary amount type code qualifier	M an..3	<b>M</b>	*	203 = Line item amount
5004 Monetary amount	C n..35	<b>R</b>		
6345 Currency identification code	C an..3	<b>N</b>		
6343 Currency type code qualifier	C an..3	<b>N</b>		
4405 Status description code	C an..3	<b>N</b>		

Segment Notes

- Line item amount; Mandatory ); N 10+3

MOA+203:3500'

**Note: The line item amount is calculated on the base of the net price(AAA), specified in the PRI-Segment X Quantity!**

SG26 - M 9999999 - LIN-IMD-QTY-DTM-SG27-SG29-SG30-SG34-SG35

SG29 - M 1 - PRI

PRI - M 1 - Price details

Function : To specify price information

Segment number : 16

Data element group/Data element	EDIFACT	ANW	*	Description
<b>C509 Price information</b>	C	<b>R</b>		
5125 Price code qualifier	M an..3	<b>M</b>	*	AAA = Calculation net
5118 Price amount	C n..15	<b>R</b>		
5375 Price type code	C an..3	<b>N</b>		
5387 Price specification code	C an..3	<b>N</b>		
5284 Unit price basis value	C n..9	<b>O</b>		
6411 Measurement unit code	C an..3	<b>O</b>		
<b>5213 Sub-line item price change operation code</b>	C an..3	<b>N</b>		

Segment Notes

- Net price (DE5125 = AAA); Mandatory; N 7+3

PRI+AAA:55'

The net price is the price information without taxes and within all discounts valid for this article.

SG26 - M 9999999 - LIN-IMD-QTY-DTM-SG27-SG29-SG30-SG34-SG35				
SG30 - M 5 - RFF-DTM				
RFF - M 1 - Reference				
Function : To specify a reference				
Segment number : 17				
Data element group/Data element	EDIFACT	ANW	*	Description
<b>C506 Referenz</b>	M	<b>M</b>		
1153 Reference code qualifier	M an..3	<b>M</b>	*	ON = Order number (buyer) DQ = Delivery note number IRN = Instruction for returns number (EAN-Code)
1154 Reference identifier	C an..70	<b>R</b>		
1156 Document line identifier	C an..6	<b>N</b>		
4000 Reference version identifier	C an..35	<b>N</b>		
1060 Revision identifier	C an..6	<b>N</b>		
<u>Segment Notes</u>				
- Order number (DE1153 = ON); Mandatory; A/N 16 RFF+ON:4711'				
- Delivery note number (DE1153 = DQ); Mandatory; A/N 16 RFF+DQ:1234'				
- Instruction for returns number (DE1153 = IRN); Optional; A/N 16 RFF+IRN:5664'				

SG26 - M 9999999 - LIN-IMD-QTY-DTM-SG27-SG29-SG30-SG34-SG35				
SG30 - M 5 - RFF-DTM				
DTM - C 1 - Date/time/period				
Function : To specify date and/or time or period				
Segment number : 18				
Data element group/Data element	EDIFACT	ANW	*	Description
<b>C507 Date/time/period</b>	M	<b>M</b>		
2005 Date or time or period function code qualifier	M an..3	<b>M</b>	*	171 = Reference date/time
2380 Date or time or period value	C an..35	<b>R</b>		
2379 Date or time or period format code	C an..3	<b>R</b>	*	102 = CCYYMMDD
<u>Segment Notes</u>				
- Reference date; Optional; D 8 DTM+171:20060602:102'				



SG26 - M 9999999 - LIN-IMD-QTY-DTM-SG27-SG29-SG30-SG34-SG35				
SG34 - M 3 - TAX-MOA				
TAX - M 1 - Duty/tax/fee details				
Function : To specify relevant duty/tax/fee information				
Segment number : 19				
Data element group/Data element	EDIFACT	ANW	*	Description
<b>5283 Duty or tax or fee function code qualifier</b>	M an..3	<b>M</b>	*	7 = Tax 6 = Fee
<b>C241 Duty/tax/fee type</b>	C	<b>D</b>		
5153 Duty tax or fee type name code	C an..3	<b>R</b>	*	VAT = Value added tax GST = Goods and services tax
1131 Code list identification code	C an..17	<b>N</b>		
3055 Code list responsible agency code	C an..3	<b>N</b>		
5152 Duty or tax or fee type name	C an..35	<b>N</b>		
<b>C533 Duty/tax/fee account detail</b>	C	<b>D</b>		
5289 Duty or tax or fee account code	M an..6	<b>M</b>		BIE = Beer fees TAB = Tobacco fees BRA = Brandy fees GLA = Gambling fees
1131 Code list identification code	C an..17	<b>N</b>		
3055 Code list responsible agency	C an..3	<b>N</b>		
<b>5286 Duty or tax or fee assessment basis value</b>	C an..15	<b>N</b>		
<b>C243 Duty/tax/fee detail</b>	C	<b>D</b>		
5279 Duty or tax or fee rate code	C an..7	<b>N</b>		
1131 Code list identification code	C an..17	<b>N</b>		
3055 Code list responsible agency code	C an..3	<b>N</b>		
5278 Duty or tax or fee rate	C an..17	<b>R</b>		Actual tax rate
5273 Duty or tax or fee rate basis code	C an..12	<b>N</b>		
1131 Code list identification code	C an..17	<b>N</b>		
3055 Code list responsible agency code	C an..3	<b>N</b>		
<b>5305 Duty or tax or fee category code</b>	C an..3	<b>O</b>		E = Steuerbefreit S = Einheitssatz
<b>3446 Party tax identifier</b>	C an..20	<b>N</b>		

<b>1227 Calculation sequence code</b>	C an..3	<b>N</b>		
<p><u>Segment Notes</u></p> <p>Value added tax for the actual position; Mandatory *); N 2+2 TAX+7+VAT++++:::20+S'</p> <p>- Producer fees (beer) as percentage; Optional; N 2+2; (the respective amounts are displayed in the following MOA-segment) TAX+6+GST+BIE'</p> <p>Remark to DE 5278 and 5305: By exempt from tax amounts or tax free amounts DE 5278 must always be filled with value 0 (Zero).</p> <p>It is allowed to set one VAT rate and two fees for one article.</p>				

SG26 - M 9999999 - LIN-IMD-QTY-DTM-SG27-SG29-SG30-SG34-SG35

SG34 - M 3 - TAX-MOA

MOA - C 1 - Monetary amount

Function : To specify a monetary amount

Segment number : 20

Data element group/Data element	EDIFACT	ANW	*	Description
<b>C516 Monetary amount</b>	M	<b>M</b>		
5025 Monetary amount type code qualifier	M an..3	<b>M</b>	*	124 = Tax amount
5004 Monetary amount	C n..35	<b>R</b>		
6345 Currency identification code	C an..3	<b>N</b>		
6343 Currency type code qualifier	C an..3	<b>N</b>		
4405 Status description code	C an..3	<b>N</b>		

Segment Notes

This segment is exclusively used to specify in monetary terms the amount of tax due on the current line item, except VAT! VAT is not to be displayed as a monetary amount!

- Tax amount; Optional; N 7+3

MOA+124:250'

SG26 - M 9999999 - LIN-IMD-QTY-DTM-SG27-SG29-SG30-SG34-SG35				
SG35 - M 3 - NAD				
NAD - M 1 - Name and address				
Function : To specify the name/address and their related function either by C082 only and/or unstructured by C058 or structured by C080 thru 3207.				
Segment number : 21				
Data element group/Data element	EDIFACT	ANW	*	Description
<b>3035 Party function code qualifier</b>	M an..3	<b>M</b>	*	DP = Delivery party UC = Ultimate consignee OB = Ordered by
<b>C082 Party identification details</b>	C	<b>R</b>		
3039 Party identifier	M an..35	<b>M</b>		GLN - Format n13
1131 Code list identification code	C an..17	<b>N</b>		
3055 Code list responsible agency code	C an..3	<b>R</b>	*	9 = EAN (International Article Numbering Association)
<b>C058 Name and address</b>	C	<b>N</b>		
3124 Name and address description	M an..35			
3124 Name and address description	C an..35			
3124 Name and address description	C an..35			
3124 Name and address description	C an..35			
3124 Name and address description	C an..35			
<b>C080 Party name</b>	C	<b>N</b>		
3036 Party name	M an..35			
3036 Party name	C an..35			
3036 Party name	C an..35			
3036 Party name	C an..35			
3036 Party name	C an..35			
3045 Party name format code	C an..3			
<b>C059 Street</b>	C	<b>N</b>		
3042 Street number or post office box identifier	M an..35			
3042 Street number or post office box identifier	C an..35			

3042	Street number or post office box identifier	C an..35		
3042	Street number or post office box identifier	C an..35		
<b>3164</b>	<b>City name</b>	C an..35	<b>N</b>	
<b>C819</b>	<b>Country sub-entity details</b>	C	<b>N</b>	
3229	Country sub-entity name code	C an..9		
1131	Code list identification code	C an..17		
3055	Code list responsible agency code	C an..3		
3228	Country sub-entity name	C an..70		
<b>3251</b>	<b>Postal identification code</b>	C an..17	<b>N</b>	
<b>3207</b>	<b>Country name code</b>	C an..3	<b>N</b>	

Segment Notes

- Delivery Party (DE3035 = DP); Mandatory\*); N 13  
NAD+DP+9012345000028::9'

**\*) For invoices with digital signature the delivery address is identified with GLN and optional address in structured form.**

- Ultimate consignee (DE3035 = UC); Optional; N 13  
NAD+UC+9012345000035::9'

- Ordered by (DE3035 = OB); Optional; N 13  
NAD+OB+9012345000042::9'

Remark for Cross-Docking:

The field for delivery party (DE3035 = DP) should contain the Cross-Docking-Point. The data field Ultimate consignee (DE3035 =UC) is used to identify the address for which the goods are picked.

DE3039: For partner identification use exclusively the GLN.

UNS - M					1 - Section control				
Function :					To separate header, detail and summary sections of a message.				
Segment number :					22				
Data element group/Data element		EDIFACT	ANW	*	Description				
<b>0081 Section identification</b>		M a1	<b>M</b>		S = Detail/summary section separation				
<u>Segment Notes</u>									
This segment is used to separate the detail and summary sections of the message.									
Example: UNS+S'									

SG50 - M		5 - MOA		
MOA - M		1 - Monetary amount		
Function : To specify a monetary amount				
Segment number : 23				
Data element group/Data element	EDIFACT	ANW	*	Description
<b>C516 Monetary amount</b>	M	<b>M</b>		
5025 Monetary amount type code qualifier	M an..3	<b>M</b>	*	36E = Goods and services total amount (EAN Code) 35E = Total returnable items deposit amount (EAN Code) 79 = Total line item amount 176 = Message total duty/tax/fee amount 77 = Invoice amount
5004 Monetary amount	C n..35	<b>R</b>		
6345 Currency identification code	C an..3	<b>N</b>		
6343 Currency type code qualifier	C an..3	<b>N</b>		
4405 Status description code	C an..3	<b>N</b>		
<u>Segment Notes</u>				
Einzustellende Datenfelder:				
- Total line items amount, the sum of goods and services total amount and total returnable items deposit amount (DE5025 = 79); Mandatory *); N 11+2: MOA+79:4000'				
- Goods and services total amount (DE5025 = 36E); Mandatory *); N 11+2 MOA+36E:3500'				
- Total returnable items deposit amount (DE5025 = 35E); Mandatory *); N 11+2 MOA+35E:500'				
- Message total duty/tax/fee amount (DE5025 = 176); Optional; N 11+2 MOA+176:4000'				
- Invoice amount (Total line items amount plus charges and VAT, minus allowances) (DE5025 = 77); Mandatory; N 11+2 MOA+77:4000'				
*) The total line item amount is obligatory. Goods and services total amount and total returnable items deposit amount should always displayed when the invoice contains returnable items. Otherwise they can be skipped.				

SG52 - M		10 - TAX-MOA			
TAX - M		1 - Duty/tax/fee details			
Function :		To specify relevant duty/tax/fee information			
Segment number :		24			
Data element group/Data element	EDIFACT	ANW	*	Description	
<b>5283 Duty or tax or fee function code qualifier</b>	M an..3	<b>M</b>	*	7 = Tax 6 = Fee	
<b>C241 Duty/tax/fee type</b>	C	<b>R</b>			
5153 Duty or tax or fee type name coded	C an..3	<b>R</b>	*	VAT = Value added tax GST = Goods and service tax	
1131 Code list identification code	C an..17	<b>N</b>			
3055 Code list responsible agency code	C an..3	<b>N</b>			
5152 Duty or tax or fee type name	C an..35	<b>N</b>			
<b>C533 Duty/tax/fee account detail</b>	C	<b>D</b>			
5289 Duty or tax or fee account code	M an..6	<b>M</b>		BIE = Beer fees TAB = Tobacco fees BRA = Brandy fees GLA = Gambling fees	
1131 Code list identification code	C an..17	<b>N</b>			
3055 Code list responsible agency code	C an..3	<b>N</b>			
<b>5286 Duty or tax or fee assessment basis value</b>	C an..15	<b>N</b>			
<b>C243 Duty/tax/fee detail</b>	C	<b>D</b>			
5279 Duty or tax or fee rate code	C an..7	<b>N</b>			
1131 Code list identification code	C an..17	<b>N</b>			
3055 Code list responsible agency code	C an..3	<b>N</b>			
5278 Duty or tax or fee rate	C an..17	<b>R</b>		Aktueller Steuersatz	
5273 Duty or tax or fee rate basis code	C an..12	<b>N</b>			
1131 Code list identification code	C an..17	<b>N</b>			
3055 Code list responsible agency code	C an..3	<b>N</b>			
<b>5305 Duty or tax or fee category code</b>	C an..3	<b>O</b>		E = Steuerbefreit S = Einheitssatz	
<b>3446 Party tax identifier</b>	C an..20	<b>N</b>			
<b>1227 Calculation sequence code</b>	C an..3	<b>N</b>			



Segment Notes

- VAT – tax rate; Mandatory; N 2+2 (to be repeated for each tax rate)  
TAX+7+VAT++++:::20'

- Producer fees (beer) as percentage; Mandatory – when fees are available; N 2+2; (to be repeated for each fee type)  
TAX+6+GST+BIE'

Remark to DE 5278 and 5305:

By exempt from tax amounts or tax free amounts DE 5278 must always be filled with value 0 (zero).

Tax rate, taxable amount and tax amount should be defined for each tax respectively fee type.

SG52 - M                    10 - TAX-MOA				
MOA - M                    9- Monetary amount				
Function                    :            To specify a monetary amount.				
Segment number : 25				
Data element group/Data element	EDIFACT	ANW	*	Description
<b>C516 Monetary amount</b>	M	<b>M</b>		
5025 Monetary amount type code qualifier	M an..3	<b>M</b>	*	125 = Taxable amount 124 = Tax amount
5004 Monetary amount	C n..35	<b>R</b>		Amount
6345 Currency identification code	C an..3	<b>N</b>		
6343 Currency type code qualifier	C an..3	<b>N</b>		
4405 Status description code	C an..3	<b>N</b>		
<u>Segment Notes</u>				
- Taxable amount (DE5025 = 125); Mandatory; N 11+2 MOA+125:8000'				
- Tax amount (DE5025 = 124); Mandatory; N 11+2 MOA+124:800'				

UNT - M					1 - Message trailer				
Function : To end and check the completeness of a message									
Segment number : 26									
Data element group/Data element		EDIFACT	ANW	*	Description				
<b>0074</b>	<b>Number of segments in a message</b>	M n..10	<b>M</b>		Sum of all segments				
<b>0062</b>	<b>Message reference number</b>	M an..14	<b>M</b>		Repetition of the reference number from the UNH-segment				
<u>Segment Notes</u>									
This segment is a mandatory UN/EDIFACT segment									
Example: UNT+35+ME000001'									

UNZ - M 1 - Interchange trailer				
Function : To end and check the completeness of an interchange				
Segment number : 27				
Data element group/Data element	EDIFACT	ANW	*	Description
<b>0036 Interchange control count</b>	M n..6	<b>M</b>		Sum of all segments
<b>0020 Interchange control reference</b>	M an..14	<b>M</b>		Reference number from the UNH-segment is to be repeated.
<u>Segment Notes</u>				
This segment is used to provide the trailer of an interchange.				
DE 0036: If functional groups are used, this is the number of functional groups within the interchange. If functional groups are not used, this is the number of messages within the interchange.				
Example: UNZ+5+1234555'				

## 5. Example INVOIC

UNA:+.?*	Service string information
UNB+UNOC:4+9099999300476:14+9099999300414:14+20060629:0801+234++++EANCOM-DISI'	Interchange Header
UNH+1+INVOIC:D:01B:UN:EAN010'	Message header
BGM+385+2789+9'	Invoice number
DTM+137:20100112:102'	Invoice date
DTM+263:2010010820100112:718'	Invoicing period
NAD+BY+9004108000000::9++Name1:Name2+Strasse 9+Wien++2355+AT'	Buyer, GLN and address text
RFF+VA:ATU111111111'	VAT reg. number buyer
NAD+SU+9099999300476::9++Name1:Name2+Muster-gasse 3+Salzburg++2800+AT'	Supplier, GLN and address text
RFF+VA:1234567890123'	VAT reg. number supplier
CUX+2:EUR:4'	Currency

LIN+1++9099999026543:SRV'	1. product
IMD+A++++:LIMO 1L'	Product description
QTY+47:50'	Quantity
DTM+35:20100111:102'	Delivery date
MOA+203:300'	Line item amount
PRI+AAA:6'	Net price
RFF+ON:6544'	Order reference
DTM+171:20100110:102'	Order date
RFF+DQ:58772'	Delivery note reference
TAX+7+VAT++++:20+S'	VAT
NAD+DP+9002233000043::9'	Delivery address
NAD+OB+9004108000000::9'	Ordered by
UNS+S'	Segment to separate detail and summary section
MOA+79:450'	Total line items amount
MOA+176:90'	Message total duty/tax/fee amount
MOA+77:540'	Invoice amount
TAX+7+VAT++++:20+S'	VAT
MOA+125:450'	Taxable amount
MOA+124:90'	Tax amount
UNT+29+1'	Message trailer
UNZ+1+234'	Interchange Trailer

## 6. Message structure Security segments

—	<b>SG1</b>		<b>M</b>	99	USH-USA-SG2
—	<b>USH</b>	2	<b>M</b>	1	Security header
—	<b>USA</b>	3	<b>M</b>	3	Security algorithm
—	<b>SG2</b>		<b>M</b>	2	USC-USA
—	<b>USC</b>	4	<b>M</b>	1	Certificate
—	<b>USA</b>	5	<b>M</b>	3	Security algorithm
—	<b>SG4</b>		<b>M</b>	99	UST
—	<b>UST</b>	6	<b>M</b>	1	Security trailer
—	<b>SG4</b>		<b>M</b>	99	UST
—	<b>USR</b>	7	<b>M</b>	1	Security result

## 7. BUSINESS TERMS Security Segments

Business term	Description	Status	Format	Segment		Data element	
Security reference number		M	A/N 14	SG1	USH	0534	Security reference number
Filter function		M	A/N 3	SG1	USH	0505	Filter function, coded
Original character set encoding		M	A/N 3	SG1	USH	0507	Original character set encoding, coded
Creation date		M	D 8	SG1	USH	S501 0517	Date and time qualifier
Creation time		M	T 6	SG1	USH	S501 0338	Event date
Hash-Algorithm		M	A/N 3	SG1	USA	S502 0527	Algorithm, coded
Certificate serial number		M	A/N 35	SG2	USC	0536	Certificate reference
Security party identification, GLN		M	N 13	SG2	USC	S500 0511	Security party identification
Certificate-Syntax		M	A/N 3	SG2	USC	0545	Certificate syntax and version, coded
Signature-Algorithm		M	A/N 3	SG2	USA	S502 0527	Algorithm, coded
Padding mechanism		M	A/N 3	SG2	USA	S502 0591	Padding mechanism, coded
Security reference number (End)		M	A/N 14	SG4	UST	0534	Security reference number
Signature value		M	A/N 512	SG4	USR	S508 0560	Number of security segments

## 8. Segment description Security Segments



SG1 - M 99 - USH-USA-SG2				
USH - M 1 - Security header				
Function : To specify a security mechanism applied to a EDIFACT structure (i.e.: either message package, group or interchange)				
Segment number : 2				
Data element group/Data element	EDIFACT	ANW	*	Description
<b>0501 Security service, coded</b>	M an..3	<b>M</b>	*	1 = Non repudiation of origin
<b>0534 Security reference number</b>	M an..14	<b>M</b>		Unique reference number assigned by the security originator to the security header group and security trailer group
<b>0541 Scope of security application, coded</b>	C an..3	<b>R</b>	*	1 = Security header and Message body
<b>0503 Response type, coded</b>	C an..3	<b>N</b>		
<b>0505 Filter function, coded</b>	C an..3	<b>R</b>	*	7 = Base64
<b>0507 Original character set encoding, coded</b>	C an..3	<b>R</b>	*	2 = ASCII 8 bit
<b>0509 Role of security provicer, coded</b>	C an..3	<b>N</b>		
<b>S500 Security identification details</b>	C	<b>N</b>		
0577 Security party qualifier	M an..3			
0538 Key name	C an..35			
0511 Security party identification	C an..512			
0513 Security party code list qualifier	C an..3			
0515 Security party code list responsible agency, coded	C an..3			
0586 Security party name	C an..35			
0586 Security party name	C an..35			
0586 Security party name	C an..35			
<b>0520 Security sequence number</b>	C an..35	<b>N</b>		
<b>S501 Security date and time</b>	C	<b>R</b>		
0517 Date and time qualifier	M an..3	<b>M</b>	*	1 = Security Timestamp 5 = EDIFACT-structure, creation date and time
0338 Event date	C n..8	<b>R</b>		Creation date, CCYYMMTT
0314 Event time	C an..15	<b>R</b>		Creation time, HHMMSS
0336 Time offset	C n4	<b>N</b>		

Segment Notes

A segment specifying a security service applied to the referenced EDIFACT structure.

- Security reference number (DE0534);Mandatory; A/N 14
- Filter Function (DE0505 = 7); Mandatory; A/N 3
- Original character set encoding (DE0507); Mandatory; A/N 3
- Signature creation date (DE0338); Mandatory; D 8
- Signature creation time (DE0314); Mandatory; D 6

USH+1+323+1++7+2++++5:20060831:105531'

SG1	- M	99	- USH-USA-SG2
USA	- M	3	- Security algorithm
Function	:	To identify a security algorithm, the technical usage made of it, and to contain the technical parameters required	
Segment number	:	3	
Data element group/Data element	EDIFACT	ANW	* Description
<b>S502 Security algorithm</b>	M	<b>M</b>	
0523 Use of algorithm, coded	M an..3	<b>M</b>	* 1 = Owner hashing
0525 Cryptographic mode of operation, coded	C an..3	<b>N</b>	
0533 Mode of operation code list, identifier	C an..3		
0527 Algorithm, coded	C an..3	<b>R</b>	* 16 = SHA1
0529 Algorithm code list identifier	C an..3	<b>R</b>	* 1 = UN/CEFACT
0591 Padding mechanism, coded	C an..3	<b>N</b>	
0601 Padding mechanism code list identifier	C an..3	<b>N</b>	
<b>S503 Algorithm parameter</b>	C	<b>N</b>	
0531 Algorithm parameter qualifier	M an..3		
0554 Algorithm parameter value	M an..512		
<u>Segment Notes</u>			
This segment is used to identify a security algorithm, the technical usage made of it, and contains the technical parameters required in order to generate the hash value.			
- Hash Algorithm (DE0527); Mandatory; A/N 3			
USA+1:::16:1'			

SG1	- M	99	- USH-USA-SG2
SG2	- M	2	- USC-USA
USC	- M	1	- Certificate
Function : To convey the public key and the credentials of its owner			
Segment number : 4			
Data element group/Data element	EDIFACT	ANW	* Description
<b>0536 Certificate reference</b>	C an..35	<b>R</b>	
<b>S500 Security identification details</b>	C	<b>R</b>	
0577 Security party qualifier	M an..3	<b>M</b>	* 4 = Authenticating party
0538 Key name	C an..35	<b>N</b>	
0511 Security party identification	C an..512	<b>R</b>	Coded (see USH/DE5050) Distinguished Name (DN) of the security party
0513 Security party code list qualifier	C an..3	<b>R</b>	* ZZZ = mutually agreed
0515 Security party code list responsible agency, coded	C an..3	<b>N</b>	
0586 Security party name	C an..35	<b>N</b>	
0586 Security party name	C an..35	<b>N</b>	
0586 Security party name	C an..35	<b>N</b>	
<b>0545 Certificate syntax and version, coded</b>	C an..3	<b>M</b>	3 = X.509
<b>0505 Filter function, coded</b>	C an..3	<b>N</b>	
<b>0507 Original character set encoding, coded</b>	C an..3	<b>N</b>	
<b>0543 Certificate original character set repertoire, coded</b>	C an..3	<b>N</b>	
<b>0546 User authorisation level</b>	C an..35	<b>N</b>	
<b>S505 Service character for signature</b>	C	<b>N</b>	
0551 Service character for signature qualifier	M an..3		
0548 Service character for signature	M an..4		
<b>S501 Security date and time</b>	C	<b>N</b>	
0517 Date and time qualifier	M an..3		
0338 Event date	C n..8		
0314 Event time	C an..15		

0336	Time offset	C n4		
<b>0567</b>	<b>Security status, coded</b>	C an..3	<b>N</b>	
<b>0569</b>	<b>Revocation reason, coded</b>	C an..3	<b>N</b>	

Segment Notes

This segment identifies the security party, certificate serial number and certificate syntax.

- Certificate serial number (DE0536); Mandatory; A/N 35
- Coded distinguished name (DN) of Certification authority (CA) (DE0511); Mandatory; A/N 512
- Certificate syntax (DE0545); Mandatory; A/N 3

**In this example the serial number is denoted hexadecimal and the distinguished name of the CA is denoted in Base64 as defined in the filter function of the USH segment.**

```
USC+3053E29993FB+4::MIGpMQswCQYDVQOGewJBVDFIMEYGA1UECgw/QS1UcnVzdCBHZXMuIGYuIFNpY2hlc
mhlaXRzc3lzdGVtZSBpbSBibGVrdHluIERhdGVudmVya2VociBHbWJIMScwJQYDVQQLDB5hLXNpZ24tY29ycG9yY
XRILUxpZ2h0LVRic3QtMDIxJzAIBgNVBAMMHmEtc2lnbi1jb3Jwb3JhdGUtTGlnaHQtVGZzdC0wMg==:ZZZ+3'
```

SG1 - M	99 - USH-USA-SG2			
SG2 - M	2 - USC-USA			
USA - M	3 - Security algorithm			
Function :	To identify a security algorithm, the technical usage made of it and to contain the technical parameters required			
Segment number :	5			
Data element group/Data element	EDIFACT	ANW	*	Description
<b>S502 Security algorithm</b>	M	<b>M</b>		
0523 Use of algorithm, coded	M an..3	<b>M</b>	*	6 = Owner signing
0525 Cryptografic mode of operation, coded	C an..3	<b>R</b>	*	16 = DSMR
0533 Mode of operation code list identifier	C an..3	<b>R</b>	*	1 = UN/CEFACT
0527 Algorithm, coded	C an..3	<b>R</b>	*	10 = RSA
0529 Algorithm code list identifier	C an..3	<b>R</b>	*	1 = UN/CEFACT
0591 Padding mechanism, coded	C an..3	<b>R</b>	*	11 = PKCS #1 signature padding 16 = RSASA-PKCS-v1_5 17 = Encryption Block Formatting
0601 Padding mechanism code list identifier	C an..3	<b>R</b>	*	1 = UN/CEFACT
<b>S503 Algorithm parameter</b>	C	<b>O</b>		
0531 Algorithm parameter qualifier	M an..3	<b>M</b>		14 = Modulus Länge
0554 Algorithm parameter value	M an..512	<b>M</b>		
<b>S503 Algorithm parameter</b>	C	<b>O</b>		
0531 Algorithm parameter qualifier	M an..3	<b>M</b>		12 = Modulus
0554 Algorithm parameter value	M an..512	<b>M</b>		
<b>S503 Algorithm parameter</b>	C	<b>O</b>		
0531 Algorithm parameter qualifier	M an..3	<b>M</b>		13 = Exponent
0554 Algorithm parameter value	M an..512	<b>M</b>		

Segment Notes

This segment is used to identify a security algorithm and its specifications.

- Signature algorithm (DE0527); Mandatory; A/N 3
- Padding mechanism (DE=591); Mandatory; A/N 3

It is possible to send optionally also the public key:

- Modulus length (public key length DE0554); Optional; A/N 512
- Modulus (Parameter value of the algorithm as public key modulus, DE0554); Optional; A/N 512
- Exponent (Parameter value of the algorithm as public key exponent, DE0554); Optional; A/N 512

USA+6:16:1:10:1:16:1+14:1024\*12: CF8516555\*13:7E7406D7'

As the component data element group S503 appears 3 times, it must be separated by the repetition separator (\*):

SG4 - M                    99 - UST				
UST - M                    1 - Security trailer				
Function :                    To establish a link between security header and securit trailer segment groups.				
Segment number : 6				
Data element group/Data element	EDIFACT	ANW	*	Description
<b>0534 Security reference number</b>	M an..14	<b>M</b>		Security reference number from USH segment
<b>0588 Number of security segments</b>	M n..10	<b>M</b>		The number of security segments in a security header/trailer group pair.
<u>Segment Notes</u>				
A segment establishing a link between security header and security trailer segment group.				
UST+323+6'				



SG4 - M                    99 - UST				
USR - M                    1 - Security result				
Function : Identification of the security result.				
Segment number : 7				
Data element group/Data element	EDIFACT	ANW	*	Description
<b>S508 Inspection value</b>	C	<b>M</b>		
0563 Inspection value, qualifier	M an..3	<b>M</b>	*	1 = Unique inspection value
0560 Inspection value	C an..512	<b>R</b>		Value determined by the hash value and the private key of the sender.
<u>Segment Notes</u>				
This segment contains the digital signature respectively the result from the applied hash and signature algorithm in the referred interchange (USH,USA,USC, USA, BGM ...MOA).				
- Signature value (DE0560); Mandatory; A/N 512				
USR+1:C7DIEW6655'				

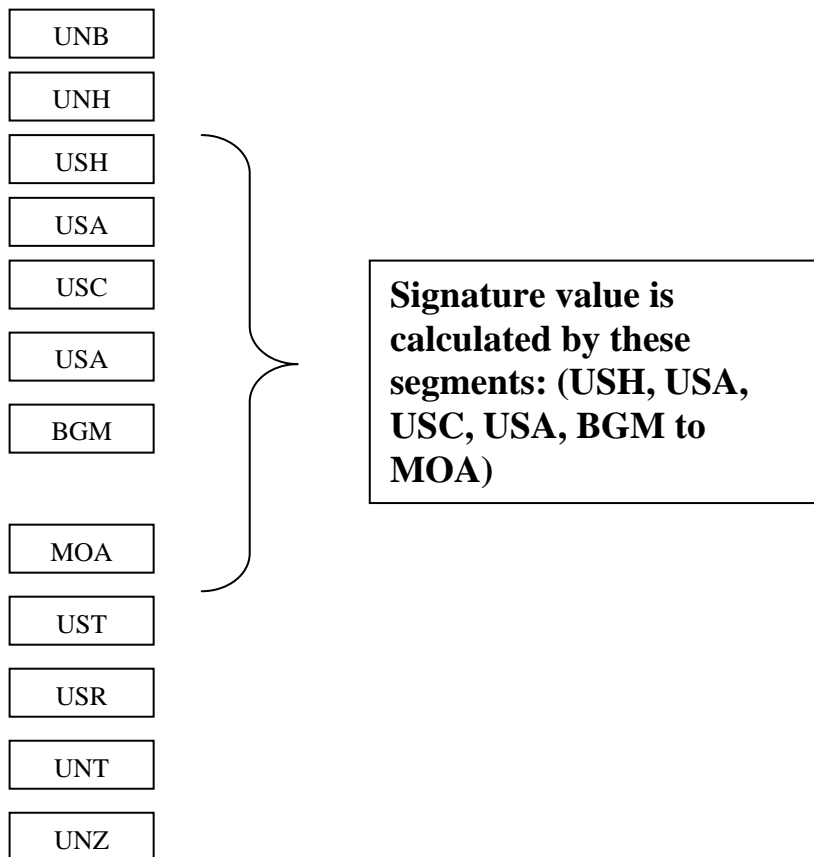
## 9. Example Security Segmente

USH+1+323+1++7+2++++5:20060831:105531'	Filter, Date/Time
USA+1:::16:1'	Hash algorithm
USC+3053E29993FB+4.:MIGpMQswCOYDVQOGEwJB VDFIMEYGA1UECgw/QS1UcnVzdCBHZXMuIGYuIFNpY 2hlcmlhlaXRzc3lzdGVtZSBpbSBibGVrdHluIERhdGVud mVya2VociBHbWJIMScwJQYDVQQLDB5hLXNpZ24tY2 9ycG9yYXRILUxpZ2h0LVRIc3QtMDIxJzAIBgNVBAMMH mEtc2lnbi1jb3Jwb3JhdGUtTGlnaHQtdGVzZdC0wMg== :ZZZ+3'	Certificate serial number, coded distinguished name of certification authority (CA)
USA+6:16:1:10:1:16:1'	Signature algorithm
UST+323+6'	Segment counter
USR+1:N3L7Ss5SLpQkrXt6gTny5V24lviW00 WeQu0bYcj1W0QBSemMyo5dthuDzTTU5i2TWsFSdMkb 9gBkOChyN8AnzCpIVdKTONQ?+xu?+BMPVDnkzbMW Ef84nnSgSolp3w?+N3gpSEdq3ULiZSB6YyIPRjgkknMp C?+xEtLUpkopunVa/5bnZSjveXry0iT3oh?+ZMix1gj/T Prv4Nq13 To1cim9XGuM1Xb4w?+S7g?+5VSOC6cuxP zcqoaLSh3ni8XFTN1Up?+XFWgpSfgeqOgM1 zCl13lp6vxR0diI3mnJ6YYp7jG2fxvwUsCS5r DPpX52fUb?+efX7jv/pvqaALaM4zSoNX/5JKG Q0ni7pY57T4Dk?+xtQvVsQ8S?+KjFD8pFneFXcelD7g ZTtsD/4oYHBvSleYFDRmtIfHRMXLpzeJ3reqQDI0bRZ2 7XIE?+Ai8ThLwlwzmpqnP5an2pxhW3sm3nQ6pk9nc YTsnYOmNZNASBYx6SkU?+O1uYT8?+r9L4fNQ1DTj gH8a/Hp3RrUAT2fW31K8qo2iNRVYsBxD2NnyHYFzffw g03TOAT0sir2nZAPk2rOiazuVOXnvXB8G3ytQfGh0OVg P8jp7?+TWaMDDc7rpyZghX6VDAPm8X1L9P3MH/yjO TKC/jD84e71xgrBBnV/?+KiNao8gkUsvQt7XhzY4iL8q6 4TUJLU='	Signature value

## 10. Entire example Interchange (INVOIC and security segments)

After the INVOIC is created in the converter, the security segments are added and the signature value is generated, after which the INVOIC is sent to the business partner together with the security segments!

Signature value calculation (hash value calculation and application of the private key) is executed by the following segments:



UNA:+.?*	Service string information
UNB+UNOC:4+9099999300476:14+9099999300414:14+20060629:0801+234++++EANCOM-DISI'	Interchange Header
UNH+1+INVOIC:D:01B:UN:EAN010'	Message Header
USH+1+323+1++7+2++++5:20060831:105531'	Filter, Date/Time
USA+1:::16:1'	Hash algorithm
USC+3053E29993FB+4.:MIGpMQswCOYDVOQGEwJBVDFIMEYGA1UECgw/QS1UcnVzdCBHZXMuIGYuIFNpY2hlcmlhlaXRzc3lzdGVtZSBpbSBibGVrdHluIERhdGVudmVya2VociBHbWJIMScwJQYDVOQLDB5hLXNpZ24tY29ycG9yYXRILUxpZ2h0LVRIc3QtMDIxJzAIBgNVBAMMH	Security party, Certificate serial number

mEtc2Inbi1jb3Jwb3JhdGUtTGlnaHQ0tVGVzdC0wMg== :ZZZ+3'	
USA+6:16:1:10:1:16:1+14:1024*12: CF8516555*13:7E7406D7'	Signature algorithm
BGM+385+2789+9'	Invoice number
DTM+137:20100112:102'	Document date
DTM+263:2010010820100112:718'	Invoicing period
NAD+BY+9004108000000::9++Name1:Name2+Stra sse 9+Wien++2355+AT'	Buyer, GLN and text address
RFF+VA:ATU111111111'	Buyer's VAT registration number
NAD+SU+9099999300476::9++Name1:Name2+Mus tergasse 3+Salzburg++2800+AT'	Supplier, GLN and text address
RFF+VA:1234567890123'	Supplier's VAT registration number
CUX+2:EUR:4'	Invoice currency
LIN+1++9099999026543:SRV'	1. Article
IMD+A+:::LIMO 1L'	Article description
QTY+47:50'	Quantity
DTM+35:20100111:102'	Delivery date
MOA+203:300'	Line item amount
PRI+AAA:6'	Net price
RFF+ON:6544'	Order reference
DTM+171:20100110:102'	Order date
RFF+DQ:58772'	Delivery note reference
TAX+7+VAT++++:::20+S'	VAT
NAD+DP+9002233000043::9'	Delivery party
NAD+OB+9004108000000::9'	Ordered by
UNS+S'	Begin of summary section
MOA+79:450'	Total line items amount

MOA+176:90'	Message total duty/tax/fee amount
MOA+77:540'	Invoice amount
TAX+7+VAT+++:::20+S'	VAT
MOA+125:450'	Taxable amount
MOA+124:90'	Tax amount
UST+323+6'	Segment counter
USR+1:N3L7Ss5SLpQkrXt6gTny5V24lviW00 WeQu0bYcj1W0QBSemMyo5dthuDzTTU5i2TWsFSdMkb 9gBkOChyN8AnzCpIVdKTONQ?+xu?+BMPVDnkbzBMW Ef84nnSgSolp3w?+N3gpSEdq3ULiZSB6YyIPRjgkknMp C?+xEtLUpkopunVa/5bnZSjveXry0iT3oh?+ZMix1gj/T Prv4Nq13 To1cim9XGuM1Xb4w?+S7g?+5VSOC6cuxP zcqoaLSh3ni8XFTN1Up?+XFWgpSfgeqOgM1 zCl13lp6vxR0diI3mnJ6YYp7jG2fxvwUsCS5r DPpX52fUb?+efX7jv/pvqaALaM4zSoNX/5JKG Q0ni7pY57T4Dk?+xtQvVsQ8S?+KjFD8pFneFXceLD7g ZTtsD/4oYHBvSleYFDRmtIfHRMXLpzeJ3reqQDI0bRZ2 7XIEx?+Ai8ThLwlwzmpqnP5an2pxhW3sm3nQ6pk9nc YTsnyOmnZBNASBYx6SkU?+O1uYT8?+r9L4fNQ1DTj gH8a/Hp3RrUAT2fW31K8qo2iNRVYsBxD2NnyHYFzffw g03TOAT0sir2nZAPk2rOiazuVOXnvXB8G3ytQfGh0OVg P8jp7?+TWaMDDc7rpyZghX6VDAPm8X1L9P3MH/yjO TKC/jD84e71xgrBBnV/?+KiNao8gkUsvQt7XhzY4iL8q6 4TUJLU='	Signature value
UNT+35+1'	Message trailer
UNZ+1+234'	Interchange trailer