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# 810 Invoice

Functional Group=IN

**Purpose:** This Draft Standard for Trial Use contains the format and establishes the data contents of the Invoice Transaction Set (810) for use within the context of an Electronic Data Interchange (EDI) environment. The transaction set can be used to provide for customary and established business and industry practice relative to the billing for goods and services provided.

## Heading:

<u>Pos</u>	<u>Id</u>	<u>Segment Name</u>	<u>Req</u>	<u>Max Use</u>	<u>Repeat</u>	<u>Notes</u>	<u>Usage</u>
010	ST	Transaction Set Header	M	1			Must use
020	BIG	Beginning Segment for Invoice	M	1			Must use
050	REF	Reference Identification	O	12			Must use
<b>LOOP ID - N1</b>					<b>200</b>		
070	N1	Name	O	1			Must use
080	N2	Additional Name Information	O	2			Used
090	N3	Address Information	O	2			Used
100	N4	Geographic Location	O	1			Used
120	PER	Administrative Communications Contact	O	3			Used
130	ITD	Terms of Sale/Deferred Terms of Sale	O	>1			Must use

## Detail:

<u>Pos</u>	<u>Id</u>	<u>Segment Name</u>	<u>Req</u>	<u>Max Use</u>	<u>Repeat</u>	<u>Notes</u>	<u>Usage</u>
<b>LOOP ID - IT1</b>					<b>200000</b>		
010	IT1	Baseline Item Data (Invoice)	O	1			Must use
040	TXI	Tax Information	O	10			Must use
<b>LOOP ID - PID</b>					<b>1000</b>		
060	PID	Product/Item Description	O	1			Must use
070	MEA	Measurements	O	10			Must use
120	REF	Reference Identification	O	>1			Must use
150	DTM	Date/Time Reference	O	10			Must use
<b>LOOP ID - SAC</b>					<b>25</b>		
180	SAC	Service, Promotion, Allowance, or Charge Information	O	1			Must use
<b>LOOP ID - N1</b>					<b>200</b>		
240	N1	Name	O	1			Must use
260	N3	Address Information	O	2			Used
270	N4	Geographic Location	O	1			Used
290	PER	Administrative Communications Contact	O	3			Used

## Summary:

<u>Pos</u>	<u>Id</u>	<u>Segment Name</u>	<u>Req</u>	<u>Max Use</u>	<u>Repeat</u>	<u>Notes</u>	<u>Usage</u>
010	TDS	Total Monetary Value Summary	M	1			Must use
<b><u>LOOP ID - SAC</u></b>					<b><u>25</u></b>		
040	SAC	Service, Promotion, Allowance, or Charge Information	O	1			Must use
070	CTT	Transaction Totals	O	1		N3/070	Must use
080	SE	Transaction Set Trailer	M	1			Must use

**Notes:**

3/070 Number of line items (CTT01) is the accumulation of the number of IT1 segments. If used, hash total (CTT02) is the sum of the value of quantities invoiced (IT102) for each IT1 segment.

# ST Transaction Set Header

Pos: 010	Max: 1
Heading - Mandatory	
Loop: N/A	Elements: 2

**User Option (Usage):** Must use

**Purpose:** To indicate the start of a transaction set and to assign a control number

## Element Summary:

<u>Ref</u>	<u>Id</u>	<u>Element Name</u>	<u>Req</u>	<u>Type</u>	<u>Min/Max</u>	<u>Usage</u>
ST01	143	Transaction Set Identifier Code	M	ID	3/3	Must use

**Description:** Code uniquely identifying a Transaction Set

**CodeList Summary** (Total Codes: 298, Included: 1)

Code Name

810 Invoice

ST02	329	Transaction Set Control Number	M	AN	4/9	Must use
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**Description:** Identifying control number that must be unique within the transaction set functional group assigned by the originator for a transaction set

## Semantics:

1. The transaction set identifier (ST01) used by the translation routines of the interchange partners to select the appropriate transaction set definition (e.g., 810 selects the Invoice Transaction Set).

# BIG Beginning Segment for Invoice

Pos: 020	Max: 1
Heading - Mandatory	
Loop: N/A	Elements: 4

**User Option (Usage):** Must use

**Purpose:** To indicate the beginning of an invoice transaction set and transmit identifying numbers and dates

## Element Summary:

<u>Ref</u>	<u>Id</u>	<u>Element Name</u>	<u>Req</u>	<u>Type</u>	<u>Min/Max</u>	<u>Usage</u>
BIG01	373	Date	M	DT	8/8	Must use
Description: Date expressed as CCYYMMDD						
BIG02	76	Invoice Number	M	AN	1/22	Must use
Description: Identifying number assigned by issuer						
BIG03	373	Date	O	DT	8/8	Must use
Description: Date expressed as CCYYMMDD						
BIG07	640	Transaction Type Code	O	ID	2/2	Must use
Description: Code specifying the type of transaction						
CodeList Summary (Total Codes: 446, Included: 1)						
<u>Code</u> <u>Name</u>						
FB      Final Bill						

## Semantics:

1. BIG01 is the invoice issue date.
2. BIG03 is the date assigned by the purchaser to purchase order.
3. BIG10 indicates the consolidated invoice number. When BIG07 contains code CI, BIG10 is not used.

## Comments:

1. BIG07 is used only to further define the type of invoice when needed.

# REF Reference Identification

Pos: 050	Max: 12
Heading - Optional	
Loop: N/A	Elements: 2

**User Option (Usage):** Must use

**Purpose:** To specify identifying information

## Element Summary:

<u>Ref</u>	<u>Id</u>	<u>Element Name</u>	<u>Req</u>	<u>Type</u>	<u>Min/Max</u>	<u>Usage</u>
REF01	128	Reference Identification Qualifier	M	ID	2/3	Must use
<b>Description:</b> Code qualifying the Reference Identification						
<b>CodeList Summary</b> (Total Codes: 1503, Included: 1)						
<b><u>Code</u> <u>Name</u></b>						
12 Billing Account						
REF02	127	Reference Identification	X	AN	1/30	Must use
<b>Description:</b> Reference information as defined for a particular Transaction Set or as specified by the Reference Identification Qualifier						

## Syntax Rules:

1. R0203 - At least one of REF02 or REF03 is required.

## Semantics:

1. REF04 contains data relating to the value cited in REF02.

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# Loop Name

Pos: 070	Repeat: 200
Optional	
Loop: N1	Elements: N/A

**User Option (Usage):** Must use

**Purpose:** To identify a party by type of organization, name, and code

## Loop Summary:

<u>Pos</u>	<u>Id</u>	<u>Segment Name</u>	<u>Req</u>	<u>Max Use</u>	<u>Repeat</u>	<u>Usage</u>
070	N1	Name	O	1		Must use
080	N2	Additional Name Information	O	2		Used
090	N3	Address Information	O	2		Used
100	N4	Geographic Location	O	1		Used
120	PER	Administrative Communications Contact	O	3		Used

# N1 Name

<b>Pos: 070</b>	<b>Max: 1</b>
<b>Heading - Optional</b>	
<b>Loop: N1</b>	<b>Elements: 4</b>

**User Option (Usage):** Must use

**Purpose:** To identify a party by type of organization, name, and code

## Element Summary:

<u>Ref</u>	<u>Id</u>	<u>Element Name</u>	<u>Req</u>	<u>Type</u>	<u>Min/Max</u>	<u>Usage</u>
N101	98	<b>Entity Identifier Code</b>	M	ID	2/3	Must use
<b>Description:</b> Code identifying an organizational entity, a physical location, property or an individual  <b>CodeList Summary</b> (Total Codes: 1312, Included: 2) <u>Code</u> <u>Name</u> BT Bill-to-Party RE Party to receive commercial invoice remittance						
N102	93	<b>Name</b>	X	AN	1/60	Must use
<b>Description:</b> Free-form name						
N103	66	<b>Identification Code Qualifier</b>	X	ID	1/2	Must use
<b>Description:</b> Code designating the system/method of code structure used for Identification Code (67)  <b>CodeList Summary</b> (Total Codes: 215, Included: 2) <u>Code</u> <u>Name</u> 1 D-U-N-S Number, Dun & Bradstreet 91 Assigned by Seller or Seller's Agent						
N104	67	<b>Identification Code</b>	X	AN	2/80	Must use
<b>Description:</b> Code identifying a party or other code						

## Syntax Rules:

1. R0203 - At least one of N102 or N103 is required.
2. P0304 - If either N103 or N104 is present, then the other is required.

## Comments:

1. This segment, used alone, provides the most efficient method of providing organizational identification. To obtain this efficiency the "ID Code" (N104) must provide a key to the table maintained by the transaction processing party.
2. N105 and N106 further define the type of entity in N101.



# N2 Additional Name Information

Pos: 080	Max: 2
Heading - Optional	
Loop: N1	Elements: 1

User Option (Usage): Used  
Purpose: To specify additional names or those longer than 35 characters in length

## Element Summary:

<u>Ref</u>	<u>Id</u>	<u>Element Name</u>	<u>Req</u>	<u>Type</u>	<u>Min/Max</u>	<u>Usage</u>
N201	93	Name	M	AN	1/60	Must use
Description: Free-form name						

# N3 Address Information

Pos: 090	Max: 2
Heading - Optional	
Loop: N1	Elements: 1

**User Option (Usage):** Used

**Purpose:** To specify the location of the named party

## Element Summary:

<u>Ref</u>	<u>Id</u>	<u>Element Name</u>	<u>Req</u>	<u>Type</u>	<u>Min/Max</u>	<u>Usage</u>
N301	166	Address Information	M	AN	1/55	Must use

**Description:** Address information

# N4 Geographic Location

Pos: 100	Max: 1
Heading - Optional	
Loop: N1	Elements: 4

**User Option (Usage):** Used

**Purpose:** To specify the geographic place of the named party

## Element Summary:

<u>Ref</u>	<u>Id</u>	<u>Element Name</u>	<u>Req</u>	<u>Type</u>	<u>Min/Max</u>	<u>Usage</u>
N401	19	<b>City Name</b>	O	AN	2/30	Must use
		<b>Description:</b> Free-form text for city name				
N402	156	<b>State or Province Code</b>	O	ID	2/2	Must use
		<b>Description:</b> Code (Standard State/Province) as defined by appropriate government agency				
N403	116	<b>Postal Code</b>	O	ID	3/15	Must use
		<b>Description:</b> Code defining international postal zone code excluding punctuation and blanks (zip code for United States)				
N404	26	<b>Country Code</b>	O	ID	2/3	Must use
		<b>Description:</b> Code identifying the country				

## Syntax Rules:

1. C0605 - If N406 is present, then N405 is required.

## Comments:

1. A combination of either N401 through N404, or N405 and N406 may be adequate to specify a location.
2. N402 is required only if city name (N401) is in the U.S. or Canada.

# PER Administrative Communications Contact

Pos: 120	Max: 3
Heading - Optional	
Loop: N1	Elements: 4

**User Option (Usage):** Used

**Purpose:** To identify a person or office to whom administrative communications should be directed

## Element Summary:

<u>Ref</u>	<u>Id</u>	<u>Element Name</u>	<u>Req</u>	<u>Type</u>	<u>Min/Max</u>	<u>Usage</u>
PER01	366	<b>Contact Function Code</b>	M	ID	2/2	Must use
		<b>Description:</b> Code identifying the major duty or responsibility of the person or group named  <b>CodeList Summary</b> (Total Codes: 230, Included: 1) <u>Code</u> <u>Name</u> CR Customer Relations				
PER02	93	<b>Name</b>	O	AN	1/60	Must use
		<b>Description:</b> Free-form name				
PER03	365	<b>Communication Number Qualifier</b>	X	ID	2/2	Must use
		<b>Description:</b> Code identifying the type of communication number  <b>CodeList Summary</b> (Total Codes: 40, Included: 1) <u>Code</u> <u>Name</u> TE Telephone				
PER04	364	<b>Communication Number</b>	X	AN	1/80	Must use
		<b>Description:</b> Complete communications number including country or area code when applicable				

## Syntax Rules:

1. P0304 - If either PER03 or PER04 is present, then the other is required.
2. P0506 - If either PER05 or PER06 is present, then the other is required.
3. P0708 - If either PER07 or PER08 is present, then the other is required.

# ITD Terms of Sale/Deferred Terms of Sale

Pos: 130	Max: >1
Heading - Optional	
Loop: N/A	Elements: 3

**User Option (Usage):** Must use

**Purpose:** To specify terms of sale

## Element Summary:

<u>Ref</u>	<u>Id</u>	<u>Element Name</u>	<u>Req</u>	<u>Type</u>	<u>Min/Max</u>	<u>Usage</u>
ITD01	336	<b>Terms Type Code</b>	O	ID	2/2	Must use
<b>Description:</b> Code identifying type of payment terms						
<b>CodeList Summary</b> (Total Codes: 65, Included: 1)						
<b><u>Code</u> <u>Name</u></b>						
05 Discount Not Applicable						
ITD02	333	<b>Terms Basis Date Code</b>	O	ID	1/2	Must use
<b>Description:</b> Code identifying the beginning of the terms period						
<b>CodeList Summary</b> (Total Codes: 17, Included: 1)						
<b><u>Code</u> <u>Name</u></b>						
3 Invoice Date						
ITD06	446	<b>Terms Net Due Date</b>	O	DT	8/8	Must use
<b>Description:</b> Date when total invoice amount becomes due expressed in format CCYYMMDD						

## Syntax Rules:

1. L03040513 - If ITD03 is present, then at least one of ITD04, ITD05 or ITD13 is required.
2. L08040513 - If ITD08 is present, then at least one of ITD04, ITD05 or ITD13 is required.
3. L091011 - If ITD09 is present, then at least one of ITD10 or ITD11 is required.

## Semantics:

1. ITD15 is the percentage applied to a base amount used to determine a late payment charge.

## Comments:

1. If the code in ITD01 is "04", then ITD07 or ITD09 is required and either ITD10 or ITD11 is required; if the code in ITD01 is "05", then ITD06 or ITD07 is required.

# Loop Baseline Item Data (Invoice)

Pos: 010	Repeat: 200000
Optional	
Loop: IT1	Elements: N/A

**User Option (Usage):** Must use

**Purpose:** To specify the basic and most frequently used line item data for the invoice and related transactions

## Loop Summary:

<u>Pos</u>	<u>Id</u>	<u>Segment Name</u>	<u>Req</u>	<u>Max Use</u>	<u>Repeat</u>	<u>Usage</u>
010	IT1	Baseline Item Data (Invoice)	O	1		Must use
040	TXI	Tax Information	O	10		Must use
060		Loop PID	O		1000	Must use
120	REF	Reference Identification	O	>1		Must use
150	DTM	Date/Time Reference	O	10		Must use
180		Loop SAC	O		25	Must use
240		Loop N1	O		200	Must use

# IT1 Baseline Item Data (Invoice)

Pos: 010	Max: 1
Detail - Optional	
Loop: IT1	Elements: 12

**User Option (Usage):** Must use

**Purpose:** To specify the basic and most frequently used line item data for the invoice and related transactions

## Element Summary:

<u>Ref</u>	<u>Id</u>	<u>Element Name</u>	<u>Req</u>	<u>Type</u>	<u>Min/Max</u>	<u>Usage</u>
IT101	350	<b>Assigned Identification</b>	O	AN	1/20	Must use
		<b>Description:</b> Alphanumeric characters assigned for differentiation within a transaction set				
IT102	358	<b>Quantity Invoiced</b>	X	R	1/10	Must use
		<b>Description:</b> Number of units invoiced (supplier units)				
IT103	355	<b>Unit or Basis for Measurement Code</b>	X	ID	2/2	Must use
		<b>Description:</b> Code specifying the units in which a value is being expressed, or manner in which a measurement has been taken				
		<b>CodeList Summary</b> (Total Codes: 794, Included: 1)				
		<u>Code</u>	<u>Name</u>			
		KH	Kilowatt Hour			
IT104	212	<b>Unit Price</b>	X	R	1/17	Must use
		<b>Description:</b> Price per unit of product, service, commodity, etc.				
IT106	235	<b>Product/Service ID Qualifier</b>	X	ID	2/2	Must use
		<b>Description:</b> Code identifying the type/source of the descriptive number used in Product/Service ID (234)				
		<b>CodeList Summary</b> (Total Codes: 477, Included: 1)				
		<u>Code</u>	<u>Name</u>			
		SV	Service Rendered			
IT107	234	<b>Product/Service ID</b>	X	AN	1/48	Must use
		<b>Description:</b> Identifying number for a product or service				
IT108	235	<b>Product/Service ID Qualifier</b>	X	ID	2/2	Must use
		<b>Description:</b> Code identifying the type/source of the descriptive number used in Product/Service ID (234)				
		<b>CodeList Summary</b> (Total Codes: 477, Included: 1)				
		<u>Code</u>	<u>Name</u>			
		C3	Classification			
IT109	234	<b>Product/Service ID</b>	X	AN	1/48	Must use
		<b>Description:</b> Identifying number for a product or service				
IT110	235	<b>Product/Service ID Qualifier</b>	X	ID	2/2	Must use
		<b>Description:</b> Code identifying the type/source of the descriptive number used in Product/Service ID (234)				

<u>Ref</u>	<u>Id</u>	<u>Element Name</u>	<u>Req</u>	<u>Type</u>	<u>Min/Max</u>	<u>Usage</u>
<b>CodeList Summary</b> (Total Codes: 477, Included: 1)						
<b><u>Code</u> <u>Name</u></b>						
CR Contract Number						
IT111	234	<b>Product/Service ID</b>	X	AN	1/48	Must use
<b>Description:</b> Identifying number for a product or service						
IT112	235	<b>Product/Service ID Qualifier</b>	X	ID	2/2	Must use
<b>Description:</b> Code identifying the type/source of the descriptive number used in Product/Service ID (234)						
<b>CodeList Summary</b> (Total Codes: 477, Included: 1)						
<b><u>Code</u> <u>Name</u></b>						
BS Bill Subgroup Code						
IT113	234	<b>Product/Service ID</b>	X	AN	1/48	Must use
<b>Description:</b> Identifying number for a product or service						

### Syntax Rules:

1. P020304 - If either IT102, IT103 or IT104 are present, then the others are required.
2. P0607 - If either IT106 or IT107 is present, then the other is required.
3. P0809 - If either IT108 or IT109 is present, then the other is required.
4. P1011 - If either IT110 or IT111 is present, then the other is required.
5. P1213 - If either IT112 or IT113 is present, then the other is required.
6. P1415 - If either IT114 or IT115 is present, then the other is required.
7. P1617 - If either IT116 or IT117 is present, then the other is required.
8. P1819 - If either IT118 or IT119 is present, then the other is required.
9. P2021 - If either IT120 or IT121 is present, then the other is required.
10. P2223 - If either IT122 or IT123 is present, then the other is required.
11. P2425 - If either IT124 or IT125 is present, then the other is required.

### Semantics:

1. IT101 is the purchase order line item identification.

### Comments:

1. Element 235/234 combinations should be interpreted to include products and/or services. See the Data Dictionary for a complete list of IDs.
2. IT106 through IT125 provide for ten different product/service IDs for each item. For example: Case, Color, Drawing No., U.P.C. No., ISBN No., Model No., or SKU.



# TXI Tax Information

Pos: 040	Max: 10
Detail - Optional	
Loop: IT1	Elements: 3

**User Option (Usage):** Must use

**Purpose:** To specify tax information

## Element Summary:

<u>Ref</u>	<u>Id</u>	<u>Element Name</u>	<u>Req</u>	<u>Type</u>	<u>Min/Max</u>	<u>Usage</u>
TXI01	963	Tax Type Code	M	ID	2/2	Must use

**Description:** Code specifying the type of tax

**CodeList Summary** (Total Codes: 74, Included: 4)

### Code Name

CS	City Sales Tax
GR	Gross Receipts Tax
OH	Other Taxes
ST	State Sales Tax

TXI02	782	Monetary Amount	X	R	1/18	Must use
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**Description:** Monetary amount

TXI03	954	Percent	X	R	1/10	Must use
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**Description:** Percentage expressed as a decimal

## Syntax Rules:

1. R020306 - At least one of TXI02, TXI03 or TXI06 is required.
2. P0405 - If either TXI04 or TXI05 is present, then the other is required.
3. C0803 - If TXI08 is present, then TXI03 is required.

## Semantics:

1. TXI02 is the monetary amount of the tax.
2. TXI03 is the tax percent expressed as a decimal.
3. TXI07 is a code indicating the relationship of the price or amount to the associated segment.

# Loop Product/Item Description

Pos: 060	Repeat: 1000
Optional	
Loop: PID	Elements: N/A

**User Option (Usage):** Must use

**Purpose:** To describe a product or process in coded or free-form format

## Loop Summary:

<u>Pos</u>	<u>Id</u>	<u>Segment Name</u>	<u>Req</u>	<u>Max Use</u>	<u>Repeat</u>	<u>Usage</u>
060	PID	Product/Item Description	O	1		Must use
070	MEA	Measurements	O	10		Must use

# PID Product/Item Description

Pos: 060	Max: 1
Detail - Optional	
Loop: PID	Elements: 2

**User Option (Usage):** Must use

**Purpose:** To describe a product or process in coded or free-form format

## Element Summary:

<u>Ref</u>	<u>Id</u>	<u>Element Name</u>	<u>Req</u>	<u>Type</u>	<u>Min/Max</u>	<u>Usage</u>				
PID01	349	Item Description Type	M	ID	1/1	Must use				
<b>Description:</b> Code indicating the format of a description										
<b>CodeList Summary</b> (Total Codes: 3, Included: 1)										
<table><tr><th><u>Code</u></th><th><u>Name</u></th></tr><tr><td>F</td><td>Free-form</td></tr></table>							<u>Code</u>	<u>Name</u>	F	Free-form
<u>Code</u>	<u>Name</u>									
F	Free-form									
PID05	352	Description	X	AN	1/80	Must use				
<b>Description:</b> A free-form description to clarify the related data elements and their content										

## Syntax Rules:

1. C0403 - If PID04 is present, then PID03 is required.
2. R0405 - At least one of PID04 or PID05 is required.
3. C0703 - If PID07 is present, then PID03 is required.
4. C0804 - If PID08 is present, then PID04 is required.
5. C0905 - If PID09 is present, then PID05 is required.

## Semantics:

1. Use PID03 to indicate the organization that publishes the code list being referred to.
2. PID04 should be used for industry-specific product description codes.
3. PID08 describes the physical characteristics of the product identified in PID04. A "Y" indicates that the specified attribute applies to this item; an "N" indicates it does not apply. Any other value is indeterminate.
4. PID09 is used to identify the language being used in PID05.

## Comments:

1. If PID01 equals "F", then PID05 is used. If PID01 equals "S", then PID04 is used. If PID01 equals "X", then both PID04 and PID05 are used.
2. Use PID06 when necessary to refer to the product surface or layer being described in the segment.
3. PID07 specifies the individual code list of the agency specified in PID03.

# MEA Measurements

Pos: 070	Max: 10
Detail - Optional	
Loop: PID	Elements: 6

**User Option (Usage):** Must use

**Purpose:** To specify physical measurements or counts, including dimensions, tolerances, variances, and weights(See Figures Appendix for example of use of C001)

## Element Summary:

<u>Ref</u>	<u>Id</u>	<u>Element Name</u>	<u>Req</u>	<u>Type</u>	<u>Min/Max</u>	<u>Usage</u>
MEA01	737	<b>Measurement Reference ID Code</b>	O	ID	2/2	Must use
<b>Description:</b> Code identifying the broad category to which a measurement applies <b>CodeList Summary</b> (Total Codes: 152, Included: 1) <u>Code</u> <u>Name</u> AA Meter reading-beginning actual/ending actual						
MEA02	738	<b>Measurement Qualifier</b>	O	ID	1/3	Must use
<b>Description:</b> Code identifying a specific product or process characteristic to which a measurement applies <b>CodeList Summary</b> (Total Codes: 920, Included: 1) <u>Code</u> <u>Name</u> MU Multiplier						
MEA03	739	<b>Measurement Value</b>	X	R	1/20	Must use
<b>Description:</b> The value of the measurement						
MEA04	C001	<b>Composite Unit of Measure</b>	X	Comp		Must use
<b>Description:</b> To identify a composite unit of measure(See Figures Appendix for examples of use)						
MEA04-01	355	<b>Unit or Basis for Measurement Code</b>	M	ID	2/2	Must use
<b>Description:</b> Code specifying the units in which a value is being expressed, or manner in which a measurement has been taken <b>CodeList Summary</b> (Total Codes: 794, Included: 1) <u>Code</u> <u>Name</u> KH Kilowatt Hour						
MEA05	740	<b>Range Minimum</b>	X	R	1/20	Must use
<b>Description:</b> The value specifying the minimum of the measurement range						
MEA06	741	<b>Range Maximum</b>	X	R	1/20	Must use
<b>Description:</b> The value specifying the maximum of the measurement range						

## Syntax Rules:

1. R03050608 - At least one of MEA03, MEA05, MEA06 or MEA08 is required.
2. C0504 - If MEA05 is present, then MEA04 is required.
3. C0604 - If MEA06 is present, then MEA04 is required.
4. L07030506 - If MEA07 is present, then at least one of MEA03, MEA05 or MEA06 is required.

5. E0803 - Only one of MEA08 or MEA03 may be present.

**Semantics:**

1. MEA04 defines the unit of measure for MEA03, MEA05, and MEA06.

**Comments:**

1. When citing dimensional tolerances, any measurement requiring a sign (+ or -), or any measurement where a positive (+) value cannot be assumed, use MEA05 as the negative (-) value and MEA06 as the positive (+) value.

# REF Reference Identification

Pos: 120	Max: >1
Detail - Optional	
Loop: IT1	Elements: 3

**User Option (Usage):** Must use

**Purpose:** To specify identifying information

## Element Summary:

<u>Ref</u>	<u>Id</u>	<u>Element Name</u>	<u>Req</u>	<u>Type</u>	<u>Min/Max</u>	<u>Usage</u>
REF01	128	Reference Identification Qualifier	M	ID	2/3	Must use

**Description:** Code qualifying the Reference Identification

**CodeList Summary** (Total Codes: 1503, Included: 1)

Code Name

MG Meter Number

REF02	127	Reference Identification	X	AN	1/30	Must use
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**Description:** Reference information as defined for a particular Transaction Set or as specified by the Reference Identification Qualifier

REF03	352	Description	X	AN	1/80	Must use
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**Description:** A free-form description to clarify the related data elements and their content

## Syntax Rules:

1. R0203 - At least one of REF02 or REF03 is required.

## Semantics:

1. REF04 contains data relating to the value cited in REF02.

# DTM Date/Time Reference

Pos: 150	Max: 10
Detail - Optional	
Loop: IT1	Elements: 2

**User Option (Usage):** Must use

**Purpose:** To specify pertinent dates and times

## Element Summary:

<u>Ref</u>	<u>Id</u>	<u>Element Name</u>	<u>Req</u>	<u>Type</u>	<u>Min/Max</u>	<u>Usage</u>
DTM01	374	Date/Time Qualifier	M	ID	3/3	Must use

**Description:** Code specifying type of date or time, or both date and time

**CodeList Summary** (Total Codes: 1112, Included: 2)

### Code Name

150 Service Period Start

151 Service Period End

DTM02	373	Date	X	DT	8/8	Must use
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**Description:** Date expressed as CCYYMMDD

## Syntax Rules:

1. R020305 - At least one of DTM02, DTM03 or DTM05 is required.
2. C0403 - If DTM04 is present, then DTM03 is required.
3. P0506 - If either DTM05 or DTM06 is present, then the other is required.

# Loop Service, Promotion, Allowance, or Charge Information

Pos: 180	Repeat: 25
Optional	
Loop: SAC	Elements: N/A

**User Option (Usage):** Must use

**Purpose:** To request or identify a service, promotion, allowance, or charge; to specify the amount or percentage for the service, promotion, allowance, or charge

## Loop Summary:

<u>Pos</u>	<u>Id</u>	<u>Segment Name</u>	<u>Req</u>	<u>Max Use</u>	<u>Repeat</u>	<u>Usage</u>
180	SAC	Service, Promotion, Allowance, or Charge Information	O	1		Must use



# SAC Service, Promotion, Allowance, or Charge Information

Pos: 180	Max: 1
Detail - Optional	
Loop: SAC	Elements: 9

**User Option (Usage):** Must use

**Purpose:** To request or identify a service, promotion, allowance, or charge; to specify the amount or percentage for the service, promotion, allowance, or charge

## Element Summary:

<u>Ref</u>	<u>Id</u>	<u>Element Name</u>	<u>Req</u>	<u>Type</u>	<u>Min/Max</u>	<u>Usage</u>
SAC01	248	<b>Allowance or Charge Indicator</b>	M	ID	1/1	Must use
<b>Description:</b> Code which indicates an allowance or charge for the service specified						
<b>CodeList Summary</b> (Total Codes: 7, Included: 2)						
<b><u>Code</u> <u>Name</u></b>						
C Charge						
N No Allowance or Charge						
SAC03	559	<b>Agency Qualifier Code</b>	X	ID	2/2	Must use
<b>Description:</b> Code identifying the agency assigning the code values						
<b>CodeList Summary</b> (Total Codes: 176, Included: 1)						
<b><u>Code</u> <u>Name</u></b>						
AS Assigned by Seller						
SAC04	1301	<b>Agency Service, Promotion, Allowance, or Charge Code</b>	X	AN	1/10	Must use
<b>Description:</b> Agency maintained code identifying the service, promotion, allowance, or charge						
SAC05	610	<b>Amount</b>	O	N2	1/15	Must use
<b>Description:</b> Monetary amount						
SAC08	118	<b>Rate</b>	O	R	1/9	Must use
<b>Description:</b> Rate expressed in the standard monetary denomination for the currency specified						
SAC09	355	<b>Unit or Basis for Measurement Code</b>	X	ID	2/2	Used
<b>Description:</b> Code specifying the units in which a value is being expressed, or manner in which a measurement has been taken						
<b>CodeList Summary</b> (Total Codes: 794, Included: 2)						
<b><u>Code</u> <u>Name</u></b>						
EA Each						
KH Kilowatt Hour						
SAC10	380	<b>Quantity</b>	X	R	1/15	Used
<b>Description:</b> Numeric value of quantity						

<u>Ref</u>	<u>Id</u>	<u>Element Name</u>	<u>Req</u>	<u>Type</u>	<u>Min/Max</u>	<u>Usage</u>
SAC12	331	<b>Allowance or Charge Method of Handling Code</b>	O	ID	2/2	Must use

**Description:** Code indicating method of handling for an allowance or charge

**CodeList Summary** (Total Codes: 22, Included: 1)

**Code Name**

06 Charge to be Paid by Customer

SAC15	352	<b>Description</b>	X	AN	1/80	Must use
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**Description:** A free-form description to clarify the related data elements and their content

### Syntax Rules:

1. R0203 - At least one of SAC02 or SAC03 is required.
2. P0304 - If either SAC03 or SAC04 is present, then the other is required.
3. P0607 - If either SAC06 or SAC07 is present, then the other is required.
4. P0910 - If either SAC09 or SAC10 is present, then the other is required.
5. C1110 - If SAC11 is present, then SAC10 is required.
6. L130204 - If SAC13 is present, then at least one of SAC02 or SAC04 is required.
7. C1413 - If SAC14 is present, then SAC13 is required.
8. C1615 - If SAC16 is present, then SAC15 is required.

### Semantics:

1. If SAC01 is "A" or "C", then at least one of SAC05, SAC07, or SAC08 is required.
2. SAC05 is the total amount for the service, promotion, allowance, or charge.
3. If SAC05 is present with SAC07 or SAC08, then SAC05 takes precedence.
4. SAC08 is the allowance or charge rate per unit.
5. SAC10 and SAC11 is the quantity basis when the allowance or charge quantity is different from the purchase order or invoice quantity.
6. SAC10 and SAC11 used together indicate a quantity range, which could be a dollar amount, that is applicable to service, promotion, allowance, or charge.
7. SAC13 is used in conjunction with SAC02 or SAC04 to provide a specific reference number as identified by the code used.
8. SAC14 is used in conjunction with SAC13 to identify an option when there is more than one option of the promotion.
9. SAC16 is used to identify the language being used in SAC15.

### Comments:

1. SAC04 may be used to uniquely identify the service, promotion, allowance, or charge. In addition, it may be used in conjunction to further the code in SAC02.
2. In some business applications, it is necessary to advise the trading partner of the actual dollar amount that a particular allowance, charge, or promotion was based on to reduce ambiguity. This amount is commonly referred to as "Dollar Basis Amount". It is represented in the SAC segment in SAC10 using the qualifier "DO" - Dollars in SAC09.

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# Loop Name

Pos: 240	Repeat: 200
Optional	
Loop: N1	Elements: N/A

**User Option (Usage):** Must use

**Purpose:** To identify a party by type of organization, name, and code

## Loop Summary:

<u>Pos</u>	<u>Id</u>	<u>Segment Name</u>	<u>Req</u>	<u>Max Use</u>	<u>Repeat</u>	<u>Usage</u>
240	N1	Name	O	1		Must use
260	N3	Address Information	O	2		Used
270	N4	Geographic Location	O	1		Used
290	PER	Administrative Communications Contact	O	3		Used

# N1 Name

<b>Pos: 240</b>	<b>Max: 1</b>
<b>Detail - Optional</b>	
<b>Loop: N1</b>	<b>Elements: 4</b>

**User Option (Usage):** Must use

**Purpose:** To identify a party by type of organization, name, and code

## Element Summary:

<u>Ref</u>	<u>Id</u>	<u>Element Name</u>	<u>Req</u>	<u>Type</u>	<u>Min/Max</u>	<u>Usage</u>
N101	98	<b>Entity Identifier Code</b>	M	ID	2/3	Must use
<b>Description:</b> Code identifying an organizational entity, a physical location, property or an individual  <b>CodeList Summary</b> (Total Codes: 1312, Included: 2) <u>Code</u> <u>Name</u> LD Liability Holder MQ Metering Location						
N102	93	<b>Name</b>	X	AN	1/60	Used
<b>Description:</b> Free-form name						
N103	66	<b>Identification Code Qualifier</b>	X	ID	1/2	Used
<b>Description:</b> Code designating the system/method of code structure used for Identification Code (67)  <b>CodeList Summary</b> (Total Codes: 215, Included: 1) <u>Code</u> <u>Name</u> 92 Assigned by Buyer or Buyer's Agent						
N104	67	<b>Identification Code</b>	X	AN	2/80	Used
<b>Description:</b> Code identifying a party or other code						

## Syntax Rules:

1. R0203 - At least one of N102 or N103 is required.
2. P0304 - If either N103 or N104 is present, then the other is required.

## Comments:

1. This segment, used alone, provides the most efficient method of providing organizational identification. To obtain this efficiency the "ID Code" (N104) must provide a key to the table maintained by the transaction processing party.
2. N105 and N106 further define the type of entity in N101.

# N3 Address Information

Pos: 260	Max: 2
Detail - Optional	
Loop: N1	Elements: 1

**User Option (Usage):** Used

**Purpose:** To specify the location of the named party

## Element Summary:

<u>Ref</u>	<u>Id</u>	<u>Element Name</u>	<u>Req</u>	<u>Type</u>	<u>Min/Max</u>	<u>Usage</u>
N301	166	Address Information	M	AN	1/55	Must use

**Description:** Address information

# N4 Geographic Location

Pos: 270	Max: 1
Detail - Optional	
Loop: N1	Elements: 3

**User Option (Usage):** Used

**Purpose:** To specify the geographic place of the named party

## Element Summary:

<u>Ref</u>	<u>Id</u>	<u>Element Name</u>	<u>Req</u>	<u>Type</u>	<u>Min/Max</u>	<u>Usage</u>
N401	19	<b>City Name</b>	O	AN	2/30	Must use
		<b>Description:</b> Free-form text for city name				
N402	156	<b>State or Province Code</b>	O	ID	2/2	Must use
		<b>Description:</b> Code (Standard State/Province) as defined by appropriate government agency				
N403	116	<b>Postal Code</b>	O	ID	3/15	Must use
		<b>Description:</b> Code defining international postal zone code excluding punctuation and blanks (zip code for United States)				

## Syntax Rules:

1. C0605 - If N406 is present, then N405 is required.

## Comments:

1. A combination of either N401 through N404, or N405 and N406 may be adequate to specify a location.
2. N402 is required only if city name (N401) is in the U.S. or Canada.

# PER Administrative Communications Contact

Pos: 290	Max: 3
Detail - Optional	
Loop: N1	Elements: 4

**User Option (Usage):** Used

**Purpose:** To identify a person or office to whom administrative communications should be directed

## Element Summary:

<u>Ref</u>	<u>Id</u>	<u>Element Name</u>	<u>Req</u>	<u>Type</u>	<u>Min/Max</u>	<u>Usage</u>
PER01	366	<b>Contact Function Code</b>	M	ID	2/2	Must use
<b>Description:</b> Code identifying the major duty or responsibility of the person or group named						
<b>CodeList Summary</b> (Total Codes: 230, Included: 1)						
<u>Code</u> <u>Name</u> CR   Customer Relations						
PER02	93	<b>Name</b>	O	AN	1/60	Must use
<b>Description:</b> Free-form name						
PER03	365	<b>Communication Number Qualifier</b>	X	ID	2/2	Must use
<b>Description:</b> Code identifying the type of communication number						
<b>CodeList Summary</b> (Total Codes: 40, Included: 1)						
<u>Code</u> <u>Name</u> TE   Telephone						
PER04	364	<b>Communication Number</b>	X	AN	1/80	Must use
<b>Description:</b> Complete communications number including country or area code when applicable						

## Syntax Rules:

1. P0304 - If either PER03 or PER04 is present, then the other is required.
2. P0506 - If either PER05 or PER06 is present, then the other is required.
3. P0708 - If either PER07 or PER08 is present, then the other is required.

# TDS Total Monetary Value Summary

Pos: 010	Max: 1
Summary - Mandatory	
Loop: N/A	Elements: 1

**User Option (Usage):** Must use

**Purpose:** To specify the total invoice discounts and amounts

## Element Summary:

<u>Ref</u>	<u>Id</u>	<u>Element Name</u>	<u>Req</u>	<u>Type</u>	<u>Min/Max</u>	<u>Usage</u>
TDS01	610	Amount	M	N2	1/15	Must use

**Description:** Monetary amount

## Semantics:

1. TDS01 is the total amount of invoice (including charges, less allowances) before terms discount (if discount is applicable).
2. TDS02 indicates the amount upon which the terms discount amount is calculated.
3. TDS03 is the amount of invoice due if paid by terms discount due date (total invoice or installment amount less cash discount).
4. TDS04 indicates the total amount of terms discount.

## Comments:

1. TDS02 is required if the dollar value subject to discount is not equal to the dollar value of TDS01.



# Loop Service, Promotion, Allowance, or Charge Information

Pos: 040	Repeat: 25
Optional	
Loop: SAC	Elements: N/A

**User Option (Usage):** Must use

**Purpose:** To request or identify a service, promotion, allowance, or charge; to specify the amount or percentage for the service, promotion, allowance, or charge

## Loop Summary:

<u>Pos</u>	<u>Id</u>	<u>Segment Name</u>	<u>Req</u>	<u>Max Use</u>	<u>Repeat</u>	<u>Usage</u>
040	SAC	Service, Promotion, Allowance, or Charge Information	O	1		Must use

# SAC Service, Promotion, Allowance, or Charge Information

Pos: 040	Max: 1
Summary - Optional	
Loop: SAC	Elements: 6

**User Option (Usage):** Must use

**Purpose:** To request or identify a service, promotion, allowance, or charge; to specify the amount or percentage for the service, promotion, allowance, or charge

## Element Summary:

Ref	Id	Element Name	Req	Type	Min/Max	Usage
SAC01	248	Allowance or Charge Indicator	M	ID	1/1	Must use

**Description:** Code which indicates an allowance or charge for the service specified

**CodeList Summary** (Total Codes: 7, Included: 2)

Code	Name
C	Charge
N	No Allowance or Charge

SAC03	559	Agency Qualifier Code	X	ID	2/2	Must use
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**Description:** Code identifying the agency assigning the code values

**CodeList Summary** (Total Codes: 176, Included: 1)

Code	Name
AS	Assigned by Seller

SAC04	1301	Agency Service, Promotion, Allowance, or Charge Code	X	AN	1/10	Must use
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**Description:** Agency maintained code identifying the service, promotion, allowance, or charge

SAC05	610	Amount	O	N2	1/15	Must use
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**Description:** Monetary amount

SAC12	331	Allowance or Charge Method of Handling Code	O	ID	2/2	Must use
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**Description:** Code indicating method of handling for an allowance or charge

**CodeList Summary** (Total Codes: 22, Included: 2)

Code	Name
04	Credit Customer Account
06	Charge to be Paid by Customer

SAC15	352	Description	X	AN	1/80	Must use
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**Description:** A free-form description to clarify the related data elements and their content

## Syntax Rules:

1. R0203 - At least one of SAC02 or SAC03 is required.
2. P0304 - If either SAC03 or SAC04 is present, then the other is required.

3. P0607 - If either SAC06 or SAC07 is present, then the other is required.
4. P0910 - If either SAC09 or SAC10 is present, then the other is required.
5. C1110 - If SAC11 is present, then SAC10 is required.
6. L130204 - If SAC13 is present, then at least one of SAC02 or SAC04 is required.
7. C1413 - If SAC14 is present, then SAC13 is required.
8. C1615 - If SAC16 is present, then SAC15 is required.

**Semantics:**

1. If SAC01 is "A" or "C", then at least one of SAC05, SAC07, or SAC08 is required.
2. SAC05 is the total amount for the service, promotion, allowance, or charge.
3. If SAC05 is present with SAC07 or SAC08, then SAC05 takes precedence.
4. SAC08 is the allowance or charge rate per unit.
5. SAC10 and SAC11 is the quantity basis when the allowance or charge quantity is different from the purchase order or invoice quantity.
6. SAC10 and SAC11 used together indicate a quantity range, which could be a dollar amount, that is applicable to service, promotion, allowance, or charge.
7. SAC13 is used in conjunction with SAC02 or SAC04 to provide a specific reference number as identified by the code used.
8. SAC14 is used in conjunction with SAC13 to identify an option when there is more than one option of the promotion.
9. SAC16 is used to identify the language being used in SAC15.

**Comments:**

1. SAC04 may be used to uniquely identify the service, promotion, allowance, or charge. In addition, it may be used in conjunction to further the code in SAC02.
2. In some business applications, it is necessary to advise the trading partner of the actual dollar amount that a particular allowance, charge, or promotion was based on to reduce ambiguity. This amount is commonly referred to as "Dollar Basis Amount". It is represented in the SAC segment in SAC10 using the qualifier "DO" - Dollars in SAC09.

# CTT Transaction Totals

Pos: 070	Max: 1
Summary - Optional	
Loop: N/A	Elements: 1

**User Option (Usage):** Must use

**Purpose:** To transmit a hash total for a specific element in the transaction set

## Element Summary:

<u>Ref</u>	<u>Id</u>	<u>Element Name</u>	<u>Req</u>	<u>Type</u>	<u>Min/Max</u>	<u>Usage</u>
CTT01	354	Number of Line Items	M	N0	1/6	Must use

**Description:** Total number of line items in the transaction set

## Syntax Rules:

1. P0304 - If either CTT03 or CTT04 is present, then the other is required.
2. P0506 - If either CTT05 or CTT06 is present, then the other is required.

## Comments:

1. This segment is intended to provide hash totals to validate transaction completeness and correctness.

# SE Transaction Set Trailer

Pos: 080	Max: 1
Summary - Mandatory	
Loop: N/A	Elements: 2

**User Option (Usage):** Must use

**Purpose:** To indicate the end of the transaction set and provide the count of the transmitted segments (including the beginning (ST) and ending (SE) segments)

## Element Summary:

<u>Ref</u>	<u>Id</u>	<u>Element Name</u>	<u>Req</u>	<u>Type</u>	<u>Min/Max</u>	<u>Usage</u>
SE01	96	Number of Included Segments	M	N0	1/10	Must use
<b>Description:</b> Total number of segments included in a transaction set including ST and SE segments						
SE02	329	Transaction Set Control Number	M	AN	4/9	Must use
<b>Description:</b> Identifying control number that must be unique within the transaction set functional group assigned by the originator for a transaction set						

## Comments:

1. SE is the last segment of each transaction set.