856 Ship Notice/Manifest

Functional Group ID=SH

Introduction:

This Draft Standard for Trial Use contains the format and establishes the data contents of the Ship Notice/Manifest Transaction Set (856) for use within the context of an Electronic Data Interchange (EDI) environment. The transaction set can be used to list the contents of a shipment of goods as well as additional information relating to the shipment, such as order information, product description, physical characteristics, type of packaging, marking, carrier information, and configuration of goods within the transportation equipment. The transaction set enables the sender to describe the contents and configuration of a shipment in various levels of detail and provides an ordered flexibility to convey information. The sender of this transaction is the organization responsible for detailing and communicating the contents of a shipment, or shipments, to one or more receivers of the transaction set. The receiver of this transaction set can be any organization having an interest in the contents of a shipment or information about the contents of a shipment.

Heading:

User Attribute	Pos. No.	Seg. ID	Name	Req. Des.	Max.Use	Loop Repeat	Notes and Comments
M	010	ST	Transaction Set Header	M	1		
M	020	BSN	Beginning Segment for Ship Notice	M	1		

Detail:

User Attribute	Pos. No.	Seg. ID	Name	Req. Des.	Max.Use	Loop Repeat	Notes and Comments
			LOOP ID - HL			200000	
M	010	HL	Hierarchical Level - Shipment Level	M	1		
M	110	TD1	Carrier Details (Quantity and Weight)	M	20		
M	120	TD5	Carrier Details (Routing Sequence/Transit Time)	M	12		
M	130	TD3	Carrier Details (Equipment)	M	12		
M	150	REF	Reference Identification	M	>1		
M	200	DTM	Date/Time Reference	M	10		
			LOOP ID - N1			200	
M	220	N1	Name	M	1		
	240	N3	Address Information	O	2		
	250	N4	Geographic Location	O	1		

Detail:

User Attribute	Pos. No.	Seg. ID	Name	Req. Des.	Max.Use	Loop Repeat	Notes and Comments
			LOOP ID - HL			200000	
M	010	HL	Hierarchical Level - Order Level	M	1		n1
M	050	PRF	Purchase Order Reference	M	1		
M	110	TD1	Carrier Details (Quantity and Weight)	M	20		
M	150	REF	Reference Identification	M	>1		
			LOOP ID - N1			200	
M	220	N1	Name	M	1		

Detail:

User Attribute	Pos. No.	Seg. ID	Name	Req. Des.	Max.Use	Loop Repeat	Notes and Comments
			LOOP ID - HL			200000	
M	010	HL	Hierarchical Level - Carton Level	M	1		
M	060	PO4	Item Physical Details	M	1		
M	190	MAN	Marks and Numbers	M	>1		

Detail:

User Attribute	Pos. No.	Seg. ID	Name	Req. Des.	Max.Use	Loop Repeat	Notes and Comments
			LOOP ID - HL			200000	
M	010	HL	Hierarchical Level - Item	M	1		
M	020	LIN	Item Identification	M	1		
M	030	SN1	Item Detail (Shipment)	M	1		

Summary:

User Attribute	Pos. No.	Seg. ID	Name	Req. Des.	Max.Use	Loop Repeat	Notes and Comments
M	010	CTT	Transaction Totals	M	1		
M	020	SE	Transaction Set Trailer	M	1		

Transaction Set Notes

1. Number of line items (CTT01) is the accumulation of the number of HL segments. If used, hash total (CTT02) is the sum of the value of units shipped (SN102) for each SN1 segment.

Segment: **ST** **Transaction Set Header**
Position: 010
Loop:
Level: Heading
Usage: Must Use
Max Use: 1
Purpose: To indicate the start of a transaction set and to assign a control number
Syntax Notes:
Comments:

Data Element Summary

Ref. Des.	Data Element	Name		Attributes
ST01	**143**	**Transaction Set Identifier Code** Code uniquely identifying a Transaction Set 856 Ship Notice/Manifest	**M**	**ID 3/3**
ST02	**329**	**Transaction Set Control Number** Identifying control number that must be unique within the transaction set functional group assigned by the originator for a transaction set **Hub Distributing Comments:** The number is sequentially assigned by the sender, starting with one within each functional group. For each functional group, the first transaction set control number will be 0001 and incremented by one for each additional transaction set within the group.	**M**	**AN 4/9**

Segment: **BSN** **Beginning Segment for Ship Notice**
Position: 020
Loop:
Level: Heading
Usage: Must Use
Max Use: 1
Purpose: To transmit identifying numbers, dates, and other basic data relating to the transaction set
Syntax Notes: **1** If BSN07 is present, then BSN06 is required.
Comments: **1** BSN06 and BSN07 differentiate the functionality of use for the transaction set.
Notes: **Hub Distributing Comments**

In some implementations, it may be appropriate to omit the unit load level and packaging levels, i.e., tare and pack, from the transaction set. Depending on the retailer's receiving systems, carton identification may not be required. Code 0004 in BSN05 indicates the use of a hierarchical structure that does not include a unit load level or any packaging levels.

Data Element Summary

Ref. Des.	Data Element	Name		Attributes
BSN01	**353**	**Transaction Set Purpose Code**	**M**	**ID 2/2**
		Code identifying purpose of transaction set		
		00 Original		
		03 Delete		
		EX Final Loading Configuration		
BSN02	**396**	**Shipment Identification**	**M**	**AN 2/30**
		A unique control number assigned by the original shipper to identify a specific shipment		
BSN03	**373**	**Date**	**M**	**DT 8/8**
		Date expressed as CCYYMMDD		
BSN04	**337**	**Time**	**M**	**TM 4/8**
		Time expressed in 24-hour clock time as follows: HHMM, or HHMMSS		
BSN05	**1005**	**Hierarchical Structure Code**		**ID 4/4**
		Code indicating the hierarchical application structure of a transaction set that utilizes the HL segment to define the structure of the transaction set		
		0001 Shipment, Order, Packaging, Item		

Segment: **HL** **Hierarchical Level - Shipment Level**
Position: 010
Loop: HL
Level: Detail
Usage: Must Use
Max Use: 1
Purpose: To identify dependencies among and the content of hierarchically related groups of data segments
Syntax Notes:
Comments:
1 The HL segment is used to identify levels of detail information using a hierarchical structure, such as relating line-item data to shipment data, and packaging data to line-item data.
The HL segment defines a top-down/left-right ordered structure.
2 HL01 shall contain a unique alphanumeric number for each occurrence of the HL segment in the transaction set. For example, HL01 could be used to indicate the number of occurrences of the HL segment, in which case the value of HL01 would be "1" for the initial HL segment and would be incremented by one in each subsequent HL segment within the transaction.
3 HL02 identifies the hierarchical ID number of the HL segment to which the current HL segment is subordinate.
4 HL03 indicates the context of the series of segments following the current HL segment up to the next occurrence of an HL segment in the transaction. For example, HL03 is used to indicate that subsequent segments in the HL loop form a logical grouping of data referring to shipment, order, or item-level information.
5 HL04 indicates whether or not there are subordinate (or child) HL segments related to the current HL segment.
Notes: **Hub Distributing Comments**

The HL segment is used to identify levels of detail information using a hierarchical structure.

HL01 shall contain a unique number for each occurrence of the HL segment within the transaction set. The value assigned to the first HL segment will be 1, and is incremented by one for each subsequent HL segment within the transaction set.

HL02 identifies the hierarchical ID of the HL segment to which it is subordinate (child of). HL02 will be omitted for the first occurrence of the HL segment in the transaction set, since it has no parent. HL03 identifies the application content of the series of segments following the current HL segment up to the next occurrence of an HL segment, or the CTT or SE segment, e.g., Shipment, Unit Load, Order, Tare, Pack and Item.

Data Element Summary

Ref. Des.	Data Element	Name	Attributes
HL01	**628**	**Hierarchical ID Number** A unique number assigned by the sender to identify a particular data segment in a hierarchical structure **Hub Distributing Comments:** The value for this level (shipment) is 1.	**M AN 1/12**
HL02	**734**	**Hierarchical Parent ID Number** Identification number of the next higher hierarchical data segment that the data segment being described is subordinate to	**AN 1/12**
HL03	**735**	**Hierarchical Level Code** Code defining the characteristic of a level in a hierarchical structure S Shipment	**M ID 1/2**

Segment: **TD1** **Carrier Details (Quantity and Weight)**
Position: 110
Loop: HL
Level: Detail
Usage: Must Use
Max Use: 20
Purpose: To specify the transportation details relative to commodity, weight, and quantity
Syntax Notes:
1 If TD101 is present, then TD102 is required.
2 If TD103 is present, then TD104 is required.
3 If TD106 is present, then TD107 is required.
4 If either TD107 or TD108 is present, then the other is required.
5 If either TD109 or TD110 is present, then the other is required.
Comments:
Notes: **Hub Distributing Comments**

This segment, at the shipment level, is used to specify total containers and gross weight of the shipment.

Data Element Summary

Ref. Des.	Data Element	Name		Attributes
TD101	**103**	**Packaging Code**	**M**	**AN 3/5**
		Code identifying the type of packaging; Part 1: Packaging Form, Part 2: Packaging Material; if the Data Element is used, then Part 1 is always required		
		BAG79 Plastic Bag - Hanging		
		CTN25 Corrugated Carton		
		PLT25 Corrugated Pallet		
TD102	**80**	**Lading Quantity**	**M**	**N0 1/7**
		Number of units (pieces) of the lading commodity		
		Hub Distributing Comments:		
		The total number of cartons on the shipment.		
TD106	**187**	**Weight Qualifier**		**ID 1/2**
		Code defining the type of weight		
		G Gross Weight		
TD107	**81**	**Weight**		**R 1/10**
		Numeric value of weight		
		Hub Distributing Comments:		
		The total weight of the order.		
TD108	**355**	**Unit or Basis for Measurement Code**		**ID 2/2**
		Code specifying the units in which a value is being expressed, or manner in which a measurement has been taken		
		Hub Distributing Comments:		
		See Section III for code list.		
		LB Pound		

Segment: **TD5** **Carrier Details (Routing Sequence/Transit Time)**
Position: 120
Loop: HL
Level: Detail
Usage: Must Use
Max Use: 12
Purpose: To specify the carrier and sequence of routing and provide transit time information
Syntax Notes:
1 At least one of TD502 TD504 TD505 TD506 or TD512 is required.
2 If TD502 is present, then TD503 is required.
3 If TD507 is present, then TD508 is required.
4 If TD510 is present, then TD511 is required.
5 If TD513 is present, then TD512 is required.
6 If TD514 is present, then TD513 is required.
7 If TD515 is present, then TD512 is required.
Comments:
1 When specifying a routing sequence to be used for the shipment movement in lieu of specifying each carrier within the movement, use TD502 to identify the party responsible for defining the routing sequence, and use TD503 to identify the actual routing sequence, specified by the party identified in TD502.
Notes: **Hub Distributing Comments**

This segment is used to specify every carrier in the routing sequence or a specific routing sequence that has been previously identified (usually from a routing guide). The segment can also be used to indicate estimated transit time in days. Only use TD501 if needed for clarity; this is not a requirement in most retail applications. When referring to a pre-established routing guide, use code 91 or 92 in TD502 and identify the routing sequence, from the routing guide, in TD503. To identify a specific private parcel service, TD502 will contain code 2 and TD503 will contain the corresponding SCAC. TD510 and TD511 are used to specify transit time.

When using a small package service provider as the carrier, TD502 will contain code 2, TD503 will contain the carrier's SCAC, and TD504 will contain code U to inform the receiver of a small package service shipment.

Data Element Summary

Ref. Des.	Data Element	Name		Attributes
TD501	**133**	**Routing Sequence Code**	**M**	**ID 1/2**
		Code describing the relationship of a carrier to a specific shipment movement		
		O Origin Carrier (Air, Motor, or Ocean)		
TD502	**66**	**Identification Code Qualifier**	**M**	**ID 1/2**
		Code designating the system/method of code structure used for Identification Code (67)		
		2 Standard Carrier Alpha Code (SCAC)		
TD503	**67**	**Identification Code**	**M**	**AN 2/80**
		Code identifying a party or other code		
		Hub Distributing Comments:		
		This will be the 4 digit SCAC code to identify the carrier. The internet has various listings that you can use.		
TD504	**91**	**Transportation Method/Type Code**	**M**	**ID 1/2**
		Code specifying the method or type of transportation for the shipment		
		A Air		
		M Motor (Common Carrier)		
		O Containerized Ocean		
TD505	**387**	**Routing**		**AN 1/35**
		Free-form description of the routing or requested routing for shipment, or the originating carrier's identity		
		Hub Distributing Comments:		

Free-form information.

Segment: **TD3** **Carrier Details (Equipment)**
Position: 130
Loop: HL
Level: Detail
Usage: Must Use
Max Use: 12
Purpose: To specify transportation details relating to the equipment used by the carrier
Syntax Notes:
1 Only one of TD301 or TD310 may be present.
2 If TD302 is present, then TD303 is required.
3 If TD304 is present, then TD305 is required.
4 If either TD305 or TD306 is present, then the other is required.
Comments:
Notes: **Hub Distributing Comments**

This segment is used to specify the trailer number for a truckload shipment.

Data Element Summary

Ref. Des.	Data Element	Name		Attributes
TD301	**40**	**Equipment Description Code** Code identifying type of equipment used for shipment CN Container TL Trailer (not otherwise specified)	**M**	**ID 2/2**
TD302	**206**	**Equipment Initial** Prefix or alphabetic part of an equipment unit's identifying number **Hub Distributing Comments:**		**AN 1/4**
TD303	**207**	**Equipment Number** Sequencing or serial part of an equipment unit's identifying number (pure numeric form for equipment number is preferred)	**M**	**AN 1/10**

Segment: **REF** **Reference Identification**
Position: 150
Loop: HL
Level: Detail
Usage: Must Use
Max Use: >1
Purpose: To specify identifying information
Syntax Notes:
1 At least one of REF02 or REF03 is required.
2 If either C04003 or C04004 is present, then the other is required.
3 If either C04005 or C04006 is present, then the other is required.
Comments:
Notes: **Hub Distributing Comments**

In some cases, individual shipments with bill of lading may be grouped under a Master Bill of Lading. Under this circumstance, specifying both the bill of lading and the associated Master Bill of Lading Number will facilitate tracking.

Data Element Summary

Ref. Des.	Data Element	Name		Attributes
REF01	**128**	**Reference Identification Qualifier**	**M**	**ID 2/3**
		Code qualifying the Reference Identification		
		4C	Shipment Destination Code	
		AC	Air Cargo Transfer Manifest	
		AW	Air Waybill Number	
		BM	Bill of Lading Number	
		CN	Carrier's Reference Number (PRO/Invoice)	
REF02	**127**	**Reference Identification**	**M**	**AN 1/30**
		Reference information as defined for a particular Transaction Set or as specified by the Reference Identification Qualifier		
		Hub Distributing Comments:		
		Required When REF01 = BM, then REF02 must be Bill of Lading number . Optional When REF01 = 4C, then REF02 must be Hub's default ship to destination 0801. When REF01 = AC, then REF02 must be Master Airway Bill (MAWB). When REF01 = AW, then REF02 must be House Airway Bill (HAWB).		

Segment: **DTM** **Date/Time Reference**
Position: 200
Loop: HL
Level: Detail
Usage: Must Use
Max Use: 10
Purpose: To specify pertinent dates and times
Syntax Notes:
1 At least one of DTM02 DTM03 or DTM05 is required.
2 If DTM04 is present, then DTM03 is required.
3 If either DTM05 or DTM06 is present, then the other is required.
Comments:

Data Element Summary

Ref. Des.	Data Element	Name			Attributes
DTM01	**374**	**Date/Time Qualifier**		**M**	**ID 3/3**
		Code specifying type of date or time, or both date and time			
		011	Shipped		
		017	Estimated Delivery		
		370	Actual Departure Date		
		371	Estimated Arrival Date		
DTM02	**373**	**Date**		**M**	**DT 8/8**
		Date expressed as CCYYMMDD			
DTM03	**337**	**Time**			**TM 4/8**
		Time expressed in 24-hour clock time as follows: HHMM, or HHMMSS			

Segment: **N1** **Name**
Position: 220
Loop: HL-N1
Level: Detail
Usage: Must Use
Max Use: 1
Purpose: To identify a party by type of organization, name, and code
Syntax Notes:
1 At least one of N102 or N103 is required.
2 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.
Notes: **Hub Distributing Comments**

The ST and SF are both required.

Data Element Summary

Ref. Des.	Data Element	Name			Attributes
N101	**98**	**Entity Identifier Code**		**M**	**ID 2/3**
		Code identifying an organizational entity, a physical location, property or an individual			
		SF	Ship From		
		ST	Ship To		
N102	**93**	**Name**		**M**	**AN 1/60**
		Free-form name			
		Hub Distributing Comments:			
		Both are required When N1_01 = ST, then the N1_02 should be Hub Distributing When N1_01 = SF, then the N1_02 should be Vendor's Name.			
N103	**66**	**Identification Code Qualifier**		**M**	**ID 1/2**
		Code designating the system/method of code structure used for Identification Code (67)			
		91	Assigned by Seller or Seller's Agent		
		92	Assigned by Buyer or Buyer's Agent		
N104	**67**	**Identification Code**		**M**	**AN 2/80**
		Code identifying a party or other code			
		Hub Distributing Comments:			
		When N1_01 = ST, then N1_04 will be 0801 (Hub's Warehouse Code). When N1_01 = SF, then N1_04 will be the vendors' name or code for the "shippoing point"			

Segment: **N3** **Address Information**
Position: 240
Loop: HL-N1
Level: Detail
Usage: Optional
Max Use: 2
Purpose: To specify the location of the named party
Syntax Notes:
Comments:

Data Element Summary

Ref. Des.	Data Element	Name	Attributes
N301	**166**	**Address Information** Address information **Hub Distributing Comments:** 100 Shea Center Drive	**AN 1/55**
N302	**166**	**Address Information** Address information **Hub Distributing Comments:** PO Box 5996	**AN 1/55**

Segment: **N4** **Geographic Location**
Position: 250
Loop: HL-N1
Level: Detail
Usage: Optional
Max Use: 1
Purpose: To specify the geographic place of the named party
Syntax Notes: **1** 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.
Notes: **Hub Distributing Comments**
N401 and N402 are required unless N405 and N406 are used.

Data Element Summary

Ref. Des.	Data Element	Name	Attributes
N401	**19**	**City Name** Free-form text for city name **Hub Distributing Comments:** Ontario	**AN 2/30**
N402	**156**	**State or Province Code** Code (Standard State/Province) as defined by appropriate government agency **Hub Distributing Comments:** CA	**ID 2/2**
N403	**116**	**Postal Code** Code defining international postal zone code excluding punctuation and blanks (zip code for United States) **Hub Distributing Comments:** 917617834	**ID 3/15**
N404	**26**	**Country Code** Code identifying the country	**ID 2/3**

Segment: **HL** **Hierarchical Level - Order Level**
Position: 010
Loop: HL
Level: Detail
Usage: Must Use
Max Use: 1
Purpose: To identify dependencies among and the content of hierarchically related groups of data segments
Syntax Notes:
Comments:
1 The HL segment is used to identify levels of detail information using a hierarchical structure, such as relating line-item data to shipment data, and packaging data to line-item data.
The HL segment defines a top-down/left-right ordered structure.
2 HL01 shall contain a unique alphanumeric number for each occurrence of the HL segment in the transaction set. For example, HL01 could be used to indicate the number of occurrences of the HL segment, in which case the value of HL01 would be "1" for the initial HL segment and would be incremented by one in each subsequent HL segment within the transaction.
3 HL02 identifies the hierarchical ID number of the HL segment to which the current HL segment is subordinate.
4 HL03 indicates the context of the series of segments following the current HL segment up to the next occurrence of an HL segment in the transaction. For example, HL03 is used to indicate that subsequent segments in the HL loop form a logical grouping of data referring to shipment, order, or item-level information.
5 HL04 indicates whether or not there are subordinate (or child) HL segments related to the current HL segment.

Notes: **Hub Distributing Comments**

The HL segment is used to identify levels of detail information using a hierarchical structure.

HL01 shall contain a unique number for each occurrence of the HL segment within the transaction set. The value assigned to the first HL segment will be 1, and is incremented by one for each subsequent HL segment within the transaction set.

HL02 identifies the hierarchical ID of the HL segment to which it is subordinate (child of). HL02 will be omitted for the first occurrence of the HL segment in the transaction set, since it has no parent. HL03 identifies the application content of the series of segments following the current HL segment up to the next occurrence of an HL segment, or the CTT or SE segment, e.g., Shipment, Unit Load, Order, Tare, Pack and Item.

Data Element Summary

Ref. Des.	Data Element	Name		Attributes
HL01	**628**	**Hierarchical ID Number** A unique number assigned by the sender to identify a particular data segment in a hierarchical structure	**M**	**AN 1/12**
HL02	**734**	**Hierarchical Parent ID Number** Identification number of the next higher hierarchical data segment that the data segment being described is subordinate to	**M**	**AN 1/12**
HL03	**735**	**Hierarchical Level Code** Code defining the characteristic of a level in a hierarchical structure O Order	**M**	**ID 1/2**

Segment: **PRF** **Purchase Order Reference**
Position: 050
Loop: HL
Level: Detail
Usage: Must Use
Max Use: 1
Purpose: To provide reference to a specific purchase order
Syntax Notes:
Comments:

Data Element Summary

Ref. Des.	Data Element	Name		Attributes
PRF01	**324**	**Purchase Order Number** Identifying number for Purchase Order assigned by the orderer/purchaser **Hub Distributing Comments:** Hub's 9 digit Purchase Order Number.	**M**	**AN 1/22**
PRF02	**328**	**Release Number** Number identifying a release against a Purchase Order previously placed by the parties involved in the transaction		**AN 1/30**
PRF03	**327**	**Change Order Sequence Number** Number assigned by the orderer identifying a specific change or revision to a previously transmitted transaction set		**AN 1/8**
PRF04	**373**	**Date** Date expressed as CCYYMMDD		**DT 8/8**

Segment: **TD1** **Carrier Details (Quantity and Weight)**
Position: 110
Loop: HL
Level: Detail
Usage: Must Use
Max Use: 20
Purpose: To specify the transportation details relative to commodity, weight, and quantity
Syntax Notes:
1 If TD101 is present, then TD102 is required.
2 If TD103 is present, then TD104 is required.
3 If TD106 is present, then TD107 is required.
4 If either TD107 or TD108 is present, then the other is required.
5 If either TD109 or TD110 is present, then the other is required.
Comments:

Data Element Summary

Ref. Des.	Data Element	Name		Attributes
TD101	**103**	**Packaging Code**	**M**	**AN 3/5**
		Code identifying the type of packaging; Part 1: Packaging Form, Part 2: Packaging Material; if the Data Element is used, then Part 1 is always required BAG79 Plastic Bag - Hanging CTN25 Corrugated Carton PLT25 Corrugated Pallet		
TD102	**80**	**Lading Quantity**	**M**	**N0 1/7**
		Number of units (pieces) of the lading commodity **Hub Distributing Comments:** The total number of cartons for this Purchase Order.		
TD106	**187**	**Weight Qualifier**		**ID 1/2**
		Code defining the type of weight		
TD107	**81**	**Weight**		**R 1/10**
		Numeric value of weight		
TD108	**355**	**Unit or Basis for Measurement Code**		**ID 2/2**
		Code specifying the units in which a value is being expressed, or manner in which a measurement has been taken LB Pound		

Segment: **REF** **Reference Identification**
Position: 150
Loop: HL
Level: Detail
Usage: Must Use
Max Use: >1
Purpose: To specify identifying information
Syntax Notes:
1 At least one of REF02 or REF03 is required.
2 If either C04003 or C04004 is present, then the other is required.
3 If either C04005 or C04006 is present, then the other is required.
Comments:

Data Element Summary

Ref. Des.	Data Element	Name		Attributes
REF01	**128**	**Reference Identification Qualifier**	**M**	**ID 2/3**
		Code qualifying the Reference Identification		
		DP	Department Number	
		IT	Internal Customer Number	
		IV	Seller's Invoice Number	
		VN	Vendor Order Number	
REF02	**127**	**Reference Identification**	**M**	**AN 1/30**
		Reference information as defined for a particular Transaction Set or as specified by the Reference Identification Qualifier		

Hub Distributing Comments:

Required:
When REF_01= IT, then REF_02 will be Hub's Internal Customer Number for the Vendor.

Optional :
When REF_01 = VN, then REF_02 will be Vendor's Order Number.
When REF_01 = IV, then REF_02 will be Vendors's Invoice Number.
When REF_01 = DP, then REF_02 will be the Buyer's Department Number.

Segment: **N1** **Name**
Position: 220
Loop: HL-N1
Level: Detail
Usage: Must Use
Max Use: 1
Purpose: To identify a party by type of organization, name, and code
Syntax Notes:
1 At least one of N102 or N103 is required.
2 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.

Data Element Summary

Ref. Des.	Data Element	Name		Attributes
N101	**98**	**Entity Identifier Code** Code identifying an organizational entity, a physical location, property or an individual BY Buying Party (Purchaser)	**M**	**ID 2/3**
N102	**93**	**Name** Free-form name **Hub Distributing Comments:** Hub Distributing Inc.	**M**	**AN 1/60**
N103	**66**	**Identification Code Qualifier** Code designating the system/method of code structure used for Identification Code (67) 92 Assigned by Buyer or Buyer's Agent		**ID 1/2**
N104	**67**	**Identification Code** Code identifying a party or other code **Hub Distributing Comments:** Hub's 4 or 5 digit store number for "Marked For" Purchase Orders Hub's Warehouse Code for non "Marked For" 0801	**M**	**AN 2/80**

Segment: **HL** **Hierarchical Level - Carton Level**
Position: 010
Loop: HL
Level: Detail
Usage: Must Use
Max Use: 1
Purpose: To identify dependencies among and the content of hierarchically related groups of data segments
Syntax Notes:
Comments:
1 The HL segment is used to identify levels of detail information using a hierarchical structure, such as relating line-item data to shipment data, and packaging data to line-item data.
The HL segment defines a top-down/left-right ordered structure.
2 HL01 shall contain a unique alphanumeric number for each occurrence of the HL segment in the transaction set. For example, HL01 could be used to indicate the number of occurrences of the HL segment, in which case the value of HL01 would be "1" for the initial HL segment and would be incremented by one in each subsequent HL segment within the transaction.
3 HL02 identifies the hierarchical ID number of the HL segment to which the current HL segment is subordinate.
4 HL03 indicates the context of the series of segments following the current HL segment up to the next occurrence of an HL segment in the transaction. For example, HL03 is used to indicate that subsequent segments in the HL loop form a logical grouping of data referring to shipment, order, or item-level information.
5 HL04 indicates whether or not there are subordinate (or child) HL segments related to the current HL segment.
Notes: **Hub Distributing Comments**

The HL segment is used to identify levels of detail information using a hierarchical structure.

HL01 shall contain a unique number for each occurrence of the HL segment within the transaction set. The value assigned to the first HL segment will be 1, and is incremented by one for each subsequent HL segment within the transaction set.

HL02 identifies the hierarchical ID of the HL segment to which it is subordinate (child of). HL02 will be omitted for the first occurrence of the HL segment in the transaction set, since it has no parent. HL03 identifies the application content of the series of segments following the current HL segment up to the next occurrence of an HL segment, or the CTT or SE segment, e.g., Shipment, Unit Load, Order, Tare, Pack and Item.

Data Element Summary

Ref. Des.	Data Element	Name		Attributes
HL01	**628**	**Hierarchical ID Number**	**M**	**AN 1/12**
		A unique number assigned by the sender to identify a particular data segment in a hierarchical structure		
HL02	**734**	**Hierarchical Parent ID Number**	**M**	**AN 1/12**
		Identification number of the next higher hierarchical data segment that the data segment being described is subordinate to		
HL03	**735**	**Hierarchical Level Code**	**M**	**ID 1/2**
		Code defining the characteristic of a level in a hierarchical structure		
		P Pack		

Segment: **PO4** **Item Physical Details**
Position: 060
Loop: HL
Level: Detail
Usage: Must Use
Max Use: 1
Purpose: To specify the physical qualities, packaging, weights, and dimensions relating to the item
Syntax Notes:
1 If either PO402 or PO403 is present, then the other is required.
2 If PO405 is present, then PO406 is required.
3 If either PO406 or PO407 is present, then the other is required.
4 If either PO408 or PO409 is present, then the other is required.
5 If PO410 is present, then PO413 is required.
6 If PO411 is present, then PO413 is required.
7 If PO412 is present, then PO413 is required.
8 If PO413 is present, then at least one of PO410 PO411 or PO412 is required.
9 If PO417 is present, then PO416 is required.
10 If PO418 is present, then PO404 is required.
Comments:
1 PO403 - The "Unit or Basis for Measure Code" in this segment position is for purposes of defining the pack (PO401) /size (PO402) measure which indicates the quantity in the inner pack unit. For example: If the carton contains 24 12-Ounce packages, it would be described as follows: Data element 356 = "24"; Data element 357 = "12"; Data element 355 = "OZ".
2 PO413 defines the unit of measure for PO410, PO411, and PO412.

Data Element Summary

Ref. Des.	Data Element	Name		Attributes
PO401	**356**	**Pack** The number of inner containers, or number of eaches if there are no inner containers, per outer container	**M**	**N0 1/6**
PO402	**357**	**Size** Size of supplier units in pack	**M**	**R 1/8**
PO405	**187**	**Weight Qualifier** Code defining the type of weight G Gross Weight		**ID 1/2**
PO406	**384**	**Gross Weight per Pack** Numeric value of gross weight per pack		**R 1/9**
PO407	**355**	**Unit or Basis for Measurement Code** Code specifying the units in which a value is being expressed, or manner in which a measurement has been taken GR Gram KG Kilogram LB Pound OZ Ounce - Av		**ID 2/2**
PO408	**385**	**Gross Volume per Pack** Numeric value of gross volume per pack		**R 1/9**
PO409	**355**	**Unit or Basis for Measurement Code** Code specifying the units in which a value is being expressed, or manner in which a measurement has been taken CF Cubic Feet		**ID 2/2**

Segment: **MAN** **Marks and Numbers**
Position: 190
Loop: HL
Level: Detail
Usage: Must Use
Max Use: >1
Purpose: To indicate identifying marks and numbers for shipping containers
Syntax Notes:
1 If either MAN04 or MAN05 is present, then the other is required.
2 If MAN06 is present, then MAN05 is required.
Comments:
1 When MAN01 contains code "UC" (U.P.C. Shipping Container Code) and MAN05/MAN06 contain a range of ID numbers, MAN03 is not used. The reason for this is that the U.P.C. Shipping Container code is the same on every carton that is represented in the range in MAN05/MAN06.
2 MAN03 and/or MAN06 are only used when sending a range(s) of ID numbers. When both MAN02/MAN03 and MAN05/MAN06 are used to send ranges of ID numbers, the integrity of the two ID numbers must be maintained.

Data Element Summary

Ref. Des.	Data Element	Name		Attributes
MAN01	**88**	**Marks and Numbers Qualifier**	**M**	**ID 1/2**
		Code specifying the application or source of Marks and Numbers (87)		
		AA SSCC-18		
		GM SSCC-18 and Application Identifier		
MAN02	**87**	**Marks and Numbers**	**M**	**AN 1/20**
		Marks and numbers used to identify a shipment or parts of a shipment		
		Hub Distributing Comments:		
		The 20 digit SSCC-18 serial shipping container identification number that is barcoded on each carton.		

Segment: **HL** **Hierarchical Level - Item**
Position: 010
Loop: HL
Level: Detail
Usage: Must Use
Max Use: 1
Purpose: To identify dependencies among and the content of hierarchically related groups of data segments
Syntax Notes:
Comments:
1 The HL segment is used to identify levels of detail information using a hierarchical structure, such as relating line-item data to shipment data, and packaging data to line-item data.
The HL segment defines a top-down/left-right ordered structure.
2 HL01 shall contain a unique alphanumeric number for each occurrence of the HL segment in the transaction set. For example, HL01 could be used to indicate the number of occurrences of the HL segment, in which case the value of HL01 would be "1" for the initial HL segment and would be incremented by one in each subsequent HL segment within the transaction.
3 HL02 identifies the hierarchical ID number of the HL segment to which the current HL segment is subordinate.
4 HL03 indicates the context of the series of segments following the current HL segment up to the next occurrence of an HL segment in the transaction. For example, HL03 is used to indicate that subsequent segments in the HL loop form a logical grouping of data referring to shipment, order, or item-level information.
5 HL04 indicates whether or not there are subordinate (or child) HL segments related to the current HL segment.
Notes: **Hub Distributing Comments**

The HL segment is used to identify levels of detail information using a hierarchical structure.

HL01 shall contain a unique number for each occurrence of the HL segment within the transaction set. The value assigned to the first HL segment will be 1, and is incremented by one for each subsequent HL segment within the transaction set.

HL02 identifies the hierarchical ID of the HL segment to which it is subordinate (child of). HL02 will be omitted for the first occurrence of the HL segment in the transaction set, since it has no parent. HL03 identifies the application content of the series of segments following the current HL segment up to the next occurrence of an HL segment, or the CTT or SE segment, e.g., Shipment, Unit Load, Order, Tare, Pack and Item.

Data Element Summary

Ref. Des.	Data Element	Name		Attributes
HL01	**628**	**Hierarchical ID Number** A unique number assigned by the sender to identify a particular data segment in a hierarchical structure	**M**	**AN 1/12**
HL02	**734**	**Hierarchical Parent ID Number** Identification number of the next higher hierarchical data segment that the data segment being described is subordinate to	**M**	**AN 1/12**
HL03	**735**	**Hierarchical Level Code** Code defining the characteristic of a level in a hierarchical structure I Item	**M**	**ID 1/2**

Segment: **LIN** **Item Identification**
Position: 020
Loop: HL
Level: Detail
Usage: Must Use
Max Use: 1
Purpose: To specify basic item identification data
Syntax Notes:
1 If either LIN04 or LIN05 is present, then the other is required.
2 If either LIN06 or LIN07 is present, then the other is required.
3 If either LIN08 or LIN09 is present, then the other is required.
4 If either LIN10 or LIN11 is present, then the other is required.
5 If either LIN12 or LIN13 is present, then the other is required.
6 If either LIN14 or LIN15 is present, then the other is required.
7 If either LIN16 or LIN17 is present, then the other is required.
8 If either LIN18 or LIN19 is present, then the other is required.
9 If either LIN20 or LIN21 is present, then the other is required.
10 If either LIN22 or LIN23 is present, then the other is required.
11 If either LIN24 or LIN25 is present, then the other is required.
12 If either LIN26 or LIN27 is present, then the other is required.
13 If either LIN28 or LIN29 is present, then the other is required.
14 If either LIN30 or LIN31 is present, then the other is required.
Comments:
1 See the Data Dictionary for a complete list of IDs.
2 LIN02 through LIN31 provide for fifteen different product/service IDs for each item. For example: Case, Color, Drawing No., U.P.C. No., ISBN No., Model No., or SKU.

Data Element Summary

Ref. Des.	Data Element	Name		Attributes
LIN02	**235**	**Product/Service ID Qualifier**	**M**	**ID 2/2**
		Code identifying the type/source of the descriptive number used in Product/Service ID (234)		
		CB Buyer's Catalog Number		
		IN Buyer's Item Number		
LIN03	**234**	**Product/Service ID**	**M**	**AN 1/48**
		Identifying number for a product or service		
		Hub Distributing Comments:		
		When LIN_02 is CB, then the LIN_03 should be the Hub's Internal UPC number, as specified on the Purchase Order. When LIN_02 is IN, then the LIN_03 should be the Buyer's Item Number, (Prepack ID Number, as specified in the Purchase Order in the PO1_07.		

Segment: **SN1** **Item Detail (Shipment)**
Position: 030
Loop: HL
Level: Detail
Usage: Must Use
Max Use: 1
Purpose: To specify line-item detail relative to shipment
Syntax Notes: **1** If either SN105 or SN106 is present, then the other is required.
Comments: **1** SN103 defines the unit of measurement for both SN102 and SN104.

Data Element Summary

Ref. Des.	Data Element	Name	Attributes
SN102	**382**	**Number of Units Shipped** Numeric value of units shipped in manufacturer's shipping units for a line item or transaction set	**M R 1/10**
SN103	**355**	**Unit or Basis for Measurement Code** Code specifying the units in which a value is being expressed, or manner in which a measurement has been taken EA Each	**M ID 2/2**

Segment: **CTT** **Transaction Totals**
Position: 010
Loop:
Level: Summary
Usage: Must Use
Max Use: 1
Purpose: To transmit a hash total for a specific element in the transaction set
Syntax Notes: **1** If either CTT03 or CTT04 is present, then the other is required.
2 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.

Data Element Summary

Ref. Des.	Data Element	Name		Attributes
CTT01	**354**	**Number of Line Items** Total number of HL segments. **Hub Distributing Comments:** The number of HL segments present in the transaction set	**M**	**N0 1/6**

Segment: **SE** **Transaction Set Trailer**
Position: 020
Loop:
Level: Summary
Usage: Must Use
Max Use: 1
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)
Syntax Notes:
Comments: **1** SE is the last segment of each transaction set.

Data Element Summary

Ref. Des.	Data Element	Name	Attributes
SE01	**96**	**Number of Included Segments** Total number of segments included in a transaction set including ST and SE segments	**M N0 1/10**
SE02	**329**	**Transaction Set Control Number** Identifying control number that must be unique within the transaction set functional group assigned by the originator for a transaction set **Hub Distributing Comments:** This must be the same number as is in the ST segment (ST02) for the transaction set.	**M AN 4/9**