

Inventory Advice
Transaction Set (846)
(Outbound from TI)

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Table of Contents

TITLE	PAGE
TABLE OF CONTENTS	3
TESTING PROCEDURES	4
HOW TO USE THIS DOCUMENTATION	5
MESSAGE DIAGRAM	6
ISA INTERCHANGE CONTROL HEADER	7
GS FUNCTIONAL GROUP HEADER	9
ST TRANSACTION SET HEADER SEGMENT	10
BIA INVENTORY ADVICE (BEGINNING SEGMENT)	11
LIN LINE ITEM	12
QTY QUANTITY	13
LDT LEAD TIME	14
CTT TRANSACTION TOTALS SEGMENT	15
SE TRANSACTION SET TRAILER SEGMENT	16
GE FUNCTIONAL GROUP TRAILER	17
IEA INTERCHANGE CONTROL TRAILER	18

Testing Procedures

- To begin testing a request needs to be made to the TI SC EDI Business Manager, Kim Harlow, at (972) 480-7982 (kharlow@ti.com) prior to sending any transmissions.
- A TI EDI Representative will contact you to begin testing.
- You will send a valid test file to Texas Instruments and notify us when it has been sent. A valid test file consists of:
 - 'T' sent in the ISA segment (ISA15)
 - Must contain all mandatory segments and fields contained in this documentation
 - Standard pack quantities
- Texas Instruments will review your transmissions and notify you of any problems.
- Move to production
 - TI SC EDI Business Manager, TI EDI Representative and the trading partner are mutually satisfied with the data being transmitted
 - TI EDI Representative will contact you to move you into production
 - 'P' sent in ISA segment (ISA15)

How To Use This Documentation

This document was created to aid in your implementation of the ANSI 3020 standard for purchase orders. This documentation contains those segments and elements required to successfully process your purchase order for Texas Instruments.

A complete description of the purchase order segments are outlined in the ANSI 3020 Standards Manual. If you require/need to send additional segments not listed in this documentation you must reach an agreement with Texas Instruments before sending those segments.

Data Element Attributes

- M = Mandatory (must be transmitted)
- X = Conditional (presence of this field is dependent on the value or presence of other data elements within the segment)
- O = Optional (the appearance of the element is either at the option of the sending party or based on agreement between the trading partners)

Data Element Types

- AN = Alphanumeric
- NN = Numeric
 - 1st N signifies numeric
 - 2nd N signifies the number of decimal places to the right of a fixed, implied decimal point (the decimal point is not transmitted for this data element type)
- R = Numeric Decimal (decimal point required to be transmitted when fractional values are present)
- ID = Field contains a code value (codes are contained within predetermined lists maintained by the standards committee and are found in the appendix of ANSI manuals)
- DT = Date formatted in YYMMDD, where
 - YY = Last 2 digits of the year (00-99)
 - MM= Numeric month (01-12)
 - DD = Numeric day (01-31)
- TM = Time formatted in HHMM, where
 - HH = Military hour (00-23)
 - MM= Minute (00-59)

Data Element Length

- The number to the left of the "/" specifies the minimum length of the field as required by the standard.
- The number to the right of the "/" specifies the maximum length of the field as required by the standard.
- When the minimum and maximum lengths are the same, this signifies the field has a fixed length.
- The minimum and maximum lengths do not include the decimal point (when data element is R).

Inventory Advice (846) - Outbound

The inventory inquiry/advice transaction set may be used in the following ways: (1) for a seller of goods and services to provide inventory information to a prospective purchaser, with no obligation to the purchaser to acquire these goods or services; (2) for a information to that seller; (3) for one location to supply another location with inventory information; and (4) for an inquiry as to the availability of inventory with no obligation on the seller of goods and services to reserve that inventory. Loop from LIN to QTY repeating 10,000 times

SEG	NAME	REQ DES	MAX USE	LOOP REPEAT
ISA	Interchange Control Header	M	1	
GS	Functional Group Header	M	1	
ST	Transaction Set Header	M	1	
BIA	Beginning Segment	M	1	
LOOP 1`				
LIN	Line Item Detail	M	1	
QTY	Quantity	M	99	10,000
LDT	Lead Time	O	1	
CTT	Transaction Totals	M	1	
SE	Transaction Set Trailer	M	1	
GE	Functional Group Trailer	M	1	
IEA	Interchange Control Trailer	M	1	

ANSI Version\Release
 ISA - 00200
 GS - 003020

LEGEND

AN	Alphanumeric
C	Conditional
DT	Date
F	Floating
ID	Identification
M	Mandatory
NO	Number
O	Optional
R	Reference
TM	Time

ISA - Interchange Control Header

Status: Mandatory

Purpose: To start and identify an interchange of one or more functional groups and interchange related control segments.

Field #	Element	Field Name	Req	Type	Size	TI Usage
ISA01	744	Authorization Information. Qualifier	M	ID	02	00 - No authorization information present 01 - UCS communication ID
ISA02	745	Authorization Information	M	AN	10	Supplied by TI if using direct dial service
ISA03	746	Security Information. Qualifier	M	ID	02	00 - No security information present 01 - Password
ISA04	747	Security Information	M	AN	10	Supplied by TI if using direct dial service
ISA05	704	Interchange ID Qualifier	M	ID	02	TI accepts all; TI uses 01-DUNS (Dun & Bradstreet)
ISA06	705	Interchange Sender ID	M	ID	15	Defined by sender
ISA07	704	Interchange ID Qualifier	M	ID	02	TI accepts all; TI uses 01-DUNS (Dun & Bradstreet)
ISA08	706	Interchange Receiver ID	M	ID	15	Defined by receiver
ISA09	373	Date	M	DT	06	Current date: YYMMDD
ISA10	337	Time	M	TM	04	Current time: HHMM
ISA11	726	Interchange standards identifier	M	ID	01	X - American National Standards Committee X12

ISA - Interchange Control Header (continued)

Field #	Element	Field Name	Req	Type	Size	TI Usage
ISA12	703	Interchange version ID	M	ID	05	This version number covers X12 control segments only: Positions 1-3 of field = major version number.
ISA13	709	Interchange control number	M	NO	09	This number is assigned by sender; together with sender ID, it uniquely identifies interchange data to receiver. It is suggested that sender, receiver, and all third parties be able to maintain an audit trail of interchanges using this number.
ISA14	749	Acknowledgment	M	ID	01	0 = No acknowledgment requested 1 = Interchange acknowledgment requested
ISA15	748	Test Indicator	M	AN	01	T = Test data P = Production data
ISA16	701	Sub-element Separator	M	AN	01	Defined by sender if necessary

NOTE: A segment terminator is mandatory. TI uses Hex 15. If Hex 15 is not used, substitute a non printable character

GS - Functional Group Header (Start)

Status: Mandatory

Purpose: To start and identify a functional group of related transaction sets and provide control and application identification information.

Field #	Element	Field Name	Req	Type	Size	TI Usage
GS01	479	Functional ID	M	ID	02	See data dictionary for code list
GS02	142	Application sender's code	M	ID	02-12	Defined by Sender
GS03	124	Application receiver's code	M	ID	02-12	Defined by Receiver
GS04	29	Data interchange date	M	DT	06	Date sender generated a functional group of transaction sets. Format: YYMMDD
GS05	30	Data interchange time	M	TM	04	Time expressed in 24-hour clock time when sender generated a functional group of transaction sets (local time at sender's location) Format: HHMM
GS06	28	Data interchange control number	M	NO	01-09	Sequentially assigned by sender
GS07	455	Responsible agency code	M	NO	01-02	X = American National Standards Committee X12
GS08	480	Version	M	ID	01-12	This number refers to X12 Transaction Sets: Positions 1-3 of this field = major version number; Positions 4 - 6 = release number.

ST - Transaction Set Header Segment

Status: Mandatory

Purpose: The first segment of each transaction set, containing the transaction set identifier and control number.

Field #	Element	Field Name	Req	Type	Size	TI Usage
ST01	143	Transaction set ID	M	ID	03	846 - Inventory advice advice
ST02	329	Transaction set control number	M	AD	04-09	A sequential number, assigned by sender

BIA - Inventory Advice (Beginning Segment)

Status: Mandatory

Purpose: To indicate the beginning of an inventory advice transaction set.

Field #	Element	Field Name	Req	Type	Size	TI Usage
BIA01	353	Transaction set purpose code	M	ID	02	03 - Delete (inactive parts) 04 - Changes (active parts)
BIA02	755	Report type code	M	ID	02	MB - Manufacturer's inventory report
BIA03	127	Reference number	M	AN	01-30	Reference number
BIA04	373	Date	M	DT	06	Date of inventory (YYMMDD)
BIA05	337	Time	O	TM	04	Not used

NOTE: When parts are no longer available (BIA01 = "03"), two ST - SE loops will be provided.

LIN - Item Identification Detail

Status: Mandatory

Purpose: To specify basic item identification data

Field #	Element	Field Name	Req	Type	Size	TI Usage
LIN01	350	Assigned identification	O	AN	01-11	Line item identification number
LIN02	235	Product ID qualifier	M	ID	02	VP - Seller's (vendor's) part number
LIN03	234	Product/service ID	M	AN	01-30	TI part number

NOTE: LIN04 through LIN31 are not used.

QTY - Quantity

Status: Mandatory

Purpose: To specify quantity information.

Field #	Element	Field Name	Req	Type	Size	TI Usage
QTY01	673	Quantity qualifier	M	ID	02	26 - Total Inventory
QTY02	380	Quantity	M	R	01-15	Quantity
QTY03	355	Unit of measure code	O	ID	02	Not used

LDT - Lead Time

Status: Optional

Purpose: To specify lead time for availability of parts.

Field #	Element	Field Name	Req	Type	Size	TI Usage
LDT01	345	Lead time code	M	ID	02	AE - From date of PO receipt to shipment
LDT02	380	Quantity	M	R	01-15	Number of days
LDT03	344	Unit of time	M	ID	02	WK - Week(s)
LDT04	373	Date	O	DT	06	Not used

CTT - Transaction Totals Segment

Status: Mandatory

Purpose: To transmit a hash total for a specific element or elements in the transaction set.

Field #	Element	Field Name	Req	Type	Size	TI Usage
CTT01	354	Number of line items	M	NO	01-06	Line item total
CTT02	347	Hash total	O	R	01-10	Not used
CTT03	81	Weight	O	R	01-08	Not used
CTT04	355	Unit of measure	C	ID	02	Not used
CTT05	183	Volume	O	R	01-08	Not used
CTT06	355	Unit of measure code	C	ID	02	Not used
CTT07	352	Description	O	AN	01-80	Not used

SE - Transaction Set Trailer Segment

Status: Mandatory

Purpose: The last segment of each transaction set, containing the number of included segments and transaction set control number.

Field #	Element	Field Name	Req	Type	Size	TI Usage
SE01	96	Number of included segments	M	NO	01-06	The total number of all segments in the transaction set, including the ST and SE segments.
SE02	329	Transaction set control number	M	AN	04-09	This number must match the transaction set control number (ST02) in the transaction set header segment.

GE - Functional Group Header (End)

Status: Mandatory

Purpose: To define (specify) the end of a functional group of related transaction sets.

Field #	Element	Field Name	Req	Type	Size	TI Usage
GE01	97	Number of included transaction sets	M	NO	01-06	Total number of transaction sets included
GE02	28	Data interchange control number	M	NO	01-09	The data interchange control number must match the same data element (GS06) in the functional group header segment.

IEA - Interchange Control Trailer

Status: Mandatory

Purpose: To define the end of an interchange of one or more functional groups and interchange related control segments.

Field #	Element	Field Name	Req	Type	Size	TI Usage
IEA01	405	Number of included groups	M	NO	01-05	A count of the number of functional groups included in a transmission.
IEA02	709	Interchange control number	M	NO	09	This number is assigned by sender; together with sender ID, it uniquely identifies interchange data to receiver. It is suggested that sender, receiver, and all third parties be able to maintain an audit trail of interchanges using this number.