



Technical XML Specifications

1. Purpose

This document sets out Freman EDI specific fields that are required to allow an XML file to be imported into Freman through Mainfreight EDI or local file upload from a client PC running Freman in a support web browser.

2. Manifest Message Group Elements

2.1 Structure

Status

M = Mandatory

C = Conditional

D = Dependant. Usage is based on another field. See explanation or usage matrix.

DM = Mandatory if the Group Element is used

Type

an..50 = Alphanumeric, up to 50 characters

an..35 = Alphanumeric, up to 35 characters

an..30 = Alphanumeric, up to 30 character

an..19 = Alphanumeric, always 19 characters

n..10 = Numeric, up to 10 digits with no decimal

TAG	Status	Repetition	Type	Notes
<Message>	M	1	Root	
<Message Header>	M	1	Group	
<MessageBody>	M	1	Group	
<Consignments>	M	1	Group	
<Consignment>	M	1..n	Group	
<Profile Name>	C	1	an..40	Target Freman profile name. Profile names are setup as required by customer. Profiles are a good way to split consignments by carriers/services/business units/location.
<ConsignmentNo>	M	1	an..14	Maximum 14 alphanumeric characters. Prefixes must be confirmed with Mainfreight IT team and account manager
<ConsignmentDate>	M	1	an10	Date (format: yyyy-mm-dd). This value is currently replaced with the current date on import
<Email>				
<EDIEmail>		Group (see details below)		This function is used to email documentation to to a specified email address. Eg. Sending documentation to the sender of stock returns or pickups from third parties
<MovementType>	C	1	an..3	Blank or FCL
<Party>	M	1..3	Group (see details below)	(C) Role = "CHARGE" (C) Role = "SENDER" (M) Role = "RECEIVER" If CHARGE or SENDER not specified details taken from the Manifest Party CHARGE – Billing account SENDER – Sending location RECEIVER – Recipient of goods
<Reference>	C	1..2	an..40	Primary References: (C) Role = "SENDER" (C) Role = "RECEIVER"
<References>	C	1	Group	
<Reference>	C	0..n	an..500	Additional References: (C) Type = "Receiver ref" (C) Type = "Sender ref" (C) Type = "OCON" OCON stands for original consignment.

n..13.2 = Numeric, up to 10 digits (plus an optional point and up to 2 decimal places)

TAG	Status	Repetition	Type	Notes	
<Carrier>	M	1	an2	Mainfreight Group: MF – Mainfreight DF – Dailyfreight CC – Chemcouriers OW – Owens	Freightways Group: (NZ only) NZCO – New Zealand Couriers PHAS – Post Haste CPAR – Castle Parcels Startrack/Auspost (AU only) STT – Startrack API
<ServiceRequired>	C	1	an3	Transport Services: LCL, MET, PRM, PLA, FTL, MOV, M2H, B2B If blank or missing, LCL is assumed	(Service Level) Startrack/Auspost (AU only) EXP, FPP, PRM
<ServiceType>	M	1	an3	LCL, MET or PAR. If blank or missing, LCL is assumed. Use LCL for all Courier consignments. Not Required in Freman? (refer Carriers and Services requirements for new Freman with mappings from ServiceRequired/Service Type ⑦ ServiceLevel/Routing Type)	

<FreightTerms>	M	1	??	<p>Required to define if the freight will either be dropped in to a DEPOT or collected from a DEPOT.</p> <p>Freights Terms should be:</p> <p>D2D – Required if customer needs a pickup and a delivery to be made</p> <p>DP2D – Required if customer is dropping in to a DEPOT but requires a Delivery to be made</p> <p>D2DP – Required if customer needs a Pickup but wants the freight to be picked up from the DEPOT at the Delivery site</p> <p>DP2DP – Required if customer is dropping in to a DEPOT and also requires freight to be picked up from the DEPOT</p>
<PickupInstructions>	M	1	an..150	Check if this is actually mandatory and they just leave blank if not provided
<DeliveryInstructions>	M	1	an..150	Check if this is actually mandatory and they just leave blank if not provided
<Line>	M	1..40	Group	
<Hire>	C	1..4	Group	
<Booking>	C	1	Group	
<Contract>	C	1	Group	NZ Only
<Total>	M	1..3	Group (see details below)	Units = "ITEMS" Units = "CUBIC" Units = "WEIGHT"
<Item>	M		Group	
<Notifications>				
<Notification>			Group (see details below)	
</Consignment>				

</Consignments>				
<ControlTotal>	M	1	Group	
<Total>	M	1	n..10	Units = "CONSIGNMENTS"
</ControlTotal>				
</MessageBody>				
</Message>				

2.2 Group Elements

TAG <MessageHeader>1	Status	Repetition	Type	Notes
<MessageHeader>	M	1		
<SenderID>	M	1	an..10	To be confirmed with Mainfreight IT - typically customer name is applied
<RecipientID>	M	1	an..50	MAINFREIGHT
<Prepared>	M	1	an19	Date and Time (format: yyyy-mm-ddThh:mm:ss, eg 2012-12-25T05:30:00)
<MessageID>	M	1	an..150	
<MessageType>	M	1	an..50	MANIFEST
<MessageVersion>	M	1	an..2	02
<MFTID>	M	1	n..10	To be confirmed by Mainfreight IT
<MergeOption>	M	1	an..16	2 values are permitted: <ul style="list-style-type: none"> MergeOverwrite – overwrite an existing note if found MergeNoOverwrite – do not import if a note with the same ConsignmentNo exists
</MessageHeader>				
TAG - <EDIEmail> 0+	Status	Repetition	Type	Notes
<EDIEmail>	M	1..n		
<ToAddress>	DM	1	Email: an..150	The email address consignment documentation is to be delivered to should be less than 150 characters.
</EDIEmail>				
TAG <Party> 1..3	Status	Repetition	Type	Notes
<Party Role ="CHARGE">	M	1		Role = "CHARGE" Role = "SENDER" Role = "RECEIVER" See Party Role / Field Matrix

<Code>	D	1	an..50	To be confirmed with account manager
<Name>	D	1	an..35	
<Address1>	D	1	an..30	
<Address2>	C	1	an..30	
<Suburb>	C	1	an..50	Supported Suburb/City list provided by Mainfreight IT
<City>	D	1	an..50	Supported Suburb/City list provided by Mainfreight IT
<State>	D	1	an..4	(AU Only)
<PostalCode>	D	1	an..10	(AU Only)
<Contact>	C	1	An..50	
<Phone>	C	1	an..15	
<ContactEmail>	C	1	an..15	
<IsDC>	C	1	an..5	True or False (AU Only)
<GPSLocation>	C	1		<Latitude> and <Longitude> values can be entered under this header to support the address.
<Latitude>	D	1	n..16	
<Longitude>	D	1	n..16	
</GPSLocation>				
</Party>				

TAG <Notification> 0+	Status	Repetition	Type	Notes
<Notification>	M	1		
<Event>	DM	1		One of: <ul style="list-style-type: none"> InformationReceived PickedUp InTransit AtDeliveryDepot OnDeliveryVehicle (NZ only), DueforDelivery (AU only) Delivered
<ToAddress>	DM	1	Email: an..10 SMS: an..24	The email address or full SMS phone number, including two-digit country code, two-digit network code and phone number. Allowed characters: numbers only ie: no spaces, hyphens plus-signs etc.

<TransportType>	DM	1		One of: • Email • SMS
</Notification>				

2.3 Party Role / Field Matrix

Field	CHARGE	SENDER	RECEIVER
<Code>	C	C	C
<Name>	C	C	C
<Address1>	C	C	C
<Address2>	C	C	C
<Suburb>	C	C	C
<City>	C	C	C
<State>	(C) Australia (N/A) NZ	(C) Australia (N/A) NZ	(C) Australia (N/A) NZ
<PostalCode>	(C) Australia (N/A) NZ	(C) Australia (N/A) NZ	(C) Australia (N/A) NZ
<Phone>	N/A	C	C
<IsDC>	N/A	N/A	(C) Australia (N/A) NZ
<GPSLocation>	C	C	C
<ContactEmail>	C	C	C

- If no data is supplied, the note will need to be completed once it is imported into Freman.
- **If the Code only is supplied, Freman will look up the code in its database. If a match is found, the remaining details will be populated for you.**
- If the code and any mixture of the remaining fields are supplied, the note will need to be completed once it is imported into Freman.

2.4 Line Items

TAG - <LINE> 1..40	Status	Repetition	Type	Notes
<Line>	M	1		
<LineNo>	M	1	n..2	Freman line number. A maximum of 40 lines per consignment note is supported
<Items>	C	1	n..10	
<Description>	M	1	an.32	
<Measurement>	C	1..2	Group	Property = "CUBIC" Property = "WEIGHT"

<DangerousGoods>	C	1	Group	
<Dimensions>	C	1	Group	
<PackTypeCode>	(M) NZ (C) AU	1	an..8	Mainfreight Code List
<SaidToContain>	C	1..n	Group	Used to define items sent within a Line Item. Example scenario: 1 Pallet, STC 100 Cartons Said to contain lines must be in the file as child node(s) to a <Line> node. Total Number of <Line> and <SaidToContain> lines cannot be more than 40.
</Line>				
TAG - <SaidToContain> 1..n	Status	Repetition	Type	Notes
<Line>	M	1		
<Items>	C	1	n..10	
<Description>	M	1	an..32	
<Measurement>	C	1..2	Group	Property = "CUBIC" Property = "WEIGHT"
<DangerousGoods>	C	1	Group	
<Dimensions>	C	1	Group	
<PackTypeCode>	M	1	An..8	Mainfreight Code List
</Line>				
TAG - <Measurement> 1..2	Status	Repetition	Type	Notes
<Measurement>	M	1		Property = "CUBIC" Property = "WEIGHT"
<Value>	M	1	n..13.2	Weight is n..10.0 Cubic is n..10.2
<Unit>	M	1	an..2	Cubic = M3 Weight = KG

</Measurement>				
TAG - <DangerousGoods> 1..40	Status	Repetition	Type	Notes
<DangerousGoods>	C	1		
<DGClass>	C	1	an..10	
<UNNumber>	C	1	an..10	

<DGProductClass>	C	1	an..20	Freman dangerous goods product class. This code must match a saved Freman dangerous goods record code. If the target profile is set to Use Customer's Own DG Documents (in Company Options) this is not required.
</DangerousGoods>				
TAG - <ItemNumbers> 1	Status	Repetition	Type	Notes
<ItemNumbers>	C	1		
<Item>	C	1..n		Repeated per each SSCC
<SSCCNumber>	C	1	n..18	To register please visit: https://www.gs1nz.org/ https://www.gs1au.org/
</Item>				
</ItemNumbers>				
TAG - <Dimensions> 1	Status	Repetition	Type	Notes
<Dimensions>	C	1		
<Length>	C	1	n..13.2	
<Width>	C	1	n..13.2	
<Height>	C	1	n..13.2	
</Dimensions>				
TAG - <Hire> 1..4	Status	Repetition	Type	Notes
<Hire>	C	1		
<HireCompany>	DM	1	an..10	C – Chep L - Loscam
<HireType>	DM	1	an1	R – Retrieval (Used to generate retrieval process by Mainfreight Group) T – Transfer (used to transfer directly onto specified account)
<HireAccount>	C	1	an..10	If left blank, will be auto-populated with expected delivery branch hire account

<EquipmentType>	DM	1	an..10	P – Pallet NOTTRANSFER – No Transfer If NOTTRANSFER is used then no transfer batch file will be generated for the hire pallets.
<Quantity>	DM	1	n..10	
</Hire>				
TAG - <Booking> 1	Status	Repetition	Type	Notes
<Booking>	C	1		
<Required>	DM	1	an..12	Required, NotRequired, Confirmed
<BookInForm>	C	1	an19	Date and Time (format: yyyy-mmddThh:mm:ss) Mandatory if Confirmed is used.
<BookInTo>	C	1	an19	Date and Time Mandatory if Confirmed is used
<BookInRef>	C	1	an20	
</Booking>				
TAG - <Contract> 1	Status	Repetition	Type	Notes
<Contract>	C	1		NZ only. If not supplied, “LCR” is assumed.
<ContractType>	DM	1	an..3	LCR – Limited Carriers Risk OR – Owner’s Risk DV – Declared Value
<DeclaredValue>	D	1	n..13.2	Value in dollar terms must be supplied for Declared Value consignments (DV)
</Contract>				

2.5 Data Elements/Glossary

MessageID When importing notes via Mainfreight EDI (Not browsing for local files using the Freman UI), this value will be recorded in the EDI log as the name of the source file.

MFTID This number, supplied by Mainfreight, is your unique customer identifier.

ProfileName	<p>The Freman profile name that the EDI note will be imported into. This is optional. The profile name, if specified, needs to be added for each <Consignment> in the file. The profile name, if specified, overrides the following checks.</p> <p>If the profile name is not supplied, Freman will use the supplied charge and / or sender codes to determine the profile that the note will be imported into using the following rules:</p> <ul style="list-style-type: none"> • If the charge code for a given note in the EDI XML matches a single profile EDI charge code (company options setting), the note will be inserted under this profile. • If the charge code for a given note does not match a EDI charge code (company options setting) for any profile, the note will be inserted under the company default profile. <ul style="list-style-type: none"> • If the same EDI charge code (company options setting) is set for multiple profiles, Freman will attempt to match one of these profiles using the EDI charge code (company options setting) and EDI Sender code (company options setting). • If no match is found, Freman will check to see if one of the profiles with a matching EDI charge code (company options setting) is found. If the company default profile matches, it will be used. If not, the first matching profile found will be used. • If a single match is found, Freman will use this profile. • If multiple matches are found, Freman will use the Company default profile if it is a match. Otherwise, Freman will use the first matching profile found. • If the EDI XML does not contain a charge code, the note will be inserted under the company default profile. • If, for any reason, the company does not have a profile marked as default, the note will be inserted into the first profile found for that company.
EDIEmail	<p>Utilising this EDIEmail function, Freman will automatically email the documentation to the specified email address if all details in the consignment note are 100% valid on import. A great feature for emailing consignment documentation to third parties or prior to collection for stock returns.</p> <p>Specify the email addresses to which the documentation is to be sent to. Freman will email the documents based off the document types selected for printing against the profile. If the Consignment Note print option is selected, then the consignment note will be uploaded to our internal Transport Management System (TMS)</p> <p>If an error occurs while importing, the error list will be sent to the EDI error email set on the profile, i.e. the profile under the ProfileName tag in the EDI XML.</p>
Service Required	<p>The values allowed here depend on what is configured for the target customer in Freman. The services utilised must be confirmed with your account manager.</p>
ServiceType	<p>The values allowed here depend on what is configured for the target customer in Freman.</p> <p>If MET ServiceRequired is used, use MET ServiceType. For all other ServiceRequired options, pair with LCL ServiceType.</p>
SenderID	<p>Agreed code to represent sender of the message.</p>

RecipientID	Agreed code to represent recipient of the message (MAINFREIGHT).
Prepared	Date and time that the message was prepared / created.
MessageID	Reference number for the message, to assist with tracing.
Carrier Code	Company responsible for the carriage of goods.
Party Code	Charge and Sender Codes supplied by Mainfreight.
Name	Customer Name.
Address	Physical street address goods sent to and from. (P.O Boxes and International addresses are not supported).
Consignment No	Unique reference to identify the consignment, this can be your invoice or packing slip number preceded by a prefix supplied by Mainfreight.
Consignment Date	Date goods are ready for collection or have been collected.
Movement Type	Used to indicate if this is an FCL consignment.
Reference	Customer references to appear on statement and delivery receipts, also assists in the tracking of the consignment.
VIP Email	A special service only supplied by arrangement. Email address(es) to be notified of conditions being tracked.
Items	Count of the goods being physically handled.
PackagingType	Type of packages of the goods.
Description	Description of goods.
Measurement	Cubic measure and weight of the goods.
DG Class	Declared hazard class of the goods.
UN Number	Declared dangerous goods UN number of the goods.
Dimensions	Measurement of goods in metres – Length, Width and Height.
Hire Company	Company the equipment has been hired from: C – Chep, L – Loscam.
Hire Type	Type of transaction: R – Triggers a pallet retrieval by the Expected Delivery branch; T – Transfer pallets off your CHEP account directly onto another specified account (eg. Directly onto the end receiver account).
Hire Account	Account number that the equipment needs to be de-hired from (To Account). If Hire Account is left blank, this will be auto-populated by Freman with the Expected Delivery Branch hire account. For No Transfer, use NOTRANSFER. NOTE: A pallet agreement MUST be signed with your account manager/local branch before pallets are allowed to be sent in our transport network.
Equipment Type	Type of hire equipment: P – Pallet; N – No Transfer
Quantity	Count of the equipment to be de-hired.
Booking	Indicates that a booking must be made to organise the delivery of the goods.
Contract	Type of contract for the carriage of goods: LCR – Limited Carriers Risk, DV Declared Value, OR – Owners Risk.
Cost	The expected cost of the consignment.
Totals	Control totals to validate the content of the consignment and message.
Packing Slip	A special service only supplied by arrangement.
Phone	A phone number for sender or received entries.
IsDC	Flag to indicate whether a receiver is a distribution centre - AU only
DeliveryInstructions	Special instructions for the delivery, can be on several lines.
PackTypeCode	Pack Type of goods. Available list of supported codes below. 1. Freman AU Supported Commodities/Pack Types

Pack Type Code	Description
BAG	BAG
BDL	BUNDLE
CRT	CRATE
CTN	CARTON
DRM	DRUM
IBC	IBC
ITEM	ITEM
PAIL	PAIL
PK	PACK
PLT	PALLET
ROLL	ROLL
SK	SKID
ST	STILLAGE

2. Freman NZ Supported Commodities/Pack Types

Pack Type Code	Description
BAG	BAG
BDL	BUNDLE
CTN	CARTON
DRM	DRUM
IBC	IBC
ITEM	ITEM
PAIL	PAIL
PLT	PALLET
ROLL	ROLL
ST	STILLAGE

3. XML Special Characters

The characters &, “ and ‘ can all be used un-encoded in XML being sent to Freman. The characters < and > cannot be used inside nodes.

```
<?xml version="1.0" encoding="utf-8"?>
<Message>
  <MessageHeader>
    <MessageType>MANIFEST</MessageType>
    <MessageVersion>02</MessageVersion>
    <MergeOption>MergeNoOverwrite</MergeOption>
    <SenderID>TEST</SenderID>
    <RecipientID>MAINFREIGHT</RecipientID>   <Prepared>2012-10-
3T13:51:25</Prepared>
```

<MessageID>12031213512501</MessageID>
<MFTID>123456</MFTID>
</MessageHeader>
<MessageBody>
<Consignments>
<Consignment>
<ProfileName>Test</ProfileName>
<ConsignmentNo>ABC123456</ConsignmentNo>
<ConsignmentDate>2018-11-13</ConsignmentDate>
<Emails>
<EDIEmail>
<ToAddress>testemail@email.com</ToAddress>
</EDIEmail>
<EDIEmail>
<ToAddress>otheremail@email.com</ToAddress>
</EDIEmail>
</Emails>
<Party Role="CHARGE">
<Code>ABCIND</Code>
<Name>ABC INDUSTRIES</Name>
<Address1>123 ABC STREET</Address1>
<Address2></Address2>
<Suburb>TAKANINI</Suburb>
<City>AUCKLAND</City>
</Party>
<Party Role="SENDER">
<Code>ABCIND</Code>
<Name>ABC INDUSTRIES</Name>
<Address1>123 ABC STREET</Address1>
<Address2></Address2>
<Suburb>TAKANINI</Suburb>
<City>AUCKLAND</City>
</Party>
<Party Role="RECEIVER">
<Code>DEMO999</Code>
<Name>DEMO COMPANY</Name>
<Address1>999 DEMO ROAD</Address1>
<Address2>C/- DEMO USER</Address2>
<Suburb></Suburb>
<City>TOKOROA</City>
<PostCode></PostCode>
</Party>
<Reference Role="SENDER">ABC-123S</Reference>
<Reference Role="RECEIVER">DEM-999</Reference>
<References>
<Reference Type="Sender ref">Additional ref</Reference>
<Reference Type="Receiver ref">Additional ref</Reference>
<Reference Type="OCON"></Reference>
</References>
<Carrier>MF</Carrier>
<ServiceRequired>LCL</ServiceRequired>
<ServiceType>LCL</ServiceType>
<Booking>
<Required>CONFIRMED</Required>
<BookInFrom>2013-10-11T08:00:00</BookInFrom>
<BookInTo>2013-10-11T10:00:00</BookInTo>
<BookInRef>AC72AOTEAROA</BookInRef>
</Booking>
<DeliveryInstructions>INWARDS GOODS DOOR IS AT END OF LONG DRIVEWAY PAST THE RECEPTION BUILDING</DeliveryInstructions>
<Line>
<Items>1</Items>

<Description>PALLET OF DGS</Description>
<Measurement Property="CUBIC">
 <Value>0.73</Value>
 <Unit>M3</Unit>
</Measurement>
<Measurement Property="WEIGHT">
 <Value>46</Value>
 <Unit>KG</Unit>
</Measurement>
<PackTypeCode>PLT</PackTypeCode>
<DangerousGoods>
 <DGClass>3, 8</DGClass>
 <UNNumber>2924</UNNumber>
 <DGProductClass>3MD2924</DGProductClass>
</DangerousGoods>
<SaidToContain>
 <Items>4</Items>
 <Description>CARTONS</Description>
 <Measurement Property="CUBIC">
 <Value>0.43</Value>
 <Unit>M3</Unit>
 </Measurement>
 <Measurement Property="WEIGHT">
 <Value>43</Value>
 <Unit>KG</Unit>
 </Measurement>
</SaidToContain>
<SaidToContain>
 <Items>8</Items>
 <Description>PAIS</Description>
 <Measurement Property="CUBIC">
 <Value>0.3</Value>
 <Unit>M3</Unit>
 </Measurement>
 <Measurement Property="WEIGHT">
 <Value>3</Value>
 <Unit>KG</Unit>
 </Measurement>
</SaidToContain>
</Line>
<Line>
 <Items>2</Items>
 <Description>PALLETS</Description>
 <Measurement Property="CUBIC">
 <Value>1</Value>
 <Unit>M3</Unit>
 </Measurement>
 <Measurement Property="WEIGHT">
 <Value>100</Value>
 <Unit>KG</Unit>
 </Measurement>
 <PackTypeCode>PLT</PackTypeCode>
 <SaidToContain>
 <Items>4</Items>
 <Description>TEST DG</Description>
 <Measurement Property="CUBIC">
 <Value>0.1</Value>
 <Unit>M3</Unit>
 </Measurement>
 <Measurement Property="WEIGHT">
 <Value>1</Value>
 <Unit>KG</Unit>


```
</Measurement>
<DangerousGoods>
  <DGClass>3, 8</DGClass>
  <UNNumber>2924</UNNumber>
  <DGProductClass>3MD2924</DGProductClass>
</DangerousGoods>
</SaidToContain>
</Line>
<Hire>
  <HireCompany>C</HireCompany>
  <HireType>R</HireType>
  <HireAccount></HireAccount>
  <EquipmentType>P</EquipmentType>
  <Quantity>1</Quantity>
</Hire>
<Contract>
  <ContractType>DV</ContractType>
  <DeclaredValue>13.2</DeclaredValue>
</Contract>
<Notifications>
  <Notification>
    <Event>InformationReceived</Event>
    <ToAddress>testemail@email.com</ToAddress>
    <TransportType>Email</TransportType>
  </Notification>
</Notifications>
</Consignment>
</Consignments>
<ControlTotal>
  <Total Units="CONSIGNMENTS">1</Total>
</ControlTotal>
</MessageBody>
</Message>
```