

# eFTR Upload and Download File Formats

Version 4.3

June 16, 2021



# eFTR

This document describes the file formats used by the eFTR application. This application provides means for eligible FTR bidders and FTR holders to participate in FTR (Financial Transmission Rights) auctions. The upload files are used to submit bids to purchase and offers to sell FTRs during the auction bidding periods published in ISO New England calendars.

The download files provide information regarding auction results and other relevant information supporting the FTR auction analysis. In addition to the information in the Tracking Table included in this document, changes made in the latest version of download files are highlighted; text related to new and renamed columns appears on yellow background.

Questions on this document, and the eFTR application in general, should be forwarded to the Customer Services at ISO New England Inc. at <u>custserv@iso-ne.com</u>.

#### File Name Convention:

The reports descriptions reference the File Name as displayed in eFTR. As these reports are generated upon request, there is no set file name for the reports when the "Save As" dialog box appears. File Names for the downloads will be specified by the users through eFTR.

#### Line Code Convention:

C – Comment row I – Informational row D – Data row



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# Change Summary

Revision	Transmittal #	Date	Comments
Draft	None	2003	Draft
1.0	None	05/13/2004	Removed DRAFT indication per DAC.
2.0	None	08/15/2005	Updated Report Names and File Names to match eFTR;
			added description for the new FTR Auction Results report;
			made some formatting changes including new logo; updated
			Public Clearing Prices and Public Binding Constraints reports
			(see Tracking Table); updated introductory description and
			added an eFTR Report Tracking Table.
2.1	None	10/07/2005	Included more information in the Report Descriptions related
			to the header information included in a report. Also includes
			conforming changes so that document better reflects the file
			formats.
3.1	None	09/11/2012	Updated report descriptions to reflect file formats
			implemented in eFTR version 2.0.0-BOPP.
4.1	None	09/26/2012	Added the upload file format description. Highlighted
			changes made in the latest version of download files (version
			2.0.0-BOPP)
4.2	None	06/22/2016	Modified the CSV file formats for the following files:
			ftr.csv,
			auction_bids.csv,
			auction_results.csv,
			FTR upload file.
4.3	None	06/16/2021	Modified the CSV file formats for the following files:
			auction_bids.csv,
			auction_results.csv,
			FTR upload file.



# eFTR File Descriptions Tracking Table

Below is the Tracking Table for changes to the various FTR reports and upload files used by the eFTR application. This Tracking Table provides participants a historical view of any changes or revisions to the file formats as well as a description of change.

Revision 6 contains the description of changes to provide Market Participants with the ability to have separate settlement accounts, called subaccounts. Participants register their subaccounts in CAMS. This new feature does not affect Participants who do not use subaccounts.

File	Revision	Description of Change	Version	Posting Date
		Added the optional column SUBACC		
Upload file format	6	applicable only to participants who use	4.3	06/16/2021
		subaccounts.		
		Renamed columns and modified data		
		type from character to number for		
Upload file format	5	columns: Customer, Source, Sink.	4.2	06/22/2016
		Added requirement for MW column -		
		must be greater than zero.		
		Added description of the upload file		
Upload file format	4	format. Changes made in the latest	4.1	09/26/2012
opioud me formu	•	version of download files are highlighted		0)/20/2012
		in yellow.		
		Added column SubAccount applicable		
Auction_Results	6	only to Participants who use	4.3	06/16/2021
		subaccounts.		
Auction_Results	4	Added column Customer ID, renamed	4.2	06/22/2016
	•	column Owner to Customer Name.		00,22,2010
		Added descriptions of renamed and new		
		columns. New: Source Location ID,		
	3	Source Location Type, Sink Location	3.1	09/11/12
Auction_Results		ID, Sink Location Type. Renamed: FTR		
		Auction, Source Location Name, Sink		
		Location Name, Class Type. Modified		
		header description.		
		Updated the description of the report so		
		that the column names in this document		10/05/05
Auction_Results	2	conform to the files produced by eFTR.	2.1	10/07/05
		No changes were made to the reports in		
		the eFTR application.		
	6	Added column SubAccount applicable	4.2	06/16/2021
Auction_Bids	6	only to Participants who use	4.3	06/16/2021
		subaccounts.		
		Added columns: Customer ID, Source		
		Location ID, Source Location Type,		
Austion Dida	А	Sink Location ID, Sink Location Type.	4.2	06/22/2016
Auction_Bids	4	Renamed columns: Owner to Customer	4.2	06/22/2016
		Name, Origin Node to Source Location		
		Name, Destination Node to Sink Location Name.		
	I	Location manne.		

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File	Revision	Description of Change	Version	Posting Date
Auction_Bids	3	Modified descriptions of Bid MW, Bid Price, Buy/Sell. Renamed column: FTR Auction. New column: Owner.	3.1	09/11/12
Auction_Bids	2	Updated the description of the report so that the column names in this document conform to the files produced by eFTR. No changes were made to the reports in the eFTR application.	2.1	10/07/05
FTR_Auction_Results	3	Updated descriptions of report header, and Class Type. Renamed column: FTR Auction. Removed column: Auction Dollars.	3.1	09/11/12
FTR_Auction_Results	2	Updated the description of the report to include details about the information included in the header of the report (primarily that the Market Name is detailed in the header).	2.1	10/07/05
FTR_Auction_Results	1	New. FTR Auction Results Report.	2	08/15/05
Clearing_Prices	2	Added descriptions of renamed and new columns. Renamed: FTR Auction, Class Type, Node Name. New: Node Type.	3.1	09/11/12
Clearing_Prices	1	New column added: Node ID. Name updated to reflect eFTR File Name, previously referred to in this document as Public Clearing Prices Report.	2	08/15/05
Binding_Constraints	2	Added description of the renamed columns: FTR Auction, Class Type.	3.1	09/11/12
Binding_Constraints	1	New column added: Marginal Value. Name updated to reflect eFTR File Name, previously referred to in this document as Public Binding Constraints Report.	2	08/15/05
Auction_Results	1	Name updated in this document to reflect the actual eFTR File Name, previously referred to in this document as Public Results Report. No changes were made to the report in this version.	2	08/15/05
FTR	3	Added column Customer ID, renamed column Owner to Customer Name.	4.2	06/22/2016
FTR	2	Added descriptions of renamed and new columns. Renamed: FTR Auction, Source Location Name, Sink Location Name, Class Type. New: Source Location ID, Source Location Type, Sink Location ID, Sink Location Type.	3.1	09/11/12



File	Revision	Description of Change	Version	Posting Date
FTR	1	Name updated in this document to reflect the actual eFTR File Name, previously referred to in this document as Monthly FTRs Report. No changes have been made to the report in this version.	2	08/15/05
Auction_Bids	1	Name updated in this document to reflect the actual eFTR File Name, previously referred to in this document as Private Results Report. No changes have been made to the report in this version.	2	08/15/05
Public_Results	0	New. Public Results Report.	1	08/15/05
Public_Clearing_Prices	0	New. Public Clearing Prices Report.	1	2003
Public_Binding_Constraints	0	New. Public Binding Constraints Report.	1	2003
Monthly_FTRs	0	New. Monthly FTRs Report.	1	2003
Private_Results	0	New. Private Results Report.	1	2003



#### **Upload File Format – Rev 6**

Upload files must have the CSV (coma-separated values) format. The file extension must be ".csv".

The comment lines and informational lines (line codes "C" and "I") are optional and may be placed in any row of the upload file. The file may start with the first data line (line code "D"). The last comment line must contain the number of lines in the file (counting the last comment line), e.g.: C, END OF REPORT, 25.

The following table describes the upload file format. If the first column contains the code "C" or "I", all the other values are optional, but the fields must be still separated by a coma. If the first column contains the code "D" the values are required or optional as specified in the table below.

COLUMN	DESCRIPTION	FORMAT/ MAX LENGTH	REQUIRED
LINE CODE	The code of the line content: C - Comment I - Information D - Data	1 character	Yes
FTRBID	Optional field		No
BID	Optional field for the data lines. NOTE: In the last line of the upload file, this field must contain the number of rows in the file.		No
VERSION	Optional field		No
CUSTOMER ID	The numeric identifier of the Customer	Number	Yes
AUCTION	Optional field		No
BEGIN	Beginning date of the Auction for which the bid is submitted. This is the first day of month for monthly auctions, or the first day of year for long term auctions.	YYYY/MM/DD	Yes
END	Ending date of the Auction for which the bid is submitted. This is the last day of month for monthly auctions, or the last day of year for long term auctions.	YYYY/MM/DD	Yes
CLASS	ONPEAK or OFFPEAK	7 characters, case sensitive	Yes
BUY SELL	BUY or SELL	4 characters	Yes
SOURCE LOCATION ID	The numeric identifier of the FTR source node	Number	Yes
SINK LOCATION ID	The numeric identifier of the FTR sink node	Number	Yes
MW	The MW amount of the bid. Must be greater than zero.	8 digits with 1 decimal place	Yes
PRICE	The \$/MW amount for the bid	10 digits with 2 decimal places	Yes
SUBACC	Name of the subaccount associated with the FTR transaction. Applicable only to Participants who use subaccounts.	20 characters	No



## Auction Results – Rev 6

Private file transfer / auction\_results.csv

This file contains auction results for FTRs submitted by the Participant.

Availability: After the completion of the FTR auction analysis. It is made available to FTR Holders.

REPORT COLUMN	DESCRIPTION
FTR Auction	The auction name indicating the period for which FTRs are defined and for which the FTR auction was performed.
Source Location ID	The ID of the FTR source location.
Source Location Name	This is the name of the FTR source location. It can be any location for which a locational marginal price is posted by ISO NE.
Source Location Type	Location type of the source node. Location type can be: Hub, Zone, Bus, Aggregate, Interface.
Sink Location ID	The ID of the FTR sink location.
Sink Location Name	This is the name of the FTR sink location. It can be any location for which a locational marginal price is posted by ISO NE.
Sink Location Type	Location type of the sink node. Location type can be: Hub, Zone, Bus, Aggregate, Interface.
Customer ID	The numeric ID of the FTR's owner
Customer Name	The name of the FTR's owner
Class Type	<ul> <li>Designates the auction for which the FTR was submitted, specified as:</li> <li>On — for the on-peak auction</li> <li>Off — for the off-peak auction</li> </ul>
Buy/Sell	A flag that designates whether the bid was a request to purchase an FTR in the FTR auction or an offer to sell an FTR in the FTR auction.
Clearing MW	The cleared MW amount of the FTRs for the source/sink location and class type, specified to the nearest 0.1 MW.
Clearing Price	The dollar amount of the clearing price, specified in \$/MW to the nearest \$0.01. The price may be a positive or a negative number.
SubAccount	The name of the subaccount associated with the FTR. Applicable only to Participants who use subaccounts.



## **Clearing Prices – Rev 2**

Public file transfer / clearing\_prices.csv

This file contains the clearing prices for each node.

Availability: After the completion of the FTR auction analysis. It is made available to registered eFTR users.

REPORT COLUMN	DESCRIPTION
FTR Auction	The auction name indicating the period for which FTRs are defined and for which the FTR auction was performed.
Class Type	<ul> <li>Designates the auction for which the clearing prices are applicable, specified as:</li> <li>On — for the on-peak auction</li> <li>Off — for the off-peak auction</li> </ul>
Node ID	Location ID
Node Name	Location name for source or sink node.
Node Type	Node type can be: Hub, Zone, Bus, Aggregate, Interface.
Clearing Price	The dollar amount of the clearing price, specified in \$/MW to the nearest \$0.01. The price may be a positive or a negative number.

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registered eFTR users.	
REPORT COLUMN	DESCRIPTION
FTR Auction	The auction name indicating the period for which binding constraints are defined and for which the FTR auction was performed.
Class Type	<ul> <li>Designates the auction for which the binding constraints were observed, specified as:</li> <li>On — for the on-peak auction</li> <li>Off — for the off-peak auction</li> </ul>
Monitored Facility	The element of the transmission system whose operating limits are violated under normal or contingency conditions

	under normal of contingency conditions.
Contingency	The name of the contingency in which one or more facilities defined in the contingency will be outaged.
Marginal Value	The Marginal Value of the constraint in dollars per MW.



### FTR – Rev 3

Public file transfer / ftr.csv

This file contains a summary of all FTRs owned by FTR Holders.

Availability: After the completion of the FTR auction analysis. It is made available to registered eFTR users.

REPORT COLUMN	DESCRIPTION	
FTR Auction	The auction name indicating the period for which FTRs are defined and for which the FTR auction was performed.	
Source Location ID	The ID of the FTR source location.	
Source Location Name	This is the name of the FTR source location. It can be any location for which a locational marginal price is posted by ISO NE.	
Source Location Type	Location type of the source node. Location type can be: Hub, Zone, Bus, Aggregate, Interface.	
Sink Location ID	The ID of the FTR sink location.	
Sink Location Name	This is the name of the FTR sink location. It can be any location for which a locational marginal price is posted by ISO NE.	
Sink Location Type	Location type of the sink node. Location type can be: Hub, Zone, Bus, Aggregate, Interface.	
Customer ID	The numeric ID of the FTR's owner	
Customer Name	The name of the FTR's owner	
Start Date	The start date for the FTR, in DD-MM-YYYY format.	
End Date	The end date for the FTR, in DD-MM-YYYY format.	
Class Type	<ul> <li>Designates the auction for which the FTR is submitted, specified as:</li> <li>On — for the on-peak auction</li> <li>Off — for the off-peak auction</li> </ul>	
MW	The cleared MW amount of the FTRs for the source/sink location and class type, specified to the nearest 0.1 MW. FTR MW values are treated as up to quotes in the FTR auction analysis.	
Source Type	Indicates whether an FTR derived from an Auction ('A') or from the Secondary Trading Center ('S'). Note that the originating source is always the auction. This field distinguishes secondary trades from FTRs awarded in the auctions.	



## Auction Bids – Rev 6

Private file transfer / auction\_bids.csv

This file contains auction bids and results for FTRs submitted by the Participant. Availability: Displays auction bids during the auction bidding window. Displays the auction bids and results after the completion of the FTR auction analysis. It is made available to FTR Holders.

REPORT COLUMN	DESCRIPTION
FTR Auction	The auction name indicating the period for which FTRs are defined and for which the FTR auction was performed.
Source Location ID	The numeric ID of the FTR source location.
Source Location Name	The FTR source location name. It can be any location for which a locational marginal price is posted by ISO NE.
Source Location Type	Source location type (Hub, Zone, Bus, Aggregate, Interface)
Sink Location ID	The numeric ID of the FTR sink location.
Sink Location Name	The FTR sink location name. It can be any location for which a locational marginal price is posted by ISO NE.
Sink Location Type	Sink location type (Hub, Zone, Bus, Aggregate, Interface)
Customer ID	The numeric ID of the FTR's owner
Customer Name	The name of the FTR's owner.
Class	<ul> <li>Designates the auction for which the FTR was submitted, specified as:</li> <li>On — for the on-peak auction</li> <li>Off — for the off-peak auction</li> </ul>
Bid MW	The MW amount of the FTR bid specified to the nearest 0.1 MW. FTR MW values are treated as up to quotes in the FTR auction analysis.
Bid Price	The dollar amount of the bid, specified in \$/MW to the nearest \$0.01. The price may be a positive or a negative number.
Clearing MW	The MW amount of the FTR that cleared specified to the nearest 0.1 MW.
Clearing Price	The dollar amount of the clearing price, specified in \$/MW to the nearest \$0.01. The price may be a positive or a negative number.
Buy/Sell	A flag that designates whether the bid was a request to purchase an FTR in the FTR auction or an offer to sell an FTR in the FTR auction.
SubAccount	The name of the subaccount associated with the FTR. Applicable only to Participants who use subaccounts.



#### FTR Auction Results – Rev 3

Public file transfer / ftr\_auction\_results.csv

This file contains auction results.

Availability: After the completion of the FTR auction analysis. It is made available to registered eFTR users.

NOTE: This report contains an additional comment row at the beginning of the report that details the corresponding Auction name for the specific report downloaded. The header also contains the FTR solution status: either date of approval, or "NOT APPROVED". The auction status column is omitted if the report contains data for multiple auctions. The calculated column Auction Dollars has been removed.

REPORT COLUMN	DESCRIPTION
FTR Auction	The auction name indicating the period for which FTRs are defined and for which the FTR auction was performed.
Customer ID	The Customer ID number for the Customer buying or selling the awarded FTR.
Customer Name	The Customer Name for the Customer buying or selling the awarded FTR.
Source Location ID	The Source Node/ Unit ID number of the awarded FTR.
Source Location Name	The Source Node Name of the awarded FTR.
Source Location Type	The Source Location Type of the awarded FTR. It can be a Hub, Load Zone or Network Node.
Sink Location ID	The Sink Node/ Unit ID number of the awarded FTR.
Sink Location Name	The Sink Node Name of the awarded FTR.
Sink Location Type	The Sink Location Type of the awarded FTR. It can be a Hub, Load Zone or Network Node.
Buy/Sell	A flag that designates whether the quote was a request to purchase an FTR in the FTR auction (Buy) or an offer to sell an FTR in the FTR auction (Sell.)
Class Type	<ul> <li>Designates the auction for which the FTR was submitted, specified as:</li> <li>ONPEAK — for the on-peak auction</li> <li>OFFPEAK — for the off-peak auction</li> </ul>
Award FTR MW	The amount of the FTR awarded in the auction specified to the nearest 0.1 MW.
Award FTR Price	The dollar amount of the clearing price, specified in \$/MW to the nearest \$0.01. The price may be a positive or a negative number.