Attachment 6
NCTA CSC Back Office System RTCS File Exchanges – ICD (DRAFT)

Submittal/Transmittal

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North Carolina Turnpike Authority

Back Office System

RTCS File Exchanges – Interface Control Document

NORTH CAROLINA
Turnpike Authority

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Version 1.2

Version History

Version Number	Date	Description	Author
1.0	01/11/2016	Initial Submission	Ganesh Kumaraswamy
1.1	01/15/2016	Updates to transaction vs trip Updated based on Kevin Palmer's comments	Ganesh Kumaraswamy
1.2	03/02/2016	Added Image file specification	Ganesh Kumaraswamy

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1 File Details

The following document outlines the specifications of the proposed file format to be used in conjunction with the new RTCS systems as part of the NCTA project. All the files specified are in **ASCII** format and the individual columns are delimited by comma (,).

1.1 XTAG File Sent from CSC to Toll Collection System Host

Tag status (XTAG) files are created by the Customer Service Center (CSC) once per day by aggregating North Carolina Department of Transportation (NCDOT) tag status and all Interop (IAG, SunPass and PeachPass) agency tag status files into a single file for the toll collection system.

Uncompressed naming convention:	C33_{FILE_NAME}.XTAG
Uncompressed naming formats:	C33_YYYYMMDDHHMMSS.XTAG
Uncompressed naming examples:	C33_20041203213000.XTAG

Table 1-1: Tag Status (XTAG) File – Header Structure

Field Name	Type/Size	Description/Valid Values
FILE_TYPE	CHAR(4)	FULL/INCR (INCR is the incremental tag status file since last update. This is applicable only for Home customers)
FROM_AGENCY_ID	CHAR(3)	C33
FILE_DATE	CHAR(8)	Date file created. Format: YYYYMMDD
FILE_TIME	CHAR(6)	Time file created: Format: HHMMSS
RECORD_COUNT	CHAR(8)	Count of all tags in file. Does not include header record. Values: 00000000 – 99999999
COUNT_STAT1	CHAR(8)	Count of all tags with status code 1. Values: 00000000 – 99999999

Field Name	Type/Size	Description/Valid Values
COUNT_STAT2	CHAR(8)	Count of all tags with status code 2. Values: 00000000 – 99999999
COUNT_STAT3	CHAR(8)	Count of all tags with status code 3. Values: 00000000 – 99999999
COUNT_STAT4	CHAR(8)	Count of all tags with status code 4. Values: 00000000 – 99999999
COUNT_STAT5	**CHAR(8)**	Count of all tags with status code 5. Values: 00000000 – 99999999
DELIMITER	CHAR(1)	LF
Header Total	**70**	

Table 1-2: Tag Status (XTAG) File - Detail Structure

Field Name	Type/Size	Description/Valid Values
TAG_AGENCY_ID	CHAR(3)	Tag agency ID. Values: 000 – 127
TAG_SERIAL_NUMBER	CHAR(8)	Tag serial number. Values: 00000001 – 16777216
TAG_STATUS	CHAR(1)	1 = Valid (report use to CSC) 2 = Low Balance (report use to CSC) 3 = Zero balance (report use to VPC)(Type 1 Violation) 4 = Invalid or lost/stolen (report use to VPC)(Type 1 Violation) 5 = non-revenue
TAG_INFO	CHAR(6)	000000 (all zeroes)
DELIMITER	CHAR(1)	LF
Record Total	**19**	

The XTAG file is zipped before transmission and can be opened using the PKZIP or WINZIP Lempel-Zif compression algorithm.

Compressed naming convention: C33_{FILE_NAME}_{FILE_TYPE}.ZIP

Compressed naming format: C33_YYYYMMDDHHMMSS_XTAG.ZIP

Compressed naming example: C33_20041203213000_XTAG.ZIP

XTAG files are securely transmitted by the CSC File Transfer Protocol (FTP) Client to the toll collection system Host (Host) FTP Server.

The toll collection system does not begin processing an XTAG file until after its accompanying XTAG_CHECK file is also received.

1.2 XTAG_CHECK File Sent from the CSC to the Toll Collection System

A tag status check (XTAG_CHECK) file is created by the CSC as each XTAG file is created.

Uncompressed naming convention: C33_{FILE_NAME}_{FILE_TYPE}.CHECK

Uncompressed naming format: C33_YYYYMMDDHHMMSS_XTAG.CHECK

Uncompressed naming example: C33_20041203213000_XTAG.CHECK

Table 1-3: Tag Status Check (XTAG_CHECK) File

Field Name	Type/Size	Description/Valid Values
ORIG_FILE_NAME_TYPE	CHAR(80)	The exact character sequence from the name of the XTAG file sent by the CSC to the toll collection system. Format: C33_{FILE_NAME}.XTAG
Total	**80**	

The XTAG_CHECK file is not compressed.

XTAG_CHECK files are securely transmitted by the CSC FTP Client to the toll collection system (Host) FTP Server.

The toll collection system begins processing the XTAG file only after receiving the accompanying XTAG_CHECK file. After processing, the toll collection system responds with an XTAG_ACK file.

1.3 XTAG_ACK File Sent from Toll Collection System Host to CSC

A tag status acknowledgement (XTAG_ACK) file is created by the toll collection system only after each XTAG file is processed.

Naming convention:	T33_{FILE_NAME}_{FILE_TYPE}.ACK
Naming format:	T33_YYYYMMDDHHMMSS_XTAG.ACK
Naming example:	T33_20041203213000_XTAG.ACK

Table 1-4: Tag Status Acknowledgement (XTAG_ACK) File

Field Name	Type/Size	Description/Valid Values
FILE_TYPE	CHAR(4)	ACK
FROM_AGENCY_ID	CHAR(3)	T33
TO_AGENCY_ID	CHAR(3)	C33
ORIG_FILE_NAME_TYPE	CHAR(50)	The exact character sequence from the name of the XTAG file sent by the CSC to the toll collection system. Format: C33_{FILE_NAME}.XTAG
FILE_DATE	CHAR(8)	Date the toll collection system created the ACK file. Format: YYYYMMDD
FILE_TIME	CHAR(6)	Time the toll collection system created the ACK file. Associated tag status is sent to the lanes after this time. Format: HHMMSS
RETURN_CODE	CHAR(2)	A code indicating the status of the XTAG file being acknowledged. Values: 00 – File was successfully received and verified 01 – Header record found with data preventing file's use. 02 – Detail record(s) found with data preventing file's use. 07 – General file structure defect preventing file's use.
DELIMITER	CHAR(1)	LF
Total	**77**	

The XTAG_ACK file is not compressed.

XTAG_ACK files are securely transmitted by the toll collection system (Host) FTP Client to the CSC FTP Server.

For a RETURN_CODE of 00 in an XTAG_ACK file, the toll collection system asynchronously loads the associated tag status into the lanes only after it successfully puts the XTAG_ACK file to the CSC

For all other return codes, this new tag status is not loaded into the toll collection system lanes.

1.4 Customer License Plate File

License Plate File (ICLP) files are created by every Interop CSC (IAG, SunPass and PeachPass) once per day. This file includes the vehicle license plate numbers of valid customers (customers with at least one tag with a TAG_STATUS of '1' or '2'). This file will allow the Away Agency/CSC to collect the toll from the Home Agency/CSC for an untagged customer violation.

Uncompressed naming convention:	<AGENCY>_{FILE_NAME}.ICLP
Uncompressed naming formats:	<AGENCY>_YYYYMMDDHHMMSS.ICLP
Uncompressed naming examples:	033_20141203213000.ICLP

Table 1-5: License Plate (ICLP) File – Header Structure

Field Name	Type/Size	Description/Valid Values
FILE_TYPE	CHAR(4)	ICLP
FROM_AGENCY_ID	CHAR(3)	HOME AGENCY DEVICE PREFIX
FILE_DATE	CHAR(8)	Date file created. Format: YYYYMMDD
FILE_TIME	CHAR(6)	Time file created: Format: HHMMSS
RECORD_COUNT	CHAR(8)	Count of all detail records in file. Does not include header record. Values: 00000000 – 99999999
DELIMITER	CHAR(1)	LF
Header Total	**30**	

Table 1-6: License Plate (ICLP) File - Detail Structure

Field Name	Type/Size	Description/Valid Values
LIC_STATE	CHAR(2)	Standard State abbreviation (or Province abbreviation for Canada). This field cannot be blank. If this field does not contain a valid state/province abbreviation, the record should be rejected.
LIC_NUMBER	CHAR(10)	Plate number must be left justified with no embedded blanks, hyphens (-), periods (.) or other special characters not allowed on a license plate. If this field contains invalid characters, the record should be rejected. Valid characters shall include: A-Z (uppercase only) and 0-9.
LIC_TYPE	CHAR(2)	The license plate type. Values: ** if unused
TAG_AGENCY_ID	CHAR(3)	Tag agency ID. Values: 000 – 127
TAG_SERIAL_NUMBER	CHAR(8)	Tag serial number. Values: 00000001 – 16777215
DELIMITER	CHAR(1)	LF
Record Total	**26**	

The ICLP file is zipped before transmission and can be opened using the PKZIP or WINZIP Lempel-Zif compression algorithm.

Compressed naming convention: <AGENCY>_{FILE_NAME}_{FILE_TYPE}.ZIP

Compressed naming format: <AGENCY>_YYYYMMDDHHMMSS_ICLP.ZIP

Compressed naming example: 033_20141203213000_ICLP.ZIP

ICLP files are securely transmitted by the CSC FTP Client to the toll collection system Host (Host) FTP Server.

The toll collection system does not begin processing an ICLP file until after its accompanying ICLP_CHECK file is also received.

1.5 ICLP_CHECK File Sent from the CSC to the Toll Collection System

A tag status check (ICLP_CHECK) file is created by the CSC as each ICLP file is transmitted.

Uncompressed naming convention: <AGENCY>_{FILE_NAME}_{FILE_TYPE}.CHECK

Uncompressed naming format: <AGENCY>_YYYYMMDDHHMMSS_ICLP.CHECK

Uncompressed naming example: 033_20141203213000_ICLP.CHECK

Table 1-7: License Plate Check (ICLP_CHECK) File

Field Name	Type/Size	Description/Valid Values
ORIG_FILE_NAME_TYPE	CHAR(80)	The exact character sequence from the name of the ICLP file sent by the CSC to the toll collection system. Format: <AGENCY>_{FILE_NAME}.ICLP
Total	**80**	

The ICLP_CHECK file is not compressed.

ICLP_CHECK files are securely transmitted by the CSC FTP Client to the toll collection system (Host) FTP Server.

The toll collection system begins processing the ICLP file only after receiving the accompanying ICLP_CHECK file. After processing, the toll collection system responds with an ICLP_ACK file.

1.6 ICLP_ACK File sent from Toll Collection System Host to CSC

A license plate acknowledgement (ICLP_ACK) file is created by the toll collection system only after each ICLP file is processed.

Naming convention: <AGENCY>_{FILE_NAME}_{FILE_TYPE}.ACK

Naming format: <AGENCY>_YYYYMMDDHHMMSS_ICLP.ACK

Naming example: <AGENCY>_20141203213000_ICLP.ACK

Table 1-8: License Plate Acknowledgement (ICLP_ACK) File

Field Name	Type/Size	Description/Valid Values
FILE_TYPE	CHAR(4)	ACK
FROM_AGENCY_ID	CHAR(3)	T33
TO_AGENCY_ID	CHAR(3)	C33
ORIG_FILE_NAME_TYPE	CHAR(50)	The exact character sequence from the name of the ICLP file sent by the CSC to the toll collection system. Format: <AGENCY>_{FILE_NAME}.ICLP
FILE_DATE	CHAR(8)	Date the toll collection system created the ACK file. Format: YYYYMMDD
FILE_TIME	CHAR(6)	Time the toll collection system created the ACK file. Format: HHMMSS
RETURN_CODE	CHAR(2)	A code indicating the status of the ICLP file being acknowledged. Values: 00 – File was successfully received and verified 01 – Header record found with data preventing file's use. 02 – Detail record(s) found with data preventing file's use. 07 – General file structure defect preventing file's use.
DELIMITER	CHAR(1)	LF
Total	**77**	

The ICLP_ACK file is not compressed.

ICLP_ACK files are securely transmitted by the toll collection system (Host) FTP Client to the CSC FTP Server.

1.7 Transaction File

The Transaction (TRAN) file is created by the Host system to inform the Back Office System (BOS) of the toll transactions generated by the Host at a detail level. This file includes a unique sequence number of the transaction that is generated by the Host system, and all the associated details of the transaction.

Uncompressed naming convention: T33_{FILE_NAME}.TRAN

Uncompressed naming formats: T33_YYYYMMDDHHMMSS.TRAN

Uncompressed naming examples: T33_20141203213000.TRAN

Table 1-9: Transaction (TRAN) File – Header Structure

Field Name	Type/Size	Description/Valid Values
FILE_TYPE	CHAR(4)	TRAN
FROM_AGENCY_ID	CHAR(3)	T33
FILE_DATE	CHAR(8)	Date file created. Format: YYYYMMDD
FILE_TIME	CHAR(6)	Time file created: Format: HHMMSS
RECORD_COUNT	CHAR(8)	Count of all detail transaction records in file. Does not include header record. Values: 00000000 – 99999999
DELIMITER	CHAR(1)	LF
Header Total		

Table 1-10: Transaction (TRAN) File – Detail Structure

Field Name	Type/Size	Required Field	Description/Valid Values
RECORD_INDICTATOR	CHAR(1)	Y	T - Transaction record
TRAN_TYPE	CHAR(1)	Y	T, V, A or I Transaction Types: = 'T' for Transponder Transaction= 'V' for Video Transaction='A' for Toll Credit Transaction Adjustment= 'I' for Informational submittal. Used for ITS or traffic count data

Field Name	Type/Size	Required Field	Description/Valid Values
RECORD_TYPE	CHAR(1)	Y	O, R, or C Record Types:= 'O' for Original Transaction= 'R' for Resubmittal= 'C' Correction
ETC_TRX_SERIAL_NUM	CHAR(18)	Y	Non-negative The unique ID of a transaction assigned by the Facility.
RESUBMITTAL_REASON	CHAR(2)	N	2 digit number code A code denoting the reason for Resubmittal. Values: i.e. 00 - Updated Interop Transaction. Required field if Record Type is 'R'.
RESUBMITTAL_COUNT	CHAR(1)	N	1-9 The number of times that the Transaction has been resubmitted by the Subscriber/Facility. Required field if Record Type is 'R'.
CORR_REASON	CHAR(2)	N	01- 05 A code denoting the reason for the correction. Values: 01 – Resolved mismatch: class/toll corrected 02 – Ignore license plate Transaction 03 – Ignore tagged Transaction 04 – Corrected plaza/lane information 05 – Corrected toll Required field if Record Type is 'C'.
ETC_FAC_AGENCY	CHAR(3)	Y	Refer to Appendix B for valid values A code indicating the agency/authority which owns/operates the facility on which the Transaction occurred. For multi-agency CSCs, this code will not represent the CSC but will represent the agency within the CSC which owns/operates the facility.
SUBSCRIBER_ID	CHAR(3)	Y	Indicates the Subscriber/Facility providing the transaction for back office processing.

Field Name	Type/Size	Required Field	Description/Valid Values
ETC_ENTRY_PLAZA	CHAR(3)	N	Refer to Appendix B for the list of valid values for this field. The ETC_FAC_AGENCY plaza code of the plaza at which the vehicle entered the facility. *** For Barrier/Unmatched Exit For single transaction transactions ETC_EXIT_PLAZA is used and this field left blank. Refer to Appendix B for the list of valid values for this field. Required for multi-transaction trips.
ETC_ENTRY_LANE	CHAR(4)	N	The entry lane number in which the transaction occurred. **** For Barrier/Unmatched Exit For single transaction transactions. Required for multi-transaction trips.
ETC_ENTRY_DATE	CHAR(8)	N	YYYYMMDD The date the vehicle entered the facility (GMT) Format: YYYYMMDD ******** For Barrier/Unmatched Exit For single transaction transactions. Required for multi-transaction trips.
ETC_ENTRY_TIME	CHAR(12)	N	The time the vehicle entered the facility (allowing for milliseconds) (GMT) Format: HHMMSSffffff For Barrier/Unmatched Exit For single transaction transactions Required for multi-transaction trips..
ETC_EXIT_PLAZA	CHAR(3)	Y	Refer to Appendix B for the list of valid values for this field The ETC_FAC_AGENCY plaza code of the plaza at which the vehicle exited the facility. Refer to Appendix B for the list of valid values for this field.
ETC_EXIT_LANE	CHAR(4)	Y	The exit lane number in which the transaction occurred.
ETC_EXIT_DATE	CHAR(8)	Y	The date the vehicle exited the facility. Format: YYYYMMDD

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Field Name	Type/Size	Required Field	Description/Valid Values
ETC_EXIT_TIME	CHAR(12)	Y	The time the vehicle exited the facility (allowing for milliseconds) (GMT)Format: HHMMSSffffff
ETC_LANE_MODE	CHAR(1)	N	Refer to Appendix B for lane modes. The mode the lane was operating in at the time of the Transaction. Values: E – ETC Only (Dedicated) A – ETC/ACM M – Manned/ETCC – Manned/ETC with Carpool confirmation
ETC_TAG_SERIAL_NUMBER	CHAR(8)	N	Tag serial number read from the tag or as retrieved from the Customer License Plate File for an untagged violation. Required field if Transaction Type is 'T'.
ETC_TAG_AGENCY	CHAR(3)	N	000 – 127 Standard agency ID read from the tag or as retrieved from the Customer License Plate File for an untagged violation. Values: 000 – 127
ETC_VALIDATION_STATUS	CHAR(1)	N	Refer to Appendix B for Transponder status indicators. The tag status from the tag status file at the time of the Transaction. Values: 1 – Good 2 – Low Balance* - Untagged violation where no tag was read but the license plate on the image was found on the Customer License Plate File. Also used if the lane system does not report this value to its CSC. For Ticketed, this would be from the exit Transaction.

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Field Name	Type/Size	Required Field	Description/Valid Values
ETC_LIC_NUMBER	CHAR(10)	N	Note that the ETC_LIC_STATE/ETC_LIC_NUMBER presented in the Transaction may not actually be associated with the account represented by the ETC_TAG_AGENCY/ ETC_TAG_SERIAL_NUMBER. The Home Agency/CSC should use the tag information to determine the account to which the Transaction should be posted. The Home Agency/CSC should attempt to present the Transaction on the customer's statement using the license plate information when such is provided (as opposed to the tag information). Required field if Transaction Type is 'V'. Optional field if Transaction Type is 'T'.
ETC_LIC_STATE	CHAR(2)	N	2 Character abbreviation. License plate state for video transaction.
ETC_LIC_PLATE_TYPE	CHAR(2)	N	Non-negative Special plate code. https://edmv.ncdot.gov/VehicleRegistration/ SpecialPlate#term
ETC_CLASS_CHARGED	CHAR(3)	Y	Refer to Appendix B. Vehicle Classification code (LOV, etc.)
ETC_DEBIT_CREDIT	CHAR(1)	N	+ or - An indicator as to whether the toll reflected in ETC_TOLL_AMOUNT is to be debited from the customer account or credited to the customer account. Values: Plus (+) – Debit from customer account Space ( ) – Debit from customer account Minus (-) – Credit to customer account Debit if not populated
ETC_TOLL_AMOUNT	CHAR(6)	Y	0.00–999.99 Full transponder toll amount due as calculated by the Facility before any discount is applied.

Field Name	Type/Size	Required Field	Description/Valid Values
ETC_DISCOUNT_TYPE	CHAR(1)	N	1, 2 or 3 1 = Facility Discount 2 = HOV 3 = Exempt Not populated if no discount applies.
ETC_DISC_TOLL_AMOUNT	CHAR(6)	N	0.00–999.99 The Total Transponder Toll Amount after any discount is applied. The discount type is denoted in Transponder Discount Type. Required field if Transponder Discount Type is populated.
VIDEO_TOLL_AMOUNT	CHAR(6)	Y	0.00–999.99 Full video toll amount due as calculated by the Facility before any discount is applied.
VIDEO_DISCOUNT_TYPE	CHAR(1)	N	1, 2 or 3 1 = Facility Discount 2 = HOV 3 = Exempt Not populated if no discount applies.
VIDEO_DISC_TOLL_AMOUNT	CHAR(6)	N	0.00–999.99 The Total Video Toll Amount after any discount is applied. The discount type is denoted in Video Discount Type. Required field if Video Discount Type is populated.
NUMBER_OF_IMAGES	CHAR(2)	N	0-99 Number of images associated with the Transaction. Required field if Transaction Type is 'V'.
DELIMITER	CHAR(1)	Y	LF
Record Total	**133**		
RECORD_INDICTATOR	CHAR(1)	Y	I - Image record
IMAGE_TYPE	CHAR(1)	N	F, B or L F - Front Image, B – Back Image, L – License Plate only.
IMAGE_FILE_NAME	CHAR(38)	N	See Image File Name Format. File name of the image file.

Field Name	Type/Size	Required Field	Description/Valid Values
DELIMITER	CHAR(1)	Y	LF
Record Total	**41**		

The TRAN file is zipped before transmission and can be opened using the PKZIP or WINZIP Lempel-Zif compression algorithm.

Compressed naming convention:	T33_{FILE_NAME}_{FILE_TYPE}.ZIP
Compressed naming format:	T33_YYYYMMDDHHMMSS_TRAN.ZIP
Compressed naming example:	T33_20141203213000_TRAN.ZIP

TRAN files are securely transmitted by the Host system client to the CSC FTP Server.

The CSC system does not begin processing a TRAN file until after its accompanying TRAN_CHECK file is also received.

1.7.1 TRAN_CHECK File Sent from the Toll Collection System to the CSC

A check (TRAN_CHECK) file is created by the Host system as each TRAN file is transmitted.

Uncompressed naming convention:	T33_{FILE_NAME}_{FILE_TYPE}.CHECK
Uncompressed naming format:	T33_YYYYMMDDHHMMSS_TRAN.CHECK
Uncompressed naming example:	T33_20141203213000_TRAN.CHECK

Table 1-11: Transaction Check (TRAN_CHECK) File

Field Name	Type/Size	Description/Valid Values
ORIG_FILE_NAME_TYPE	CHAR(80)	The exact character sequence from the name of the TRAN file sent by the CSC to the toll collection system. Format: T33_{FILE_NAME}.TRAN
Total	**80**	

The TRAN_CHECK file is not compressed.

TRAN_CHECK files are securely transmitted by the toll collection system (Host) client to CSC FTP Server.

The toll collection system begins processing the TRAN file only after receiving the accompanying TRAN_CHECK file. After processing, the CSC system responds with a TRAN_ACK file.

1.7.2   TRAN_ACK File sent from CSC to Toll Collection System Host

A transaction acknowledgement (TRAN_ACK) file is created by the CSC after each TRAN file is processed.

Naming convention: C33_{FILE_NAME}_{FILE_TYPE}.ACK

Naming format: C33_YYYYMMDDHHMMSS_TRAN.ACK

Naming example: C33_20141203213000_TRAN.ACK

Table 1-12: Transaction Acknowledgement (TRAN_ACK) File

Field Name	Type/Size	Description/Valid Values
FILE_TYPE	CHAR(4)	ACK
FROM_AGENCY_ID	CHAR(3)	C33
TO_AGENCY_ID	CHAR(3)	T33
ORIG_FILE_NAME_TYPE	CHAR(50)	The exact character sequence from the name of the TRAN file sent by the CSC to the toll collection system. Format: T33_{FILE_NAME}.TRAN
FILE_DATE	CHAR(8)	Date the CSC system created the ACK file. Format: YYYYMMDD
FILE_TIME	CHAR(6)	Time the CSC system created the ACK file. Format: HHMMSS
RETURN_CODE	CHAR(2)	A code indicating the status of the TRAN file being acknowledged. Values: 00 – File was successfully received and verified 01 – Header record found with data preventing file's use. 02 – Detail record(s) found with data preventing file's use. 07 – General file structure defect preventing file's use.
DELIMITER	CHAR(1)	LF
Total	**77**	

The TRAN_ACK file is not compressed.

TRAN_ACK files are securely transmitted by the CSC FTP client to the toll collection system (Host) FTP Server.

1.8 Transaction Disposition File

Transaction Disposition (DISP) file is created by the Back Office System (BOS) to inform the Host system, the current disposition of a transaction at a detail level. This file includes the unique sequence number of the transaction that was originally submitted by the Host system, its current status and financial associated with the transaction if applicable.

Uncompressed naming convention: C33_{FILE_NAME}.DISP

Uncompressed naming formats: C33_YYYYMMDDHHMMSS.DISP

Uncompressed naming examples: C33_20141203213000.DISP

Table 1-13: Transaction Disposition (DISP) File – Header Structure

Field Name	Type/Size	Description/Valid Values
FILE_TYPE	CHAR(4)	DISP
FROM_AGENCY_ID	CHAR(3)	C33
FILE_DATE	CHAR(8)	Date file created. Format: YYYYMMDD
FILE_TIME	CHAR(6)	Time file created: Format: HHMMSS
RECORD_COUNT	CHAR(8)	Count of all detail records in file. Does not include header record. Values: 00000000 – 99999999
DEPOSIT_ID	CHAR(12)	Deposit ID that is used to track the bank deposits <to be discussed>
DELIMITER	CHAR(1)	LF
Header Total	**42**	

Table 1-14: License Plate (ICLP) File - Detail Structure

Field Name	Type/Size	Description/Valid Values
TRX_SERIAL_NUM	CHAR(12)	The unique key of the transaction assigned by the Host system Values: 000000000000 – 999999999999

Field Name	Type/Size	Description/Valid Values
DISP_TYPE	CHAR(2)	01 – Informational 02 – Payment 03 – Rejection 04 – Adjustment 05 – Rejection after payment 06 – Adjustment after payment
DISP_STATUS	CHAR(4)	The current status of the transaction. Refer to Appendix B for list of values.
POSTED_AMOUNT	CHAR(6)	Format 0.00 to 999.99 The amount posted. For rejected or Interim updates, this would be 0.00.
POSTED_DATE	CHAR(8)	Transaction posted date at the back office
DELIMITER	CHAR(1)	LF
Record Total	**42**	

The DISP file is zipped before transmission and can be opened using the PKZIP or WINZIP Lempel-Zif compression algorithm.

Compressed naming convention: C33_{FILE_NAME}_{FILE_TYPE}.ZIP

Compressed naming format: C33_YYYYMMDDHHMMSS_DISP.ZIP

Compressed naming example: C33_20141203213000_DISP.ZIP

DISP files are securely transmitted by the CSC FTP Client to the toll collection system Host (Host) FTP Server.

The toll collection system does not begin processing a DISP file until after its accompanying DISP_CHECK file is also received.

1.8.1 DISP_CHECK File Sent from the CSC to the Toll Collection System

A check (DISP_CHECK) file is created by the CSC as each DISP file is transmitted.

Uncompressed naming convention: C33_{FILE_NAME}_{FILE_TYPE}.CHECK

Uncompressed naming format: C33_YYYYMMDDHHMMSS_DISP.CHECK

Uncompressed naming example: C33_20141203213000_DISP.CHECK

Table 1-15: Transaction Disposition Check (DISP_CHECK) File

Field Name	Type/Size	Description/Valid Values
ORIG_FILE_NAME_TYPE	CHAR(80)	The exact character sequence from the name of the DISP file sent by the CSC to the toll collection system. Format: C33_{FILE_NAME}.DISP
Total	**80**	

The DISP_CHECK file is not compressed.

DISP_CHECK files are securely transmitted by the CSC FTP Client to the toll collection system (Host) FTP Server.

The toll collection system begins processing the DISP file only after receiving the accompanying DISP_CHECK file. After processing, the toll collection system responds with a DISP_ACK file.

1.8.2 DISP_ACK File sent from Toll Collection System Host to CSC

A disposition acknowledgement (DISP_ACK) file is created by the toll collection system only after each DISP file is processed.

Naming convention: T33_{FILE_NAME}_{FILE_TYPE}.ACK

Naming format: T33_YYYYMMDDHHMMSS_DISP.ACK

Naming example: T33_20141203213000_DISP.ACK

Table 1-16: Transaction Disposition Acknowledgement (DISP_ACK) File

Field Name	Type/Size	Description/Valid Values
FILE_TYPE	CHAR(4)	ACK
FROM_AGENCY_ID	CHAR(3)	T33
TO_AGENCY_ID	CHAR(3)	C33
ORIG_FILE_NAME_TYPE	CHAR(50)	The exact character sequence from the name of the DISP file sent by the CSC to the toll collection system. Format: C33_{FILE_NAME}.DISP
FILE_DATE	CHAR(8)	Date the toll collection system created the ACK file. Format: YYYYMMDD
FILE_TIME	CHAR(6)	Time the toll collection system created the ACK file. Format: HHMMSS

Field Name	Type/Size	Description/Valid Values
RETURN_CODE	CHAR(2)	A code indicating the status of the DISP file being acknowledged. Values: 00 – File was successfully received and verified 01 – Header record found with data preventing file's use. 02 – Detail record(s) found with data preventing file's use. 07 – General file structure defect preventing file's use.
DELIMITER	CHAR(1)	LF
Total	**77**	

The DISP_ACK file is not compressed.

DISP_ACK files are securely transmitted by the toll collection system (Host) FTP Client to the CSC FTP Server.

1.9 Violation Image File (.JPG)

The Image (.JPG) file is created by the Host system to inform the BOS of the images corresponding to the video transactions generated at the Host. The BOS requires two images per transaction which will be compressed into a single .zip file. These .zip files will be exchanged via drop box using secured FTP.

The .zip file will include the best region of interest (ROI) image and the best rear overview image. For commercial vehicles the front overview image would need to be provided if a front ROI image is provided. These images are expected to be compressed but suitable for inclusion in a printed statement and presentation to the customer or customer service representative (CSR) via a web based application.

1.9.1 Image File Name

Format:

PPP_LLSYYYYMMDDHHMMSSTTF_N.jpg

Field definitions are defined in the table below.

Table 1-17: Violation Image File Field Definitions

Field Name	Definition
PPP	Plaza ID (4 chars including trailing '_') Plaza IDs less than three (3) characters will have preceding 0 added. E.g. T01_ for Toll Zone Number 8-1 ETC_EXIT_PLAZA From Trip File
LL	Lane ID (two (2) chars with leading zeros). 01 : default if no lanes are in trips file
S	Straddling indicator N not straddling U upper D lower E.g. Lane 02U indicates a vehicle drove through lane 2, straddling with lane 3
YYYYYMMDD	The date time (eight (8) chars) This is the local time from the Zone Controller ETC_EXIT_DATE From trip file

Field Name	Definition
HHMMSSTT	The time of the transaction HH - Hour MM - Minute SS - Second TT – Centi-seconds ETC_EXIT_TIME From trips File
F	Day Light Saving D - Day Light Saving Time S - Standard Time

N	Image number (1, 2).
	  1 is the index of the ROI image which is generated by the license plate recognition (LPR) process.
	  2 is the index of the image generated by the Zone Controllers.

Jpg	File extension

Example image file name:

T01_01N2010021211183701S_1.jpg

1.9.2   IMAGE .ZIP File

Format:

PPP_LLSYYYYMMDDHHMMSSTTF.zip

Field definitions are defined in the table below.

Table 1-18: Image .Zip File Field Definitions

Field Name	Definition
PPP	Plaza ID (4 chars including trailing '_') Plaza IDs less than three (3) chars will have preceding 0 added. E.g. T01_ for Toll Zone Number 8-1 ETC_EXIT_PLAZA From Trip File
LL	Lane ID (two (2) chars with leading zeros). 01 : If no lane in trips File

Field Name	Definition
S	Straddling indicator N not straddling U upper D lower E.g. Lane 02U indicates a vehicle drove through lane 2, straddling with lane 3
YYYYYMMDD	The date time (eight (8) chars) This is the local time from the Zone Controller ETC_EXIT_DATE From trip File
HHMMSSTT	The time of the transaction HH - Hour MM - Minute SS - Second TT – Centi-seconds ETC_EXIT_TIME From trips File
F	Day Light Saving D - Day Light Saving Time S - Standard Time
zip	File extension

Appendix A: Acronyms

Acronym	Definition
ACK	Acknowledgement file
BOS	Back Office System
CSC	Customer Service Center
DISP	Transaction Disposition
FTP	File Transfer Protocol
IAG	Interagency Group
ICLP	License Plate File
LPR	License Plate Recognition
NCDOT	North Carolina Department of Transportation
NCTA	North Carolina Turnpike Authority
XTAG	Tag Status File
ROI	Region of Interest
RTCS	Roadside Toll Collection System

Appendix B: List of DISP Codes

Table B-1: List of Codes Applicable to Home Agency Transactions

CSC DISP Code	Status	Description
1	TOLL	Home Agency toll posted successfully as a normal ETC transaction
2	VTOL	Home Agency toll posted successfully as a ETC violation transaction
601	XTOLL	Home Agency toll corrected successfully as a normal ETC transaction
602	XVTOLL	Home Agency toll corrected successfully as a ETC violation transaction
11	TAGINV	Tag Inventory - Tag is currently in the Vector's Inventory status. This status indicates that Tag is in CSC. Any transactions received on a tag will be a violation transaction and go through the violation processing system)
12	TAGLOST	Tag Lost
13	TAGSTOLEN	Tag Stolen
14	TAGRETURNED	Tag in shipping, Returned Defective, Tag Returned
15	TAGDAMAGED	Tag Damaged
16	INVTAG	Invalid tag – Does not belong to any participating agencies
22	DUPL	Duplicate transaction
24	INVACC	Invalid Account – Not a valid account
26	INVACPEND	Invalid Account Pending – Account is not open and waiting for payment
27	INVACRVKF	Invalid Account Revoked Final – Account is in collection
28	INVACCLOS	Invalid Account Closed
29	XLANE	Cross Lane - duplicate reject
31	POACHING	Poaching - duplicate reject
51	QINVPLAZA	Transaction rejected as invalid due to an invalid plaza
52	QINVDATE	Transaction rejected as invalid due to invalid date
53	QINVAGENCY	Transaction rejected as invalid due to invalid agency code
99	OLDREQ	Transaction request is beyond posting limit

Table B-2: CSC Reason Codes for Interoperability Transactions

CSC Reason Code	Status	Description
06	POST	Transaction posted successfully to an Interop Agency account due to a tag read at the lanes.
07	PPST	Transaction posted successfully to an Interop Agency account as a pay-by-plate transaction.
41	NPST	Toll transaction did not post but Home Agency acknowledges that toll is still owed to the Away Agency
42	INSU	Rejected, account has insufficient funds where transaction date/time (ETC_EXIT_DATE/ ETC_EXIT_TIME) is greater than date/time of acknowledgement from that Away Agency/CSC of receipt of full Tag Status File which indicated that the tag was in an Invalid status. See Invalid Tag Customer File for associated name/address information
43	TAGB	Rejected, tag in bad status (e.g., lost, stolen, etc.) where transaction date/time (ETC_EXIT_DATE/ ETC_EXIT_TIME) is greater than date/time of acknowledgement from that Away Agency/CSC of receipt of full Tag Status File which indicated that the tag was in a Lost/Stolen status.
44	ACCB	Rejected, account in bad status (revoked, closed, etc.) where transaction date/time (ETC_EXIT_DATE/ ETC_EXIT_TIME) is greater than date/time of acknowledgement from that Away Agency/CSC of receipt of full Tag Status File which indicated that the tag was in an Invalid status. See Invalid Tag Customer File for associated name/address information.
45	RJDP	Rejected, duplicate transaction. Usually associated with a skip read or cross lane read where a tagged transaction and license plate transaction exist for the same customer at the same plaza within "X" minutes. The license plate transaction is rejected as the duplicate
46	OLD1	Rejected, old transaction – account closed. The difference between the date of the transaction and the date the transaction was received by the Home Agency/CSC exceeded that specified in the Reciprocity Agreement under Account Settlement Process for Valid Tag Transactions when accounts are closed.

CSC Reason Code	Status	Description
47	OLD2	Rejected, old transaction – other. The difference between the date of the transaction and the date the transaction was received by the Home Agency/CSC exceeded that specified in the Reciprocity Agreement under Account Settlement Process for Valid Tag Transactions when accounts are not closed.
48	RINV	Rejected, the transaction contains invalid data (e.g., invalid agency as defined in IAG spec)
49	RJPL	Rejected license plate transaction. The license plate transaction could not be posted.

Table B-3: CSC Reason Codes for Violation Transactions

CSC Reason Code	Status	Description
09	ITOL	Home Agency toll posted successfully to a valid account using license plate information.
609	XITOLL	Home Agency toll corrected successfully as a ITOL
100	VCSCRCV	Image transaction received at CSC
104	VNOIMG	Image transaction with no image after "X" number of days
107	DMVS	Image Transaction sent to DMV for name and address lookup
108	DMVR	Image Transaction information received from DMV
111	INVDMVHLD	Invoice transaction in DMV hold
112	INVDMVPAY	Invoice transaction paid at DMV Payment
113	INVDMVREL	Invoice transaction paid at DMV Release
114	INVPFULL	Invoice transaction paid full
115	INVPPART	Invoice transaction paid part
116	INVCOLLECT	Invoice transaction sent to collection
117	INVDISS	Violation transaction dismissed – used for all violations written off.
118	AUTHREJ	Image transaction authority reject
214	NIXIE	Invoice marked as Nixie.
222	PRE_INVOICE	Transactions with LPN and address ready to be placed on invoice
223	INV_2	Invoice escalated with fee
223	INV_3	Invoice escalated with penalty
401	DMVREJ	Rejected by DMV
402	NODMV	No DMV agreement

Submittal/Transmittal

From:	Laurie Zavadil (310) 820-4353
	Xerox Services, Americas Commercial and State Government Transportation
	12410 Milestone Center Dr.
	Germantown MD 20876
Date of Submission:	March 02, 2016
Contract Number:	N/A
Contract Title:	NCTA Back Office System
Submittal Description:	NCTA BOS RTCS File Exchange Interface Control Document
Submittal File Name:	41311_NCTA_RTCS_File_Exchange_ICD_V2_20160302
Schedule Line Item	NA
No. Pages (w cover):	34
Action Requested	Review and approve
Comments	

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North Carolina Turnpike Authority

Back Office System

RTCS File Exchanges – Interface Control Document

March 02, 2016

Version 1.2

Version History

Version Number	Date	Description	Author
1.0	01/11/2016	Initial Submission	Ganesh Kumaraswamy
1.1	01/15/2016	Updates to transaction vs trip Updated based on Kevin Palmer's comments	Ganesh Kumaraswamy
1.2	03/02/2016	Added Image file specification	Ganesh Kumaraswamy

Table of Contents

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1 File Details

The following document outlines the specifications of the proposed file format to be used in conjunction with the new RTCS systems as part of the NCTA project. All the files specified are in **ASCII** format and the individual columns are delimited by comma (,).

1.1 XTAG File Sent from CSC to Toll Collection System Host

Tag status (XTAG) files are created by the Customer Service Center (CSC) once per day by aggregating North Carolina Department of Transportation (NCDOT) tag status and all Interop (IAG, SunPass and PeachPass) agency tag status files into a single file for the toll collection system.

Uncompressed naming convention:	C33_{FILE_NAME}.XTAG
Uncompressed naming formats:	C33_YYYYMMDDHHMMSS.XTAG
Uncompressed naming examples:	C33_20041203213000.XTAG

Table 1-1: Tag Status (XTAG) File – Header Structure

Field Name	Type/Size	Description/Valid Values
FILE_TYPE	CHAR(4)	FULL/INCR (INCR is the incremental tag status file since last update. This is applicable only for Home customers)
FROM_AGENCY_ID	CHAR(3)	C33
FILE_DATE	CHAR(8)	Date file created. Format: YYYYMMDD
FILE_TIME	CHAR(6)	Time file created: Format: HHMMSS
RECORD_COUNT	CHAR(8)	Count of all tags in file. Does not include header record. Values: 00000000 – 99999999
COUNT_STAT1	CHAR(8)	Count of all tags with status code 1. Values: 00000000 – 99999999

Field Name	Type/Size	Description/Valid Values
COUNT_STAT2	CHAR(8)	Count of all tags with status code 2. Values: 00000000 – 99999999
COUNT_STAT3	CHAR(8)	Count of all tags with status code 3. Values: 00000000 – 99999999
COUNT_STAT4	CHAR(8)	Count of all tags with status code 4. Values: 00000000 – 99999999
COUNT_STAT5	**CHAR(8)**	Count of all tags with status code 5. Values: 00000000 – 99999999
DELIMITER	CHAR(1)	LF
Header Total	**70**	

Table 1-2: Tag Status (XTAG) File - Detail Structure

Field Name	Type/Size	Description/Valid Values
TAG_AGENCY_ID	CHAR(3)	Tag agency ID. Values: 000 – 127
TAG_SERIAL_NUMBER	CHAR(8)	Tag serial number. Values: 00000001 – 16777216
TAG_STATUS	CHAR(1)	1 = Valid (report use to CSC) 2 = Low Balance (report use to CSC) 3 = Zero balance (report use to VPC)(Type 1 Violation) 4 = Invalid or lost/stolen (report use to VPC)(Type 1 Violation) 5 = non-revenue
TAG_INFO	CHAR(6)	000000 (all zeroes)
DELIMITER	CHAR(1)	LF
Record Total	**19**	

The XTAG file is zipped before transmission and can be opened using the PKZIP or WINZIP Lempel-Zif compression algorithm.

Compressed naming convention: C33_{FILE_NAME}_{FILE_TYPE}.ZIP

Compressed naming format: C33_YYYYMMDDHHMMSS_XTAG.ZIP

Compressed naming example: C33_20041203213000_XTAG.ZIP

XTAG files are securely transmitted by the CSC File Transfer Protocol (FTP) Client to the toll collection system Host (Host) FTP Server.

The toll collection system does not begin processing an XTAG file until after its accompanying XTAG_CHECK file is also received.

1.2 XTAG_CHECK File Sent from the CSC to the Toll Collection System

A tag status check (XTAG_CHECK) file is created by the CSC as each XTAG file is created.

Uncompressed naming convention: C33_{FILE_NAME}_{FILE_TYPE}.CHECK

Uncompressed naming format: C33_YYYYMMDDHHMMSS_XTAG.CHECK

Uncompressed naming example: C33_20041203213000_XTAG.CHECK

Table 1-3: Tag Status Check (XTAG_CHECK) File

Field Name	Type/Size	Description/Valid Values
ORIG_FILE_NAME_TYPE	CHAR(80)	The exact character sequence from the name of the XTAG file sent by the CSC to the toll collection system. Format: C33_{FILE_NAME}.XTAG
Total	**80**	

The XTAG_CHECK file is not compressed.

XTAG_CHECK files are securely transmitted by the CSC FTP Client to the toll collection system (Host) FTP Server.

The toll collection system begins processing the XTAG file only after receiving the accompanying XTAG_CHECK file. After processing, the toll collection system responds with an XTAG_ACK file.

1.3 XTAG_ACK File Sent from Toll Collection System Host to CSC

A tag status acknowledgement (XTAG_ACK) file is created by the toll collection system only after each XTAG file is processed.

Naming convention:	T33_{FILE_NAME}_{FILE_TYPE}.ACK
Naming format:	T33_YYYYMMDDHHMMSS_XTAG.ACK
Naming example:	T33_20041203213000_XTAG.ACK

Table 1-4: Tag Status Acknowledgement (XTAG_ACK) File

Field Name	Type/Size	Description/Valid Values
FILE_TYPE	CHAR(4)	ACK
FROM_AGENCY_ID	CHAR(3)	T33
TO_AGENCY_ID	CHAR(3)	C33
ORIG_FILE_NAME_TYPE	CHAR(50)	The exact character sequence from the name of the XTAG file sent by the CSC to the toll collection system. Format: C33_{FILE_NAME}.XTAG
FILE_DATE	CHAR(8)	Date the toll collection system created the ACK file. Format: YYYYMMDD
FILE_TIME	CHAR(6)	Time the toll collection system created the ACK file. Associated tag status is sent to the lanes after this time. Format: HHMMSS
RETURN_CODE	CHAR(2)	A code indicating the status of the XTAG file being acknowledged. Values: 00 – File was successfully received and verified 01 – Header record found with data preventing file's use. 02 – Detail record(s) found with data preventing file's use. 07 – General file structure defect preventing file's use.
DELIMITER	CHAR(1)	LF
Total	**77**	

The XTAG_ACK file is not compressed.

XTAG_ACK files are securely transmitted by the toll collection system (Host) FTP Client to the CSC FTP Server.

For a RETURN_CODE of 00 in an XTAG_ACK file, the toll collection system asynchronously loads the associated tag status into the lanes only after it successfully puts the XTAG_ACK file to the CSC

For all other return codes, this new tag status is not loaded into the toll collection system lanes.

1.4 Customer License Plate File

License Plate File (ICLP) files are created by every Interop CSC (IAG, SunPass and PeachPass) once per day. This file includes the vehicle license plate numbers of valid customers (customers with at least one tag with a TAG_STATUS of '1' or '2'). This file will allow the Away Agency/CSC to collect the toll from the Home Agency/CSC for an untagged customer violation.

Uncompressed naming convention:	<AGENCY>_{FILE_NAME}.ICLP
Uncompressed naming formats:	<AGENCY>_YYYYMMDDHHMMSS.ICLP
Uncompressed naming examples:	033_20141203213000.ICLP

Table 1-5: License Plate (ICLP) File – Header Structure

Field Name	Type/Size	Description/Valid Values
FILE_TYPE	CHAR(4)	ICLP
FROM_AGENCY_ID	CHAR(3)	HOME AGENCY DEVICE PREFIX
FILE_DATE	CHAR(8)	Date file created. Format: YYYYMMDD
FILE_TIME	CHAR(6)	Time file created: Format: HHMMSS
RECORD_COUNT	CHAR(8)	Count of all detail records in file. Does not include header record. Values: 00000000 – 99999999
DELIMITER	CHAR(1)	LF
Header Total	**30**	

Table 1-6: License Plate (ICLP) File - Detail Structure

Field Name	Type/Size	Description/Valid Values
LIC_STATE	CHAR(2)	Standard State abbreviation (or Province abbreviation for Canada). This field cannot be blank. If this field does not contain a valid state/province abbreviation, the record should be rejected.
LIC_NUMBER	CHAR(10)	Plate number must be left justified with no embedded blanks, hyphens (-), periods (.) or other special characters not allowed on a license plate. If this field contains invalid characters, the record should be rejected. Valid characters shall include: A-Z (uppercase only) and 0-9.
LIC_TYPE	CHAR(2)	The license plate type. Values: ** if unused
TAG_AGENCY_ID	CHAR(3)	Tag agency ID. Values: 000 – 127
TAG_SERIAL_NUMBER	CHAR(8)	Tag serial number. Values: 00000001 – 16777215
DELIMITER	CHAR(1)	LF
Record Total	**26**	

The ICLP file is zipped before transmission and can be opened using the PKZIP or WINZIP Lempel-Zif compression algorithm.

Compressed naming convention:	<AGENCY>_{FILE_NAME}_{FILE_TYPE}.ZIP
Compressed naming format:	<AGENCY>_YYYYMMDDHHMMSS_ICLP.ZIP
Compressed naming example:	033_20141203213000_ICLP.ZIP

ICLP files are securely transmitted by the CSC FTP Client to the toll collection system Host (Host) FTP Server.

The toll collection system does not begin processing an ICLP file until after its accompanying ICLP_CHECK file is also received.

1.5 ICLP_CHECK File Sent from the CSC to the Toll Collection System

A tag status check (ICLP_CHECK) file is created by the CSC as each ICLP file is transmitted.

Uncompressed naming convention: <AGENCY>_{FILE_NAME}_{FILE_TYPE}.CHECK

Uncompressed naming format: <AGENCY>_YYYYMMDDHHMMSS_ICLP.CHECK

Uncompressed naming example: 033_20141203213000_ICLP.CHECK

Table 1-7: License Plate Check (ICLP_CHECK) File

Field Name	Type/Size	Description/Valid Values
ORIG_FILE_NAME_TYPE	CHAR(80)	The exact character sequence from the name of the ICLP file sent by the CSC to the toll collection system. Format: <AGENCY>_{FILE_NAME}.ICLP
Total	**80**	

The ICLP_CHECK file is not compressed.

ICLP_CHECK files are securely transmitted by the CSC FTP Client to the toll collection system (Host) FTP Server.

The toll collection system begins processing the ICLP file only after receiving the accompanying ICLP_CHECK file. After processing, the toll collection system responds with an ICLP_ACK file.

1.6 ICLP_ACK File sent from Toll Collection System Host to CSC

A license plate acknowledgement (ICLP_ACK) file is created by the toll collection system only after each ICLP file is processed.

Naming convention: <AGENCY>_{FILE_NAME}_{FILE_TYPE}.ACK

Naming format: <AGENCY>_YYYYMMDDHHMMSS_ICLP.ACK

Naming example: <AGENCY>_20141203213000_ICLP.ACK

Table 1-8: License Plate Acknowledgement (ICLP_ACK) File

Field Name	Type/Size	Description/Valid Values
FILE_TYPE	CHAR(4)	ACK
FROM_AGENCY_ID	CHAR(3)	T33
TO_AGENCY_ID	CHAR(3)	C33
ORIG_FILE_NAME_TYPE	CHAR(50)	The exact character sequence from the name of the ICLP file sent by the CSC to the toll collection system. Format: <AGENCY>_{FILE_NAME}.ICLP
FILE_DATE	CHAR(8)	Date the toll collection system created the ACK file. Format: YYYYMMDD
FILE_TIME	CHAR(6)	Time the toll collection system created the ACK file. Format: HHMMSS
RETURN_CODE	CHAR(2)	A code indicating the status of the ICLP file being acknowledged. Values: 00 – File was successfully received and verified 01 – Header record found with data preventing file's use. 02 – Detail record(s) found with data preventing file's use. 07 – General file structure defect preventing file's use.
DELIMITER	CHAR(1)	LF
Total	**77**	

The ICLP_ACK file is not compressed.

ICLP_ACK files are securely transmitted by the toll collection system (Host) FTP Client to the CSC FTP Server.

1.7 Transaction File

The Transaction (TRAN) file is created by the Host system to inform the Back Office System (BOS) of the toll transactions generated by the Host at a detail level. This file includes a unique sequence number of the transaction that is generated by the Host system, and all the associated details of the transaction.

Uncompressed naming convention: T33_{FILE_NAME}.TRAN

Uncompressed naming formats: T33_YYYYMMDDHHMMSS.TRAN

Uncompressed naming examples: T33_20141203213000.TRAN

Table 1-9: Transaction (TRAN) File – Header Structure

Field Name	Type/Size	Description/Valid Values
FILE_TYPE	CHAR(4)	TRAN
FROM_AGENCY_ID	CHAR(3)	T33
FILE_DATE	CHAR(8)	Date file created. Format: YYYYMMDD
FILE_TIME	CHAR(6)	Time file created: Format: HHMMSS
RECORD_COUNT	CHAR(8)	Count of all detail transaction records in file. Does not include header record. Values: 00000000 – 99999999
DELIMITER	CHAR(1)	LF
Header Total		

Table 1-10: Transaction (TRAN) File – Detail Structure

Field Name	Type/Size	Required Field	Description/Valid Values
RECORD_INDICTATOR	CHAR(1)	Y	T - Transaction record
TRAN_TYPE	CHAR(1)	Y	T, V, A or I Transaction Types: = 'T' for Transponder Transaction= 'V' for Video Transaction='A' for Toll Credit Transaction Adjustment= 'I' for Informational submittal. Used for ITS or traffic count data

Field Name	Type/Size	Required Field	Description/Valid Values
RECORD_TYPE	CHAR(1)	Y	O, R, or C Record Types:= 'O' for Original Transaction= 'R' for Resubmittal= 'C' Correction
ETC_TRX_SERIAL_NUM	CHAR(18)	Y	Non-negative The unique ID of a transaction assigned by the Facility.
RESUBMITTAL_REASON	CHAR(2)	N	2 digit number code A code denoting the reason for Resubmittal. Values: i.e. 00 - Updated Interop Transaction. Required field if Record Type is 'R'.
RESUBMITTAL_COUNT	CHAR(1)	N	1-9 The number of times that the Transaction has been resubmitted by the Subscriber/Facility. Required field if Record Type is 'R'.
CORR_REASON	CHAR(2)	N	01- 05 A code denoting the reason for the correction. Values: 01 – Resolved mismatch: class/toll corrected 02 – Ignore license plate Transaction 03 – Ignore tagged Transaction 04 – Corrected plaza/lane information 05 – Corrected toll Required field if Record Type is 'C'.
ETC_FAC_AGENCY	CHAR(3)	Y	Refer to Appendix B for valid values A code indicating the agency/authority which owns/operates the facility on which the Transaction occurred. For multi-agency CSCs, this code will not represent the CSC but will represent the agency within the CSC which owns/operates the facility.
SUBSCRIBER_ID	CHAR(3)	Y	Indicates the Subscriber/Facility providing the transaction for back office processing.

Field Name	Type/Size	Required Field	Description/Valid Values
ETC_ENTRY_PLAZA	CHAR(3)	N	Refer to Appendix B for the list of valid values for this field. The ETC_FAC_AGENCY plaza code of the plaza at which the vehicle entered the facility. *** For Barrier/Unmatched Exit For single transaction transactions ETC_EXIT_PLAZA is used and this field left blank. Refer to Appendix B for the list of valid values for this field. Required for multi-transaction trips.
ETC_ENTRY_LANE	CHAR(4)	N	The entry lane number in which the transaction occurred. **** For Barrier/Unmatched Exit For single transaction transactions. Required for multi-transaction trips.
ETC_ENTRY_DATE	CHAR(8)	N	YYYYMMDD The date the vehicle entered the facility (GMT) Format: YYYYMMDD ******** For Barrier/Unmatched Exit For single transaction transactions. Required for multi-transaction trips.
ETC_ENTRY_TIME	CHAR(12)	N	The time the vehicle entered the facility (allowing for milliseconds) (GMT) Format: HHMMSSffffff For Barrier/Unmatched Exit For single transaction transactions Required for multi-transaction trips..
ETC_EXIT_PLAZA	CHAR(3)	Y	Refer to Appendix B for the list of valid values for this field The ETC_FAC_AGENCY plaza code of the plaza at which the vehicle exited the facility. Refer to Appendix B for the list of valid values for this field.
ETC_EXIT_LANE	CHAR(4)	Y	The exit lane number in which the transaction occurred.
ETC_EXIT_DATE	CHAR(8)	Y	The date the vehicle exited the facility. Format: YYYYMMDD

Field Name	Type/Size	Required Field	Description/Valid Values
ETC_EXIT_TIME	CHAR(12)	Y	The time the vehicle exited the facility (allowing for milliseconds) (GMT)Format: HHMMSSffffff
ETC_LANE_MODE	CHAR(1)	N	Refer to Appendix B for lane modes. The mode the lane was operating in at the time of the Transaction. Values: E – ETC Only (Dedicated) A – ETC/ACM M – Manned/ETCC – Manned/ETC with Carpool confirmation
ETC_TAG_SERIAL_NUMBER	CHAR(8)	N	Tag serial number read from the tag or as retrieved from the Customer License Plate File for an untagged violation. Required field if Transaction Type is 'T'.
ETC_TAG_AGENCY	CHAR(3)	N	000 – 127 Standard agency ID read from the tag or as retrieved from the Customer License Plate File for an untagged violation. Values: 000 – 127
ETC_VALIDATION_STATUS	CHAR(1)	N	Refer to Appendix B for Transponder status indicators. The tag status from the tag status file at the time of the Transaction. Values: 1 – Good 2 – Low Balance* - Untagged violation where no tag was read but the license plate on the image was found on the Customer License Plate File. Also used if the lane system does not report this value to its CSC. For Ticketed, this would be from the exit Transaction.

Field Name	Type/Size	Required Field	Description/Valid Values
ETC_LIC_NUMBER	CHAR(10)	N	Note that the ETC_LIC_STATE/ETC_LIC_NUMBER presented in the Transaction may not actually be associated with the account represented by the ETC_TAG_AGENCY/ ETC_TAG_SERIAL_NUMBER. The Home Agency/CSC should use the tag information to determine the account to which the Transaction should be posted. The Home Agency/CSC should attempt to present the Transaction on the customer's statement using the license plate information when such is provided (as opposed to the tag information). Required field if Transaction Type is 'V'. Optional field if Transaction Type is 'T'.
ETC_LIC_STATE	CHAR(2)	N	2 Character abbreviation. License plate state for video transaction.
ETC_LIC_PLATE_TYPE	CHAR(2)	N	Non-negative Special plate code. https://edmv.ncdot.gov/VehicleRegistration/ SpecialPlate#term
ETC_CLASS_CHARGED	CHAR(3)	Y	Refer to Appendix B. Vehicle Classification code (LOV, etc.)
ETC_DEBIT_CREDIT	CHAR(1)	N	+ or - An indicator as to whether the toll reflected in ETC_TOLL_AMOUNT is to be debited from the customer account or credited to the customer account. Values: Plus (+) – Debit from customer account Space ( ) – Debit from customer account Minus (-) – Credit to customer account Debit if not populated
ETC_TOLL_AMOUNT	CHAR(6)	Y	0.00–999.99 Full transponder toll amount due as calculated by the Facility before any discount is applied.

Field Name	Type/Size	Required Field	Description/Valid Values
ETC_DISCOUNT_TYPE	CHAR(1)	N	1, 2 or 3 1 = Facility Discount 2 = HOV 3 = Exempt Not populated if no discount applies.
ETC_DISC_TOLL_AMOUNT	CHAR(6)	N	0.00–999.99 The Total Transponder Toll Amount after any discount is applied. The discount type is denoted in Transponder Discount Type. Required field if Transponder Discount Type is populated.
VIDEO_TOLL_AMOUNT	CHAR(6)	Y	0.00–999.99 Full video toll amount due as calculated by the Facility before any discount is applied.
VIDEO_DISCOUNT_TYPE	CHAR(1)	N	1, 2 or 3 1 = Facility Discount 2 = HOV 3 = Exempt Not populated if no discount applies.
VIDEO_DISC_TOLL_AMOUNT	CHAR(6)	N	0.00–999.99 The Total Video Toll Amount after any discount is applied. The discount type is denoted in Video Discount Type. Required field if Video Discount Type is populated.
NUMBER_OF_IMAGES	CHAR(2)	N	0-99 Number of images associated with the Transaction. Required field if Transaction Type is 'V'.
DELIMITER	CHAR(1)	Y	LF
Record Total	**133**		
RECORD_INDICTATOR	CHAR(1)	Y	I - Image record
IMAGE_TYPE	CHAR(1)	N	F, B or L F - Front Image, B – Back Image, L – License Plate only.
IMAGE_FILE_NAME	CHAR(38)	N	See Image File Name Format. File name of the image file.

Field Name	Type/Size	Required Field	Description/Valid Values
DELIMITER	CHAR(1)	Y	LF
Record Total	**41**		

The TRAN file is zipped before transmission and can be opened using the PKZIP or WINZIP Lempel-Zif compression algorithm.

Compressed naming convention: T33_{FILE_NAME}_{FILE_TYPE}.ZIP

Compressed naming format: T33_YYYYMMDDHHMMSS_TRAN.ZIP

Compressed naming example: T33_20141203213000_TRAN.ZIP

TRAN files are securely transmitted by the Host system client to the CSC FTP Server.

The CSC system does not begin processing a TRAN file until after its accompanying TRAN_CHECK file is also received.

1.7.1   TRAN_CHECK File Sent from the Toll Collection System to the CSC

A check (TRAN_CHECK) file is created by the Host system as each TRAN file is transmitted.

Uncompressed naming convention: T33_{FILE_NAME}_{FILE_TYPE}.CHECK

Uncompressed naming format: T33_YYYYMMDDHHMMSS_TRAN.CHECK

Uncompressed naming example: T33_20141203213000_TRAN.CHECK

Table 1-11: Transaction Check (TRAN_CHECK) File

Field Name	Type/Size	Description/Valid Values
ORIG_FILE_NAME_TYPE	CHAR(80)	The exact character sequence from the name of the TRAN file sent by the CSC to the toll collection system. Format: T33_{FILE_NAME}.TRAN
Total	**80**	

The TRAN_CHECK file is not compressed.

TRAN_CHECK files are securely transmitted by the toll collection system (Host) client to CSC FTP Server.

The toll collection system begins processing the TRAN file only after receiving the accompanying TRAN_CHECK file. After processing, the CSC system responds with a TRAN_ACK file.

1.7.2 TRAN_ACK File sent from CSC to Toll Collection System Host

A transaction acknowledgement (TRAN_ACK) file is created by the CSC after each TRAN file is processed.

Naming convention:	C33_{FILE_NAME}_{FILE_TYPE}.ACK
Naming format:	C33_YYYYMMDDHHMMSS_TRAN.ACK
Naming example:	C33_20141203213000_TRAN.ACK

Table 1-12: Transaction Acknowledgement (TRAN_ACK) File

Field Name	Type/Size	Description/Valid Values
FILE_TYPE	CHAR(4)	ACK
FROM_AGENCY_ID	CHAR(3)	C33
TO_AGENCY_ID	CHAR(3)	T33
ORIG_FILE_NAME_TYPE	CHAR(50)	The exact character sequence from the name of the TRAN file sent by the CSC to the toll collection system. Format: T33_{FILE_NAME}.TRAN
FILE_DATE	CHAR(8)	Date the CSC system created the ACK file. Format: YYYYMMDD
FILE_TIME	CHAR(6)	Time the CSC system created the ACK file. Format: HHMMSS
RETURN_CODE	CHAR(2)	A code indicating the status of the TRAN file being acknowledged. Values: 00 – File was successfully received and verified 01 – Header record found with data preventing file's use. 02 – Detail record(s) found with data preventing file's use. 07 – General file structure defect preventing file's use.
DELIMITER	CHAR(1)	LF
Total	**77**	

The TRAN_ACK file is not compressed.

TRAN_ACK files are securely transmitted by the CSC FTP client to the toll collection system (Host) FTP Server.

1.8 Transaction Disposition File

Transaction Disposition (DISP) file is created by the Back Office System (BOS) to inform the Host system, the current disposition of a transaction at a detail level. This file includes the unique sequence number of the transaction that was originally submitted by the Host system, its current status and financial associated with the transaction if applicable.

Uncompressed naming convention: C33_{FILE_NAME}.DISP

Uncompressed naming formats: C33_YYYYMMDDHHMMSS.DISP

Uncompressed naming examples: C33_20141203213000.DISP

Table 1-13: Transaction Disposition (DISP) File – Header Structure

Field Name	Type/Size	Description/Valid Values
FILE_TYPE	CHAR(4)	DISP
FROM_AGENCY_ID	CHAR(3)	C33
FILE_DATE	CHAR(8)	Date file created. Format: YYYYMMDD
FILE_TIME	CHAR(6)	Time file created: Format: HHMMSS
RECORD_COUNT	CHAR(8)	Count of all detail records in file. Does not include header record. Values: 00000000 – 99999999
DEPOSIT_ID	CHAR(12)	Deposit ID that is used to track the bank deposits <to be discussed>
DELIMITER	CHAR(1)	LF
Header Total	**42**	

Table 1-14: License Plate (ICLP) File - Detail Structure

Field Name	Type/Size	Description/Valid Values
TRX_SERIAL_NUM	CHAR(12)	The unique key of the transaction assigned by the Host system Values: 000000000000 – 999999999999

Field Name	Type/Size	Description/Valid Values
DISP_TYPE	CHAR(2)	01 – Informational 02 – Payment 03 – Rejection 04 – Adjustment 05 – Rejection after payment 06 – Adjustment after payment
DISP_STATUS	CHAR(4)	The current status of the transaction. Refer to Appendix B for list of values.
POSTED_AMOUNT	CHAR(6)	Format 0.00 to 999.99 The amount posted. For rejected or Interim updates, this would be 0.00.
POSTED_DATE	CHAR(8)	Transaction posted date at the back office
DELIMITER	CHAR(1)	LF
Record Total	**42**	

The DISP file is zipped before transmission and can be opened using the PKZIP or WINZIP Lempel-Zif compression algorithm.

Compressed naming convention: C33_{FILE_NAME}_{FILE_TYPE}.ZIP

Compressed naming format: C33_YYYYMMDDHHMMSS_DISP.ZIP

Compressed naming example: C33_20141203213000_DISP.ZIP

DISP files are securely transmitted by the CSC FTP Client to the toll collection system Host (Host) FTP Server.

The toll collection system does not begin processing a DISP file until after its accompanying DISP_CHECK file is also received.

1.8.1 DISP_CHECK File Sent from the CSC to the Toll Collection System

A check (DISP_CHECK) file is created by the CSC as each DISP file is transmitted.

Uncompressed naming convention: C33_{FILE_NAME}_{FILE_TYPE}.CHECK

Uncompressed naming format: C33_YYYYMMDDHHMMSS_DISP.CHECK

Uncompressed naming example: C33_20141203213000_DISP.CHECK

Table 1-15: Transaction Disposition Check (DISP_CHECK) File

Field Name	Type/Size	Description/Valid Values
ORIG_FILE_NAME_TYPE	CHAR(80)	The exact character sequence from the name of the DISP file sent by the CSC to the toll collection system. Format: C33_{FILE_NAME}.DISP
Total	**80**	

The DISP_CHECK file is not compressed.

DISP_CHECK files are securely transmitted by the CSC FTP Client to the toll collection system (Host) FTP Server.

The toll collection system begins processing the DISP file only after receiving the accompanying DISP_CHECK file. After processing, the toll collection system responds with a DISP_ACK file.

1.8.2 DISP_ACK File sent from Toll Collection System Host to CSC

A disposition acknowledgement (DISP_ACK) file is created by the toll collection system only after each DISP file is processed.

Naming convention: T33_{FILE_NAME}_{FILE_TYPE}.ACK

Naming format: T33_YYYYMMDDHHMMSS_DISP.ACK

Naming example: T33_20141203213000_DISP.ACK

Table 1-16: Transaction Disposition Acknowledgement (DISP_ACK) File

Field Name	Type/Size	Description/Valid Values
FILE_TYPE	CHAR(4)	ACK
FROM_AGENCY_ID	CHAR(3)	T33
TO_AGENCY_ID	CHAR(3)	C33
ORIG_FILE_NAME_TYPE	CHAR(50)	The exact character sequence from the name of the DISP file sent by the CSC to the toll collection system. Format: C33_{FILE_NAME}.DISP
FILE_DATE	CHAR(8)	Date the toll collection system created the ACK file. Format: YYYYMMDD
FILE_TIME	CHAR(6)	Time the toll collection system created the ACK file. Format: HHMMSS

Field Name	Type/Size	Description/Valid Values
RETURN_CODE	CHAR(2)	A code indicating the status of the DISP file being acknowledged. Values: 00 – File was successfully received and verified 01 – Header record found with data preventing file's use. 02 – Detail record(s) found with data preventing file's use. 07 – General file structure defect preventing file's use.
DELIMITER	CHAR(1)	LF
Total	**77**	

The DISP_ACK file is not compressed.

DISP_ACK files are securely transmitted by the toll collection system (Host) FTP Client to the CSC FTP Server.

1.9 Violation Image File (.JPG)

The Image (.JPG) file is created by the Host system to inform the BOS of the images corresponding to the video transactions generated at the Host. The BOS requires two images per transaction which will be compressed into a single .zip file. These .zip files will be exchanged via drop box using secured FTP.

The .zip file will include the best region of interest (ROI) image and the best rear overview image. For commercial vehicles the front overview image would need to be provided if a front ROI image is provided. These images are expected to be compressed but suitable for inclusion in a printed statement and presentation to the customer or customer service representative (CSR) via a web based application.

1.9.1 Image File Name

Format:

PPP_LLSYYYYMMDDHHMMSSTTF_N.jpg

Field definitions are defined in the table below.

Table 1-17: Violation Image File Field Definitions

Field Name	Definition
PPP	Plaza ID (4 chars including trailing '_') Plaza IDs less than three (3) characters will have preceding 0 added. E.g. T01_ for Toll Zone Number 8-1 ETC_EXIT_PLAZA From Trip File
LL	Lane ID (two (2) chars with leading zeros). 01 : default if no lanes are in trips file
S	Straddling indicator N not straddling U upper D lower E.g. Lane 02U indicates a vehicle drove through lane 2, straddling with lane 3
YYYYYMMDD	The date time (eight (8) chars) This is the local time from the Zone Controller ETC_EXIT_DATE From trip file

Field Name	Definition
HHMMSSTT	The time of the transaction HH - Hour MM - Minute SS - Second TT – Centi-seconds ETC_EXIT_TIME From trips File
F	Day Light Saving D - Day Light Saving Time S - Standard Time

N	Image number (1, 2).
	  1 is the index of the ROI image which is generated by the license plate recognition (LPR) process.
	  2 is the index of the image generated by the Zone Controllers.

Jpg	File extension

Example image file name:

T01_01N2010021211183701S_1.jpg

1.9.2   IMAGE .ZIP File

Format:

PPP_LLSYYYYMMDDHHMMSSTTF.zip

Field definitions are defined in the table below.

Table 1-18: Image .Zip File Field Definitions

Field Name	Definition
PPP	Plaza ID (4 chars including trailing '_') Plaza IDs less than three (3) chars will have preceding 0 added. E.g. T01_ for Toll Zone Number 8-1 ETC_EXIT_PLAZA From Trip File
LL	Lane ID (two (2) chars with leading zeros). 01 : If no lane in trips File

Field Name	Definition
S	Straddling indicator N not straddling U upper D lower E.g. Lane 02U indicates a vehicle drove through lane 2, straddling with lane 3
YYYYYMMDD	The date time (eight (8) chars) This is the local time from the Zone Controller ETC_EXIT_DATE From trip File
HHMMSSTT	The time of the transaction HH - Hour MM - Minute SS - Second TT – Centi-seconds ETC_EXIT_TIME From trips File
F	Day Light Saving D - Day Light Saving Time S - Standard Time
zip	File extension

Appendix A: Acronyms

Acronym	Definition
ACK	Acknowledgement file
BOS	Back Office System
CSC	Customer Service Center
DISP	Transaction Disposition
FTP	File Transfer Protocol
IAG	Interagency Group
ICLP	License Plate File
LPR	License Plate Recognition
NCDOT	North Carolina Department of Transportation
NCTA	North Carolina Turnpike Authority
XTAG	Tag Status File
ROI	Region of Interest
RTCS	Roadside Toll Collection System

Appendix B: List of DISP Codes

Table B-1: List of Codes Applicable to Home Agency Transactions

CSC DISP Code	Status	Description
1	TOLL	Home Agency toll posted successfully as a normal ETC transaction
2	VTOL	Home Agency toll posted successfully as a ETC violation transaction
601	XTOLL	Home Agency toll corrected successfully as a normal ETC transaction
602	XVTOLL	Home Agency toll corrected successfully as a ETC violation transaction
11	TAGINV	Tag Inventory - Tag is currently in the Vector's Inventory status. This status indicates that Tag is in CSC. Any transactions received on a tag will be a violation transaction and go through the violation processing system)
12	TAGLOST	Tag Lost
13	TAGSTOLEN	Tag Stolen
14	TAGRETURNED	Tag in shipping, Returned Defective, Tag Returned
15	TAGDAMAGED	Tag Damaged
16	INVTAG	Invalid tag – Does not belong to any participating agencies
22	DUPL	Duplicate transaction
24	INVACC	Invalid Account – Not a valid account
26	INVACPEND	Invalid Account Pending – Account is not open and waiting for payment
27	INVACRVKF	Invalid Account Revoked Final – Account is in collection
28	INVACCLOS	Invalid Account Closed
29	XLANE	Cross Lane - duplicate reject
31	POACHING	Poaching - duplicate reject
51	QINVPLAZA	Transaction rejected as invalid due to an invalid plaza
52	QINVDATE	Transaction rejected as invalid due to invalid date
53	QINVAGENCY	Transaction rejected as invalid due to invalid agency code
99	OLDREQ	Transaction request is beyond posting limit

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Table B-2: CSC Reason Codes for Interoperability Transactions

CSC Reason Code	Status	Description
06	POST	Transaction posted successfully to an Interop Agency account due to a tag read at the lanes.
07	PPST	Transaction posted successfully to an Interop Agency account as a pay-by-plate transaction.
41	NPST	Toll transaction did not post but Home Agency acknowledges that toll is still owed to the Away Agency
42	INSU	Rejected, account has insufficient funds where transaction date/time (ETC_EXIT_DATE/ ETC_EXIT_TIME) is greater than date/time of acknowledgement from that Away Agency/CSC of receipt of full Tag Status File which indicated that the tag was in an Invalid status. See Invalid Tag Customer File for associated name/address information
43	TAGB	Rejected, tag in bad status (e.g., lost, stolen, etc.) where transaction date/time (ETC_EXIT_DATE/ ETC_EXIT_TIME) is greater than date/time of acknowledgement from that Away Agency/CSC of receipt of full Tag Status File which indicated that the tag was in a Lost/Stolen status.
44	ACCB	Rejected, account in bad status (revoked, closed, etc.) where transaction date/time (ETC_EXIT_DATE/ ETC_EXIT_TIME) is greater than date/time of acknowledgement from that Away Agency/CSC of receipt of full Tag Status File which indicated that the tag was in an Invalid status. See Invalid Tag Customer File for associated name/address information.
45	RJDP	Rejected, duplicate transaction. Usually associated with a skip read or cross lane read where a tagged transaction and license plate transaction exist for the same customer at the same plaza within "X" minutes. The license plate transaction is rejected as the duplicate
46	OLD1	Rejected, old transaction – account closed. The difference between the date of the transaction and the date the transaction was received by the Home Agency/CSC exceeded that specified in the Reciprocity Agreement under Account Settlement Process for Valid Tag Transactions when accounts are closed.

CSC Reason Code	Status	Description
47	OLD2	Rejected, old transaction – other. The difference between the date of the transaction and the date the transaction was received by the Home Agency/CSC exceeded that specified in the Reciprocity Agreement under Account Settlement Process for Valid Tag Transactions when accounts are not closed.
48	RINV	Rejected, the transaction contains invalid data (e.g., invalid agency as defined in IAG spec)
49	RJPL	Rejected license plate transaction. The license plate transaction could not be posted.

Table B-3: CSC Reason Codes for Violation Transactions

CSC Reason Code	Status	Description
09	ITOL	Home Agency toll posted successfully to a valid account using license plate information.
609	XITOLL	Home Agency toll corrected successfully as a ITOL
100	VCSCRCV	Image transaction received at CSC
104	VNOIMG	Image transaction with no image after "X" number of days
107	DMVS	Image Transaction sent to DMV for name and address lookup
108	DMVR	Image Transaction information received from DMV
111	INVDMVHLD	Invoice transaction in DMV hold
112	INVDMVPAY	Invoice transaction paid at DMV Payment
113	INVDMVREL	Invoice transaction paid at DMV Release
114	INVPFULL	Invoice transaction paid full
115	INVPPART	Invoice transaction paid part
116	INVCOLLECT	Invoice transaction sent to collection
117	INVDISS	Violation transaction dismissed – used for all violations written off.
118	AUTHREJ	Image transaction authority reject
214	NIXIE	Invoice marked as Nixie.
222	PRE_INVOICE	Transactions with LPN and address ready to be placed on invoice
223	INV_2	Invoice escalated with fee
223	INV_3	Invoice escalated with penalty
401	DMVREJ	Rejected by DMV
402	NODMV	No DMV agreement