

TVM Technical Requirements

A TVM General Requirements				
		Can Proposer Meet This Requirement? (Yes/No)	Does Proposer Have Alternate that Meets or Exceeds? (Yes/No)	Please Provide Specific Explanation for Alternate
	Metro requires a total of 30 TVMs will be installed among two Transit Centers, Metro Headquarters, and all ORBT stations to enable our passengers to purchase fare media, check balances, and reload accounts. The TVMs will connect via broadband over cellular or wired connections already established at each location to a central data center for reporting and to banking services to process credit card transactions. All TVMs will:			
1	Accept cash and credit payment types			
2	Support real-time processing of media sales and account/card reloads			
3	Provide detailed reporting for each transaction including time and date, transaction type, account information (without credit card or pin numbers), and amount of transaction back to a central reporting server			
4	Support the purchase/issuing of media, reloading of transit accounts, and account balance inquiries			
5	Be capable of automatically limiting transaction types when without online communications, or otherwise operating in a degraded mode			
6	Be capable of maintaining outdoor operations within temperature extremes of -20 F to +130 F and at humidity levels between 5% and 98%			
7	Measure no larger than 31" W x 72" H x 30" D			
8	Report status updates and all service warnings to the central reporting server and be capable of emailing service warnings to facilitate faster response times			

B TVM and Fare Media Requirements				
TVMs will be capable of dispensing fare media and reloading passenger accounts as well as proximity card media. TVMs will be capable of accepting cash, credit, and EBT cards. TVMs will also be capable of reading existing media and providing available balance information. TVM will also dispense contactless smart cards as well as 'paper' tickets and passes. Specifically, TVMs will:		Can Proposer Meet This Requirement? (Yes/No)	Does Proposer Have Alternate that Meets or Exceeds? (Yes/No)	Please Provide Specific Explanation for Alternate
1	Accept cash with the denominations of \$1, \$5, \$10 and \$20 bills			
2	Accept coins with the denomination of nickel, dime, quarter and one dollar			
3	Allow Passengers to check and print a report of account balances remaining on proximity cards			
4	Dispense and encode 'paper' tickets and passes. Encoding should allow for multiple types of passes and tickets to be sold at and dispensed from the TVM			
5	Be capable of loading additional funds to existing passenger accounts and proximity card media			
6	Display current amount due based on passenger selections and payments			
7	Print and issue transaction receipts <i>when requested</i>			
8	Return monies deposited in machine if transaction is canceled or aborted			
9	Provide audio output of messages and instructions			
10	Include raised lettering and braille instructions in accordance of ADA requirements			
11	Be capable of accepting Visa, MasterCard, Bank debit cards, and EBT Cards			

C TVM Communications and Reporting Requirements				
TVMs will communicate via the existing cellular or hardwired broadband connections provided by Metro at each location. In the absence of available communication path, the TVM will function in a degraded mode that will automatically limit the available transaction types for passengers. The TVM will communicate with financial entities for credit/debit transactions via an encrypted secure tunnel connection over the Metro provided internet connection. The TVM will provide detailed reports back to a central Metro server that will provide passenger transaction data WITHOUT passenger full credit card or pin numbers. In order to accomplish this, TVM's will:		Can Proposer Meet This Requirement? (Yes/No)	Does Proposer Have Alternate that Meets or Exceeds? (Yes/No)	Please Provide Specific Explanation for Alternate
1	Use existing broadband or cellular internet connections for all communications			
2	Be capable of operating in a degraded mode during communication failures automatically limiting the types of available transactions to passengers			
3	Communicate all credit/debit/passenger account information using data encryption compliant with the PCI DSS (Payment Card Industry Data Security Standard) when processing transactions.			
4	Communicate with a central Metro server for reporting data that will include:			
	Transaction Type			
	Transaction Amount			
	Passenger Account (If available)			
	Transaction date/time			
	Transaction location			
	Transaction number			
	Transaction Success/Failure			
5	Provide secure transactions by not storing locally nor transmitting any full credit card numbers, PIN numbers, debit card numbers, or other regulated PCI DSS data back to the reporting server			
6	Provide status of available coin and bill storage and provide email alerts when receiving vaults are nearing capacity and when dispensing vaults are nearing empty			
7	Allow for remote shutdown or remote degradation of services from central Metro server			
8	Alert and report all security events to central Metro server, including normal maintenance servicing, adding/removing of vaults, and unauthorized access via email notifications			
9	Transmit all event data for diagnostics, power, communications failures, environmental alerts, and system status information back to the central Metro server			

D TVM Passenger Interface Requirements				
The TVM will provide an interface with passengers at the front of the machine only. The passengers will be able to interface with the TVM using either touch screen or button controls. The TVM will provide quick access to most used passenger functions to reduce the number of screens or button pushes the passenger must engage with to complete their transaction. The TVM must provide visual, tactile, and audio instructions for each screen. Metro will provide final configuration, function, arrangement and description of all devices for the front of the panel, including:		Can Proposer Meet This Requirement? (Yes/No)	Does Proposer Have Alternate that Meets or Exceeds? (Yes/No)	Please Provide Specific Explanation for Alternate
1	Audio output of messages and instructions that are field adjustable for each TVM to be audible in all station environments			
2	Keypad (PIN pad) options that accomodate passengers with visual impairments			
3	Instructions that clearly indicate each step a passenger will follow to choose and complete a transaction, including pictograms that clearly depict proper insertion and orientation of bills and bank cards			
4	Passenger control to change or cancel any transaction selection up to the moment when the complete transaction option has been selected			
5	Automatic detection of what form of payment the passenger has inserted			
6	Allowing multiple payment types for a single transaction			
7	Accepting money in any sequence when depositing cash or coins			
8	Interface controls that are designed to prevent unauthorized access to the TVM interior			

E TVM Display Screen Requirements				
The TVM display screen will provide passengers with a full color display with basic instructions sequentially provided on how to perform any transaction available on the TVM. The TVM will incorporate a screen font size that meets ADA requirements and provide audio assistance to complete transactions. The display screen will:		Can Proposer Meet This Requirement? (Yes/No)	Does Proposer Have Alternate that Meets or Exceeds? (Yes/No)	Please Provide Specific Explanation for Alternate
1	Consist of a color, trans-reflective LED backlit LCD.			
2	Provide a resolution of no less than 1024 by 768 pixels, and will generally use dark characters on a light background			
3	Measure no less than 15 inches diagonally			
4	Be able to produce no less than 256 distinct colors			
5	Display characters and symbols to comply with ADA requirements			
6	Be angled at least 15 degrees from vertical to permit ease of use by standing passengers as well as those seated in wheelchairs			
7	Be free from obstruction by any portion of the TVM exterior, outer doors, mounting bezels, or other element of the TVM			
8	Include a variable lighting system with an ambient light sensor for adjustment of screen intensity during different hours of use and should be adjustable remotely by Metro staff			
9	Allow full customization of display by Metro staff remotely			

F TVM Push Button Requirements				
The TVM shall incorporate at least two push buttons for passenger use. The first button will be to turn on audio annunciation of instructions and other on screen information in the language selected. The second button will be a cancellation button allowing the passenger to cancel any transaction prior to completing that transaction. All buttons will:		Can Proposer Meet This Requirement? (Yes/No)	Does Proposer Have Alternate that Meets or Exceeds? (Yes/No)	Please Provide Specific Explanation for Alternate
1	Be made of stainless steel or hardened aluminum that does not rotate			
2	Be accompanied by an audio tone to verify the button was pressed			
3	Require less than 8 ounces of resistance to depress and function properly regardless of where the force is applied on the surface of the button			
4	Protrude no more than .25 inches from the face of the front panel			
5	Be protected against vandalism, including impact resistance from pounding			
6	Maintain IP66 rating for water/dust proofing			
7	Be easily replaceable from inside the unit and not removable from the outside			
8	Comply with all applicable ADA requirements for accessibility, including incorporating braille on or directly next to the buttons			

G TVM Bill and Coin Vault Requirements				
The TVM will contain separate bill and coin vaults. The vaults will retain monies in removable secure containers that do not exceed 50 pounds when full. The vaults will be modular within the TVM, allowing for quick changing with empty vaults for retrieval of full vaults. All bill vaults will:		Can Proposer Meet This Requirement? (Yes/No)	Does Proposer Have Alternate that Meets or Exceeds? (Yes/No)	Please Provide Specific Explanation for Alternate
1	Stack bills neatly			
2	Be made of stainless steel and require a high security key to open so that no Metro representative will have access to the funds inside the vault			
3	Be sturdy enough to survive a drop from 3 feet on a concrete floor on any corner or side while retaining all contents and without compromising the locking mechanism			
4	Have a carrying handle or handles and be easily retrievable from the TVM by a Metro service representative using a gloved hand			
5	Be secured within the TVM and require a high security key to access			
6	Be designed to enable quick proper placement within the TVM			
7	Report on the current level within each vault and send an alert when capacity is at greater than 80% full			

H TVM Touch Screen Requirements				
The TVM shall provide a touch screen interface for passengers providing context sensitive information and ease of system navigation and use. The touch screen will be color with the capability to support at least 256 colors. The TVM touch screen will enable passengers to interact with the TVM and select any available transaction function. At a minimum, touch screens should:		Can Proposer Meet This Requirement? (Yes/No)	Does Proposer Have Alternate that Meets or Exceeds? (Yes/No)	Please Provide Specific Explanation for Alternate
1	Provide variably defined functions as required through transaction progression			
2	Allow for any available transaction to be completed by the passenger			
3	Provide no less than 12 clearly delimited regions from which selection may be made. Each region shall be no less than 2 square inches in size			
4	Be dynamically defined and allow for easy navigation for all passenger transactions, and designed to reduce dwell time by minimizing the number of screens required to complete a transaction			
5	Have a language selection area that will change the language for the transaction, then revert to English after completion of that transaction			
6	Have a dedicated touch area capable of canceling the transaction at any time before completing the transaction. This function will be duplicative of the physical cancel button required in the previous section			
7	Have a layout and menu selection system that will be customizable by Metro staff remotely following installation			
8	Provide an audible tone each time a button is pushed, and will play an alternate tone for invalid button pushes			

I TVM Cash Slot Requirements				
	The TVM will have designated slots for the insertion and return of both cash and to accept cash and coins. The TVM must be capable of validating the type and value of each bill and coin when inserted into the machine. Coins and bills that cannot be validated must be returned automatically. Additional required features include:	Can Proposer Meet This Requirement? (Yes/No)	Does Proposer Have Alternate that Meets or Exceeds? (Yes/No)	Please Provide Specific Explanation for Alternate
1	A bill insertion slot that is designed to guide bills fed into the TVM without jamming			
2	A coin slot that is designed to prevent multiple coins being jammed together in order to preventing the coins from dropping into the validation mechanism			
3	A shutter or similar system over slots that maintains an IP66 rating when not accepting bills or coins to prevent dust and water from penetrating the TVM			
4	A coin return tray or bin that will safely hold returned coins			
5	The opening for the coin return tray/bin will be recessed and covered with a spring-loaded door that opens inward, but does not have enough force to cause pinching when opened by passengers.			
6	The coin validator at a minimum will be capable of accepting multiple coins in denominations of penny, nickel, dime, quarter and dollar			
7	The tray/bin door will maintain the TVMs IP66 rating when closed			
8	The coin return slot will be designed to minimize intrusion into the TVM			
9	The coin return tray/bin will be designed to drain any liquids to the outside of the TVM			
10	The coin return tray/bin must be at least 24 inches from the finished floor			
11	The coin return tray/bin must provide a visual notification to the passenger of its location			
12	In the event a jam does occur due to foreign objects, bent or sticky coins, the coin release mechanism will cause the jammed items to be released into the coin return tray/bin			
13	When a passenger cancels a transaction by use of the cancel button this action will activate the coin release mechanism			
14	The bill slot will include a bill validator, a bill escrow module, and a bill vault and chassis			
15	The bill validator will accept one bill at a time and will determine the denomination and validity of the bill			
16	The bill validator will determine the validity and denomination by validating both sides of the bill, dimension, pattern, and color recognition.			
17	The bill validator will be capable of accepting at a minimum multiple bills in varieties of \$1, \$5, \$10, \$20			

18	The bill validator will return any bill deemed to be invalid			
19	The bill return process will keep the bill gripped in order to prevent the bill from falling from the TVM			
20	The TVM will be capable of handling situations where the passenger does not respond to a returned bill and will be able to return to normal working order after an elapsed time, preventing passenger inaction causing an out of service state for the TVM			
21	Both the coin and bill validators will contain security measures that make it impossible to pull a coin or bill out of the machine once it has been accepted			
22	As new coins and bill designs are introduced by the U.S. Treasury Department, the TVM will be capable of being programmatically updated to accept the new designs remotely, while still maintaining the ability to accept previous designs			
23	The TVM will be capable of refusing acceptance of high denomination bills for low dollar transactions, in order to limit the amount of return change to the passenger			
24	The TVM will include a bill escrow module that will temporarily store bills for each transaction until completion or cancellation of the transaction			

J TVM Bill and Coin Vault Requirements				
The TVM will contain separate bill and coin vaults. The vaults will retain monies in removable secure containers that do not exceed 50 pounds when full. The vaults will be modular within the TVM, allowing for quick changing with empty vaults for retrieval of full vaults.		Can Proposer Meet This Requirement? (Yes/No)	Does Proposer Have Alternate that Meets or Exceeds? (Yes/No)	Please Provide Specific Explanation for Alternate
1	The bill vault will stack bills neatly.			
2	The vaults will be made of stainless steel and require a high security key to open.			
3	The vaults will be must be sturdy enough to survive a drop from 3 feet on a concrete floor on any corner or side while retaining all contents and without compromising the locking mechanism.			
4	The vaults will have a carrying handle or handles and be easily retrievable from the TVM by a Metro service representative using a gloved hand.			
5	The vaults must be secured within the TVM and require a high security key to access.			
6	The vaults must be designed to enable quick proper placement within the TVM.			
7	The TVM must report on the current level within each vault and send an alert when capacity is at greater than 80% full.			

K TVM Smart Card Processing System				
The TVM will allow passengers to purchase new and reload monies onto existing smart cards. The TVM will be able to:		Can Proposer Meet This Requirement? (Yes/No)	Does Proposer Have Alternate that Meets or Exceeds? (Yes/No)	Please Provide Specific Explanation for Alternate
1	Recognize and update information on contactless smart cards			
2	Provide balance information, and load new monies to contactless smart cards			
3	Vend new contactless smart cards with value added at the time vended			
4	Determine the status of each card and be able to verify with the central Metro server			
5	Invalidate cards that have been marked as invalid on the central Metro server, to prevent lost/stolen cards from being further used			
6	Report on invalidated cards for verification purposes			
7	Provide a detailed description of the smart card processing system to Metro for review			

L TVM Bank Card Processing System				
The TVM will be capable of accepting Visa, MasterCard, and Bank Debit cards as payment. The TVM will process the card transaction using PCI DSS standards for banking compliance. The TVM will not store nor report full card numbers or PIN numbers.		Can Proposer Meet This Requirement? (Yes/No)	Does Proposer Have Alternate that Meets or Exceeds? (Yes/No)	Please Provide Specific Explanation for Alternate
1	The TVM will include all modules necessary to process bank cards including chip enabled bank cards.			
2	The TVM will have the ability to require a minimum payment for processing bank cards in order to reduce transaction fees. This minimum amount will be remotely configurable by Metro.			
3	The TVM will have a 'cash only' mode that will be enabled if network communications are offline.			
4	The TVM will support cardholder verification methods, including address verification and all methods as defined by EMV, to limit risk of fraudulent transactions. These verifications may include entering PIN, billing ZIP code, or none, depending on Metro configuration parameters. Parameters include card brand, card type, country of card issuance.			
5	The TVM will include distinct bank card transaction time-outs.			
6	A detailed description of the bank card processing system will be provided to Metro for review.			

M TVM Products to be Vended				
TVMs will be able to provide Passengers:		Can Proposer Meet This Requirement? (Yes/No)	Does Proposer Have Alternate that Meets or Exceeds? (Yes/No)	Please Provide Specific Explanation for Alternate
1.	Reloadable contactless smart cards, paper tickets/passes or QR/Barcoded cards.			

N TVM Receipt Printer				
The TVM will be equipped to print and issue receipts to passengers after a transaction is completed. The TVM software will allow the passenger to select whether or not they wish to have a printed receipt provided. To conserve material and reduce waste paper the TVM will not automatically print a receipt.		Can Proposer Meet This Requirement? (Yes/No)	Does Proposer Have Alternate that Meets or Exceeds? (Yes/No)	Please Provide Specific Explanation for Alternate
1	The receipt printer will also be capable of printing a diagnostic report of the TVM when requested from an authorized technician. Samples of this report and the information available will be provided to Metro for review.			
2	The TVM should also be capable of initiating an emailed receipt sent to the passenger either by using existing passenger account information if available or an email address entered by the passenger at the TVM.			
3	Specified receipt paper should be of a type and size that is readily available from third-party sources and not proprietary to the TVM manufacturer.			

Fare Validator Technical Requirements

A Fare Validator General Requirements				
Fare Validators will be installed at on all revenue fleet vehicles. The Fare Validators will connect via WiFi or wired connections to the onboard vehicle Cradlepoint router then to a central Metro server for reporting transactions. The Fare Validators will accept contactless smart cards, MAG cards, mobile payment using NFC, or QR/Barcode systems. Further, the Fare Validators will:		Can Proposer Meet This Requirement? (Yes/No)	Does Proposer Have Alternate that Meets or Exceeds? (Yes/No)	Please Provide Specific Explanation for Alternate
1	Support real-time processing of transactions on reloadable media and support automatic data downloads either real-time or at Transit Centers and Administration Building			
2	Provide detailed reporting for each transaction including time and date, transaction type, account information (without credit card or pin numbers), and amount of transaction back to a central reporting server			
3	Report status updates and all service warnings to the central reporting server			

B Fare Validator and Fare Media Requirements				
Fare Validators will be capable of reading, validating, reporting and when necessary deducting fare amounts from contactless smart cards, mobile payment devices, and MAG cards. Fare validators will provide:		Can Proposer Meet This Requirement? (Yes/No)	Does Proposer Have Alternate that Meets or Exceeds? (Yes/No)	Please Provide Specific Explanation for Alternate
1	Audio output of messages and instructions			
2	Instruction graphics as well as raised lettering and braille instructions in accordance of ADA requirements			
3	Audio and visual feedback on success or failure of fare validation that is visible and audible to the vehicle operator as well as the passenger			

C Fare Validator Communications and Reporting Requirements				
	If the system has real-time data communication the Fare Validators will communicate via the existing Cradlepoint cellular router on each vehicle. If the system operates on data communication at Transit Centers and the vehicle barn, or in the absence of available communication path, the Fare Validator will function in a local mode, that will have the capabilities of keeping all data up to 72 hours before overwriting. The central Metro server will send alerts on all Fare Validators that have not connected within 24 hours. The Fare Validators will provide detailed reports back to a central Metro server that will provide passenger transaction data.	Can Proposer Meet This Requirement? (Yes/No)	Does Proposer Have Alternate that Meets or Exceeds? (Yes/No)	Please Provide Specific Explanation for Alternate
1	Fare Validators that provide a real-time data download option will utilize existing Cradlepoint cellular internet connections for all communications.			
2	Fare Validators will be capable of operating in a local mode when communication is not available. This local mode will be capable of storing all transactions for a minimum of 72 hours.			
3	Fare Validators that operate in a local mode will download all data information at Transit Centers or vehicle barn. The central Metro server will report on vehicles that have not communicated in 24 hours and continue to provide alerts on those vehicles every 4 hours until communication has been restored.			
4	Fare Validators will communicate with a central Metro server for reporting data that will include:			
	Transaction Type			
	Transaction Amount			
	Passenger Account (If available)			
	Transaction date/time			
	Transaction location			
	Transaction Success/Failure			
5	Fare Validators will alert and report all security events to central Metro server, including normal maintenance servicing back to central Metro server.			
6	Fare Validators will transmit all event data for diagnostics, communications failures, environmental alerts, and system status information back to the central Metro server.			

D Fare Validator Passenger Interface Requirements				
The Fare Validator will provide easy to understand visual pictogram instructions to passengers on how to validate their fare media. These instructions will also include braille information for our visually impaired passengers. The Fare Validator will provide visual and audible feedback on fare validation success or failure to the passenger and the vehicle operator. Additionally, fare validators will:		Can Proposer Meet This Requirement? (Yes/No)	Does Proposer Have Alternate that Meets or Exceeds? (Yes/No)	Please Provide Specific Explanation for Alternate
1	Include Instruction graphics with raised lettering and braille instructions in accordance of ADA requirements			
2	Automatically detect what form of media the passenger has presented			
3	Allow all audible tones and messages to be field-adjustable			
4	Have instructions on the front panel that clearly indicate each step a passenger will follow to complete the fare validation procedure			
5	Include pictograms that clearly depict proper insertion and orientation of fare media in the appropriate slot or location on the validator			

E Fare Validator Smart Card Processing System				
The Fare Validator will allow passengers to utilize reloadable contactless smart cards . A detailed description of the smart car processing system will be provided to Metro for review. At a minimum, the Fare Validators should:		Can Proposer Meet This Requirement? (Yes/No)	Does Proposer Have Alternate that Meets or Exceeds? (Yes/No)	Please Provide Specific Explanation for Alternate
1	Incorporate the ability to recognize and update information on contactless smart cards			
2	Be able to determine the status of each card and be able to verify with the central Metro server in either real-time or at the next data communications locations			
3	Invalidate cards that have been marked as invalid on the central Metro server, to prevent lost/stolen cards from being further used			
4	Keep a list of and report on invalidated cards for verification purposes			

F Fare Validator NFC Processing System				
The Fare Validator will allow passengers to utilize NFC devices. A detailed description will be provided to Metro to review, but at a minimum, the Fare Validators will:		Can Proposer Meet This Requirement? (Yes/No)	Does Proposer Have Alternate that Meets or Exceeds? (Yes/No)	Please Provide Specific Explanation for Alternate
1	Incorporate the ability to recognize and update information on NFC devices			
2	Be able to determine the status of each NFC device and be able to verify with the central Metro server in either real-time or at the next data communications locations			
3	Invalidate NFC devices that have been marked as invalid on the central Metro server, to prevent lost/stolen cards from being further used, even when being used in local mode			
4	Report on invalidated NFC devices for verification purposes			

G Fare Validator MAG Processing System				
The Fare Validator will allow passengers to utilize MAG cards. A detailed description will be provided to Metro to review, but at a minimum, the Fare Validators will:		Can Proposer Meet This Requirement? (Yes/No)	Does Proposer Have Alternate that Meets or Exceeds? (Yes/No)	Please Provide Specific Explanation for Alternate
1	Incorporate the ability to recognize and where appropriate update information on MAG cards			
2	Be able to determine the status of each MAG device and be able to verify with the central Metro server in either real-time or at the next data communications locations			
3	Invalidate MAG devices that have been marked as invalid on the central Metro server, to prevent lost/stolen cards from being further used, even when being used in local mode			
4	Report on invalidated MAG devices for verification purposes			

Software Reporting Requirements				
Metro Requires that the software provided ensure the following reporting capabilities are maintained. Additional capabilities will be explored as part of the proposal process. Existing capabilities that need to be maintained include:		Can Proposer Meet This Requirement? (Yes/No)	Does Proposer Have Alternate that Meets or Exceeds? (Yes/No)	Please Provide Specific Explanation for Alternate
1	Reporting cashbox use by bus, date, time and route			
2	Providing passengers transaction data from missing or malfunctioning fare cards			
3	Categorizing trips by pass type, including pass types for pass partners for monthly reporting			
4	Cataloging the number of unused fare cards for financial reporting and auditing			

Optional Equipment

A Mobile Inspection Device				
	Mobile inspection devices will support proof-of-payment inspection through scanning and validation of fare media. The mobile inspection devices will validate whatever fare media is part of the Proposer's solution, including but not limited to smart cards, NFC enabled mobile devices, and MAG stripe media. The Mobile Inspection Devices will:	Can Proposer Meet This Requirement? (Yes/No)	Does Proposer Have Alternate that Meets or Exceeds? (Yes/No)	Please Provide Specific Explanation for Alternate
1	Support real-time inspection and validation of all valid types of fare media, including contactless smart cards, NFC enabled mobile devices, MAG stripe media, and QR/Barcode media			
2	Provide easy to interpret visual and audible reference for validation success or failure			
3	Provide a reporting log of validation successes and failures that include device id, user id, date, and time of each event			

B Point of Sale Terminal				
	POS terminals will be installed at retail outlets to provide our customers a convenient option to reload smart cards, view account balances and account activity, and purchase fare media. POS terminals should accept credit cards and PIN-less debit cards. The terminals will provide an experience similar to the hosted web site and mobile application for interface consistency. The key capabilities will include:	Can Proposer Meet This Requirement? (Yes/No)	Does Proposer Have Alternate that Meets or Exceeds? (Yes/No)	Please Provide Specific Explanation for Alternate
1	Web enabled device equipped with a secure retail sales application that provides sales tracking and reporting			
2	Fully-integrated sales and reloading POS with a staff terminal and passenger-facing display			
3	An integrated contactless smart card reader			
4	A secure cash drawer			
5	An EMV-compliant credit/debit card reader			
6	Be capable of providing printed receipts for each transaction			
7	Specified receipt paper must be of a type and size that is readily available from third-party sources and not proprietary to the manufacturer or Proposer			
8	Be capable of accepting credit cards and PIN-less debit cards			
9	Be capable of reloading contactless smart cards			
10	Be capable of accessing, adding monies to, and viewing activity on Passenger accounts from the hosted account based system			
11	Have a customizable interface that will provide a similar experience to the hosted web site and mobile application			