

City of Albuquerque

Request for Proposals

Solicitation Number: RFP2007-009-VC
RFP Title: Comprehensive Transit Database & AVL



Due Date: February 23, 2007: NLT 4:00 p.m. (Local Time)
The time and date proposals are due shall be strictly observed.

City of Albuquerque
Department of Finance and Administrative Services
Purchasing Division
January 2007

TABLE OF CONTENTS

		Page
	Introduction	3
Part	1	Instructions to Offerors 4
Part	2	Proposal Format 16
Part	3	Scope of Services 18
	3.1	ABQ-Ride Description 18
	3.2	Project Management 25
	3.3	Software License 26
	3.4	Software Maintenance 26
	3.5	Phase 1: Replace Outdated Systems 27
	3.6	Phase 2: Automated Vehicle Location with Schedule Adherence Monitoring 34
	3.7	Phase 3: Integrated Accident / Incident Tracking & Begin Bus Stop Tracking 44
	3.8	Phase 4: Finalize Bus Stop Tracking & Implement Customer Service Trip Planning 48
	3.9	Phase 5: Publish Web-Based Trip Planning & Implement Interfaces to City Systems 50
Part	4	Evaluation of Offers 52
Part	5	Draft Agreement 54
	Appendix	A. Cost Proposal Form 61
		B. Certification of Buy America 63
		C. Certification Regarding Debarment, Suspension, and Other Responsibility Matters – Primary Covered Transactions 64
		D. Phased Implementation Context Diagrams 65

INTRODUCTION

The City of Albuquerque Transit Department, ABQ-Ride, is requesting services for implantation of an automated vehicle location (AVL) for approximately 230 fleet vehicles. The AVL solution will include a schedule adherence monitoring capability to provide performance measures of routes and drivers. AVL data will also provide real-time problem identification and will be recorded to provide playback capabilities. To accomplish this goal, computer applications are also requested. These applications will track accidents, schedule vehicles and schedule drivers for our fixed route operation. These programs will pass and retrieve data to the AVL solution seamlessly by employing a centralized database.

ABQ-Ride is also requesting services for implementation of a web-based trip planning solution. To accomplish this goal, a bus stop tracking application is also requested. The trip planning solution will be required to seamlessly integrate with the vehicle scheduling application and with the bus stop tracking application. The seamless integration of applications will provide ABQ-Ride with an efficient data processing environment.

It is also a goal of ABQ-Ride to implement a solution where information is easily interfaced between work units. Conceptually, all data should reside in one database and all client applications should query the same database for its various purpose. Data entry duplication shall be minimized.

PART 1
INSTRUCTIONS TO OFFERORS

1.1 RFP Number and Title: RFP2007-009-VC, "Comprehensive Transit Database & AVL"

1.2 Proposal Due Date: Friday, February 23, 2007 - NLT 4:00 PM (Local Time)

The time and date proposals are due shall be strictly observed.

1.3 Purchasing Office: This RFP has issued on behalf of the City of Albuquerque by the Purchasing Office, which is the sole point of contact during the entire procurement process.

1.4 Authority: Chapter 5, Article 5 of the Revised Ordinances of the City of Albuquerque, 1994, (the "Public Purchases Ordinance"). The City Council, pursuant to Article 1 of the Charter of the City of Albuquerque and Article X, Section 6 of the Constitution of New Mexico, has enacted this ordinance as authorized by such provisions and for the purpose of providing maximum local self-government. To that end, it is intended that this ordinance shall govern all purchasing transactions of the City and shall serve to exempt the City from all provisions of the New Mexico Procurement Code, as provided in Section 13-1-98K, NMSA 1978.

1.5 Acceptance of Offer: Acceptance of Offer is contingent upon Offeror's certification and agreement by submittal of its offer, to comply and act in accordance with all provisions of the following:

1.5.1 City Public Purchases Ordinance

1.5.2 City Purchasing Rules and Regulations: City of Albuquerque Purchasing Rules and Regulations: These Rules and Regulations (hereinafter "Regulations") are written to clarify and implement the provisions of the Public Purchases Ordinance. These Regulations establish policies, procedures, and guidelines relating to the procurement, management, control, and disposal of goods, services, and construction, as applicable, under the authority of the Ordinance.

1.5.3 Civil Rights Compliance: Acceptance of offer is contingent upon the Offeror's certification and agreement by submittal of its offer, to comply and act in accordance with all provisions of the Albuquerque Human Rights Ordinance, the New Mexico Human Rights Act, Title VII of the U.S. Civil Rights Act of 1964, as amended, and all federal statutes and executive orders, New Mexico statutes and City of Albuquerque ordinances and resolutions relating to the enforcement of civil rights and affirmative action. Questions regarding civil rights or affirmative action compliance requirements should be directed to the City of Albuquerque Human Rights Division, Community Services Department.

1.5.4 Americans with Disabilities Act Compliance: Offeror certifies and agrees, by submittal of its offer, to comply and act in accordance with all applicable provisions of the Americans With Disabilities Act of 1990 and Federal regulations promulgated there under.

1.5.5 Insurance and Bonding Compliance: Acceptance of offer is contingent upon Offeror's ability to comply with the insurance requirements as stated herein. Please include a copy(s) of such certification or statement of compliance in your proposal.

1.5.6 Ethics:

1.5.6.1 Fair Dealing. The Offeror warrants that its proposal is submitted and entered into without collusion on the part of the Offeror with any person or firm, without fraud and in good faith. Offeror also warrants that no gratuities, in the form of entertainment, gifts or otherwise, were, or will be offered or given by the Offeror, or any agent or representative of the Offeror to any officer or employee of the City with a view toward securing a recommendation of award or subsequent contract or for securing more favorable treatment with respect to making a recommendation of award.

1.5.6.2 Conflict of Interest. The Offeror warrants that it presently has no interest and shall not acquire any interest, direct or indirect, which would conflict in any manner or degree with the performance of services required under the contract resulting from this RFP. The Offeror also warrants that, to the best of its knowledge, no officer, agent or employee of the City who shall participate in any decision relating to this RFP and the resulting contract, currently has, or will have in the future, a personal or pecuniary interest in the Offeror's business.

1.5.7 Participation/Offeror Preparation: Offeror may not use the consultation or assistance of any person, firm company who has participated in whole or in part in the writing of these specifications or the Scope of Services, for the preparation of its offer or in the management of its business if awarded the contract resulting from this RFP.

1.5.8 Debarment or Ineligibility Compliance: By submitting its offer in response to this RFP, the Offeror certifies that (i) it has not been debarred or otherwise found ineligible to receive funds by any agency of the federal government, the State of New Mexico, any local public body of the State, or any state of the United States; and (ii) should any notice of debarment, suspension, ineligibility or exclusion be received by the Offeror, the Offeror will notify the City immediately.

1.5.9 Goods Produced Under Decent Working Conditions. It is the policy of the City not to purchase, lease, or rent goods for use or for resale at City owned enterprises that were produced under sweatshop conditions. The Offeror certifies, by submittal of its offer in response to this solicitation, that the goods offered to the City were produced under decent working conditions. The City defines "under decent working conditions" as production in a factory in which child labor and forced labor are not employed; in which adequate wages and benefits are paid to workers; in which workers are not required to work more than 48 hours per week (or less if a shorter workweek applies); in which employees are free from physical, sexual or verbal harassment; and in which employees can speak freely about working conditions and can participate in and form unions. [*Council Bill No. M-8, Enactment No. 9-1998*]

1.5.10 Fly America. The Contractor shall comply with 49 U.S.C. 40118 (The “Fly America” Act) in accordance with the General Services Administration’s regulations at 41 CFR Part 301-10, which provide that recipients and sub-recipients of federal funds and their Contractors are required to use US Flag air carriers for U.S. Government financed international air travel and transportation of their personal effects or property, to the extent such service is available, unless traveled by foreign air carrier is a matter of necessity, as defined by the Fly America Act. The Contractor shall submit, if a foreign air carrier is used, and appropriate certification or memorandum adequately explaining why service by a U.S. Flag air carrier was not available or why it was necessary to use a foreign air carrier and shall, in any event, provide a certificate of compliance with the Fly America requirements. The Contractor agrees to include the requirements in this section in all subcontracts that may involve international air transportations.

1.5.11 Buy America. The Contractor agrees to comply with 49 U.S.C. 5323(j) and 49 C.F.R. Part 661, which provide that Federal funds may not be obligated unless steel, iron, and manufactured products used in FTA-funded projects are produced in the United States, unless a waiver has been granted by FTA or the product is subject to a general waiver. General waivers are listed in 49 C.F.R. 661.7. Separate requirements for rolling stock are set out at 49 U.S.C. 5323(j)(2)(C) and 49 C.F.R. 661.11. Rolling stock must be assembled in the United States and have a 60 percent domestic content. Contractor must submit the appropriate Buy America certification with all bids or offers on FTA-funded contracts, except those subject to a general waiver.

1.5.12 Cargo Preference. The Contractor agrees: a. to use privately owned United States-Flag commercial vessels to ship at least 50 percent of the gross tonnage (computed separately for dry bulk carriers, dry cargo liners, and tankers) involved, whenever shipping any equipment, material, or commodities pursuant to the underlying contract to the extent such vessels are available at fair and reasonable rates for United States-Flag commercial vessels.

1.5.13 Energy Conservation Requirements. The Contractor agrees to comply with mandatory standards and policies relating to energy efficiency that are contained in the state energy conservation plan issued in compliance with the Energy Policy and Conservation Act.

1.5.14 Access to Records and Reports. The Contractor shall comply with all requirements of 49 U.S.C. 5325 18 CFR 18.36(i) 49 CFR 633.17. The Contractor agrees to provide the City, the FTA Administrator, the Comptroller General of the United States or any of their authorized representatives.

1.5.15 Federal Changes. Contractor shall at all times comply with all applicable FTA regulations, policies, procedures and directives, including without limitation those listed directly or by reference in the Master Agreement between Purchaser and FTA, as they may be amended or promulgated from time to time during the term of this contract. Contractor’s failure to so comply shall constitute a material breach of this contract.

1.5.16 Clean Air. The Contractor agrees to comply with all applicable standards, orders or regulations issued pursuant to the Clean Air Act, as amended, 42 U.S.C §§ 7401 et seq. The Contractor agrees to report each violation to the Purchaser and understands and agrees that the Purchaser will, in turn, report each violation as required to assure notification to FTA and the appropriate EPA Regional Office. The Contractor also agrees to include these requirements in each subcontract exceeding \$100,000 financed in whole or in part with Federal assistance provided by FTA.

1.5.17 Recycled Products. The Contractor agrees to comply with all the requirements of Section 6002 of the Resource Conservation and Recovery Act (RCRA), as amended (42 U.S.C. 6962), including but not limited to the regulatory provisions of 40 CFR Part 247, and Executive Order 12873, as they apply to the procurement of the items designated in Subpart B of 40 CFR Part 247.

1.5.18 Davis Bacon and Copeland Anti-Kickback Acts. The Contractor shall comply with the requirements of 29 CFR Part 3 and Part 5, which are incorporated by reference in this Contract.

1.5.19 No Government Obligations to Third Parties. The Purchaser and Contractor acknowledge and agree that, notwithstanding any concurrence by the Federal Government in or approval of the solicitation or award of the underlying contract, absent the express written consent by the Federal Government, the Federal Government is not a party to this contract and shall not be subject to any obligations or liabilities to the Purchaser, Contractor, or any other party (whether or not a party to that contract) pertaining to any matter resulting from the underlying contract. The Contractor agrees to include the above clause in each subcontract financed in whole or in part with Federal assistance provided by FTA. It is further agreed that the clause shall not be modified, except to identify the subcontractor who will be subject to its provisions.

1.5.20 Program Fraud and False M Fraudulent Statements and Related Acts. The Contractor acknowledges that the provisions of the Program Fraud Civil Remedies Act of 1986 as amended, 31 U.S.C. § § 3801 et seq. and U.S. DOT regulations, "Program Fraud Civil Remedies," 49 C.F.R. Part 31, apply to its actions pertaining to this Project. Upon execution of the underlying contract the Contractor certifies or affirms the truthfulness and accuracy of any statement it has made, it makes it may make, or causes to be made, pertaining to the underlying contract or the FTA assisted project for which this contract work is being performed. In addition to other penalties that may be applicable, the Contractor further acknowledges that if it makes, or causes to be made, a false, fictitious, or fraudulent claim, statement, submission, or certification, the Federal Government reserves the right to impose the penalties of the Program Fraud Civil Remedies Act of 1986 on the Contractor to the extent the Federal Government deems appropriate. The Contractor also acknowledges that if it makes, or causes to be made, a false, fictitious, or fraudulent claim, statement, submission, or certification to the Federal Government under a contract connected with a project that is financed in whole or in part with Federal assistance originally awarded by FTA under the authority of 49 U.S.C. § 5307, the

Government reserves the right to impose the penalties of 18 U.S.C. § 1001 and 49 U.S.C. § 5307(n)(1) on the Contractor, to the extent the Federal Government deems appropriate. The Contractor agrees to include the above two clauses in each subcontract financed in whole or in part with Federal assistance provided by FTA. It is further agreed that the clauses shall not be modified, except to identify the subcontractor who will be subject to the provisions.

1.5.21 Debarment and Suspension. The Contractor shall provide certifications required by Department of Transportation regulations, "Government-wide Debarment and Suspension (Nonprocurement)," 49 C.F.R. Part 29, and otherwise comply with the requirements of those regulations (see Appendix C).

1.5.22 Civil Rights Compliance. Acceptance of offer is contingent upon the Contractor's certification and agreement by submittal of its offer, to comply and act in accordance with all provisions of the Albuquerque Human Rights Ordinance, the New Mexico Human Rights Act, Title VII of the U.S. Civil Rights Act of 1964, as amended, and all federal statutes and executive orders, New Mexico statutes and City of Albuquerque ordinances relating to the enforcement of civil rights. Contractor additionally certifies to abide by and cooperate in the implementation of the policies and practices set forth in the City Affirmative Action Plan. Questions regarding civil rights or affirmative action compliance requirements should be directed to the City of Albuquerque Human Rights Division, Community Services Department.

1.5.23 Breaches and Dispute Resolution. Disputes arising in the performance of this Contract, which are not resolved by agreement of the parties, shall be decided in writing by the authorized representative of the City of Albuquerque. This decision shall be final and conclusive unless within [ten (10)] days from the date of receipt of its copy, the Contractor mails or otherwise furnishes a written appeal to the City of Albuquerque. In connection with any such appeal, the Contractor shall be afforded an opportunity to be heard and to offer evidence in support of its position. The decision of the City of Albuquerque shall be binding upon the Contractor and the Contractor shall abide by the decision.

1.5.24 Disadvantaged Business Enterprise. The City of Albuquerque Transit Department is committed to Disadvantaged Business Enterprise program for the participation of Disadvantaged Business Enterprise (DBEs) in Transit Department contracting opportunities in accordance with 49 Code of Federal Regulations Part 26 (49 CFR Part 26), effective March 26, 1999. A DBE is a for-profit, small business concern; 1) that is at least fifty-one percent (51%) owned by one or more individuals who are both socially and economically disadvantaged, or, in the case of a corporation, in which fifty-one percent (51%) of the stock is owned by one or more socially and economically disadvantaged individuals; and 2) whose management and daily business operations are controlled by one or more of the socially and economically disadvantaged individuals who own it. City of Albuquerque Transit Department has set a goal of 5% certified Disadvantaged Business Enterprise participation for this request for proposal. A list of certified Disadvantaged Business Enterprises can be obtained from the New Mexico State

Highway and Transportation Department, Office of Equal Employment Opportunity Programs, P.O. Box 1148, Santa Fe, New Mexico 87504-1148.

1.5.25. Compliance With Laws. In performing the Services required hereunder, the Contractor shall comply with all applicable laws, ordinances, and codes of the Federal, State and local governments.

1.5.26 Incorporation of Federal Transit Administration (FTA) Terms. All contractual provisions required by DOT, as set forth in FTA Circular 4220.1E are hereby incorporated by reference. Anything to the contrary herein notwithstanding, all FTA mandated terms shall be deemed to control in the event of a conflict with other provisions contained in this Agreement. The Contractor shall not perform any act, fail to perform any act, or refuse to comply with any City requests that would cause the City to be in violation of the FTA terms and conditions.

1.6 City Contact: The sole point of contact for this Request for Proposals is the City of Albuquerque Purchasing Division. Contact the following individual(s) regarding this RFP:

- Viola Cunningham, Assistant Purchasing Officer, Department of Finance and Administrative Services, Purchasing Division,
- Phone: (505) 768-3340 or E-Mail: VCunningham@cabq.gov
- Post Office Box 1293, Albuquerque, New Mexico 87103

1.7 Contract Management: The contract resulting from this RFP will be managed by the Transit Department/ABQ-Ride, Administration Division.

1.8 Clarification: Any explanation desired by an Offeror regarding the meaning or interpretation of this Request For Proposals must be requested in writing not less than ten (10) working days prior to the hour and date specified for the receipt of offers to allow sufficient time for a reply to reach Offerors before the submission of their offers. All inquiries must be directed to the Purchasing Office as stated herein. Oral explanations or instructions given before the award of the contract or at any time will not be binding. Any information given to a prospective Offeror concerning this Request For Proposals, will be furnished to all prospective Offerors as an amendment to this Request for Proposals, if such information is necessary to Offerors in submitting offers on this Request For Proposals or if the lack of such information would be prejudicial to uninformed Offerors.

1.9 Submission of Offers: The Offeror's sealed proposal must be in the format outlined in Part 2 of this Request for Proposals and mailed or delivered pursuant to the following requirements:

1.9.1 Envelope preparation. Offers and modifications thereof shall be enclosed in sealed envelopes and have the following identifying information on the outside:

- Name and address of Offeror
- Closing Date and Time
- Request for Proposals Number

- RFP Title

1.9.2 Ship, Deliver or Hand Carry Sealed Offers to: The Office of the City Clerk, City /County Government Center, 11th Floor, One Civic Plaza, Albuquerque, New Mexico 87102. Mark all packages as stated above.

1.9.3 Mail Sealed Responses to: Office of the City Clerk, Post Office Box 1293, Albuquerque, New Mexico 87103. (Certified Mail is recommended). The City shall not be responsible for the failure of mailed offers to actually be received by the Office of the City Clerk by 4:00 of the day of closing.

Note: The City picks up mail at the post office **once** every morning at 7:00 AM (Local Time). **Note: ALL SEALED PROPOSALS MUST BE RECEIVED BY THE OFFICE OF THE CITY CLERK NO LATER THAN 4:00 PM, LOCAL TIME AS RECORDED IN THE CITY CLERK'S OFFICE.**

1.9.4 No other methods of offer delivery: Neither telephone, facsimile, electronic, nor telegraphic offers shall be accepted.

1.9.5 Submit 1 original and 7 copies of your Technical Proposal. Submit 1 original and 1 copy of your Cost Proposal. One soft copy on compact or floppy disk is requested containing the cost and technical proposal.

1.9.6 Modification: Offers may be modified or withdrawn by written notice provided such notice is received prior to the hour and date specified for receipt of offers.

1.9.7 Failure to Submit Offer: If no offer is to be submitted, the recipient shall not return the Request For Proposals.

1.9.8 Response Forms: All parts of this RFP require the use of the Response Forms that are included in Appendix A, Appendix B and Appendix C. Use of these Response Forms is required. Failure to use the forms could result in a proposal being rejected. Unless otherwise instructed, do not retype these forms. If additional copies are needed, make copies on an office copy machine or obtain electronic versions of the forms from the project website.

1.10 Receipt of Proposals: The only acceptable evidence to establish the time of receipt of proposals at the City Clerk's Office is the time-date stamp of such office on the proposal wrapper or other documentary evidence of receipt maintained by the office.

1.11 Acknowledgment of Amendments To the Request For Proposals: Receipt of an amendment to the Request For Proposals by an Offeror must be acknowledged (a) by signing and returning the amendment, or (b) by letter. Such acknowledgment may be submitted with your offer. Such acknowledgment must be received prior to the hour and date specified for receipt of offers.

1.12 Modifications to Scope of Services: In the event that sufficient funds do not become

available to complete each task in the Scope of Services, the Scope of Services may be amended, based upon the cost breakdown required in the Cost Proposal.

1.13 Draft Agreement: A copy of the Draft Agreement to be entered into is attached. Please state that you accept the terms and conditions of the Draft Agreement, or note exceptions.

1.14 Evaluation period: The City reserves the right to analyze, examine and interpret any offer for a period of ninety (90) days after the hour and date specified for the receipt of offers.

1.15 Evaluation Assistance: The City of Albuquerque, in evaluating proposals, reserves the right to use any assistance deemed advisable, including City Contractors and consultants.

1.16 Rejection and Waiver: The City reserves the right to reject any or all offers and to waive informalities and minor irregularities in offers received.

1.17 Debarment of Offeror: Any proposal received from an Offeror that is, at the time of submitting its proposal or prior to receipt of award of a contract, debarred by or otherwise ineligible to receive funds from any agency of the State of New Mexico, any local public body of the State, or any state of the United States, shall be rejected.

1.18 Award of Contract:

1.18.1 When Award Occurs: Award of contract occurs when a Purchase Order is issued or other evidence of acceptance by the City is provided to the Offeror. A Recommendation of Award does not constitute award of contract.

1.18.2 Award: If a contract is awarded, it shall be awarded to the responsive and responsible Offeror whose offer conforming to the Request for Proposals will be most advantageous to the City as set forth in the Evaluation Criteria.

1.18.3 Contract Term: The contract term shall be for a period of eighteen (18) months from the effective date of execution of the contract and/or final execution by the City. This contract term may be extended for up to may be extended up to twelve (12) months by mutual written agreement between the City and the Contractor.

1.18.4 Type of Contract: Firm fixed price.

1.18.5 Debarment/Cancellation of Contract: Upon receipt of notice of debarment of an Offeror awarded a contract as a result of this RFP (the "Contractor"), or other ineligibility of the Contractor to receive funds from any agency of the federal government, the State of New Mexico, any local public body of the State, or any state of the United States, the City shall have the right to cancel the contract with the Contractor resulting from this RFP for cause as provided in accordance with the terms of said contract.

1.18.6 Graffiti Free: When required, the Contractor will be required to furnish equipment, facilities, or other items required to complete these services, that are "graffiti free". Failure of

Contractor to comply with this requirement may result in cancellation of the contract resulting from this RFP.

1.19 Cancellation: This Request for Proposals may be canceled and any and all proposals may be rejected in whole or in part when it is in the best interest of the City.

1.20 Negotiations: Negotiations may be conducted with the Offeror(s) recommended for award of contract.

1.21 City-Furnished Property: No material, labor, or facilities will be furnished by the City unless otherwise provided for in the Request for Proposals.

1.22 Proprietary Data: This Request for Proposals shall be open to public inspection after the recommendation of award of a contract has been signed by the Mayor, except to the extent the Offeror designates trade secrets or other proprietary data to be confidential. Material so designated must be separated from the Offeror's main proposal and each page shall be clearly marked in order to be considered confidential and to facilitate public inspection of the non-confidential portion of the proposal. Prices and makes and models or catalog numbers of the items offered, deliveries, and terms of payment shall be publicly available regardless of any designation to the contrary. The City of Albuquerque will endeavor to restrict distribution of the material designated as confidential or proprietary to only those individuals involved in the review and analysis of the proposals. Offerors are cautioned that materials designated as confidential may nevertheless be subject to disclosure under the New Mexico Inspection of Public Records Act (Sections 14-2-1 et seq, NMSA 1978).

1.24 REQUEST FOR PROPOSALS (RFP) PROTEST PROCESS:

1.24.1 When: If the protest concerns the specifications for a competitive solicitation or other matters pertaining to the solicitation documents, it must be received by the Purchasing Officer no later than ten working days prior to the deadline for the receipt of offers.

1.24.2 Recommendation of Award: If the protest concerns other matters relating to this solicitation, the protest must be filed within ten working days after the receipt of notice of the Recommendation of Award.

1.24.3 Timely Protests: Protests must be received by the Purchasing Officer prior to the appropriate deadline as set out herein, or they will not be considered valid. The Purchasing Officer may waive the deadline for good cause, including a delay caused by the fault of the City. Late delivery by the U.S. Postal Service or other carrier shall not be considered good cause.

1.24.4 How to File: The protest shall be addressed to the Purchasing Officer, must be submitted in written form and must be legible. Protests may be hand-delivered or mailed. Facsimile, telephonic, telegraphic or electronic protests will not be accepted.

1.24.5 Required Information: The protest shall contain at a minimum the following;

- The name and address of the protesting party;
- The number of the competitive solicitation;
- A clear statement of the reason(s) for the protest;
- Details concerning the facts, which support the protest;
- Attachments of any written evidence available to substantiate the claims of the protest; and
- A statement specifying the ruling requested.

1.24.6 Address Letters and Envelopes as Follows:

- City of Albuquerque RFP Number
- Purchasing Division PROTEST
- PO Box 1293
- Albuquerque, New Mexico 87103

1.24.7 Protest Response by Purchasing Officer: All protests will be responded to by the Purchasing Officer upon evaluation. The Purchasing Officer will, after evaluation of a protest, issue a response. Only the issues outlined in the written protest will be considered by the Purchasing Officer.

1.24.8 Protest Hearing: If a hearing is requested, the request must be included in the protest and received within the time limit to be allowed. The filing fee of twenty dollars (\$20.00) must accompany the request for hearing. Only the issues outlined in the protest will be considered by the Purchasing Officer, or may be raised at a protest hearing. The granting of a hearing shall be at the discretion of the Purchasing Officer following review of the request.

1.25 BONDS and INSURANCE:

1.25.1 General Conditions: The City will require that the successful Offeror, referred to as the Contractor, procure and maintain at its expense during the term of the contract resulting from the RFP, insurance in the kinds and amounts hereinafter provided with insurance companies authorized to do business in the State of New Mexico, covering all operations of the Contractor under the contract. Upon execution of the contract and on the renewal of all coverage, the Contractor shall furnish to the City a certificate or certificates in form satisfactory to the City showing that it has complied with these insurance requirements. All certificates of insurance shall provide that thirty (30) days written notice be given to the Risk Manager, Department of Finance and Administrative Services, City of Albuquerque, P.O. Box 470, Albuquerque, New Mexico, 87103, before a policy is canceled, materially changed, or not renewed. Various types of required insurance may be written in one or more policies. The City shall be named an additional insured for all coverages and the coverages afforded shall be primary with respect to operations provided.

1.25.2 Approval of Insurance: Even though the Contractor may have been given notice to proceed, it shall not begin any work under the contract resulting from this RFP until the required insurance has been obtained and the proper certificates (or policies) filed with the City. Neither approval nor failure to disapprove certificates, policies, or the insurance by the

City shall relieve the Contractor of full responsibility to maintain the required insurance in full force and effect. If part of the contract is sublet, the Contractor shall include any or all Subcontractors in its insurance policies, or require the subcontractor to secure insurance to protect itself against all hazards enumerated herein, which are not covered by the Contractor's insurance policies.

1.25.3 Coverage Required: The kinds and amounts of insurance required are as follows:

1.25.3.1 Commercial General Liability Insurance. A commercial general liability insurance policy with combined limits of liability for bodily injury or property damage as follows:

\$1,000,000	Per Occurrence
\$1,000,000	Policy Aggregate
\$1,000,000	Products Liability/Completed Operations
\$1,000,000	Personal and Advertising Injury
\$ 50,000	Fire Legal
\$ 5,000	Medical Payments

Said policy of insurance must include coverage for all operations performed for the City by the Contractor and contractual liability coverage shall specifically insure the hold harmless provisions of the contract resulting from this RFP.

1.25.3.2 Automobile Liability Insurance. A comprehensive automobile liability insurance policy with liability limits in amounts not less than \$1,000,000 combined single limit of liability for bodily injury, including death, and property damage in any one occurrence. The policy must include coverage for the use of all owned, non-owned, hired automobiles, vehicles and other equipment both on and off work.

1.25.3.3 Workers' Compensation Insurance. Workers' compensation insurance policy for the Contractor's employees, in accordance with the provisions of the Workers' Compensation Act of the State of New Mexico, (the "Act"). If the Contractor employs fewer than three employees and has determined that it is not subject to the Act, it will certify, in a signed statement, that it is not subject to the Act. The Contractor will notify the City and comply with the Act should it employ three or more persons during the term of the contract resulting from this RFP.

1.25.4 Increased Limits: During the life of the contract the City may require the Contractor to increase the maximum limits of any insurance required herein. In the event that the Contractor is so required to increase the limits of such insurance, an appropriate adjustment in the contract amount will be made.

1.25.5 Performance Bond and Labor and Material Payments Bond: The Contractor will be required to furnish separate surety bonds each in the amount of one hundred percent (100%) of the total contract amount, offered as security for the faithful performance of the contract and for the payment of all labor and materials. These

bonds must be written on the forms provided in this RFB and furnished prior to or at the time of the issuance of a written notice of award of a contract resulting from this RFB. The Contractor must be named as principal on the bonds. No third party performance bonds will be accepted. The sureties on such bonds shall be duly authorized to conduct business in the State of New Mexico, and acceptable to the City.

CASHIER'S CHECKS, CERTIFIED CHECKS, PERSONAL CHECKS, LETTERS OF CREDIT, CASH OR OTHER SUBSTITUTES WILL NOT BE ACCEPTED IN LIEU OF THESE BONDS.

Left blank intentionally

PART 2 PROPOSAL FORMAT

2.1 Technical Proposal Format, Section One

2.1.1 Offeror Identification: State name and address of your organization or office and nature of organization (individual, partnership or corporation, private or public, profit or non-profit). Subcontractors if any must be identified in a similar manner. Include name and telephone number of person(s) in your organization authorized to execute the Draft Agreement. Submit a statement of compliance with all laws stated herein. Submit a statement of agreement of the terms and conditions of the Draft Agreement; state exceptions. Show receipt of Addenda if applicable. Provide a statement or show ability to carry the insurance specified.

2.1.2 Experience:

2.1.2.1 Current Experience. State relevant experience of the company and person(s) who will be actively engaged in the proposed project, including experience of Subcontractors. Submit resumes for the individuals who will be performing the services for the City.

2.1.2.2 Past Experience. Describe a minimum of three (3) projects of similar scope and size, which are now complete; state for whom the work was performed, year completed, and a reference person who can be contacted regarding the work. References must be for work performed in the past three to five (3 to 5) years. State relevant experience with other municipalities or government entities.

2.1.3 Proposed Approach to Tasks: Discuss fully your proposed approach to each of the tasks described in Part 3, Scope of Services. Use charts to illustrate the number of hours dedicated to each task and who will be performing each task [individual(s)/firm(s)]. Reference Appendix A, attached hereto, without stating the price structure.

2.1.4 Management Summary: Describe individual staff and subcontractor's responsibilities with lines of authority and interface with the City of Albuquerque staff. Describe resources to be drawn from in order to complete tasks.

2.2 Cost Proposal Format, Section Two

2.2.1 Total Cost: Submit one original and one copy of your Cost Proposal, in a **separate** binder, or folder distinctly marked with the following information, in a "spread sheet" format as given in the example provided in Appendix A, and attached hereto.

2.2.2 The cost proposal should contain at least the following information:

- The cost for the entire project broken down by the activities or steps shown on the project schedule.

- Estimated periodic billing to the City based on the cost of the deliverable items.
- Cost or pricing details should be shown by task. This might include, but is not limited to:
 - Hours by category, hourly rates, and total labor broken out by professional and other labor. Rates are to include all overhead and profit.
 - Purchased materials, unit costs, and quantities.
 - Travel, lodging, and other direct expenses.
 - Subcontract costs if applicable, and additional consulting beyond the scope of the described tasks (if requested).

2.2.3 Offerors should show detailed costs by task and number of hours dedicated to each task as listed in the specifications.

2.2.4 An example of the preferred format is contained in Appendix A, attached hereto as described above. Your response to this section will be used in performing a cost/price analysis.

2.2.5 All Costs: All costs to be incurred and billed to the City should be described by the Offeror for each item, to allow for a clear evaluation and comparison, relative to other offers received. The Offeror should understand that the City will not pay for any amounts not included -- for example, insurance or taxes -- and that liability for items not included remains with the Offeror.

**PART 3
SCOPE OF SERVICES**

This project will be implemented as a Phased project based on availability of funds.

The following are scope of services arranged in priority and logical implementation order. If the Contractor disagrees with the implementation order, please give an explanation of the rationale for the disagreement. In such cases, the Contractor shall also provide their recommended implementation order. The ideal proposal shall include all components described in this section working from a centralized database that houses all transit data and will be built using a fully scalable and modular approach.

Many of the Services requested duplicate existing systems the City has implemented on an enterprise-wide basis. We have identified potential modules that fall into this criterion throughout this proposal. The awarded Contractor may be required to create interfaces to City systems that are not Transit specific.

3.1 ABQ-Ride Description

The purpose of this section is to provide Contractors with the opportunity to understand the current status of ABQ-Ride.

3.1.1 Vehicle Inventory

<u>Service Type</u>	<u>Vehicle Type</u>	<u>Year</u>	<u>Make</u>	<u>Model</u>	<u>Numbers</u>
Fixed Route	40' Diesel Bus	1989	TMC	RTS06	101-110
	35' Diesel Bus	1989	TMC	RTS06	201-248
	40' CNG Bus	1997	Neoplan	AN440	301-340
	32' CNG Bus	2001	Thomas	SLF200	401-435
	36' Diesel Bus	2001	Thomas	SLF200	436
	Trolley Bus	1995	Chance	AH28	905-910
Rapid Route	60' Hybrid	2004	New Flyer	DE60LF	6401-6412
Demand - Response	Mini Van	2000	Dodge	Caravan	2001-2030
	22' Cutaway	2002	Ford/Thomas	E-450	2301-2311
	20' Cutaway	2006	Ford/Spartan	E-350	2601-2630
	Full size van	1996	Dodge	Ram	9601-9612

Various support vehicles include Honda Civic, Ford Taurus, Chevrolet Tahoe, Chevrolet Lumina and Chevrolet Colorado.

3.1.2 On-board equipment and systems

All fixed route vehicles, except 905-910, utilize GFI Genfare's CENTSaBILL fare boxes. Fare boxes are not integrated with any other on-board systems. Vehicle numbers 905-910 have primitive non-registering fare collection devices.

Vehicle operators have to perform two logons, one for the fare box and the other for the head-sign/enunciator system. Demand-response vehicles do not have a fare collection system.

All revenue vehicles are equipped with GE Ericsson 800 MHz radio system. Radio communication is not integrated with any other on-board system. However, a data channel on this radio system is used to transmit and receive Trapeze PASS schedules. Such schedules are displayed on the MDT's that are further described in the following matrix. All vehicles have a power delay timer to maintain radio power 15 minutes after vehicle shut down.

All revenue vehicles are also equipped with S&A Systems electronic hubometers. Hubometers are usually mounted on the driver's side rear axle.

For vehicles with destination signs installed, the standard configuration is a large forwarding facing display, a medium sized passenger side display and a small rear display. The front and side displays will usually mirror each other with their text messages. The rear display usually will only display the route number.

<u>Vehicle Numbers</u>	<u>System Type</u>	<u>Manufacturer</u>	<u>Summary</u>
101-110	Destination sign	Illuminator	Destination signs utilize flip dot technology. Most destination signs are faded and are hard to read. These are the original models installed with bus procurement in 1989. Destination signs have not gone through any upgrades since.
201-248	Destination sign	Illuminator	
301-340	Cameras	Various VCRs and analog cameras.	VCR technology. Cameras are black and white. Audio is also recorded. One microphone is installed near the driver's seat. Three cameras are installed per vehicle. All cameras are interior views. Most are non functional. Cameras not integrated with any other on-board system.
	Enunciator	Digital Recorders DR600.	Operator Control Unit (OCU) also controls the destination signs. Destination signs can be controlled independently from the enunciator system. Associated equipment for enunciator system includes GPS antennas, interior LED display for visual announcements and tamper resistant housing. Announcement image upload to each bus is a manual process.
	Destination sign	Twin Vision	High intensity LED technology. Amber only LED signs.

401-435 & 436	Cameras	Safety Vision Road Recorder 5000	Cameras are color. Audio is also recorded. However, audio is unusable while the vehicle is in motion due to the interior noise levels. One microphone is mounted near the driver's seat. Most are still functional. Safety Vision has dropped support for this product. Three cameras installed per bus. All cameras have interior views. Cameras are not integrated with any other on-board system. Video and audio is recorded onto a removable hard drive. Video downloading is a manual process.
---------------	---------	----------------------------------	--

401-435 & 436 (cont.)	Enunciator	Digital Recorders DR500	OCU also controls the destination signs. Destination signs can be controlled independently from the enunciator system. Associated equipment for enunciator system includes GPS antennas, interior LED display for visual announcements and tamper resistant housing. Announcement image upload to each bus is a manual process.
	Destination sign	Twin Vision	High intensity LED technology. Amber only LED signs.
905-910			No I.T.S. technologies implemented with these buses.
6401-6412	Cameras	GE Mobile View	Cameras are color. Audio is also recorded. One microphone is mounted near the driver's seat. All cameras are functional. Six cameras installed per bus. One camera faces forward to record area in front of the bus. All other cameras record interior views. Cameras are not integrated with any other on-board system. Video and audio is recorded onto a removable hard drive. Video downloading is a manual process.

	Enunciator	Digital Recorders DR600	<p>OCU also controls the destination signs and the automated passenger counters (APC). Destination signs can be controlled independently from the enunciator system.</p> <p>APC device uses the logon data to identify its route and coach run. APC device also integrates with the GPS antenna for latitude and longitude coordinates. APC stores its data on the DR600 unit. DR600 units are integrated with the predictive arrival signs (PAS) that is defined later in this section.</p> <p>Associated equipment for enunciator system includes GPS antennas, two interior LED displays for visual announcements and tamper resistant housing.</p> <p>Announcement image upload to each bus is a manual process. Video download and APC download from each bus is a manual process.</p>
--	------------	----------------------------	---

6401-6412 (cont.)	Destination sign	Twin Vision Chroma 1	High intensity LED technology. Chroma 1 is the current standard for new destination signs. The color on the left most ¼ of the front sign can be controlled. Remainder ¾ of the front sign is amber only. Side and rear signs are amber only.
	Automated Passenger Counter	InfoDev	APC devices are mounted above all three entry/exit doors. APC data is recorded and downloaded through the DR600 unit.
	Wireless Internet	Cisco	Cisco Aironet bridges are mounted on street signal poles with line of sight (LOS) from one to another. The wireless mobile Internet only works while the bus is within LOS of a Cisco antenna.

	Next Bus Display at Stops	Digital Recorders Predictive Arrival Signs (PAS)	<p>DR600 unit incorporates a Cingular GPRS SIM card that allows GPS data to be communicated to a centralized server. Based on the vehicle's location and speed, the server can predict when each vehicle will intersect the next stop. Stops are also equipped with Cingular GPRS modems for reception of server transmissions of next bus predictions.</p> <p>Since latitude and longitude information is available at the centralized server, AVL data is passed to a Windows workstation that displays current vehicle's location in real time. This display is located at the dispatch center.</p> <p>PAS system is implemented along the Central Rapid Ride corridor. A total of 23 stops are equipped.</p>
--	---------------------------	--	--

2001-2030	Mobile Data Terminals (MDT)	Mentor Engineering	<p>MDT's are connected to the vehicle's odometer. This allows the MDT's to calculate mileage traveled between customer pick-ups and drop-offs. Automated mileage information streamlines the National Transit Database reporting process.</p> <p>Using the MDT's, operators may indicate whether they are in-route for a pick-up, have or have not picked up specific customers, on a break, on lunch hours or simply deadheading.</p> <p>MDT's communicate with ABQ-Ride's command center via the private radio network. Currently, this radio network is limited to 9600 baud rate.</p> <p>At the command center, MDT data integrates with Trapeze Paratransit Scheduling System (PASS). MDT's also send occasional GPS data to PASS. This data is displayed in near-real time on a map and can be used as a basic AVL system.</p>
2301-2311			
2601-2630			
9601-9612			

3.1.3 Facilities

ABQ-Ride presently operates three major facilities. These are:

	Address	Function
A.	100 First Street SW Albuquerque, NM 87102	Administrative Offices Central Dispatch Center Customer Service Center Finance Human Resources Information Technology Marketing Public Information Office
B.	601 Yale Blvd SE Albuquerque, NM 87106	Facility Maintenance Main Security Offices Maintenance Operations Parts
C.	8001 Daytona Rd NW Albuquerque, NM 87121	Maintenance Operations Parts

3.1.4 Computer Systems

Provider	System	Summary
GFI Genfare	Data System	Integrated with GFI's fare boxes, this system gathers data from the fixed route vehicles.
Trapeze	PASS	Paratransit Scheduling System (PASS). Schedules the paratransit services.
Trapeze	PASS-MON	Interface to Mentor's on-board MDT. Provides trip data to vehicle's operator.
DRI	AVL	Provides real time AVL data for the Rapid Ride route only.
DRI	PAS	Predictive Arrival System (PAS). Displays the next predictive arrival times at each Rapid Ride stop.
DRI	Talking Bus	Provides ADA announcements on each vehicle.
GIRO	Hastus	Scheduling system for the fixed route vehicles. This is for bookings or bids only. Not used for daily scheduling operation of operators.
Multi-Systems	BD	Bid Dispatch (BD). DOS based scheduling system of operators on a daily basis. Database engine is B-trieve.
S&A Systems	Fleetwatch	Fuel management system
Maximus	Fleet Focus	Fleet maintenance system
InfoDev	APC	Automated Passenger Counters (APC). Installed only on Rapid Ride vehicles.
ABQ-Ride	TCD	Transit Central Database (TCD). Originally conceived as an in-house system that all users can access. Currently, TCD can track complaints, is the foundation for all interfaces, is a information dispersal tool, and is also a boarding analysis tool.
	EMPATH /	EMPATH is currently the citywide payroll system. There is a project underway to implement a HR/payroll system from PeopleSoft.

	PeopleSoft	
ESRI	GIS	Enterprise-wide GIS system.

3.1.5 Network Environment

Servers

NOS	Name	Version	Utilization
Novell	ST5	4.11	File storage and file serving. Print services. Primary authentication server.
Novell	ST1	3.12	BD application and database server (B-trieve). Print services. Backup login authentication.
Win NT	hastus	4	Hastus application and database server. Database engine is Microsoft SQL 7.
Win 2000	ST6	2000	Database server utilizing Microsoft SQL 2000. Backup domain controller.
Win 2000	ST_DC1	2000	Primary domain controller.
Win 2003	Transched	2003	Trapeze scheduling server.

Physical Network

All facilities have 100mbs category 5 cable to the desktop. Cisco switches are the standard and are utilized to manage computer communications.

The Yale facility has a fiber optics back-bone that links all of the buildings together.

The Daytona facility has a fiber optics back-bone that links all of the buildings together.

The Alvarado facility is connected to Yale via fiber optics. Currently, the Alvarado facility is connected to the Daytona facility via a public data T1 line. Efforts are underway to upgrade this to a fiber line. The Yale facility and the Daytona facility do not have any direct lines to each other. Because of the geographic location of these facilities, most communication lines route through City Hall and the Alvarado facility.

3.1.6 Desktop PC Environment

The standard desktop PC utilizes Microsoft Windows XP. There are some exceptions where Microsoft Windows 2000 is used. Approximately 12 PC's are still running Microsoft Windows 98.

Section 3.2 – Project Management

Project Management services are required per City policy on projects such as this. It is expected that the Contractor will exercise project management methodologies throughout this project. In your response, the Contractor shall document their standard project management techniques. Note however, that the Contractor will be required to also follow project management standards as identified by the City. These standards include the development and completion of the following deliverables:

3.2.1 System Deliverables

- A. Functional and Technical Requirements
- B. Fit-Gap Analysis
- C. System Design Document
- D. System Administration and Configuration Management Plan
- E. Testing Plan
- F. User Guides
- G. System Modification and Configuration Documentation
- H. Reports Plan and Documentation

3.2.2 Project Management

Project Management Plan including, but not limited to, the following components:

- A. Microsoft Project Work Plan with tasks, deliverables, estimated durations, and resources (leveled to 40 hours/week).
- B. Dispute and Issue Resolution Procedure
- C. Change Order Procedure
- D. Risk Analysis
- E. Training Plan for System Administration and End-users
- F. Change Management and Communications Plan
- G. Quality Assurance Plan
- H. Deliverables Acceptance Process
- I. Deployment Plan
- J. Bi-weekly Project Status Reports including updates to the Microsoft Project Work Plan Final Project Acceptance
- K. Project Acceptance Plan

The Project Management steps shall include all phases of Project Management, including a 30-day acceptance period subsequent of Production Go-Live of each phase unless explicitly defined otherwise.

Section 3.3 – Software License

The Contractor shall recommend and provide details for an enterprise licensing model that is cost effective and flexible. This license shall permit the use of any of the applications or its subcomponents by the City of Albuquerque without limitations on the number of workstations, number of users, the number of daily trips performed or the number of vehicles used.

Section 3.4 – Software Maintenance

Software maintenance license cost shall not be applied for an individual application until that application has been successfully implemented and a software acceptance has been granted by the City of Albuquerque.

Software maintenance license cost for all applications shall be incorporated into one annual agreement. If individual applications are implemented during the middle of the annual agreement, then that the portion of the software license shall be prorated.

Section 3.5 – Phase 1: Replace Unsupported Systems

Phase 1 will replace the unsupported systems at the City of Albuquerque, Transit Department. These are the fixed route scheduling and operator scheduling systems. In addition, this Phase will implement publishing tools for the fixed route scheduling system and an automated operator's bidding module. These systems will support all of the requested Integrated Transportation Management Systems (ITMS) that are described in later Phases.

3.5.1 Fixed Route Scheduling For Bids

The Fixed Route Scheduling For Bids is the core function of any transportation entity. Schedulers must rely on this system to provide management with fundamental information. Schedulers shall easily and efficiently:

- A. Construct routes patterns by graphically linking major timing points along a system street map.
- B. Construct routes, travel times, headways and transfer points along the route pattern.
- C. Construct route deviations.
- D. Construct layover points and layover times.
- E. Incorporate deadhead times.
- F. Copy and paste route patterns, routes and entire bookings.
- G. Break or link trips on any route.
- H. Break or link work pieces on any route.
- I. Interline routes or partial routes.
- J. Construct hypothetical service scenarios.
- K. Produce cost estimates for proposed transit service.
- L. Account for scheduled:
 - a. Mileage
 - b. Operational hours
 - c. Pay hours
 - d. Deadhead times
 - e. Layover times
 - f. Number of vehicles required
 - g. Vehicle types required
 - h. Service types such as express, commuter, trolley and rail
 - i. Service days such as weekdays, Saturdays, Sundays and holidays
- M. Apply beginning and ending dates of service.
- N. Apply system-wide travel speed and travel times.
- O. Apply different travel times based on different times of day or different day types.
- P. Apply different travel times for different zones within the service area.
- Q. Specify a vehicle type for any route or trip within a route.
- R. Graphically view bus stop locations and amenities on a system street map.
- S. Produce public timetables for each route and day type.
- T. Extrapolate passing times at bus stops based on patterns generated.

- U. Produce stop timetables for each bus stop.
- V. Produce operator's paddleboard report.

3.5.1.1 Interfaces

- A. The City currently has an enterprise-wide GIS system. The City's GIS street network is updated regularly and shall serve as the foundation to the GIS environment of this project. The proposed solution shall provide the capability to:
 - a. Import the street centerline data from an ESRI formatted file.
 - b. Export the route centerline data, route day type, route timing points and route running times to an ESRI formatted file.

3.5.1.2 Integration

Data produced by schedulers shall be electronically available to any user on the network. Access to such information online reduces search times, eliminates prints and reduces desk clutter. Any changes made by schedulers are immediately reflected online.

The data generated shall integrate seamlessly to the following, but not limited to:

- A. Schedule Publishing Tools Application, Phase 1.
- B. Automated Bidding Data Capture, Phase 1.
- C. Fixed Route Driver Scheduling Application, Phase 1.
- D. AVL Schedule Adherence Monitor Application, Phase 2.
- E. Trip Planning Applications, Phase 4 and Phase 5.
- F. Bus Stop Tracking Application, Phase 3.

See Appendix D

3.5.1.3 Export Capabilities

Module must provide export capabilities in fixed width text format for any data this system produces. This data includes, but is not limited to:

- A. Route information
- B. Work piece information
- C. Vehicle coach run information
- D. Public time tables

3.5.1.4 Data Conversion

The Contractor shall convert data from the current Fixed Route Scheduling for Bid system Hastus ver. 5 to the proposed solution. This includes but is not limited to:

- A. Route information
- B. Work piece information
- C. Vehicle coach run information
- D. Route deviation information
- E. Service types
- F. Major time points
- G. Vehicle type required for coach run

3.5.1.5 Training

The Contractor shall supply a recommendation for days required for end-user and administrator training on this application.

3.5.2 Schedule Publishing Tools

The Schedule Publishing Tools is the application that enables schedulers to efficiently publish their work. Schedulers shall easily and efficiently:

- A. Export route schedules to a format that can be imported by a page layout application such as Adobe PageMaker, Macromedia FreeHand, or Macromedia PhotoFinish, to provide a means for ease of publishing schedules.
- B. Export route schedules in Adobe PDF format.
- C. Export route schedules for individual bus stop locations.
- D. Export schedules in an ADA acceptable format for web pages. See <http://www.cabq.gov/transit/tran.html> and click ADA accessible version of route schedules for reference.

3.5.2.1 Training

The Contractor shall supply a recommendation for days required for end-user and administrator training on this application.

3.5.3 Automated Bidding Application

From the Fixed Route Scheduling For Bids application, a generic schedule is available less driver assignments. This information includes:

- A. Bid starting and ending dates.
- B. Start and end times of each coach run.
- C. Start and end locations of each coach run.
- D. Pre-trip inspection times and post-trip inspection times allowed.
- E. Travel times allowed.
- F. Pay times.
- G. Layover times.
- H. Deadhead distance and travel times.

- I. Relief points.
- J. Day type of work assignments.

With this information, MCO's can bid on their work assignments online. With a networked environment, MCO's may bid from any computer or physical location. Once a work assignment has been selected, the same work assignment is immediately made unavailable within the application.

This application shall have the ability to enforce the bidding order by driver's seniority. An override option shall be made available for supervisors in the event a driver cannot or did not bid.

MCO's are allowed 15 minutes to bid on their desired work assignments. This application shall have the ability to enforce their allowed bid times.

Once implemented, this application shall eliminate or minimize the data entry generated from the current manual process.

3.5.3.1 Integration

This application shall seamlessly and automatically push its data to the Driver Management Application once the bidding process is complete.

3.5.3.2 Training

The Contractor shall supply a recommendation for days required for driver and supervisor training on this application. The Contractor shall also provide a recommendation for dry runs and information on common mistakes when implemented at other transit agencies.

3.5.4 Driver Management Application

This module will be a workflow based application that will read directly from the Fixed Route Schedule data and will provide the following base functionality: Personnel Tracking, Bidding, Dispatching, and Timekeeping.

3.5.4.1 Personnel Tracking

In order to effectively integrate data and databases, ABQ-Ride recognizes that implementation of personnel data is key. Personnel data validation is required throughout many various other modules.

The Personnel Tracking module shall include:

- A. First name, last name, middle name.
- B. Unique employee ID numbers.

- C. Social security numbers. Available on-line only, not available on any report.
- D. Home address, mailing address.
- E. Date of birth, date of hire, date of termination, date of transfer, date of retirement.
- F. Driver's license number, license date of expiration, license number, license state of issue.
- G. Other licensed permit types such as City Operator's Permits (COP) and Commercial Driver's License (CDL).
- H. Home phone, cellular phone, e-mail address.
- I. In-case-of-emergency contact information.

3.5.4.1.1 Interfaces

The City currently has implemented an enterprise-wide human resources system called EMPATH. A project is currently underway to implement a new HR system by PeopleSoft. Due to this, interfaces in-to and/or out-of the Personnel Data will be required and the details should be addressed as part of your high-level project plan. This will take advantage of data entry provided by City's HR department.

The Personnel Tracking Application shall have the capability to import personnel data that originates from either EMPATH or PeopleSoft.

3.5.4.2 Tardy and Missed Pull Out Tracking

Solution proposed shall have tracking ability for motor coach operator's (MCO) tardy and missed pull-outs (missouts). Data to include, but not limited to:

- A. Date and time of incident.
- B. Affected coach run or work assignment.
- C. Preventable or non-preventable status.
- D. Upheld or dismissed status, used by the pre-determination hearing process.

3.5.4.3 Integration

Data produced by this module must integrate with all of the following as seamlessly as possible. If a seamless solution cannot be provided, the Contractor shall detail the process or steps required to maintain functionality. The Contractor shall also provide detailed information on any data entry duplication.

- A. Trapeze PASS and PASS MON, implemented February 2005.
- B. CAD/AVL Application for Dispatch, Phase 2.
- C. Fixed Route Scheduling For Bids, Phase 1.
- D. Automated Bidding Application, Phase 1.
- E. Fixed Route Daily Operator Scheduling, Phase 1.
- F. Accident and Incident Tracking Application, Phase 3.

3.5.4.4 Training

The Contractor shall supply a recommendation for days required for supervisor training on this application.

3.5.5 Fixed Route Daily Operator Scheduling

A Fixed Route Daily Operator Scheduling application is used to ensure that each work assignment has the appropriate resources. The two major resources required are vehicles and the MCO's. With such an application, users shall be able to schedule work assignments days or weeks in advance.

To validate a vehicle's availability, this application shall query the centralized database.

To validate MCO's availability, this application shall query data from the Personnel Tracking Module. In addition, this application shall track availability of MCO's data including:

- A. Scheduled vacation / bid vacation dates.
- B. Scheduled time allowed for bidding on work assignments.
- C. Operator's sick days.
- D. Scheduled meeting dates and times.
- E. Scheduled retirement dates.

3.5.5.1 Theory of Operation

Once the MCO's bidding process is complete, the data shall serve as templates for daily work assignments. The application shall use this template in conjunction with a driver's unavailability data to create a default work schedule.

The default work schedule is then reviewed and modified to include any additional assignments, changes to current assignments and removal of current assignments.

This application shall:

- A. Provide the user with status assignments including the number of assignments not fulfilled.
- B. Prevent overlap of assignment times by the same MCO or the same vehicle.
- C. Allow for sufficient rest time between different days of work.
- D. Allow the user to break up a work assignment and distribute to multiple MCO's.
- E. Track pay times for MCO's.
- F. Track pay for split work assignment types.
- G. Track overtime for MCO's.

- H. Track paid leave time such as vacation, sick, meetings and drug testing.
- I. Print an end of week or end of pay period payroll report for each MCO.
- J. Allow for a text export of an end of week or end of pay period payroll data for each MCO.

3.5.5.2 Interfaces to Current Systems

One of the concepts for using the Fixed Route Daily Operator Scheduling is to reduce data entry into a payroll system. Ideally, an interface would be created to eliminate data entry and transfer driver's pay data to the citywide payroll system.

The Fixed Route Daily Operator Scheduling Application shall have the capability to export timekeeper data to the City's payroll system. The City is currently replacing EMPATH with PeopleSoft as the HR/payroll system. As a result, the interface capability to upload this data will be implemented in Phase 5. At that time the City will have better expectation of which payroll system to export to.

The Fixed Route Daily Operator Scheduling Application shall have the capability to assign drivers to a specific vehicle. This is vital to the Fixed Route Schedule Adherence Application in Phase 2.

3.5.5.3 Training

The Contractor shall supply a recommendation for days required for supervisor training and system administration training on this application.

3.5.6 Identify Potential Interfaces

The Contractor shall review enterprise-wide systems and identify potential interfaces that will increase efficiency. The option to purchase these interfaces will be decided in Phase 5.

Section 3.6 – Phase 2: Automated Vehicle Location with Schedule Adherence Monitoring

Phase 2 is to implement Automated Vehicle Location with Schedule Adherence for the fixed route vehicles and Automated Vehicle Location for MDC capabilities for the Paratransit fleet.

The Contractor shall provide all in-vehicle equipment and dispatch software necessary to obtain functionality specified in subsections below. Contractor shall also provide installation services and any engineering necessary. A covered and lighted facility will be provided by the City of Albuquerque. Prior to installation of each vehicle type, the Contractor shall submit a written plan with wiring schematics for approval by the City of Albuquerque.

Fixed end computer hardware, public communication devices and public communication contracts shall be the responsibility of ABQ-Ride.

All or majority of equipment shall operate independent of data transmission provider. At such time when the City of Albuquerque installs a private communications network, all or majority of equipment shall be reconfigurable.

The City of Albuquerque is attempting to standardize in-vehicle AVL equipment, mobile data communication and back office servers. The Contractor must specify all in-vehicle hardware that they support. The Contractor must also specify the data transmission technology that in-vehicle hardware will support (GPRS, CDMA, iDen, WiFi, etc.).

The AVL system must include the ability to send the following data in real-time to a City server in either XML or other City approved open source standard in such a way as the data can be displayed in real-time and a history for the vehicle can be recorded and stored:

- A. Vehicle ID, must be user customizable.
- B. Time and date.
- C. Vehicle location.
- D. Vehicle speed, calculated or interfaced to vehicle's speedometer.
- E. Any other data the system collects.

3.6.1 GIS Maps

Map solution shall have the following functionalities and should be based on a centralized map for all back office and ITMS system components. This includes the vehicle scheduling system in Phase 1. The GIS map functionality shall include:

- A. View major features of service areas, including roads, railways, water features, buildings and various kinds of polygons, as well as routes and runs.
- B. View or hide street names.
- C. Change line attributes (color, width, dotted or solid, zoom threshold).
- D. Define polygons for many uses, such as land use, boundaries for service areas and sub-areas, fare zones, congested areas.

- E. Select which polygons appear on the map.

3.6.2 CAD/AVL for Paratransit Vehicles

The Mobile Computing solution must incorporate real-time data communications between revenue vehicles and the Trapeze PASS scheduling and dispatch system. This solution shall be as seamless as possible. If a seamless solution cannot be provided, the Contractor shall give detailed specifications on how the proposed solution shall integrate data. The Contractor shall also describe any duplication of data entry, separate data pools, or additional processes.

The solution must enable sending and receiving of manifest events, latitude and longitude GPS/AVL data, text messaging, and more to a mobile device such as a mobile data computer (MDC). Drivers will be able to view manifests on a MDC or equivalent, and perform the day's trips using the MDC. The performed trip data will be automatically transmitted back to the dispatching system. Included with the performed trip, odometer, GPS and any other useful data will also be transmitted back to the dispatching system.

Access to real-time data, such as arrive and perform times for every trip as they happen, provides Paratransit dispatchers, managers and other operations staff with key information and tools to improve service. This information may also be used for better same-day incident management and customer service investigations.

3.6.2.1 In Vehicle Hardware

The awarded Contractor shall provide for each vehicle:

- A. Mobile Data Computer (MDC) or equivalent.
- B. Touch screen display and user interface. If not, explain the proposed user interface and the space requirements for such devices.
- C. GPS antenna.
- D. Tamper resistant design and/or tamper resistant enclosures that are lockable.
- E. Any engineering services needed for the tamper resistant enclosures.
- F. Associated cabling.
- G. Onsite installation training.
- H. A spare parts inventory shall be provided to accommodate repairs. Spare stock will be calculated at 5% of the installation for the Paratransit fleet.

3.6.2.2 MDC requirements

The MDC, or equivalent, shall:

- A. Enable seamless data transfer between Trapeze PASS and the MDC.
- B. Enable real-time, two-way data communication between the dispatch center and vehicles equipped with mobile computing devices.

- C. Transmission intervals per vehicle shall be parameter driven by the dispatch system. Parameter shall accept a range between 15 seconds and 5 minutes between.
- D. Integrate with the vehicle's speedometer to provide real-time speed information to the dispatch center. It is also acceptable to calculate speed based on current/previous location only if the calculation is performed once every 10 seconds, at worst. The speed of the vehicle does not need to be transmitted every 10 seconds, only calculated every 10 seconds.
- E. Integrate with the vehicle's odometer to track revenue, deadhead, and pull miles.
- F. Capture and transmit odometer to a centrally located database. Provide notification when a driver has arrived early or late for a pickup.
- G. Have the ability to send text message, either predefined or free flow to the dispatch center system.
- H. Not impede on the operator's vision of roadway, vehicle's instruments or controls. If the installation of such equipment cannot meet this requirement, an alternate mounting location shall be recommended. Approval from the ABQ-RIDE project coordinator must be granted prior to installation.
- I. Be powered on when vehicle's ignition is on.
- J. Have a delayed power down feature for up to 15 minutes after vehicle's ignition is turned off.
- K. Have an in-vehicle application that operates on a Windows CE or NT / 2000 / XP platform.
- L. Queue messages at both ends, and ensure their delivery even if a vehicle is temporarily out of coverage area.
- M. Enable configuration of canned text messages.
- N. Enable remote configuration of or upgrades to the MDC software using a public data (GPRS, CDMA, iDen, WiFi) connection to the Internet.

3.6.2.3 In Vehicle Driver Application

The in-vehicle equipment provided must support the following:

- A. **Configurable GUI** – the screens can be customized to display, hide or rearrange data elements.
- B. **Pop-up Notification** – configure pop-up notifications for add-on trips, trip modifications, cancellations and mail messages.
- C. **Audio Notification** – configure audio notifications for add-on trips, trip modifications, cancellations and mail messages.
- D. **Perform Trips in Order** – option to enforce performance of trips in order on the MDC.
- E. **No-Show Timer** – configure a timer so that after “arriving” at a pickup, it will not allow a driver to request a No-Show until the specified time has elapsed.
- F. **Odometer** - odometer entry can be configured to be required at logon only or for every event. This shall be interfaced with a vehicle's odometer and

the readings can be automatically transmitted into a centrally located database.

- G. **Stand-Alone Driver Training Manifests (Emulation Mode)** - create and set up a stand-alone training manifest, negating the need for a connection to a live PASS system. Any computer needed to perform the emulation mode shall also be provided.
- H. **Over-the-Air Upgrades** – update the application software using an over-the-air upgrade process. There’s no need to physically board each vehicle to make updates, saving time and resources.

The **manifest** shall display the following elements. The elements can be configured either to be displayed or not be displayed.

- A. Client Name and Client ID Code
- B. Number of Passengers and Passenger Type
- C. Street Address and Address (Location) Comments
- D. Map Page
- E. Client Phone Number
- F. Pickup Time
- G. Scheduled Window
- H. Equipment (Space) Type
- I. Fare Type and Amount
- J. Mobility Aids
- K. Client Comments

3.6.2.4 CAD/AVL Application for Dispatch Center

The dispatcher shall be able to:

- A. Display previous drop off/pick up point and next drop off/pick up point per vehicle.
- B. Display vehicle operator’s ID, operator’s name and route ID.
- C. Filter playback data for scheduled or actual events.
- D. Determine vehicle position through any of four means:
 - a. MDC-equipped vehicles report their location to the base station at regular intervals. Preferably, the intervals are software parameter driven and can be easily changed by ABQ-Ride.
 - b. Vehicle location data is automatically captured when drivers perform certain activities, such as pick up, drop off or arrival at specific points
 - c. Dispatcher polls a vehicle at any time and vehicle returns real-time position data
 - d. Driver sends location data to dispatcher in the event of an emergency

- E. View the itinerary of a vehicle's run.
- F. Display real-time location graphically as moving icons on a street map background. This display shall include current speed and calculated heading information of AVL equipped vehicles.
- G. Record above information and have playback capabilities. Storage of recordings shall only be limited by hard drive space.
- H. Have a quick-closest-find function. For example: When a will-call occurs, a dispatcher can quickly find the nearest Paratransit vehicle to that will-call.
- I. Have map functions such as zoom in, zoom out, pan and center on a location or vehicle.
- J. Have the ability to display how long a vehicle has been idle at one location.
- K. Have back-office 32-bit applications that operate on a Windows NT/2000/XP platform.
- L. Feature client-server architecture.
- M. Provide multi-user functionality.
- N. Enable site-specific configuration through user definable codes and parameters.
- O. Display historical "playback" AVL information data at scalable speeds (slow to fast).
- P. Use digital maps to geocode locations and calculate distances.
- Q. Have the capability to geocode locations by several means, including:
 - a. Entering a cross street or block range
 - b. Mouse clicking the location on the map
 - c. Matching address information to the map data

3.6.2.5 Mobile Data Communication

3.6.2.5.1 From the dispatch center workstation, the dispatcher will be able to **send** the following trip information and messages to the MDC:

- A. Client name
- B. Pickup and drop off time, address and location comments
- C. Passenger type, space type, fare type, fare to collect
- D. Dispatch of add-on trip data
- E. Dispatch of trip modifications data
- F. Dispatch of cancellations and no-shows
- G. Send canned text message to one or multiple vehicles
- H. Send freeform text message to one or multiple vehicles

3.6.2.5.2 From the dispatch center workstation, the dispatcher will be able to **receive** the following messaging data:

- A. Notification from drivers of events such as arrivals, performs (completed

- trips), cancellation and no-show requests
- B. Fare information (fare type/code and amount)
- C. Early/Late arrival notification
- D. Log On / Log Off notification
- E. Emergency messages.
- F. Receive canned text message to one or multiple vehicles
- G. Receive freeform text message to one or multiple vehicles

3.6.2.6 Training

The Contractor shall supply a recommendation for training to drivers, supervisors, electronic technicians, and system administrators. Any additional training not covered by the above should also be recommended.

3.6.3 CAD/AVL for Fixed Route Vehicles

The Mobile Computing solution must incorporate real-time data communications between revenue vehicles and the dispatch center.

The solution must enable sending and receiving of latitude and longitude GPS/AVL data, text messaging, and more to a mobile device such as a mobile data computer (MDC). All data transmitted to the dispatch system will seamlessly and automatically be collected into the centralized database.

3.6.3.1 In Vehicle Hardware

The awarded Contractor shall provide for each vehicle:

- A. Mobile Data Computer (MDC) or equivalent.
- B. Touch screen display and user interface. If not, explain the proposed user interface and the space requirements for such devices.
- C. GPS antenna.
- D. Tamper resistant design and/or tamper resistant enclosures that are lockable.
- E. Any engineering services needed for the tamper resistant enclosures.
- F. Associated cabling.
- G. Onsite installation training.
- H. A spare parts inventory shall be provided to accommodate repairs. Spare stock will be calculated at 5% of the installation for the fixed route fleet.

3.6.3.2 Login Devices

ABQ-Ride's fixed route vehicles are equipped with Digital Recorder's Inc. (DRI) Enunciation system. The DRI Operator Control Unit (OCU) is used to control the electronic destination signs and the onboard announcements. The MCO is

required to enter a valid route number. The OCU does not require a valid driver's ID for login.

ABQ-Ride's fixed route vehicles are equipped with General Farebox Inc. (GFI) Centsabill fare collection system. The MCO is required to enter their ID number, the work run number and coach run number of their work assignment.

The AVL for Fixed Route Vehicles solution should not incorporate another login device. One ideal solution is to install a master login device that will pass data required by both the GFI or DRI devices. Another possible solution is to use either of the existing login devices to pass data to the AVL system.

If a single sign-on device is not available or cannot be achieved, then the Contractor shall provide a best-case solution.

3.6.3.3 MDC requirements

The MDC, or equivalent, shall:

- A. Enable real-time, two-way data communication between the dispatch center and vehicles equipped with mobile computing devices.
- B. Transmit actual latitude and longitude GPS data from the MDC to CAD/AVL Application.
- C. Transmission intervals per vehicle shall be parameter driven by the dispatch system. Parameter shall accept a range between 15 seconds and 5 minutes between.
- D. Integrate with the vehicle's speedometer to provide real-time speed information to the dispatch center. It is also acceptable to calculate speed based on current/previous location only if the calculation is performed once every 10 seconds, at worst. The speed of the vehicle does not need to be transmitted every 10 seconds, only calculated every 10 seconds.
- E. Have the ability to send and receive text message, either predefined or free flow to the dispatch center application.
- F. Not impede on the operator's vision of roadway, vehicle's instruments or controls. If the installation of such equipment cannot meet this requirement, an alternate mounting location shall be recommended. Approval from the ABQ-RIDE project coordinator must be granted prior to installation.
- G. Be powered on when vehicle's ignition is on.
- H. Have a delayed power down feature for up to 15 minutes after vehicle's ignition is turned off.
- I. Have an in-vehicle application that operates on a Windows CE or NT / 2000 / XP platform.
- J. Queue messages at both ends, and ensure their delivery even if a vehicle is temporarily out of coverage area.
- K. Enable configuration of canned text messages.

- L. Enable remote configuration of or upgrades to the MDC software using a public data (GPRS, CDMA, iDen, WiFi) connection to the Internet.

3.6.3.4 In Vehicle Driver Application

The in-vehicle equipment provided must support the following:

- A. **Online Schedules** – the vehicle’s route and schedule shall be available to the operator online.
- B. **Pop-up Notification** – configure pop-up notifications being behind schedule, ahead of schedule, going off route or received messages from dispatch.
- C. **Audio Notification** – configure audio notifications being behind schedule, ahead of schedule, going off route or received messages from dispatch.
- D. **Logging in** – A validation procedure for operator shall be:
 - a. Send MCO’s ID number to the dispatch center application.
 - b. Receive validation for the MCO’s ID number.
 - c. Receive route number, coach run number and work run number.
 - d. Send longitude and latitude data from the GPS antenna to the dispatch center application.

3.6.3.5 CAD/AVL Application for Dispatch Center

The dispatcher shall be able to:

- A. View MCO’s with invalid login information.
- B. Override the MCO’s ID number.
- C. Restrict MCO’s to a specific vehicle for login.
- D. View MCO’s that have violated vehicle restrictions.
- E. Graphically display vehicle operator’s ID, operator’s name and route ID on a system street map.
- F. Filter playback data for scheduled or actual events.
- G. Determine vehicle position through any of three means:
 - a. AVL equipped vehicles report their location to the base station at regular intervals. Preferably, the intervals are software parameter driven and can be easily changed by ABQ-Ride. This regular interval shall not be greater than once per every 60 seconds.
 - b. Vehicle location data is automatically captured when MCO’s activate their emergency button.
 - c. Dispatcher polls a vehicle at any time and vehicle returns real-time position data
- H. View the on time status of a vehicle.
- I. View the on time status of a route.

- J. Display real-time location graphically as moving icons on a street map background. This display shall include current speed and calculated heading information of AVL equipped vehicles.
- K. Record above information and have playback capabilities. Storage of recordings shall only be limited by hard drive space.
- L. Have map functions such as zoom in, zoom out, pan and center on a location or vehicle.
- M. Have the ability to display how long a vehicle has been idle at one location.
- N. Have back-office 32-bit applications that operate on a Windows NT/2000/XP platform.
- O. Feature client-server architecture.
- P. Provide multi-user functionality.
- Q. Enable site-specific configuration through user definable codes and parameters.
- R. Display historical “playback” AVL information data at scalable speeds (slow to fast).
- S. Use digital maps to geocode locations and calculate distances.
- T. Have the capability to geocode locations by several means, including:
 - a. Entering a cross street or block range
 - b. Mouse clicking the location on the map
 - c. Matching address information to the map data
- U. Have the ability to record passing times of major timing points. This data, once gathered and analyzed, is vital for accurate scheduling of fixed route vehicles.

3.6.3.6 Mobile Data Communication

3.6.3.6.1 From the dispatch center workstation, the dispatcher will be able to **send** the following information and messages to the MDC:

- A. Send canned text message to one or multiple vehicles.
- B. Send freeform text message to one or multiple vehicles.

3.6.3.6.2 From the dispatch center workstation, the dispatcher will be able to **receive** the following messaging data:

- A. Emergency messages.
- B. Operator login ID.
- C. Operator login route number.
- D. Operator login work run number.
- E. Operator login coach run number.
- F. Any invalid login information.

3.6.3.7 Schedule Adherence Monitor

The Schedule Adherence Monitor shall query data from the Fixed Route Scheduling for Bids for scheduled travel times and street route information. This application shall also query the vehicle's real time location. Both queries shall be used to calculate the on time status of each vehicle. This application shall provide system parameters that define the number of minutes that any fixed route vehicle is allowed to be early or late.

While in its exceptions mode, the Schedule Adherence Monitor shall graphically display on a system street map all fixed route vehicles:

- A. That are outside of the early/late window.
- B. That depart the garage late.
- C. That depart from its layover point early or late.
- D. That is not on its assigned street routing.
- E. That have activated their emergency button.

This application shall record all events where vehicles are outside of specified parameters. Such information shall be available for later analysis by the Analytical Management Tools.

3.6.3.8 Training

The Contractor shall supply a recommendation for training to drivers, supervisors, electronic technicians, and system administrators. Any additional training not covered by the above should also be recommended.

Section 3.7 – Phase 3: Integrated Accident/Incident Tracking & Begin Bus Stop Tracking

Phase 3 will be to implement an integrated Accident/Incident Tracking system and an integrated Bus Stop Tracking system.

Accident and Incident tracking is also a key element to an automated IVR solution. The solution provided must have the expansion capability to include an IVR application to automatically call registered customers of service delays and service interruptions.

3.7.1 Accident and Incident Tracking

The Accident and Incident Tracking application shall coordinate and enable responsible parties from multiple sites to input their portion of the dataset. Currently, dispatchers are the first to be notified of an accident or incident. Dispatchers are tasked with initiating the accident or incident record.

3.7.1.1 Initial Data

This application shall accept the initial data from Dispatchers.

- A. Unique event identifier record ID.
- B. Date and time of event.
- C. Motor coach operator ID number.
- D. Location of event.
- E. Type of event.
- F. Description of event.

3.7.1.2 Automated Queries

During the initial data entry, this application shall query the data for the following:

- A. Motor coach operator name.
- B. Route number.
- C. Coach run number.
- D. Work run number.
- E. Vehicle ID number.

3.7.1.3 Supervisor Data

Once initiated, an operations supervisor is responsible for the field investigation. Returning from the field investigation, the supervisor shall have the ability to input:

- A. Specific descriptions of the event.

- B. Police report number of event, if applicable.
- C. Other vehicles involved including:
 - a. Owner's name and contact information
 - b. Insurance carrier and policy numbers
 - c. Description of damage
- D. Injuries involved.
 - a. Name and contact information
 - b. Medical attention required
- E. Fatalities involved.
 - a. Name and contact information
- F. Witness information including names, addresses, telephone numbers and their statements.

3.7.1.4 Accident Review

Once all pertinent data is gathered, an accident review hearing is scheduled. This application shall accept the following data:

- A. Date of operator notification of pending accident review.
- B. Date of invitation to the accident review
- C. Invitation of accident review status (accepted or declined).
- D. Date of accident review.
- E. Accident review findings (preventable, non-preventable).

3.7.1.5 National Transit Database (NTD)

This application shall also track any pertinent data required by the National Transit Database reporting requirements for accidents, incidents and injuries.

3.7.1.6 Training

The Contractor shall supply a recommendation for training to dispatchers, supervisors and system administrators. Any additional training not covered by the above should also be recommended.

3.7.2 Bus Stop Inventory Tracking

An accurate Bus Stop Inventory is required to successfully implement Trip Planning (Phase 4).

3.7.2.1 Requirements

Bus stop maintenance managers shall easily and efficiently:

- A. View, locate and select bus stops graphically on a system street map.
- B. View all stops for a specific route.
- C. Geocode bus stop locations.
- D. Automatically assign unique bus stop numbers.
- E. Assign the bus stops to all routes that serve it. Route data is created by schedulers from the Fixed Route Scheduling for Booking Module.
- F. Assign amenities including but not limited to:
 - a. Benches, number of and types.
 - b. Lamp poles
 - c. Shelters, types, date last maintained.
 - d. Bus stop signs
 - e. Curb/side walk availability, date last painted or maintained.
 - f. Trash bins
- G. Produce a preventative maintenance schedule for amenities.
- H. Produce work orders for maintenance or repairs. Integrate work done on work orders with the preventative maintenance schedules

The module should be available on a desktop computer as well as on a touch screen tablet PC that allows for in-the-field collection of stop amenities and GPS information of the bus stop's exact location (longitude x latitude). The tablet PC shall allow for wireless uploading into the Fixed Route Scheduling database.

Contractor shall describe how the proposed system will handle the streamlined process of collecting and managing bus stop locations, amenities, and work orders through the use of tablet PC and wireless technologies.

3.7.2.2 Interfaces

The Bus Stop Inventory data shall have the capability to export location and amenity data to the City's GIS.

3.7.2.3 Integration

Bus Stop locations shall be made available to the Vehicle Scheduling for Bids Application, Phase 1.

Bus Stop Tracking must integrate with Trip Planning Application in Phase 4.

3.7.2.4 Training

The Contractor shall supply a recommendation for training to bus stop maintenance crews, supervisors and system administrators. Any additional training not covered by the above should also be recommended.

Section 3.8 – Phase 4: Finalize Bus Stop Tracking & Implement Trip Planning for Customer Service Center

Phase 4 will be the finalization of Bus Stop Data and the implementation of Trip Planning for the Customer Service Center.

The proposed solution shall provide automated trip planning capabilities. Data provided from this system shall also provide customer service staff to view schedules online.

3.8.1 Trip Planning

A Trip Planning Application shall provide Customer Service Staff with quick and easy access to travel times, locations, and travel options. Details shall include travel times at any stop location. The application shall also reduce the average call duration with by a Customer Service Staff with a customer, and reduce overall wait time in the call queue. With bus stop location data and route data now available via Bus Stop Tracking and Fixed Route Scheduling for Bids respectively, the foundation for Trip Planning is set.

3.8.1.1 Theory of Operation.

3.8.1.1.1 The proposed Trip Planning Application shall accept the following data:

- A. Origination location. This can be a specific street address including city, major cross streets, a predefined point-of-interest such a museum, a stop ID, or a point-and-click map location.
- B. Destination location. This can also be a specific street address including city, major cross streets, a predefined point-of-interest such as a museum, a stop ID, or a point-and-click map location.
- C. Plan itinerary by departure time or times no-earlier-than departure time.
- D. Plan itinerary by arrival time or no-later-than arrival time.
- E. Times shall be displayed in 12 hour AM/PM format.
- F. Date of travel.
- G. Travel options including but not limited to shortest trip time, least amount of transfers or shortest walking distance.
- H. Multi mode options including but not limited to bike and rail.

3.8.1.1.2 Once the above data has been entered, the system shall validate the origination location and the destination location. If an exact match is not available, a list of next closest matches should be displayed. The user will have the option to select from the produced list of near matches or input a new location altogether.

Upon successful validation of origination location and destination location, the application shall provide the following information to the user:

- A. Travel times for each segment of the trip.

- B. Any walking directions and distances for any segment of the trip. Travel time for walking shall be calculated based on a system defined parameter for speed of travel.
- C. Any landmark, stop ID, street names or intersections shall be provided for each segment of the trip.
- D. Fare required for any segment of the trip.
- E. Total travel time.
- F. If user selects a departure time, then application shall display the estimated arrival time.
- G. If user selects an arrival time, then application shall display the estimated departure time.
- H. User shall have the option to print the itinerary.
- I. User shall have the option to modify the search parameters without re-entering all data.
- J. User shall have the ability to view the system street map and view their travel path. Map functions such as zoom in, zoom out, pan and street labels shall be included.

3.8.1.2 Integration

The Trip Planning Application shall have the capability to provide “fixed route alternatives” to Paratransit trips without duplicating the information entry process for the caller.

The Trip Planning Application shall be able to generate multi-modal itineraries that incorporate both ADA compliant fixed route service and Paratransit service using data already available in Trapeze PASS.

The Contractor shall describe the proposed itinerary planning algorithms.

3.8.1.3 Outside Agencies

ABQ-Ride is not the only transportation provider within the greater Albuquerque metropolitan area. The Trip Planning system must allow for entry of outside agencies’ schedules to provide the citizens of Albuquerque the flexibility to use any available transportation provider and any combinations thereof.

3.8.1.4 Training

The Contractor shall supply a recommendation for training to customer service staff, supervisors and system administrators. Any additional training not covered by the above should also be recommended.

Section 3.9 – Phase 5: Publish Web-Based Trip Planning & Implement Interfaces to City Systems

Phase 5 will be to expand the scope of the Trip Planning system (Phase 4) to a Web-Based Trip Planning system. Phase 5 will also implement interfaces to City's payroll system and ABQ-Ride's fare collection system.

3.9.1 Web-Based Trip Planning

All of the details described in section 4.5 and all of its subsections apply unless explicitly noted in this section.

A Web-Based Trip Planning shall enable Internet users to create their itineraries. Since the average Internet user is not highly computer literate, it is vital for this application to be simple and intuitive to use.

3.9.1.1 Compliance

Any web page developed shall comply with City of Albuquerque web standards. These standards are published at <http://www.cabq.gov/isd> under the link Policies, Standards and Procedures.

Any web page developed shall comply with ADA regulations.

Any web addresses, IP addresses and domain names shall be provided by the City of Albuquerque prior to implementation.

3.9.1.2 Training

The Contractor shall supply a recommendation for training to customer service staff, supervisors and system administrators. Any additional training not covered by the above should also be recommended.

3.9.2 Interfaces

The Contractor shall provide a detailed recommendation for interfaces identified in Phase 1. The Contractor shall also provide recommendations for implementation of these interfaces.

The following interfaces have been identified by the City of Albuquerque as necessary:

3.9.2.1 Payroll Upload Interface

The Driver Scheduling Application implemented in Phase 1 stores payroll information for MCO's. The proposed solution shall have the capability to upload this data to the City payroll system. At the time of RFP release, the City is in the

process of converting from EMPATH to PeopleSoft. At Phase 5 initiation, a selection will be made as to which payroll system to interface with.

The proposed solution shall allow for:

- A. Supervisor's validation of pay hours, sick leave hours, vacation hours, leave without pay hours, etc.
- B. Payroll staff validation of pay hours, sick leave hours, vacation hours, leave without pay hours, etc.
- C. Upon acceptance of pay time, the authorized payroll personnel will automatically upload.
- D. Prevention of changes to records that has been uploaded.

PART 4 EVALUATION OF OFFERS

4.1 Selection Process. The Mayor of Albuquerque shall name, for the purpose of evaluating the proposals, an Ad Hoc Advisory Committee. On the basis of the evaluation criteria established in this RFP, the committee shall submit to the Mayor a list of qualified firms in the order in which they are recommended. Proposal documentation requirements set forth in this RFP are designed to provide guidance to the Offeror concerning the type of documentation that will be used by the Ad Hoc Advisory Committee. Offerors should be prepared to respond to requests by the Purchasing Office on behalf of the Ad Hoc Advisory Committee for oral presentations, facility surveys, demonstrations or other areas deemed necessary to assist in the detailed evaluation process. Offerors are advised that the City, at its option, may award this request on the basis of the initial offers.

4.2 Evaluation Criteria. The following general criteria, not listed in order or significance, will be used by the Ad Hoc Advisory Committee in recommending contract award to the Mayor. The proposal factors will be rated on a scale of **0-1000** with weight relationships as stated below.

4.2.1 Evaluation Factors:

100 -- The Offeror's general approach and plans to meet the requirements of the RFP.

150 --The Offeror's detailed plans to meet the objectives of each task, activity, etc. on the required schedule.

100 -- Experience and qualifications of the Offeror and personnel as shown on staff resumes to perform tasks described in Part 3, Scope of Services.

100 -- Adequacy of proposed project management and resources to be utilized by the Offeror.

100 -- The Offeror's past performance on projects of similar scope and size.

300 -- The overall ability of the Offeror, as judged by the evaluation committee, to successfully deliver every component of the entire project. This judgment will be based upon factors such as the current component availability and current integration with other components.

150 -- Cost Proposal – The costs proposed by the Contractor as described in Section 2.2 of this RFP to perform the tasks listed in Part 4, Scope of Services. The evaluation of this section will occur after the technical evaluation, based on a cost/price analysis.

4.2.2 Cost/Price Factors: The evaluation of cost factors in the selection will be determined by a cost/price analysis using your proposed figures. Please use the format described in Appendix A. Proposed costs will be evaluated not only to determine if the estimate is reasonable, realistic, and cost effective, but also, the Offeror's ability to organize and perform the services. Please note that the lowest cost is not the sole criterion for

recommending contract award.

4.2.3 Cost Evaluation. The cost/price evaluation will be performed by the City Purchasing Division or designee. A preliminary cost review will ensure that each Offeror has complied with all cost instructions and requirements. In addition, proposals will be examined to ensure that all proposed elements are priced and clearly presented. Cost proposals that are incomplete or reflect significant inconsistencies or inaccuracies will be scored accordingly or may be rejected by the Ad Hoc Advisory Committee if lacking in information to determine the value/price/cost relative to the services proposed.

{INTENTIONALLY LEFT BLANK}

**PART 5
DRAFT AGREEMENT**

THIS AGREEMENT is made and entered into this ___ day of _____, 20__ by and between the City of Albuquerque, New Mexico a municipal corporation, (hereinafter referred to as the "City"), and _____, hereinafter referred to as the "Contractor"), a _____, whose address is _____.

RECITALS

WHEREAS, the City issued a Request For Proposals for the _____ Department, RFP____ - ____ - __, titled “ _____”, dated _____, which is attached hereto as Exhibit A, and by this reference made a part of this Agreement; and

WHEREAS, the Contractor submitted its proposal, dated _____, in response to RFP____ - ____ - __, which proposal is attached hereto as Exhibit B, and by this reference made a part of this Agreement; and

WHEREAS, the City desires to engage the Contractor to render certain services in connection therewith, and the Contractor is willing to provide such services.

NOW, THEREFORE, in consideration of the premises and mutual obligations herein, the parties hereto do mutually agree as follows:

1. Scope of Services. The Contractor shall perform the following services (hereinafter the "Services") in a satisfactory and proper manner, as determined by the City:

Provide integrated central database, in accordance with Exhibit A as supplemented by Exhibit B.

2. Time of Performance. Services of the Contractor shall commence on the date of final execution of this Agreement and shall be undertaken and completed in such sequence as to assure their expeditious completion in light of the purposes of this Agreement; provided, however, that in any event, all of the Services required hereunder shall be completed within _____ years of the date of execution of this Agreement. This Agreement may be extended for up to _____ additional one-year periods upon written agreement of the parties.

3. Compensation and Method of Payment.

A. Compensation. For performing the Services specified in Section 1 hereof, the City agrees to pay the Contractor up to the amount of _____ Dollars (\$_____), which amount includes any applicable gross receipts taxes and which amount shall constitute full and complete compensation for the Contractor's Services under this Agreement, including all expenditures made and expenses incurred by the Contractor in performing such Services.

B. Method of Payment. Such amount shall be paid to the Contractor at the rate of _____ Dollars (\$_____) per month. Payment shall be made to the Contractor monthly upon receipt by the City of a properly documented requisition for monthly payment as determined by the budgetary and fiscal guidelines of the City and on the condition that the Contractor has accomplished the Services to the satisfaction of the City.

C. Appropriations. Notwithstanding any other provisions in this Agreement, the terms of this Agreement are contingent upon the City Council of the City of Albuquerque making the appropriations necessary for the performance of this Agreement. If sufficient appropriations and authorizations are not made by the City Council, this Agreement may be terminated at the end of the City's then current fiscal year upon written notice given by the City to the Contractor. Such event shall not constitute an event of default. All payment obligations of the City and all of its interest in this Agreement will cease upon the date of termination. The City's decision as to whether sufficient appropriations are available shall be accepted by the Contractor and shall be final.

4. Independent Contractor. The Contractor is considered as an independent Contractor at all times in the performance of the services described in Section 1. The Contractor further agrees that neither it nor its employees are entitled to any benefits from the City under the provisions of the Workers' Compensation Act of the State of New Mexico, or to any of the benefits granted to employees of the City under the provisions of the Merit System Ordinance as now enacted or hereafter amended.

5. Personnel.

A. The Contractor represents that it has, or will secure at its own expense, all personnel required in performing all of the Services required under this Agreement. Such personnel shall not be employees of or have any contractual relationships with the City.

B. All the Services required hereunder will be performed by the Contractor or under its supervision and all personnel engaged in the work shall be fully qualified and shall be authorized or permitted under state and local law to perform such Services.

C. None of the work or Services covered by this Agreement shall be subcontracted without the prior written approval of the City. Any work or Services subcontracted hereunder shall be specified by written contract or agreement and shall be subject to each provision of this Agreement.

6. Indemnity. The Contractor agrees to defend, indemnify, and hold harmless the City and their officials, agents, and employees from and against any and all claims, actions, suits, or proceedings of any kind brought against said parties for or on account of any matter arising from the Services performed by the Contractor under this Agreement. The indemnity required herein shall not be limited by reason of the specification of any particular insurance coverage in this Agreement.

7. **Bonds and Insurance.** The Contractor shall not commence any work under this Agreement until the insurance required in Exhibit A, Section 1.25, has been obtained and the proper certificates (or policies) have been submitted to the City.

8. **Discrimination Prohibited.** In performing the Services required hereunder, the Contractor shall not discriminate against any person on the basis of race, color, religion, gender, sexual preference, sexual orientation, national origin or ancestry, age, physical handicap or disability, as defined in the Americans With Disabilities Act of 1990, as currently enacted or hereafter amended.

9. **ADA Compliance.** In performing the Services required hereunder, the Contractor agrees to meet all the requirements of the Americans With Disabilities Act of 1990 (the "ADA"), which are imposed directly on the Contractor or which would be imposed on the City as a public entity. The Contractor agrees to be responsible for knowing all applicable rules and requirements of the ADA and to defend, indemnify and hold harmless the City, its officials, agents and employees from and against any and all claims, actions, suits or proceedings of any kind brought against said parties as a result of any acts or omissions of the Contractor or its agents in violation of the ADA.

10. **Reports and Information.** At such times and in such forms as the City may require, there shall be furnished to the City such statements, records, reports, data and information, as the City may request pertaining to matters covered by this Agreement. Unless authorized by the City, the Contractor will not release any information concerning the work product including any reports or other documents prepared pursuant to the Agreement until the final product is submitted to the City.

11. **Establishment and Maintenance of Records.** Records shall be maintained by the Contractor in accordance with applicable law and requirements prescribed by the City with respect to all matters covered by this Agreement. Except as otherwise authorized by the City, such records shall be maintained for a period of three (3) years after receipt of final payment under this Agreement.

12. **Audits and Inspections.** At any time during normal business hours and as often as the City may deem necessary, there shall be made available to the City for examination all of the Contractor's records with respect to all matters covered by this Agreement. The Contractor shall permit the City to audit, examine, and make excerpts or transcripts from such records, and to make audits of all contracts, invoices, materials, payrolls, records of personnel, conditions of employment and other data relating to all matters covered by this Agreement. The Contractor may be required to provide such information and records and appear as a witness in hearings for the City's Board of Ethics and Campaign Practices pursuant to Article XII, Section 8 of the Albuquerque City Charter.

13. **Publication, Reproduction and Use of Material.** No material produced in whole or in part under this Agreement shall be subject to copyright in the United States or in any other country. The City shall have unrestricted authority to publish, disclose, distribute and otherwise

use, in whole or in part, any reports, data or other materials prepared under this Agreement.

14. Compliance with Laws. In providing the Scope of Services outlined herein, the Contractor shall comply with all applicable laws, ordinances, and codes of the Federal, State, and local governments.

15. Changes. The City may, from time to time, request changes in the Services of the Contractor to be performed hereunder. Such changes, including any increase or decrease in the amount of the Contractor's compensation, which are mutually agreed upon by and between the City and the Contractor, shall be incorporated in written amendments to this Agreement.

16. Assignability. The Contractor shall not assign any interest in this Agreement and shall not transfer any interest in this Agreement (whether by assignment or novation), without the prior written consent of the City thereto.

17. Termination for Cause. If, through any cause, the Contractor shall fail to fulfill in a timely and proper manner its obligation under this Agreement or if the Contractor shall violate any of the covenants, agreements, or stipulations of this Agreement, the City shall thereupon have the right to terminate this Agreement by giving five (5) days written notice to the Contractor of such termination and specifying the effective date of such termination. In such event, all finished or unfinished documents, data, and reports prepared by the Contractor under this Agreement shall, at the option of the City, become its property, and the Contractor shall be entitled to receive just and equitable compensation for any work satisfactorily completed hereunder. Notwithstanding the above, the Contractor shall not be relieved of liability to the City for damages sustained by the City by virtue of any breach of this Agreement by the Contractor, and the City may withhold any payments to the Contractor for the purposes of set-off until such time as the exact amount of damages due the City from the Contractor is determined.

18. Termination for Convenience of City. The City may terminate this Agreement at any time by giving at least fifteen (15) days notice in writing to the Contractor. If the Contractor is terminated by the City as provided herein, the Contractor will be paid an amount which bears the same ratio to the total compensation as the Services actually performed bear to the total Services of the Contractor covered by this Agreement, less payments of compensation previously made. If this Agreement is terminated due to the fault of the Contractor, the preceding section hereof relative to termination shall apply.

19. Construction and Severability. If any part of this Agreement is held to be invalid or unenforceable, such holding will not affect the validity or enforceability of any other part of this Agreement so long as the remainder of the Agreement is reasonably capable of completion.

20. Enforcement. The Contractor agrees to pay to the City all costs and expenses including reasonable attorney's fees incurred by the City in exercising any of its rights or remedies in connection with the enforcement of this Agreement.

21. Entire Agreement. This Agreement contains the entire agreement of the parties

and supersedes any and all other agreements or understandings, oral or written, whether previous to the execution hereof or contemporaneous herewith.

22. Applicable Law. This Agreement shall be governed by and construed and enforced in accordance with the laws of the State of New Mexico, and the laws, rules and regulations of the City of Albuquerque.

23. Approval Required. This Agreement shall not become effective or binding until approved by the City's Chief Administrative Officer.

IN WITNESS WHEREOF, the City and the Contractor have executed this Agreement as of the date first above written.

CITY OF ALBUQUERQUE

CONTRACTOR:

Approved By:

By: _____

Dr. Bruce Perlman, PhD
Chief Administrative Officer

Title: _____

Date: _____

Date: _____

Fed Tax ID No: _____

State Tax ID No: _____

_____, **Director**
Department _____

Date: _____

EXHIBIT A

City of Albuquerque Request for Proposals

Exhibit B

Offeror's Proposal

**APPENDIX A
COST PROPOSAL FORM**

Note any assumptions, conditions or prerequisites required.

Description	Cost Proposal
Phase 1	
Fixed Route Scheduling For Bids Application	
Schedule Publishing Tools	
Driver Management Application	
Fixed Route Daily Operator Scheduling	
Implementation services including project management.	
Interface: Import of street centerline from City of Albuquerque GIS/ESRI	
Interface: Export of route data to City of Albuquerque GIS/ESRI	
Interface: Import of Personnel Data	
Software License	
Software Maintenance	
Data Conversion	
Training	
Phase 2	
AVL in-vehicle equipment fixed route vehicles, per each	
Engineering and installation services for fixed route vehicles, per each	
AVL in-vehicle equipment Paratransit vehicles, per each	
Engineering and installation services for Paratransit vehicles, per each	
Fixed end equipment (not including servers and PCs)	
CAD/AVL Application for Dispatch Center for Paratransit	
Implementation services including project management	
Software License	
Software Maintenance	
Training	
Phase 3	
Integrated Accident/Incident Tracking	
Bus Stop Tracking Application	
Implementation services including project management	
Software License	
Software Maintenance	
Training	
Phase 4	
Trip Planning for Customer Service Center	
Implementation services including project management	
Software License	
Software Maintenance	

Training	
Phase 5	
Web Based Trip Planning	
Interface: Export and upload payroll data to Citywide payroll system	
Interface: Export schedule data to GFI fare collection system	
Interfaces identified in Phase 1	
Implementation services including project management	
Software License	
Software Maintenance	
Training	

APPENDIX B
Certification of Buy America

Certificate of Compliance with 49 U.S.C. 5323(j)(1)

The Contractor, _____, certifies to the best of its knowledge and belief, that it and its principals will meet the requirements of 49 U.S.C.(j)(1) and the applicable regulations in 49 C.F.R. Part 661.5.

Executed this _____ day of _____, 20__.

By _____
(signature of authorized official)

(title of authorized official)

Certificate of Non-Compliance with 49 U.S.C. 5323(j)(1)

The Contractor, _____, certifies to the best of its knowledge and belief, that it and its principals cannot comply the requirements of 49 U.S.C.(j)(1) and 49 C.F.R. Part 661.5, but it may qualify for an exception pursuant to 49 U.S.C.5323(j)(2)(A), 5323(j)(2)(B), or 5323(j)(2)(D), and 49 C.F.R. 661.7.

Executed this _____ day of _____, 20__.

By _____
(signature of authorized official)

(title of authorized official)

APPENDIX C
Certification Regarding Debarment, Suspension, and Other Responsibility
Matters – Primary Covered Transactions

The Contractor, _____, certifies to the best of its knowledge and belief, that it and its principals:

(1) Are not presently debarred, suspended, proposed for debarment, declared ineligible, or voluntarily excluded from covered transactions by any Federal department or agency;

(2) Have not within a three-year period preceding this proposal been convicted or had a civil judgment rendered against them for commission of fraud or a criminal offense in connection with obtaining, attempting to obtain, or performing a public (Federal, State, or local) transaction or contract under a public transaction; violation of Federal or State antitrust statutes or commission or embezzlement, theft, forgery, bribery, falsification or destruction of records, making false statement or receiving stolen property;

(3) Are not presently indicted for or otherwise criminally or civilly charged by a governmental entity (Federal, State, or local) with commission of any of the offenses enumerated in paragraph (2) of this certification; and

(4) Have not within a three-year period preceding this agreement had one or more public transactions (Federal, State or local) terminated for cause or default.

Where the Contractor is unable to certify to any of the statements in this certification, such Contractor shall attach an explanation to this proposal.

THE CONTRACTOR, _____,
CERTIFIES OR AFFIRMS THE TRUTHFULNESS AND ACCURACY OF THE CONTENTS
OF THE STATEMENTS SUBMITTED ON OR WITH THIS CERTIFICATION AND
UNDERSTANDS THAT THE PROVISIONS OF 31 U.S.C. sub-section 3801 ET SEQ. ARE
APPLICABLE THERETO.

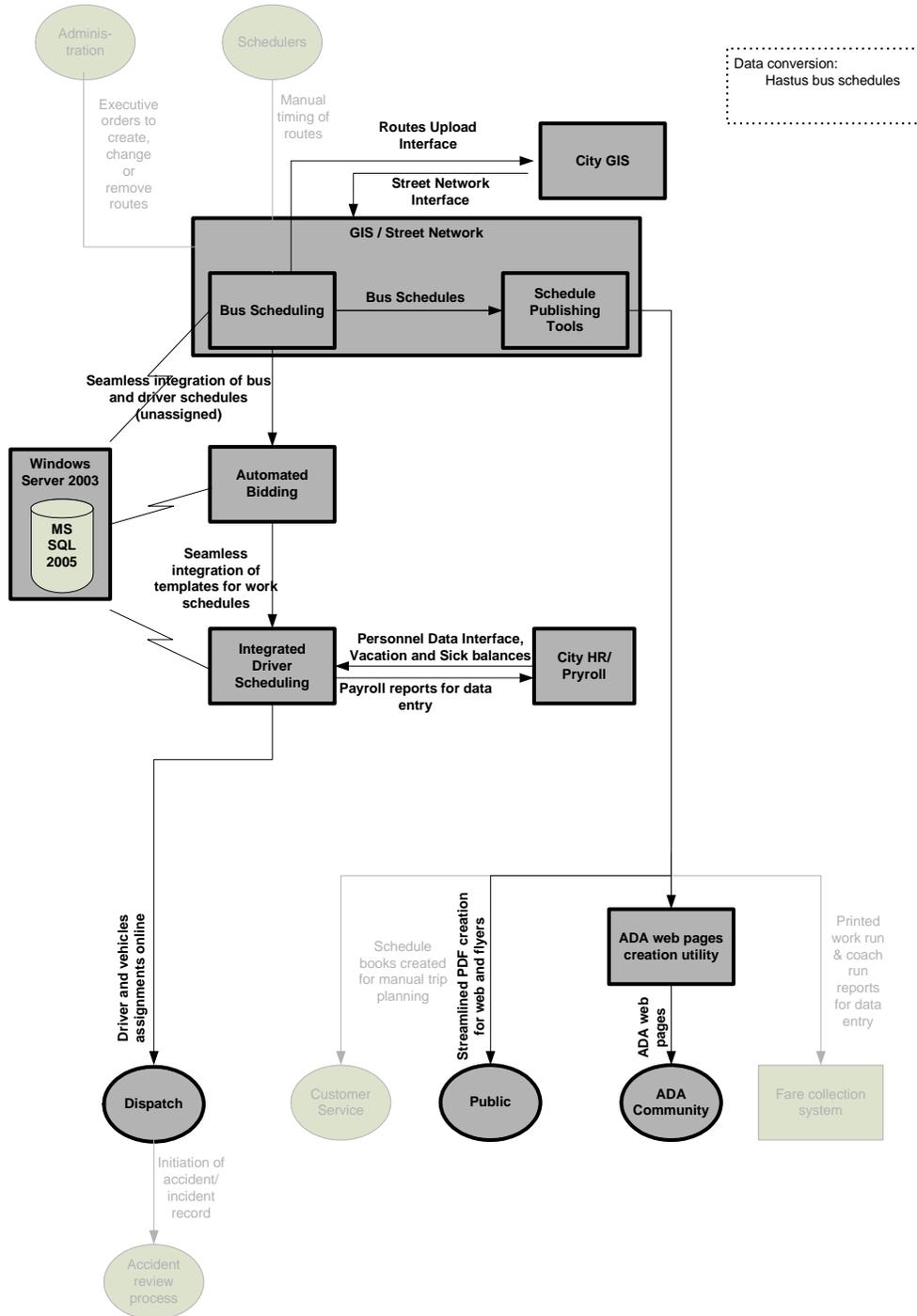
Executed this _____ day of _____, 20____.

By _____
(signature of authorized official)

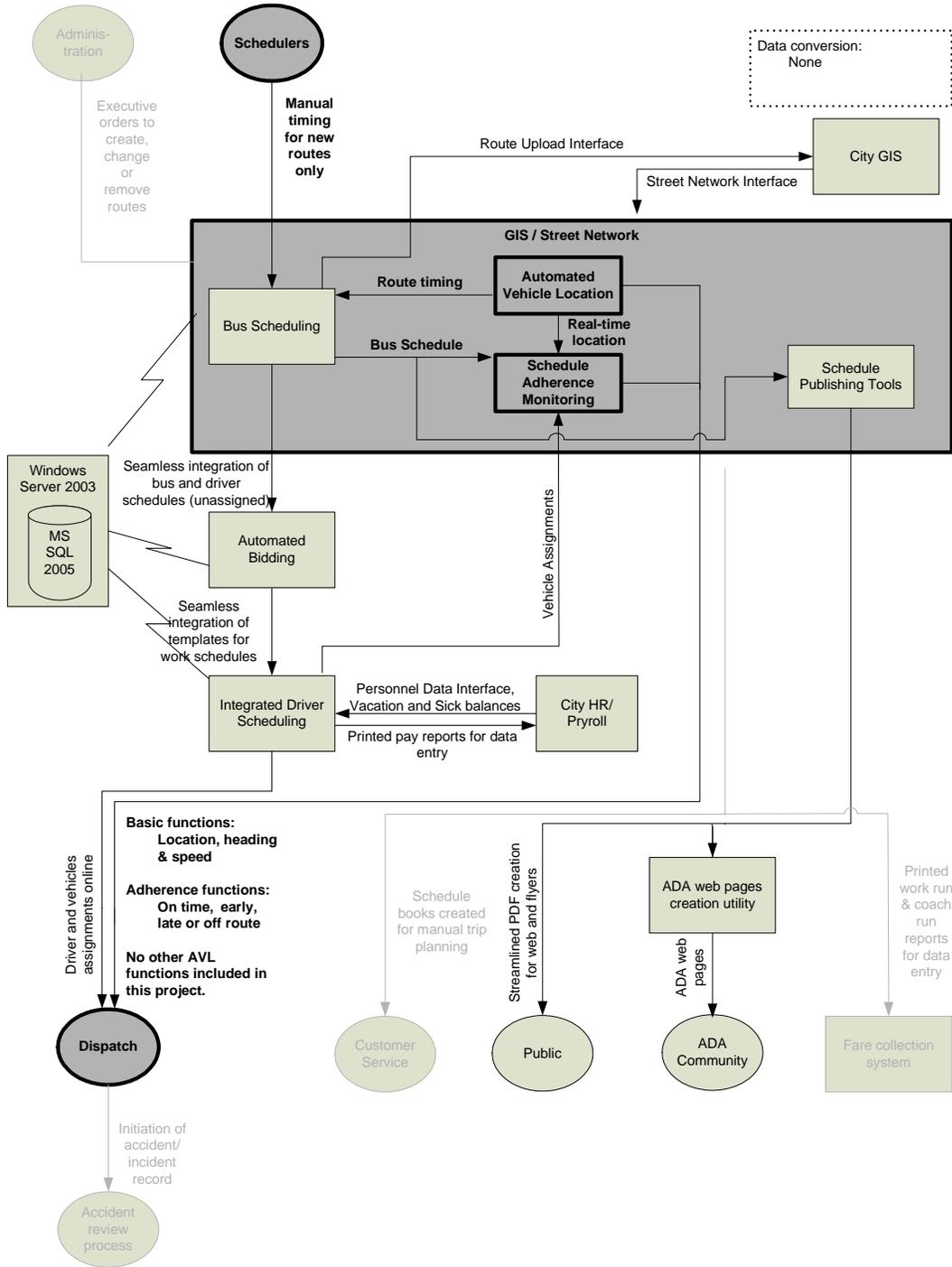
(title of authorized official)

APPENDIX D Phased Implementation Diagrams

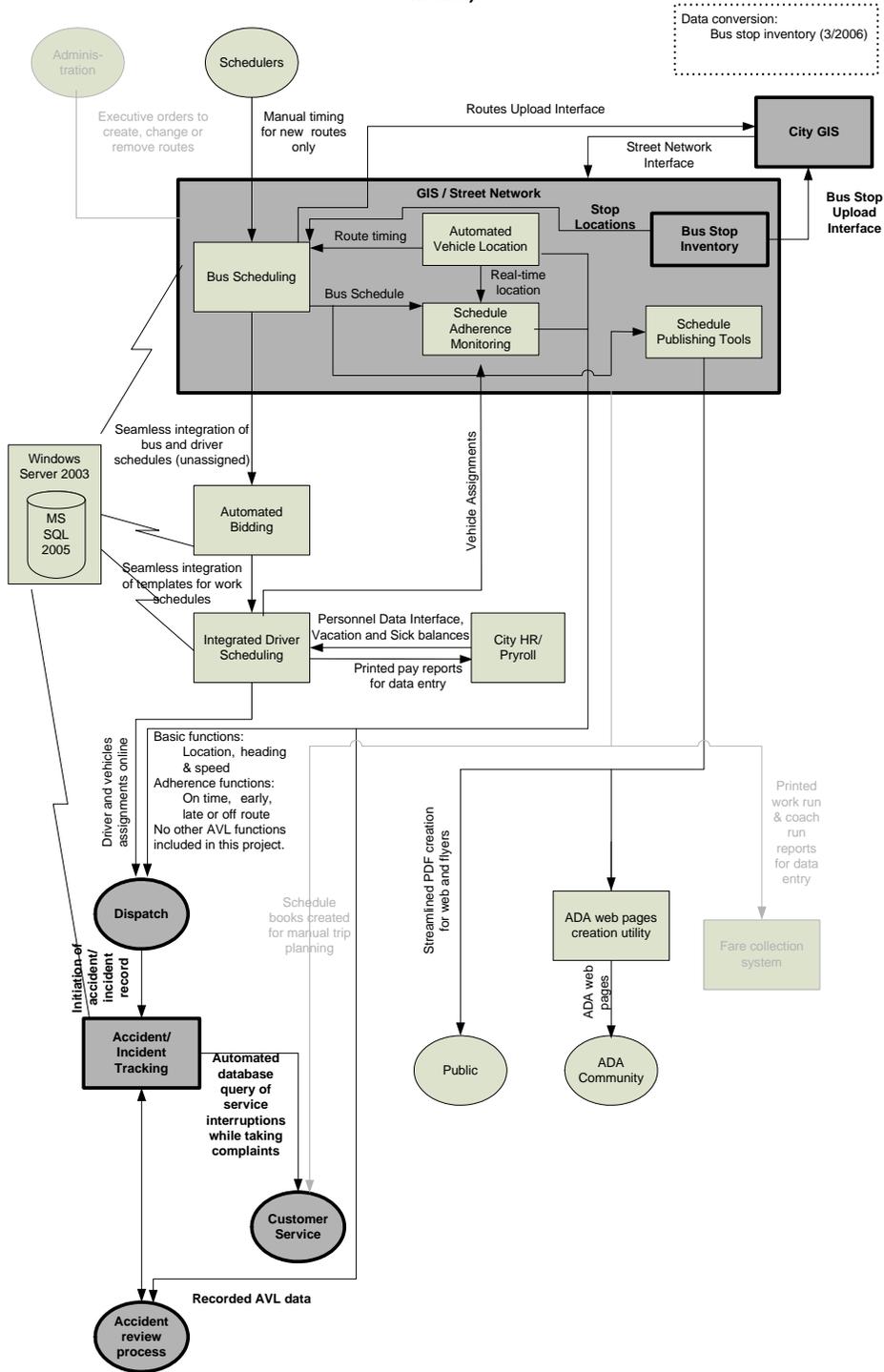
Comprehensive Transit Database Phase 1 : Section 3.5 : Replace outdated systems (est. 8 months)



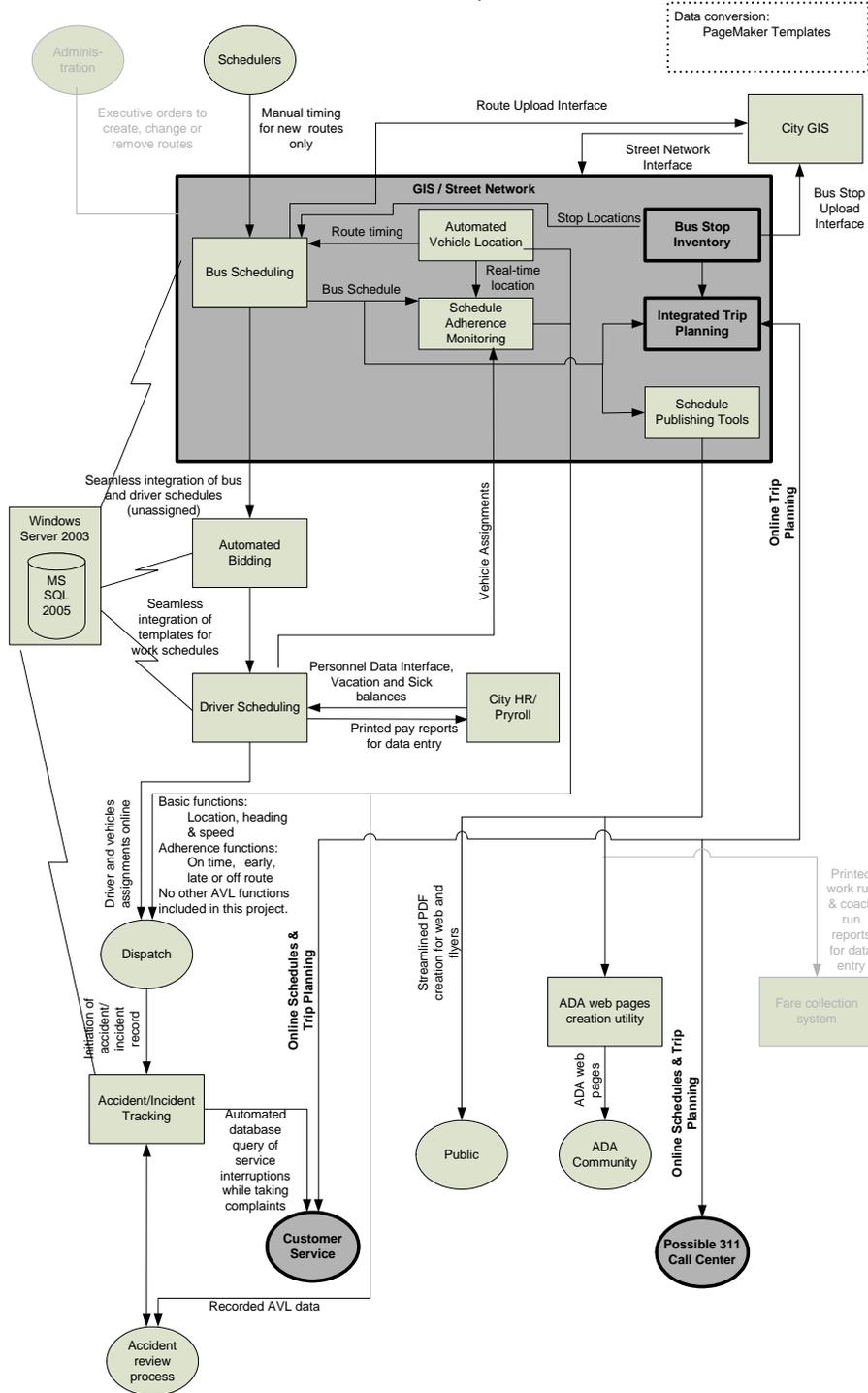
Comprehensive Transit Database
Phase 2 : Section 3.6 : Automated Vehicle Location with Schedule Adherence Monitoring (est. 6 months)



Comprehensive Transit Database
Phase 3 : Section 3.7 : Integrated Accident/Incident Tracking & Begin Bus Stop Tracking (est. 6 month)



Comprehensive Transit Database
Phase 4 : Section 3.8 : Finalize Bus Stop Tracking & Implement Customer Service Trip Planning (est. 8 months)



Comprehensive Transit Database
Phase 5 : Section 3.9 : Publish Web-Based Trip Planning & Implement Interfaces to City Systems
(est. 6 Months)

