Fayetteville Area System of Transit (FAST)
Fayetteville, NC

Review of Lift Reliability and Maintenance
for
Operation of Fixed Route Bus Service

March 22-25, 2010

Summary of Observations

Prepared for

Federal Transit Administration
Office of Civil Rights
Washington, DC

Prepared by

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Final Report: February 6, 2012

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1 Purpose of the Review

The U.S. Department of Transportation (DOT) regulations implementing the Americans with Disabilities Act of 1990 (ADA) contain two primary provisions to ensure that vehicles with accessibility features are reliable and properly maintained. General equipment maintenance requirements, which pertain to all types of entities and services, are contained in 49 CFR §37.161:

> *(a) Public and private entities providing transportation services shall maintain in operative condition those features of facilities and vehicles that are required to make the vehicles and facilities readily accessible to and usable by individuals with disabilities. These features include, but are not limited to, lifts and other means of access to vehicles, securement devices, elevators, signage and systems to facilitate communications with persons with impaired vision or hearing.*
>
> *(b) Accessibility features shall be repaired promptly if they are damaged or out of order. When an accessibility feature is out of order, the entity shall take reasonable steps to accommodate individuals with disabilities who would otherwise use the feature.*
>
> *(c) This section does not prohibit isolated or temporary interruptions in service or access due to maintenance or repairs.*

In addition to the general maintenance provisions described above that apply to all transportation providers, 49 CFR § 37.163 requires public entities to keep vehicle lifts[1] (and ramps) in operative condition as follows:

> *(a) This section applies only to public entities with respect to lifts in non-rail vehicles.*
>
> *(b) The entity shall establish a system of regular and frequent maintenance checks of lifts sufficient to determine if they are operative.*
>
> *(c) The entity shall ensure that vehicle operators report to the entity, by the most immediate means available, any failure of a lift to operate in service.*
> *(d) Except as provided in paragraph (e) of this section, when a lift is discovered to be inoperative, the entity shall take the vehicle out of service before the beginning of the vehicle's next service day and ensure that the lift is repaired before the vehicle returns to service.*
>
> *(e) If there is no spare vehicle available to take the place of a vehicle with an inoperable lift, such that taking the vehicle out of service will reduce the transportation service the entity is able to provide, the public entity may keep the vehicle in service with an inoperable lift for no more than five days (if the entity serves an area of 50,000 or less population) or three days (if the entity serves an area of over 50,000 population) from the day on which the lift is discovered to be inoperative.*
>
> *(f) In any case in which a vehicle is operating on a fixed route with an inoperative lift, and the headway to the next accessible vehicle on the route exceeds 30 minutes, the entity shall*

[1] The word "lift" is used in the DOT's ADA regulations to describe the accessibility feature for boarding and alighting riders using wheelchairs and others unable to use the steps of the vehicle. Similar requirements apply to other boarding technologies and systems, such as ramps used on low-floor buses.

promptly provide alternative transportation to individuals with disabilities who are unable to use the vehicle because its lift does not work.

The DOT ADA regulations also contain several requirements related to the operation of accessibility features. Part 38 of the regulations requires that accessible vehicles be equipped with mobility aid securement systems and passenger restraint systems. Technical and functional specifications for these securement and restraint systems are included in Part 38. The regulations require that transit systems use the securement system that is available on vehicles. Section 37.165 requires that agency personnel assist individuals with disabilities with the use of lifts, ramps, and securement systems (and that they leave their seat if necessary to provide this assistance). Section 37.173 requires that transit agencies ensure that "personnel are trained to proficiency, as appropriate to their duties, so that they operate vehicles and equipment safely and properly assist and treat individuals with disabilities who use the service in a respectful and courteous way, with appropriate attention to the differences among individuals with disabilities."

The Federal Transit Administration (FTA) is responsible for ensuring compliance with the ADA and the DOT implementing regulations (49 CFR Parts 27, 37, and 38). As part of its oversight efforts, FTA, through its Office of Civil Rights, conducts periodic reviews of fixed route transit services operated by grantees.

This report includes the results of the review of lift reliability, maintenance, and operation at the Fayetteville Area System of Transit (FAST), operating in Fayetteville, North Carolina. The review was conducted from March 22 to 25, 2010. This report summarizes the observations and findings of the on-site review of FAST's fixed route bus service. A description of key features of the fixed route bus service is first provided, followed by a description of the approach and methodology used to carry out the review. Observations and findings related to the ADA requirements are then described. The major findings of the review are summarized at the end of this report. Recommendations for addressing the findings identified are also provided.

2 Background

The City of Fayetteville is the county seat of Cumberland County, North Carolina. Fayetteville Area System of Transit (FAST) is a department of the city government. FAST was created in 1976 when the city assumed operations from the privately-owned Cape Fear Transit Bus Company.

The FAST service population is estimated to be approximately 131,000. In fiscal year 2008 (which began October 1, 2007), FAST carried approximately 850,000 passengers.

FAST operates 12 fixed routes that operate from 5:30 a.m. to 7:30 p.m. weekdays and from 6:30 a.m. to 6:30 p.m. Saturdays. There is no Sunday transit service. At the time of the review, there was also an additional contracted commuter route that was scheduled to end on March 31, 2010. Ten routes have 60-minute headways and two routes have 30-minute headways. Seven of the routes originate at the FAST Transit Center, which also has a modular building that houses the dispatcher's office, information window, waiting room, and restrooms; a pulse schedule enables transfers at the center. In 2009, service hours were expanded for four of the routes and one new route was added. As discussed in this report, eight new low-floor buses were placed in service in July 2009; five low floor hybrids were also purchased and are planned to enter service in December 2010.

The adult bus fare is $1.00 and there is a discount 35-cent fare for older adults and persons with disabilities. Transfers are free.

All FAST service is based at a municipal facility at 455 Grove Street in Fayetteville, which also contains management offices. The Transit Director and Assistant Director work through a management contract with First Transit, Inc. All other management, administrative, maintenance, and bus driver positions are filled by municipal employees. All vehicles are city-owned.

FAST's website (www.ridefast.net) provides schedules, maps, and other public information (including FAST TRAK complementary paratransit information). It includes a telephone number for information and an electronic message form for complaints and comments. The website and is equipped with Google Translate to provide multi-lingual information.

Figure 2-1 presents the FAST route map.

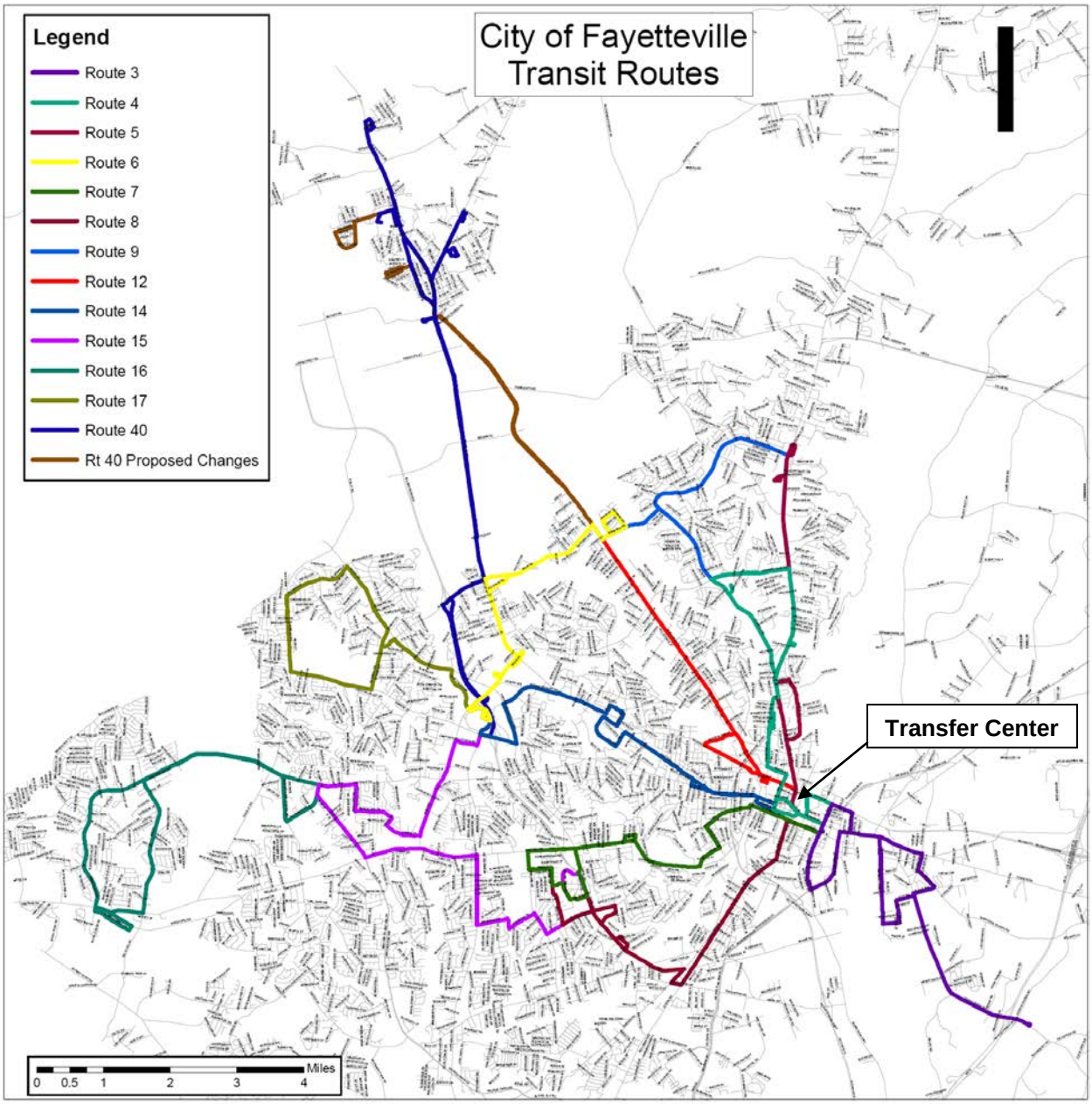


Figure 2.1 – FAST Route Map

3 Overview of the Review

The review focused on FAST's compliance with the DOT's ADA regulatory requirements related to the operation and maintenance of lifts/ramps as required for accessible fixed route bus service. The specific regulatory requirements that were the focus of the review are described in the first section of this report.

FTA provided FAST with written notification of the review on February 17, 2010. A copy of the notification letter is provided in Attachment A. In the letter, FAST was requested to provide the following information:

- Five copies of the current fixed route system map
- A complete set of current detailed route schedules
- Identification of which routes are operated directly by the transit authority and which are operated by private contractors
- Identification of which routes/areas are served by each garage
- Bus fleet inventory identifying year, make, bus garage, and accessibility of each bus, including whether the system uses low-floor buses and to what extent
- A description of lift maintenance practices identifying the location and party performing lift maintenance
- Current fixed route drivers' manuals, notices, memoranda, or other documentation informing drivers of lift operation and maintenance procedures
- Reports, memoranda, or other documentation regarding lift operation and maintenance monitoring activities and findings
- A list of all complaints related to lift operations in the past year

The letter also requested that an opening conference be scheduled on Monday, March 22, 2010, and that an exit conference be scheduled on Thursday, March 25, 2010.

Planners Collaborative, Inc., of Boston, Massachusetts, conducted the review on behalf of FTA. Jim Purdy of Planners Collaborative served as the review team leader. John Hersey of Planners Collaborative assisted with the review. A schedule of the review team's on-site review is provided in Attachment B.

Prior to the on-site visit, the review team received and reviewed the complete package of the requested information. Before the visit, the review team also contacted advocacy organizations and conducted a telephone interview with an advocate for the disability community. This interview is described in Section 4.1 along with two additional interviews conducted during the on-site visit.

The following individuals participated in the opening conference held at 1 p.m. on Monday, March 22, at FAST headquarters at 455 Grove Street, Fayetteville, NC:

Ronald Macaluso	(former) FAST Transit Director
Rosann Christian	FAST Assistant Transit Director
Tony Means	FAST Transit Operations Superintendent
Juan J. Larregui	FAST Automotive Technician Supervisor
Donald Pike	FAST Safety and Training Coordinator
Doug Hewett	Assistant City Manager, Fayetteville, NC

Patricia Bradley	Assistant City Attorney, Fayetteville, NC
Ron McElrath	Human Relations Director, Fayetteville/Cumberland County
Jim Purdy	Planners Collaborative (team leader)
John Hersey	Planners Collaborative (team member)
Susan Clark	FTA Office of Civil Rights (by telephone)

Susan Clark thanked FAST for its cooperation with the review. She described the purpose of the review as identifying whether people with disabilities were receiving the accessible fixed route services to which they are entitled in accordance with DOT ADA regulations. She also noted that an objective of the review is to offer assistance to FAST in meeting the ADA requirements, and that the review team was available for that purpose.

Ms. Clark outlined the process the review team would follow for the review, noting that the review team would present preliminary findings at the Thursday exit conference. She explained that the review team and FTA would then prepare a draft report, which would be transmitted to FAST for its review and comment, and that once transmitted, the Draft Report becomes a public document subject to release in response to Freedom of Information Act (FOIA) requests. The Final Report would include FAST's comments and would be posted on FTA's website**.** Following issuance of the Final Report, FAST will be required to report on its progress on implementing corrective actions in response to findings in delivering service as required by the DOT ADA regulations. Progress reporting will continue on a quarterly basis until FTA is satisfied that all findings have been adequately addressed and releases FAST from further reporting.

Mr. Purdy distributed copies of the schedule of the planned review activities. He reviewed the planned on-site activities and meetings, which would focus on the working condition, maintenance, and use of the bus ramps and lifts and wheelchair securement systems. He explained that observations would be made during morning pull-outs; interviews and examination of data would address driver training, maintenance, service monitoring, driver discipline, and handling of customer complaints. In addition FAST management personnel and drivers would be interviewed, and inspections of ADA-related bus equipment would be conducted.

The review team then met with senior managers to discuss the history of FAST, its policies and procedures, fleet resources, and expansion plans. Individual team members later met separately with FAST managers and examined records regarding service monitoring and the handling and response to complaints, plans and budgets for fleet replacement and maintenance, and training of new drivers. The review team reviewed the bus fleet roster with FAST managers and selected a representative set of buses to inspect for conformity with DOT specifications.

On Tuesday the review team observed bus pull-outs at FAST's bus facility at 455 Grove Street in Fayetteville. During the day, the review team interviewed the Operations Superintendent regarding employee monitoring and the disciplinary system, the safety and training coordinator, the maintenance supervisor, and bus drivers. The team reviewed maintenance records and bus assignments (pull-out sheets) and inspected three buses.

On Wednesday the review team continued with the examination of maintenance records and pull-out sheets, conducted additional interviews with drivers, and compared bus maintenance records with pull-out sheets.

On Thursday the review team synthesized the materials and information collected, and reported preliminary findings at the exit conference. The following people attended the exit conference:

Ronald Macaluso	(former) FAST Transit Director
Rosann Christian	FAST Assistant Transit Director
Tony Means	FAST Transit Operations Superintendent
Juan J. Larregui	FAST Automotive Technician Supervisor
Donald Pike	FAST Safety and Training Coordinator
Doug Hewett	Assistant City Manager, Fayetteville, NC
Patricia Bradley	Assistant City Attorney, Fayetteville, NC
Ron McElrath	Human Relations Director, Fayetteville/Cumberland County
Luis Collazo	Human Relations, Fayetteville/Cumberland County
Jim Purdy	Planners Collaborative (team leader)
John Hersey	Planners Collaborative (team member)
Susan Clark	FTA Office of Civil Rights (by telephone)

Ms. Clark thanked FAST for its cooperation throughout the site visit and for providing working space for the review team. She reviewed the purpose of the review and the schedule for preparation of this report.

Mr. Purdy outlined the material to be covered in the exit conference, and the review team presented its preliminary findings. FAST's response to the draft review findings and recommendations is provided in Attachment C [Final Report only].

4 Observations of Lift and Ramp Reliability and Maintenance

To assess FAST's performance with respect to accessible fixed route reliability, maintenance, and operation, the review team performed the following activities:

- Gathered customer input by various means, including interviews with individuals familiar with the FAST bus system
- Reviewed policies and procedures regarding lift operations, service monitoring, and equipment inspection
- Observed bus operations
- Interviewed drivers to gauge their understanding of lifts and wheelchair securement policies and procedures
- Observed vehicle pull-outs and pre-trip inspections
- Inspected buses for compliance with ADA-related specifications
- Reviewed maintenance procedures and performance
- Reviewed availability of resources for fleet renewal and lift/ramp maintenance and operation

4.1 Customer Input

Customer Interviews

In advance of the site visit, the review team contacted four social service agencies in the Fayetteville area to seek the input of individuals with disabilities who are customers of the FAST fixed route service. The review team spoke with one person who frequently rides FAST and requires driver assistance using the lift or ramp.

He declared that FAST fixed-route service had improved dramatically in the three years prior to the review. Whereas irregular service and lack of attention to ADA compliance were once common, he said the agency had improved adherence to its timetables and had emphasized disability awareness and compliance with ADA regulations. The rider mentioned that there was inconsistent enforcement of driver and passenger rights and responsibilities, but added that FAST has improved substantially in this area. He also mentioned that the public address systems on the buses do not work consistently.

Customer Comments and Complaints

At the time of the review, FAST fixed route customers could make a complaint about service in four ways. First, a complainant could call FAST and speak with a FAST customer service representative, who completes a "Report of Complaint" form with information to identify the route, run, bus and/or driver and forwards the form to the Operations Superintendent. Second, customers could speak to the dispatcher at the Transit Center. Third, a complainant could e-mail FAST via its website; web complaints also go to the Operations Superintendent. Finally, since FAST is a municipal service, a complainant could file an "ADA Complaint Form" with the City's ADA Title II Coordinator, who responded to the complainant and contacted the Operations Superintendent for further discussion of the issue. Both complaint forms are included in Attachment D.

FAST maintained an informal record of complaints made by phone or e-mail. Calls and e-mails were sent to the Operations Superintendent, who may contact the complainant, the driver of the route in question, and/or the maintenance staff in order to better understand the issue. The Operations Superintendent recorded the steps taken to resolve the issue in a notebook, including any response to the complainant, and retained e-mails in a saved e-mail file. While the Operations Superintendent and other FAST staff expressed a commitment to responding to complaints and improving service, there was no systematic documentation of these efforts such as a database or spreadsheet.

The DOT ADA regulations require public transit providers to receive complaints from riders and keep copies of complaints on file for one year and maintain a summary of complaints on file for five years (§§ 27.13(b) and 27.121(b)). Section 27.13(b) requires prompt and equitable resolution of complaints alleging discrimination on the basis of disability. While requirements to respond to complainants are not included in the DOT ADA regulations, it is a common and effective practice for a transit provider to respond to complainants and for transit providers to investigate allegations to ensure that all DOT ADA requirements are being met.

It appeared that FAST had records of complaints going back for a year, but the informal manner in which complaints are documented made it impossible to determine if all complaints were documented. At the time of the review, it did not appear that FAST was keeping copies of any or all complaints or maintaining a summary of complaints received over the past five years.

FAST commented that the City maintains a database of complaints and responses related to other municipal services such as waste management or public works and suggested that the City could potentially allow FAST to use this database for complaint documentation.

In a selection of e-mails received by FAST since March 22, 2009 one year preceding the review, two e-mails concerned FAST fixed route service, and those e-mails were questions rather than complaints about service. Most other e-mails concerned FAST's paratransit service, system maps, scheduling, or the agency's website. While the lack of complaints may indicate a high level of customer satisfaction, it may also indicate that many customers do not understand how to make a complaint or what to expect if they do so.

4.2 FAST Policies and Procedures

Bus Operations

At the time of the review, FAST did not have a driver's manual. Instead it relied on relatively extensive training materials to communicate policies and procedures, described in more detail below. The Administrative Policies/Procedures Manual is a City of Fayetteville document that applies to all municipal departments and does not specifically address transit.

In addition to the training manual, there were two documents relevant to transit policies and procedures specific to ADA issues. They are presented in Attachment E and described below.

A two-page November 2009 supplement to the Policies/Procedures Manual addresses securement of wheelchairs and other mobility aids and use of passenger restraints on both fixed route and paratransit vehicles. It states that before the bus can be moved, wheelchairs and other mobility devices must be properly secured with a four-point tie-down system, and passengers using these devices must be offered seat belt restraints. These policies are consistent with US

DOT ADA regulations, which require passenger restraints to be offered but not required, and which permit the transit entity to require securement of mobility devices.

A July 2008 memo entitled "Vehicle Lift Repair" addresses pre-trip inspections, response to lift-related road calls, and how to list vehicles with inoperative lifts on the daily Vehicle Operational Status Sheets (also called "down sheets"). The memo may be paraphrased as follows:

- All lifts must be cycled before the vehicle leaves the yard for service; if problems are observed, the maintenance technician will make necessary repairs or provide a replacement vehicle, and the problem vehicle will remain out of service until repairs are completed.
- If a lift problem occurs during revenue service, the dispatcher and maintenance will assist the driver over the radio and provide troubleshooting advice. If this does not solve the problem, a supervisor or maintenance technician will be sent to the site to repair the lift or replace the vehicle.
- After repairs are completed, the lift problem will be removed from the Vehicle Operational Status Sheet so the Supervisors know the vehicle can be placed back into revenue service.

These provisions address the portions of the DOT ADA regulations regarding regular and frequent maintenance checks of lifts at § 37.163(b), reporting lift failures by the most immediate means available at §.37.163(c), and removal of a vehicle with an inoperative lift from service before the beginning of the next service day at § 37.163(d). Lift failure detected during pre-trip inspection is reported by vehicle operators directly to the maintenance personnel, and lift failures on the road are reported by radio to the dispatcher, who immediately notifies the maintenance department; in both situations the reporting is by the most immediate means available. A street supervisor was assigned to observe the pull-outs every day and watched the cycling of lifts and kneelers before the bus was permitted to leave the yard.

The troubleshooting element of the procedure is noteworthy. Dispatchers and street supervisors are provided with a list of potential remedies to inoperative lifts and other types of common mechanical problems that may occur in revenue service. According to FAST's Operations Superintendent and Automotive Technician Supervisor, use of this troubleshooting procedure and involvement of a maintenance technician in communication with the driver reduces the need for road calls and thus restores lift function with less delay and inconvenience for the passenger.

At the time of the review, FAST did not have a written procedure on providing alternative transportation in the event of an in-service lift failure. Provision of alternative transportation is required by § 37.163(f) of the DOT ADA regulations, and is particularly important in a system where most headways are 60 minutes. Lift maintenance, supervisory personnel, and drivers who were interviewed all indicated that alterative transportation is provided if the lift cannot immediately be made operable. The procedure should be documented and disseminated to drivers.

Driver Training

Prior to the site visit, FAST provided the ADA-related portion of its training materials to the review team. During the on-site review, the FAST Safety and Training Coordinator provided the review team with a complete copy of its training manual.

On Tuesday, the review team interviewed the Safety and Training Coordinator to gather more information on the driver training program. FAST separates training into three distinct sessions: the training that is provided to all municipal employees; 11 days of classroom training for FAST drivers which was provided by the Safety and Training Coordinator; and 11 days of in-revenue on-road training, (provided by veteran drivers selected by the Safety and Training Coordinator and the Operations Superintendent). At the time of the review, FAST did not require refresher training, but training staff is available for remedial training as necessary.

Following this training, the driver must satisfactorily complete two final exams. The first is a Transportation Safety Institute exam containing 256 multiple-choice questions related to a variety of transit operations issues, 35 of them concerning ADA matters. The second is a FAST exam with 25 fill-in-the-blank questions specific to municipal transit service. For drivers who pass these exams, the Operations Superintendent must approve the prospective driver and issue a complete Summary Record of Training.

Facilitated Classroom Training

FAST required prospective drivers to satisfactorily complete 11 days (90 hours) of classroom training. At the start of the classroom instruction, trainees are given a FAST manual that discusses operation of the vehicle, driver behavior, customer relations, emergency response, and ADA regulations. Attachment F presents the ADA section of the training manual.

FAST dedicated 8 hours of classroom training to ADA regulations during which the Safety and Training Coordinator discusses operation of lifts, ramps, and securements. The Safety and Training Coordinator stated that FAST training emphasizes equity and access for all riders. In addition to ADA education, the instruction incorporates lessons from the Smith School of Defensive Driving, an element that many drivers pointed to as an asset in their daily operations (see Section 4.3 for a discussion of driver interviews). Other elements include sensitivity training, rules of conduct for drivers and passengers, and two hours of non-revenue behind the wheel equipment training, including hands-on boarding and securement practice.

In-service Training

Following classroom training, prospective drivers must complete 11 days of supervised in-service training. FAST believed that it is best to learn in this manner because it is not possible to simulate all the challenges presented during revenue operations. Trainees are accompanied by veteran drivers selected by the Safety and Training Coordinator and Operations Superintendent. This training provides not only guidance on driving the vehicle but also opportunities for the new driver to use ADA equipment and to practice customer relations skills.

Remedial Training

Refresher training is a resource to reinforce appropriate driver attitude and awareness in all drivers. At the time of the review, FAST offered no formal refresher training. In contrast, remedial training was applied in cases where the Operations Superintendent determined that it was appropriate in light of an incident or complaint involving the driver; in these instances, the driver involved must re-take and complete applicable portions of the 11-day classroom course Although not incident-driven, targeted remedial training was also being administered to veteran drivers as the training schedule allowed.

Approximately half of the drivers were hired before the training program was instituted three years prior to the review, and the Safety and Training Coordinator noted that the training in earlier years did not fully cover ADA topics and may have taught incorrect practices. In cases where veteran drivers are not certified in defensive driving, customer service, or ADA compliance – all newer facets of the training course – these drivers must complete two days of the standard classroom training in which these subjects are taught. FAST also invites informal instruction through one-on-one dialogue between senior staff and drivers. The Safety and Training Coordinator, the Operations Superintendent, street supervisors, or veteran drivers regularly make themselves available to drivers for questions about appropriate equipment use or other operations advice. The relatively small number of administrative and driver staff at FAST work together informally and often one-on-one to resolve points of confusion.

In addition to incident-triggered and other remedial training, FAST managers held monthly meetings with drivers to discuss safety and operations issues that may have developed. At the time of the review team's site visit, FAST managers encouraged drivers to bring up points of confusion or other matters whose resolution may benefit the entire staff. According to the Operations Superintendent, approximately 10-15 minutes of each 90 minute safety meeting is used to remind drivers of their responsibilities under ADA; from time to time, ADA issues are the main topic for a safety meeting. . Attendance was required for all drivers, and the meetings were held at three times on the same day to accommodate different shift schedules.

In addition, FAST administration encouraged drivers to review the training guide.

Service Monitoring and Enforcement Procedures

FAST monitored driver performance in two separate ways: routine on-board observations by street supervisors or even the Operations Superintendent or Transit Director, and response to complaints and incidents. A street supervisor was stationed at the FAST Transit Center, where seven of its routes converge on a pulse schedule. Supervisors discussed issues as they arise with drivers and the transit dispatcher. Each of the four street supervisors typically conducted 12 on-board observations per year. However, FAST did not have a covert or "secret rider" program to monitor driver performance at the time of the review.

The drawback of using supervisory personnel to monitor drivers is that supervisors are known and their presence likely changes driver behavior. Thus, supervisor ride-alongs are useful in identifying issues that stem from misunderstanding FAST policies and procedures and ADA requirements, but are less useful in assessing general driver performance. One indication of this is that no violations of the requirement that drivers announce stops had been reported by supervisors in the past year, and the level of compliance would likely be lower if the drivers did not know they were being monitored.

Incidents reported to the dispatcher or street supervisor and complaints submitted by passengers were a second means of monitoring service performance. When a complaint or incident report was received, the Operations Superintendent meets with the driver to get his or her side of the story and to establish the facts. FAST buses are equipped with cameras, and the superintendent reviews the video record with the driver. The superintendent then applies discipline and remedial training if he determines that it is warranted.

FAST used a progressive discipline system. An oral warning or counseling is given on the driver's first offense, provided it is not of undue severity. Subsequent offenses are punished with

unpaid suspensions of 1, 3, and 5 days, followed by "Consideration of Dismissal" and termination. The less typical aspect of FAST's disciplinary system is that, as City employees, drivers have a right to a lengthy appeal process that goes beyond the Transit Director to the Fayetteville Human Resources staff, the City Manager, and the City Appeals Board. FAST reported that approximately 40 percent of suspensions go beyond the Transit Director.

According to the Operations Superintendent, there were no ADA-related disciplinary actions in the 12 months prior to the review; however, as discussed above, there were also no complaints about fixed route drivers during this period of time. This may indicate that there really were no infractions by drivers, or it may reflect an imperfect monitoring and complaint tracking system. Better information on operations would be provided by systematizing the complaint procedure as discussed above, and instituting covert monitoring to provide a more accurate picture of actual driver performance when supervisors are not known to be observing. Discipline could then be applied when infractions are observed or complaints are substantiated.

4.3 Resources

Facilities

All FAST operations, maintenance, and administrative functions are located at 455 Grove Street in Fayetteville, except for a modular building at the FAST Transit Center, located five blocks to the south on Old Wilmington Road. The bus facility is shared with the Fayetteville Environmental Services department, but has a separate secure entrance. Renovations to the administrative office space, paratransit call center and dispatch, and drivers' ready room were nearing completion at the time of the review team's site visit. Maintenance facilities and outdoor overnight parking for transit vehicles appear to be adequate for the fixed route and paratransit fleets.

The Transit Center building was replaced with a new modular building. It houses fixed route dispatch operations, with a window for information and sale of bus passes, a passenger waiting room, and rest rooms.

The City of Fayetteville had also completed a siting study for a multimodal transit center located downtown near the Amtrak station. The new transit center would replace the one on Old Wilmington Road and would contain second floor office administrative space for FAST. However, the time for constructing the new facility is uncertain and would occur over several years.

Maintenance of Lifts and other Accessibility Features

Most maintenance of the FAST fleet took place at the Grove Street facility. Major engine rebuilding, transmission work, and body work was contracted out to vendors. Warranty repairs on new buses were done by an authorized service provider located near Fayetteville.

FAST used a typical scheduled preventative maintenance (PM) program with "A," "B," "C," and "D" services on 6,000, 12,000, 18,000, and 24,000 mile intervals, or corresponding 3-month time periods. The A and B maintenance checklists included lift cycling, checking wheelchair securements and passenger restraints, testing the interlock system to ensure the bus cannot be moved when the door is open and lift is deployed, and checking the stop indicator, kneeling system, destination signs, ISA, and priority seating and securement area decals. The C service added lift stowing alignment and drive train, lifting arm and bridgeplate pivots, and hydraulic

fluid level check. The D service added removal of the lift assembly, adjustment of drive chains and sprockets, and hydraulic system inspection. FAST's fixed route buses were typically driven approximately 1,000 miles per week; therefore at least the basic maintenance check of maintenance occurred at approximately six-week intervals. Together with daily lift cycling and a system for reporting lift/ramp malfunctions, which is described below under Pull-out Inspections, this PM schedule appeared to comply with § 37.163(b), which requires a system of regular and frequent maintenance checks of lift/ramp operability.

The vehicle maintenance Management Information System (MIS) provides a monthly schedule of vehicles due for preventative maintenance and compliance reports of the status of each vehicle, flagging those on which PM service is overdue. The report lists the vehicles scheduled for maintenance during the month and gives both the actual mileage and date of the PM along with the scheduled PM date and projected mileage at that date. The review team examined a sample of these reports, which are prepared for the Transit Director. The variances between scheduled and actual dates and mileages were small, which indicates that that preventative maintenance is taking place as scheduled.

FAST used the AssetWorks maintenance MIS, an internet-based system shared with four other institutions. Each agency has access only to its own vehicle records through client software that connects to a central server. The review team observed the maintenance supervisor using AssetWorks to query maintenance records that involved lifts/ramps. Several reports were helpful in determining the duration of repairs for each vehicle. The MIS connects to a parts inventory and helped to ensure that parts were re-ordered as necessary. The FAST maintenance MIS was well-organized, and data appeared to be complete and kept up to date.

At the time of the review, repairs were initiated either in response to preventative maintenance checks or driver reports, which may have been made when road calls were necessary and were most commonly noted by the driver on the Daily Vehicle Condition Report (DVCR), also called the defect report. Drivers were required to use the DVCR as a checklist during their pre-trip inspection and to note defects detected in the inspection or during revenue service. The DVCR was turned in to the dispatcher when the driver completes his or her run. A maintenance technician investigated any defects noted on the form and opened a work order if it cannot be repaired on the spot with minimal labor and no replacement of parts. Driver reporting of defects was reinforced by street supervisors who monitored the pull-outs each day, observed lift cycling, and made independent spot checks of ADA equipment and whether the driver had filled out the DVCR. Samples of the DVCR and Street Supervisor Daily Report are presented in Attachment G.

When an inoperable lift was reported, the bus was listed on the Vehicle Operational Status Sheet as unavailable until it is repaired. Based on a review of maintenance and operations data for calendar year 2009, it appears that FAST did not place a bus in service for three or more days when a repair order had been opened for a lift problem. Most repairs were completed in three days or less.

A sample work order is shown in Attachment H. The work order contained spaces for recording the date and time it was opened, when work was finished, and when the order was closed. Work performed under a work order may have included more than one category of mechanical systems and may have combined unrelated problems, such as the air conditioner and lift. The work order

report displayed the total labor of each technician as well as time-stamped comments entered by the technicians.

Multiple repairs were often included in the same work order, so that the finish date may have reflected a longer repair interval than was needed for the lift repairs, for example, while parts were ordered for an unrelated defect. This is a shortcoming in the maintenance documentation that made it more likely that FAST managers are not always aware of the time required for lift repairs. Separating work orders for lift repair would isolate the time required for the lift repairs.

A separate report provided daily labor entries for all queried work orders, broken down by vehicle and subsystem; the review team used this report together with the work orders to determine when lift repairs were actually completed.

Vehicles

At the time of the review, FAST used 21 buses for fixed route service. The fleet is summarized in Table 4.1 and shown in more detail in Attachment I.

Table 4.1 – FAST Fixed Route Fleet Summary

Model Year	Unit #	Make	Model	Floor	Length (feet)	Lift/ ramp	Age (years)	Quantity
1999	642-694	Nova	Bus RTS	high	35	L	11	9
2008	700-704	Gillig	Bus LF	low	35	R	2	5
2009	705-707	Gillig	Bus LF	low	35	R	<1	3
2009	400-403	Ford	E-450	high	25	L	<1	4
Average/Total							5.4	21

The fixed route schedules, excluding the Route 40 commuter service that terminated at the end of March 2010, require a peak pull-out of 16 buses. This left five of the 21 buses unassigned, a spares ratio of approximately 31 percent. In practice, according to the Transit Director, two of the 1999 Novas are inactive, leaving three usable Novas for use as spares. One of these spare buses is located at the FAST Transit Center each day to minimize the time needed to replace any bus that has mechanical problems while in service. This practice helps FAST to provide alternative service if a lift becomes inoperable on a route with headways greater than 30 minutes. In addition to the Novas at the Transit Center and at FAST headquarters, FAST occasionally used a spare accessible paratransit van for alternative service.

At the time of the site visit, FAST had a fleet replacement plan aimed at retiring the 1999 Novas that were about to reach the 12-year threshold that is the typical working lifetime of a transit bus. This plan included the acquisition of three 2010 low-floor Gillig hybrid-powered buses at the end of 2010 and six 20-foot LTVs in 2011 and 2012. The Assistant Transit Director anticipated that these acquisitions would be sufficient to retire aging Novas and serve extended hours on eight of the bus routes. FTA 5307 program funds will be used for these acquisitions in addition to local and state funds.

Staffing

At the time of the review team's site visit, FAST had 49 full-time drivers, of whom 39 were assigned to fixed route service and 10 to FAST*TRAC* complementary paratransit service. There were also 15 "intermittent" (i.e., part-time) drivers who drove both fixed route buses and

paratransit vehicles as needed. The tenure of full-time drivers ranged from 3 months to 19 years. Twenty of 48 full-time drivers had less than one full year of service and one position was open at the time of the review, indicating a very high turnover in personnel in 2009. All part-time drivers had at least 1 year of service. As discussed in the sections on training and driver interviews, the new personnel appeared to receive appropriate training, and those who were interviewed demonstrated familiarity with ADA-related topics. However, stability of the staff was recognized by FAST management as an important priority. Potential actions at the time of the review, which must be approved by the City of Fayetteville, included pay increases, authorization of additional positions to reduce overtime, and promotion of part-time drivers to full-time status to fill openings.

FAST had an Operations Superintendent and five street supervisors who also oversaw paratransit operations.

On the maintenance side, the Automotive Technician Supervisor had five technicians and four service aides plus two positions that were open at the time of review. Four of the technicians had more than 13 years of service with FAST. This staffing permitted a three-shift operation in which preventative maintenance takes place at night and did not require buses to be withheld from service for scheduled preventative maintenance.

Budget and Financial Resources

FAST's 2008 budget is shown in Table 4.2. The operating expenses were approximately $4.9 million of which $3.6 million (74 percent) was for fixed route service. Of this amount, $2.1 million was for fixed route vehicle operations and $875 thousand for fixed route vehicle maintenance.

Based on 8 months of data provided by FAST for FY 2010, fixed route vehicle operations was extrapolated to total approximately $3.35 million, which is roughly 60 percent higher than in 2008. Total vehicle maintenance for both fixed route and paratransit vehicles was extrapolated to total approximately $690 thousand, which is approximately 65 percent of the FY 2008 expense for the combined fixed route and paratransit fleet. The reduced expenditure on maintenance may reflect a smaller maintenance staff; two positions were open at the time of the review as well as a fleet that contained a substantial number of newer vehicles. As discussed under staffing, the number of automotive technicians and aides appeared to be adequate for preventative maintenance and repair of mechanical problems, including maintenance of lifts and ramps.

FAST had a fleet renewal plan that will replace the oldest vehicles in the fleet (nine 1999 lift-equipped Novas) over the next three years, reducing chronic maintenance problems that have been experienced with some of these vehicles.

Table 4.2 – FAST Operating Expenses, FY2008 and 2010

	FY2008	FY2010 (Extrapolated)
Fixed Route Service		
Vehicle Operations	$2,097,148	$3,350,000
Vehicle Maintenance	875,440	
Non-Vehicle Maintenance	126,675	
General Administration	498,302	
Total Fixed Route	$3,597,565	
Fixed Route + Paratransit		
Vehicle Operations	2,927,355	4,260,000
Vehicle Maintenance	1,053,872	690,000
Non-Vehicle Maintenance	166,132	110,000
General Administration	707,720	850,000
Total FAST	$4,855,079	$5,910,000

Sources: FY2008 - National Transit Database;
FY2010 - FAST data for July 2009-February 2010

At the time of the review, financial resources available to FAST appeared adequate to meet DOT ADA requirements including training and proper maintenance of lifts. FAST's management expressed optimism that funds would be available for some expansion of fixed route service and for maintenance and orderly replacement of the fleet in coming years.

4.4 Review Team Observations

Bus Ride-Alongs

The review team did not find a FAST customer with whom to conduct a ride-along. A member of the review team took a FAST bus to the Veterans Affairs Hospital and to the Transfer Center to observe customers boarding and alighting the vehicle. However, in three hours of observation no passengers were observed using the ramp or lift or requiring securement.

Driver Interviews

The review team interviewed 10 drivers immediately before or after driver shifts. A copy of the Driver Interview Form used is presented in Attachment J. The interview consisted of questions in three broad categories: basic information about the driver (e.g., length of time as a driver, whether they are full-time or part-time, etc.); questions regarding initial training and refresher training; and questions regarding the driver's understanding of lift/ramp and securement practices.

The interviewees were selected at random and had varying years of service. At the beginning of each interview, the interviewer explained the purpose of the review and told the driver that the information collected during the interviews would be kept confidential.

Nine of the 10 drivers had worked for FAST for more than 14 months, with the longest tenure being 20 years. Nine of 10 worked full-time, and all operated fixed route buses with either lifts or ramps. All drivers reported boarding at least three customers using wheelchairs per week, with eight drivers reporting at least one customer using a wheelchair per day.

With regard to training, all drivers reported that the existing training was sufficient and did not recommend any changes to it. All drivers noted that the Safety and Training Coordinator and veteran drivers were available for on-demand training and advice, but only four of the 10 drivers mentioned the monthly safety meetings.

Concerning equipment inspection, all drivers said that they and/or supervisors inspect the lift or ramp and securement equipment before each shift, whether in the morning or the afternoon, and no driver said that they had operated a bus with an inoperable lift. If the equipment fails in service, all drivers noted the same procedure:

- Inform passengers of the problem
- Contact the Information Center (i.e., dispatcher) for troubleshooting instruction
- If troubleshooting fails, the Information Center calls the Garage
- The garage sends a mechanic and/or a new vehicle
- If the mechanic cannot fix the problem immediately, the driver and passengers continue on the route with the new vehicle

Most drivers knew that alternative transportation should be available within 30 minutes.

The interviews included a question regarding the securement of three-wheel scooters, because this is more challenging than securing a wheelchair. There was some disagreement among drivers in how best to secure scooters. Seven of the 10 drivers spoke in detail about the issue, while four drivers simply commented that they would use crossing straps around the rear wheel of the device. Other drivers mentioned a variety of securement arrangements, but all drivers confirmed that they must secure the device before continuing on the route. Overall, the responses indicated a relatively sophisticated understanding of securement techniques.

All drivers stated a preference for deploying the lift or ramp on a sidewalk but, in the case where sidewalk deployment is not possible or otherwise not safe or practical due to specific conditions, seven drivers said they would deploy it to a safe area of the street, making sure to notify passengers, activate hazard lights, and position the bus to protect the boarding or alighting passenger.

All drivers said they would ask whether a passenger using a wheelchair needed assistance and, upon confirmation, would assist as necessary. Often, this assistance involves a push onto the lift or up the ramp or sometimes involves helping with shopping bags or parcels. Drivers showed understanding of sensitivity to people with disabilities by emphasizing the need to ask the passenger before providing assistance.

All drivers said that getting other passengers to make priority seating available is not a challenge and that passengers often move from the priority-seating area without request. However, three drivers noted that they could point to the priority seating sign if passengers were resistant to move.

Two drivers noted other ADA-related issues. One driver commented that wheelchairs often have too many items hanging from them to easily navigate inside the bus or to easily be secured once inside. Another driver requested automated wheelchair clamps like those he had used in the Washington Metropolitan Area Transit Authority fleet.In summary, the FAST drivers who were interviewed demonstrated an understanding of techniques and information that ADA training is intended to impart. The 10 drivers interviewed understood policies, procedures, and practices regarding wheelchair lifts/ramps, securement, and techniques to communicate with their

customers who have disabilities. They also demonstrated good judgment in answering questions about where to deploy the lift or ramp when picking up a customer and what do if a lift or ramp failed to work.

Pull-out and Condition of Accessibility Equipment

On Tuesday the review team observed the morning pull-out of 12 vehicles at the FAST facility at 455 Grove Street in Fayetteville. The purpose of the observations was to assess the working condition of lifts/ramps and other accessibility equipment, to observe procedures used by drivers for cycling and inspecting equipment, and to determine whether drivers were familiar with the operation of accessibility equipment.

The vehicles observed had front-door wheelchair lifts or ramps; both types of vehicles had kneeling systems. During the morning pull-out, review team members observed or looked for the following driver practices and vehicle features:

- Operation of lift or ramp
- Operation of kneeling systems
- Placement of International Symbol of Accessibility signs (ISAs)
- Working exterior destination signs
- Working securements (the equipment to hold the wheelchair in place) for passengers who use wheelchairs
- Working restraints (lap and shoulder belts to secure the passenger) for passengers who use wheelchairs
- Clean securements and restraints
- Driver familiarity with the equipment
- "Stop request" adjacent to wheelchair securement positions
- Proper signage adjacent to priority seating and securement areas
- Functional public address (PA) system

Review team members used a standard form to record results of the observations and inspections. A copy of the "Record of Lift Cycling/Working Condition of Lifts and Access Features" form is included in Attachment K.

Table 4.3 provides a summary of the pull-out observations. Note that in some cases, not all items were observed and/or tested on every bus; consequently, the total observations of accessibility features does not equal the total number of buses observed.

In general, compliance was very high with FAST's policy of cycling ramps and lifts, testing equipment, and checking signs prior to pull-out. All 12 observed drivers test-cycled the lift or ramp. The kneeling feature was tested for nine of the 11 vehicles that have this feature (cutaway vehicles do not). On the day of the observations a street supervisor was on duty monitoring the lift cycling, checking head signs, and making spot checks of on-board accessibility equipment; FAST stated that this is a daily practice.

In compliance reviews, FTA notes whether or not the kneeling systems are checked in those instances when a kneeler is a component of a bus because its functionality is part of its overall accessibility. A driver's lack of checking –or the discovery of a non functioning kneeler that nevertheless goes into service –is an indication of a transit system's overall accessibility

program. While a non-functioning kneeler would not constitute a compliance issue on its own (since a transit system is required to allow any standee to use the lift), it may in cases where a ramp-equipped bus requires a functioning kneeler in order to achieve the ramp slopes required under the DOT ADA regulations.

Nine of the 12 drivers checked securements and passenger restraints. Securements were not clean in two cases. Review team members judged that, were they in the passenger's position, they would decline to use these lap and shoulder belts due to their lack of cleanliness.

Table 4.3 – Summary of FAST Pull-out Observations, March 23, 2010

Observation	Component Functional?		Not Checked by Driver	Total Observations*	Percent Functional
	Yes	No			
Lift Works	5	0		5	100%
Ramp Works	7	0	0	7	100%
Securements Work	9	0	3	9	100%
Restraints Work	9	0	3	9	100%
Securements, Restraints Clean	10	2	0	12	83%
Stop Request Audible and Visible	11	1	0	12	92%
PA System Functional	8	1	0	9	88%
Kneeler Works	9	0	0	9	100%
International Symbol of Accessibility (ISA)*	12	0	0	12	100%
Proper Signs for Vacating Accessible Space	8	4	0	12	67%
Both Destination Signs Work*	9	2	0	11	81%
Driver Familiar with Equipment	12	0	0	12	100%

*Signs and ISA were classified as missing if too faded or dim to be easily legible.
The number of observations varied if observer was not sure an item had been checked or if bus was removed from service after lift or ramp failed to work.

All audible stop request indicators were functional. In one case, the visual stop request indicator was not functional; this was reported to the maintenance staff by the driver. Nine drivers checked the public address (PA) system; in one case, the PA system did not work.

Four vehicles did not have properly located signs for vacating the securement area and/or priority seats. The securement areas must be identified as such, and a sign is required over the first forward-facing priority seat requesting passengers to move if a person with a disability needs the seat. In three cases, the signs were movable placards in the advertising band above the seats; FAST staff simply moved these signs to the appropriate location.

For one bus, only the right-side destination sign was illuminated and legible. For another bus, the front headboard sign was illuminated and legible but the side sign was not.

Use of Buses with Inoperable Lifts

The DOT ADA regulations at §§ 37.163(d) and (e) require a transit system remove buses from service before the beginning of the next service day after it finds a lift (or ramp) to be inoperable unless there is no spare bus, and the regulation specifically prohibits keeping a bus with an inoperable lift in service for more than 3 days for any reason (see Section 1 of this report). For low-floor buses with front-door ramps, the ramp can usually be operated manually without difficulty, typically by lifting a grab loop and folding out the ramp. As a result, entering service with the intent to manually operate this type of ramp does not violate the regulation as long as the driver deploys the ramp for all customers who request it. Nonetheless, it is important for drivers to test and report any failures in ramp deployment at pull-out, and for the maintenance department to make repairs promptly.

The review team inspected vehicle maintenance records, daily vehicle availability sheets, and daily bus pull-out sheets to determine if the regulations were being followed. The analysis consisted of two parts, with the following steps:

1. Review of maintenance records:
    - Identify vehicles that had maintenance problems related to a lift or ramp
    - Determine date that FAST identified each problem
    - Determine date that FAST repaired each problem
    - If the period from identifying the problem to repairing the problem is 3 days or more, check daily pullout sheets for those days to determine if FAST placed this vehicle in service
2. Review of vehicle operational status sheets:
    - Review daily sheets to see if buses were listed as unavailable owing to wheelchair lift problem
    - Check daily pull-out sheets to see if FAST placed this vehicle in service

Maintenance Records versus Pullouts

There were over 1,000 maintenance work orders in calendar year 2009 for the combined fixed route and paratransit fleet. Using the maintenance MIS, FAST identified 20 work orders that involved the lift or ramp of a fixed route bus. Although work orders have an opening date, a finish date, and a closing date, many work orders include two or more repairs of disparate components, e.g., lift and air conditioning system. It was possible to identify the dates on which a component repair was performed by using a related database that listed labor hours on each day for each work order by the component category. Based on this information, the review team was able to estimate the number of days between the opening of the work order and the completion of work on the lift or ramp; because repairs may have been performed during the third maintenance shift, this estimate may err on the high side in some cases in which repairs were completed before the morning pull-out. Table 4.4 shows the number of repairs by time required to complete the lift/ramp work.

Table 4.4 – FAST Lift/Ramp Repairs: Calendar Year 2009

Days to Repair	Number of Repairs
Same day	5
1 day	3
2 days	2

3 days	4
More than 3 days	6
Total	**20**

Three of the 10 repairs that took three days or longer were for ramp-equipped buses; these ramps can be easily deployed by hand. For the other seven repairs that took three or more days, the review team examined the daily pull-out sheets that show the assignment of the buses to drivers. Based on the maintenance and operations records for buses that had open work orders, FAST did not place a bus in service for 3 or more days when it knew that the lift was not operable.

The second part of the analysis yields a different conclusion, however. Each day the Maintenance Department prepared a Vehicle Operational Status Sheet identifying any vehicle that was not available for assignment to service. The review team examined these sheets for the period from July 1, 2009 through March 2010, as well as a few sheets from the first half of 2009. There were 10 instances, some involving 2 or more successive days, in which one or more vehicles had lift or ramp problems noted in the problem field of the Vehicle Operational Status Sheet. Review team members examined the pullout sheets for these days to see if FAST used the bus.

- In two of those instances the status column said “no go” and the vehicle was not placed in service
- In one instance, the bus was scheduled for periodic maintenance and was not placed in service
- In two instances, status was “if needed”; this notation is potentially inconsistent with the regulations if it led to the bus being placed in service when another vehicle with a working lift was available, but in both cases the bus was not used.
- In two instances, the status column indicated to which routes a bus could be assigned or not assigned (because the lift was unreliable)
    - Bus 656 on 3/19/09: status column notation was “Route 15.” This is a bus route that infrequently has passengers that use wheelchairs, according to FAST staff .
    - Bus 682 on 4/22/09: status column notation was “Route 3 or 4 or spare; not Route 5 runs.” Route 5 serves the Veterans Administration hospital on 60-minute headways.
- Bus 656 was on the Status Sheet with a lift problem from mid-May 2009 to early October 2009; it was placed in service on most days but not daily. It was assigned to Route 15. According to the Automotive Technician Supervisor, the lift on this bus had an intermittent short circuit that made the lift unreliable until it was finally repaired in October 2009. This bus was not in service during the period of the work order in which this repair took place.
- After mid-September 2009 there were no instances of placing into service a bus with a lift problem noted on the Vehicle Operational Status Sheet.

Until September 2009 there appeared to have been a practice of assigning buses that had lifts that were known to be inoperable or that had a high likelihood of being inoperable. This practice is a repeated violation of the DOT ADA regulations. The practice may have been due to a lack of spare buses, a situation that was relieved by the arrival of the 2009 Fords and Gilligs in the summer of 2009. Whatever the cause, this practice is contrary to the DOT ADA regulations and is not permitted.

Vehicle Inspections

The review team inspected three buses representing each type of fixed route vehicle operated by FAST.

As shown in Table 4.5, vehicles were inspected to determine whether their designs meet the requirements of Subpart B of 49 CFR Part 38, the ADA Accessibility Specifications for Transportation Vehicles. This portion of the ADA regulations applies to all new, used, or remanufactured buses. Vehicles purchased by public as well as private entities operating services covered by the ADA, regardless of whether or not they receive federal funding, must comply with these specifications.

Table 4.5 – FAST Buses Inspected

Model Year	Make	Description	Length (ft)	Vehicle ID
1999	Nova	RTS high floor; rear door lift	35	650
2008	Gillig	Low floor, front door ramp	35	704
2009	Ford	E-450 LTV, rear door lift	25	400

The components addressed in the bus inspections included:

- Lifts/ramps
- Securement areas
- Other accessible features (e.g., doors, steps, floors, handrails, communication devices)

The review team used a Bus and Van Specification Checklist to record the observations for each bus (see Attachment L). The bus models that were inspected meet the ADA Accessibility Specifications except as noted below. The 2008 Gillig low-floor bus met all specifications.

1999 Nova, High Floor

- The handrail height on the lift platform ranges from 28.5 to 30 inches, below the allowable range of 30 to 38 inches.
- The securement area sign reads “Wheelchair securement” but does not explicitly indicate that the area is reserved for passengers with wheelchairs or other mobility aids. Although Section 38.27(b) reads “Each securement location shall have a sign designating it as such,” the intent is to instruct other passengers to move when the securement area is needed.
- The priority seating sign is a card mounted in the advertising band but is not located over a front-facing seat; at least one front-facing seat must be so designated.
- Although the vehicle chosen for inspection had operable front and side destination signs, similar vehicles were observed during pullouts with a side destination sign that was not illuminated.

2009 Ford LTV, high floor

- Wheelchair securement area sign reads “This area for forward facing wheelchair securement only.” This sign (which appears to be the manufacturer’s label to instruct the transit agency on proper use) may confuse bus passengers, who may use the seats except when the area is needed by a passenger with a wheelchair or other mobility aid.

5 Findings and Recommendations

5.1 Findings

This chapter summarizes the findings made as a result of the review. Findings denote deficiencies in ADA compliance or topics on which FTA requires additional reporting to ensure an ADA compliance issue does not exist. Findings shall always require corrective action and/or additional reporting. Recommendations are statements detailing suggested changes to policy or practice to ensure best practices under the ADA. The basis for findings and recommendations are detailed in the previous sections.

Customer Complaints and Comments

1. FAST did not systematically record complaints and retain these records. In addition, the complaint records that existed did not consistently document the action taken in response to the complaint or indicate if FAST notified the complainant of the outcome. To meet its obligations under Section 27.121(b) of the DOT ADA regulations, FAST must retain copies of all complaints for one year and summaries of all complaints for five years.

Use of Buses with Inoperable Lifts

1. On several occasions from March to September 2009, FAST placed into service buses that were listed on its daily Vehicle Operational Status Sheet as having lift problems. These buses did not have open repair orders but were known to have unreliable lifts based on their repair records. This appears to have been a practice when spare buses with working lifts were unavailable up until early fall 2009 when new vehicles replaced some of the buses with chronic lift problems. Placing such buses in service for more than three days or when a spare bus is available is a violation of DOT ADA regulations Section 37.161(e).

Bus Operations

1. FAST does not have a written procedure regarding provision of alternative transportation in cases where an in-service lift failure occurs and headways exceed 30 minutes. This practice is required by 49 C.F.R. 37.163(f) of the DOT ADA regulations, and is particularly important in a system where most headways are 60 minutes. To meet its obligations under Sections 37.163(f) and 37.173 of the DOT ADA regulations, FAST must develop a procedure for the provision of alternative transportation and ensure that drivers are trained to proficiency on it.

Vehicle Specifications

The vehicles in FAST's fleet comply with DOT ADA specifications except as noted.

1. On the Nova model year (MY) 1999 buses:
   - The handrail height on the lift platform ranges from 28.5 to 30 inches; under DOT ADA regulations at 49 C.F.R. Section 38.23(b)(13), the allowable range is 30 to 38 inches. On the 1999 Nova buses, FAST should adjust the handrail on the lift platform to a proper height of 30 to 38 inches.
   - The priority seating sign is a card mounted in the advertising band but is not located over a front-facing seat; under DOT ADA regulations at 49 C.F.R. Section 38.27(a) at least one front-facing seat must be so designated. On the 1999 Nova buses, FAST should

place a priority seating sign adjacent to the most forward front-facing seat,

- Although the vehicle chosen for inspection had operable front and side destination signs consistent with DOT ADA regulations at 49 C.F.R. Section 38.39, similar vehicles were observed during pullouts with a non-illuminated sign on the side. FAST should make sure that the front and side destination signs are working properly on the 1999 Nova buses.

2. On the 2009 Ford LTV, the wheelchair securement area sign reads "This area for forward facing wheelchair securement only." The sign may confuse bus passengers, who may use the seats except when the area is needed by a passenger with a mobility device.

5.2 Recommendations

FTA makes the following recommendations to address the needs for corrective action in the findings presented above. FAST does not have to follow these specific recommendations and may address the findings in other ways.

Customer Complaints

1. The complaint records that existed did not contain any complaints about fixed route service within the 12 months prior to the review. While the lack of complaints may indicate a high level of customer satisfaction, it may also indicate that many customers do not understand how to make a complaint or what to expect if they do so. There was no specific complaint link on the FAST website that invites comments and complaints or instructs customers how to enter a complaint. Encourage and facilitate customer comments and complaints by placing a link for this purpose on their website home page and posting notices on buses and at the Transit Center. Many transit agencies have top-level website links to a complaint form with instructions regarding what information to provide with the complaint and what follow-up to expect.

Use of Buses with Inoperable Lifts

1. Ensure that vehicles with inoperable lifts are listed on the Vehicle Operational Status Sheet as not available—without remarks indicating that it can be assigned "if needed" or can be assigned to routes with less likelihood of a passenger who uses a wheelchair or other mobility device, and that listed vehicles are not placed in service.
2. In four instances of repair orders involving ramps, buses with fold-out ramps were allowed to enter service after repairs were scheduled. This would not violate the DOT ADA regulations, provided that the driver manually deploys the ramp whenever it is needed, which can be done without difficulty with this type of ramp.

Pull-out Inspections

1. Nine of the 12 drivers checked the wheelchair securements, which were present and functional. Remind drivers to check the wheelchair securements as part of their pre-trip inspections.
2. Nine of the 12 drivers checked the kneeling feature, all of which were functional. Remind drivers to check the kneelers as part of their pre-trip inspections.

3. Nine of the 12 drivers checked the PA system and eight of those nine buses had a functional PA. Remind drivers to check the PA system as part of their pre-trip inspections.
4. Two of the 12 vehicles had passenger restraints that were noticeably dirty. Direct vehicle maintenance staff to inspect and when necessary, clean or replace dirty passenger restraints.
5. Eleven of 12 buses had functional audible and visual stop request indicators. Direct vehicle maintenance staff to check, and when necessary, repair or replace audible and visual stop request indicators.
6. Two of the 12 buses had at least one destination sign that was not illuminated and legible. Direct vehicle maintenance staff to inspect, and when necessary, repair or replace destination signs.

Bus Operations

1. FAST staff held monthly safety meetings with drivers, where they briefly discussed ADA issues that arose in the previous month, but there was no regularly scheduled refresher training for all drivers. Consider instituting a periodic refresher course in ADA topics and skills for all drivers. A summary sheet should be used to record when each driver last received training.
2. FAST uses its supervisors to monitor driver performance and does not conduct covert observations. Supervisor ride-alongs are useful in identifying issues that stem from misunderstanding FAST policies and procedures and ADA requirements, but are less useful than covert monitoring in assessing general driver performance because supervisor monitoring typically does not identify driver performance issues that occur when supervisors are not present. Consider the use of covert observers to monitor driver performance with respect to ADA requirements.
3. FAST used a system of progressive discipline, primarily in response to incidents and substantiated customer complaints. FAST reported no disciplinary actions related to ADA in the 12 months prior to the review, and this may indicate the need for increased and/or covert monitoring to determine whether infractions are occurring but not being reported. Instituting occasional covert monitoring would provide a more accurate picture of actual driver performance when supervisors are not known to be observing. Discipline could then be applied when infractions are observed or complaints are substantiated.

Maintenance of Lifts and Other Accessibility Features

1. The assignment of single work orders for several components of a vehicle made it more difficult to determine how long lift repairs take to be completed. This makes it more likely that FAST managers are not always aware of the time of lift repairs. Consider separating work orders for repair of lifts from other unrelated work so that the duration of the lift repair can be monitored.

Budget and Resources

1. Consider taking action to reduce turnover in drivers and the need for overtime.
2. FAST should ensure that all new drivers receive training in sensitivity to passengers with disabilities, as well as training in boarding and securing passengers who use mobility aids.

Vehicle Specifications

1. On the 1999 Nova buses, the securement area sign reads “Wheelchair securement” but does not explicitly indicate that the area is reserved for passengers with wheelchairs or other mobility aids. FAST should consider re-wording the sign in the securement area to indicate that the area is reserved for passengers with wheelchairs or other mobility aids. In addition, a permanently affixed sign or decal would eliminate the problem of the sign being inadvertently moved from its proper location.
2. On the 2009 Ford LTV, the wheelchair securement area sign reads “This area for forward facing wheelchair securement only.” The sign may confuse bus passengers, who may use the seats except when the area is needed by a passenger with a mobility device. FAST should re-word the sign in the wheelchair securement area so that passengers who do not use a mobility device understand that the seat is also available to them. The wording used on securement area signs on other models in FAST’s fleet is acceptable and less likely to be confusing to passengers.

Attachment A

FTA Notification Letter

U.S. Department
Of Transportation
Federal Transit
Administration

Headquarters

East Building, 5th Floor - TCR
1200 New Jersey Ave., SE
Washington, D.C. 20590

February 17, 2010

Mr. Ron Macaluso
Director
Fayetteville Area System of Transit
455 Grove Street
Fayetteville, NC 28301, (910) 433-1747

Dear Mr. Macaluso:

The Federal Transit Administration (FTA) is responsible for ensuring compliance with the Americans with Disabilities Act of 1990 (ADA) and the Department of Transportation's (DOT) implementing regulations at 49 CFR Parts 27, 37, and 38, as they relate to public transportation. As part of our ongoing oversight efforts, FTA's Office of Civil Rights conducts a number of on-site compliance reviews of fixed route transit providers. Fayetteville Area System of Transit (FAST) has been selected for such a review.

The focus of the fixed route lift maintenance and reliability review will be FAST's compliance with the DOT ADA regulations applicable to the maintenance, reliability, and usage of accessibility equipment. Section 37.161 mandates that transit service providers maintain in operable condition features required to make vehicles readily accessible by individuals with disabilities. When accessibility features are out of order, they must be promptly repaired. Such features include, but are not limited to, wheelchair lifts. Additionally, Section 37.165 addresses the use of wheelchair lifts and securements. These are some, but not all, of the regulations that you re required to meet to be in compliance with the ADA and implementing regulations

The overall review process will consist of the collection of data prior to the visit, an on-site review of FAST's fixed route stop announcements, an opening conference after on-site observations have commenced, and an exit conference. The entire on-site portion of the review will be completed within four days. FTA has engaged the services of Planners Collaborative, Inc. (PCI) of Boston, MA, to conduct the compliance review. Representatives of PCI and FTA will participate in the exit conference. Susan Clark, the Program Manager for FTA's ADA reviews, has contacted your office to schedule a telephone call to notify you of the on-site visit and to confirm **Monday, March 22, 2010,** for commencement of the on-site visit.

We request **1:00** p.m. for the opening conference. This will provide an opportunity for an introduction of the FTA representatives and members of the review team to members of your organization, including you or your designee, the bus fleet service manager, the ADA

coordinator, and other key staff. During the opening conference, the review team will present an overview of the on-site review.

Because the members of the review team will be spending considerable time reviewing the FAST's fixed route service, it would be helpful if you could provide them with temporary identification to permit easy system access. We also request that you identify a FAST staff contact to coordinate the on-site review and address questions that may arise during the review. In addition, we request that a work area be made available to the team in the building where the opening and exit conferences take place.

In order that we may properly prepare for the on-site visit, we request that you provide the information outlined in the enclosure to this letter within 21 calendar days of the date of this letter. These materials should be forwarded to:

Jim Purdy
Planners Collaborative, Inc.
122 South Street
Boston MA 02111
617-338-0018 x17
617-338-4228 fax
jpurdy@thecollaborative.com

We request that the exit conference be scheduled for **2:00 p.m.** on **Thursday, March 25, 2010.** This conference will afford an opportunity for the reviewers to discuss their observations with you and your organization. We request that in addition to yourself or your designee, the bus fleet service manager, the ADA Coordinator, and other key staff attend the exit conference. Findings will be made by the FTA Office of Civil Rights and provided to you in a written draft at a future date. You will then have an opportunity to provide comments before the report becomes final. When the report is provided to you in a written draft, it will be a public document and subject to release consistent with the Freedom of Information Act upon request.

FAST staff are welcome to accompany the review team during the review, if you so choose. We welcome your suggestions and encourage your participation in the review by asking questions or commenting on any issues you may feel are relevant. If you have any questions or concerns prior to the site visit, please contact Susan Clark, FTA Equal Opportunity Specialist, at 202-493-0511 or at her mail address: sue.clark@*dot.gov*. You may also contact Jim Purdy, of PCI, whose contact information is above.

Thank you for your assistance and cooperation as we undertake this process together. We look forward to a meaningful and successful review.

Sincerely,

Cheryl L. Hershey, Director
FTA Office of Civil Rights

Enclosure

cc: Yvette G. Taylor, FTA Region IV Administrator
Frank Billue, FTA Region IV Civil Rights Officer
Dudley Whyte, FTA Region IV Director of Operations & Program Management
Jim Purdy, PCI

Attachment B

On-Site Review Schedule

ADA Fixed Route Lift/Ramp Service Review

Fayetteville Area System of Transit (FAST)

Fayetteville NC

March 22-25, 2010

SCHEDULE

Time	Activity	Who	Where
Monday March 22, 010			
1:00 PM	• Opening Conference (requires conference call connection to FTA)	FTA, FAST, Review Team	FAST
2:00 PM	• Review operating policies and procedures, fleet information, maintenance, service issues and monitoring.	Purdy/ FAST managers	FAST
2:00 PM	• Interview customer service supervisor/representative and review details of recent lift/ramp accessibility-related complaints	Hersey, FAST customer service	Same as above
2:00 PM	• Review plans and budget for bus fleet replacement, facilities and lift/ramp maintenance program	Purdy, managers	Same as above
Tuesday March 23, 2010			
4:30 AM-6:30 AM	• Observe ramp, lift and kneeler cycling	Review Team	FAST
8:00 AM-10:30 AM	• Interview maintenance supervisor/staff • Review lift/ramp maintenance procedures and records • Interview operations supervisor re discipline, and review records	Purdy, FAST maintenance supervisor	FAST
8:00 AM-10:30 AM	• Interview safety/training supervisor • Review operator training program	Hersey, FAST training supervisor	FAST
10:30 AM 12:00 AM	• Inspect buses	Purdy & Hersey, FAST personnel	FAST
11:00 AM-1:00 PM	• Interview bus operators	Hersey, bus operators	FAST
1:00 PM-4:00 PM	• Analyze & tabulate data	Review Team	FAST
1:00 PM-4:00 PM	• Ride-alongs with wheelchair user	Hersey/Purdy, customer	TBD
Wednesday March 24, 2010			
8:00 AM-1:00 PM	• Continue review of lift/ramp maintenance records and pull-out data, road call data	Purdy, FAST maintenance personnel	FAST
8:00 AM-1:00 PM	• Alternate times for bus inspections, bus operator interviews, other data collection	Purdy, Hersey, bus operators	FAST
1:00 PM-4:00 PM	• Analyze & tabulate data	Review Team	FAST
1:00 PM-4:00 PM	• Ride-alongs with wheelchair user	Hersey/Purdy, customer	TBD
Thursday, March 25, 2010			
9:00 AM-1:00 PM	• Final data tabulations & prepare for Exit Conference	Review Team Members	FAST
1:00 PM	• Exit Conference (requires conference call connection to FTA)	FTA, FAST, Review Team Members	FAST

Attachment C

FAST Response Letter

[Final Report only]

City of Fayetteville North Carolina

TRANSIT

November 14, 2011

John R. Day
ADA Team Leader
Federal Transit Administration
Office of Civil Rights1200 New Jersey Avenue S.E.
Washington, DC 20590

RE: ADA Review of Lift Reliability and Maintenance
March 22-25, 2010

Dear Mr. Day:

As requested we have reviewed the draft report of FTA's ADA Review of Lift Reliability and Maintenance for Operation of Fixed Route Bus Service of the Fayetteville Area System of Transit (FAST). Below please find the comments of FAST staff on the Lift Reliability Review conducted in March 2010:

Pages 5 & 7 – The report notes Ronald Macaluso as (former) FAST Director. Please note Rosann Christian and Donald Pike have also left FAST so they should be noted as "former" to be consistent.

Page 14 – the DVCR was replaced about this same time as the review with a Daily Vehicle Inspection Report (DVIR) That is what we are using today.

Page 15 – last paragraph under vehicles – Five (5) low-floor Gillig hybrid-powered buses were on order to be delivered near the end of 2010 (the report says three (3)). These are now in service.

Page 19 (continuing on page 20) - the paragraph beginning with "Table 4.3" and following indicates that the kneeling feature was not functioning on two (2) buses. As noted in Table 4.3 the kneeler worked on 9 of 9 (100%). The two other vehicles (LTVs) were not equipped with the kneeling feature.

Thank you for this opportunity to review. We are ready to provide responses of actions taken since the review when the final report is issued. Please call me at 910-433-1011, if you have further questions or need more information or clarification.

Sincerely,

Randall J. Hume
Transit Director

CC: Aaron Meyers, FTA

455 GROVE STREET
FAYETTEVILLE, NC 28301
(910) 433-1743 • FAX (910) 433-1064
www.cityoffayetteville.org
An Equal Opportunity Employer

Attachment D

FAST and City of Fayetteville Complaint Forms

City of Fayetteville North Carolina TRANSIT

Report of Complaint

Route No: _____ Run No: _____

Bus No: _____ Operator's Name: _____

Date: _____ Time: _____

Location: _____

Direction bus was going: _____

Name and address of party complaining: _____

_____

Phone No: _____

Particulars: _____

_____

_____

_____

_____

_____

Received by: _____ Date: _____

Investigated by: _____ Date: _____

Disposal of complaint: _____

_____

_____

_____

TRANS-108 (2/2/09)

CITY OF FAYETTEVILLE AMERICANS WITH DISABILITY ACT (ADA) COMPLAINT PROCEDURE

Any person who wishes to file a complaint against the City of Fayetteville for an alleged violation(s) of provisions of the Americans with Disabilities Act may do so by contacting the City's ADA Coordinator, Ron McElrath, at (910) 433-1696, or by visiting the Fayetteville-Cumberland County Human Relations Department at 433 Hay Street.

Forms on which to file your complaint will be provided, or if necessary your complaint will be heard verbally. A record of your complaint and the action taken will be maintained in the ADA Coordinator's office. The designated ADA Coordinator will contact you regarding your complaint within 10 business days of being filed.

CITY OF FAYETTEVILLE, NORTH CAROLINA
AMERICANS WITH DISABILITIES COMPLAINT FORM

Date _____ CASE #

1	Name _____ Telephone Number _____ Address _____ City _____ State _____ Zip Code _____
2	Please indicate in writing (verbally, if unable to communicate in writing) your concern or complaint and indicate the approximate time, date and location of the occurrence. (If additional space is needed, please attach extra sheets.) _____ _____ _____ _____ _____
3	What do you think would resolve the problem or complaint? _____ _____ _____ _____ _____
4	Privacy Act Statement: The Fayetteville-Cumberland County Human Relations Department is authorized to review and discuss any records that pertain to me. The respondent is authorized to receive a copy of my complaint. I swear or affirm that I have read the above information and that it is true to the best of my knowledge, information and belief.

Signature of Complainant _____

Intake Officers Summary & Recommendation

5

To: ADA Coordinator

From: ADA Department Representative _____ Date _____

Other Staff Contact _____ Date _____

Summary of Interview:

_____

_____

_____

_____

_____

Recommendations:

_____

_____

_____

_____

_____

6

Recommendation is Approved ____ Recommendation is Disapproved ____

Assigned To: _____ for appropriate action.

Date Assigned: _____

Comments:

_____

_____

_____

_____

7

Date Case Completed: _____

Investigator: _____ Director: _____

Attachment E

FAST Policies and Procedures on Wheelchair Lifts and Securement

FAYETTEVILLE AREA SYSTEM OF TRANSIT
455 GROVE STREET
FAYETTEVILLE, NORTH CAROLINA 28301

Transit Department Supplemental Administrative Policies/Procedures Manual

SUBJECT:	SAFETY-SEAT BELT USE AND WHEEL CHAIR SECUREMENT	SECTION:	3.03 Safety
EFFECTIVE DATE:	November 17, 2009		
APPROVED BY:			
APPROVAL DATE:	November 17, 2009		

DIRECTIVE:
To establish guidelines and procedures, in order to facilitate full compliance with all Federal, State, and Local laws and to ensure the safety of our customers and our employees.

PROCEDURE:
While operating F.A.S.T. owned/operated vehicles, F.A.S.T. employees shall be responsible for the proper use of all safety-seat belt and wheelchair securement systems/devices and in accordance with the following vehicle operation guidelines:

I. While operating the following F.A.S.T. owned/operated vehicle types:

1) Passenger car/truck/SUV
2) FASTTRAC! / ADA Paratransit Van/Cut-A-Way Van/LTV

ALL vehicle occupants must have his/her safety-seat belt fastened BEFORE vehicle movement/operation is permitted. All wheelchairs and mobility devices must be properly secured, using the Four (4) point tie-down system, BEFORE vehicle movement/operation is permitted. All vehicle occupants, wheelchairs, and mobility devices must remain secured and restrained during all vehicle movement/operation. In addition, children under the age of four (4) and/or under forty (40) pounds must be properly secured in accordance with the manufacture's instructions in a child restraint system that meets federal motor carrier vehicle safety standards. The provision for and securement of child safety seats and/or equipment shall be the responsibility of the child(s) guardian, parent or companion.

II. While operating the following F.A.S.T owned/operated vehicle types:

1) Fixed Route Cut-A-Way Bus/ LTV
2) Fixed Route Bus

All wheelchairs and mobility devices must be properly secured, using the Four (4) point tie-down system, BEFORE vehicle movement/operation is permitted. Wheelchair occupants and mobility aid users shall be offered the use of vehicle installed safety-seat belt restraint. ONLY the operator of the vehicle is mandated and must have his/her safety-seat belt fastened at all times while the vehicle is in motion.

Authorization:
F.A.S.T employees are not permitted to make exceptions to the above stated procedures without prior consent from the Transit Director. Failure to comply with these guidelines may result in disciplinary action up to and including Consideration of Dismissal.

Acknowledgement:

I acknowledge I have received F.A.S.T. Supplemental Policy, Section 3.3 Safety: **Safety-Seat Belt Use & Wheel Chair Securement**

_____ _____
Employee Printed Name Employee Signature

_____
Date

F.A.S.T.
Lift Maintenance Procedure

DATE: 7/01/2008

FROM: Juan J. Larregui, Automotive Supervisor

TO: All Maintenance Personnel

RE: Vehicle Lift Repair

The following is the vehicle lift maintenance procedure to be followed by FAST maintenance personnel whenever a problem with a vehicle lift arises.

- **Morning Pre-Trip**: Before all lift equipped vehicles leave the yard for revenue service, the lift must be cycled by the operator and observed by a Transit Supervisor and a maintenance technician. If a problem with the lift is encountered at that time, the maintenance technician proceeds to make the necessary repairs, if possible, to include switching the vehicle to make sure the route starts on schedule. The problem vehicle will remain out of service until the repairs are completed. A work order must be created if the vehicle is brought in the shop for repairs.
- **While In Service**: The Operator will radio the Dispatcher to inform them of a lift malfunction. The Dispatcher will attempt to assist the operator over the radio to make sure all the proper steps were taken regarding lift operation. The Maintenance shop will also monitor the radio regarding the lift problem, and provide further troubleshooting advice. If the problem remains, either a Supervisor (if in the vicinity) or a maintenance technician will be sent to the vehicle to make the repair. If a repair cannot be made at the site, the vehicle will be replaced with a spare vehicle and the one with the lift problem will be returned to the garage for repair.
- **After Lift Repairs Completion**: Once the repairs are completed by the maintenance technician, the lift problem will be removed from the comments section of the daily Vehicle Operational Status sheet so the Supervisors know the vehicle can be scheduled back into revenue service.

Our fleet is made up of 35' Transit Buses (Gillig & Novas), 20 & 25' LTV Cut-Aways (El-Dorado Transtech) and Conversion Vans (Ford E-350). The Gillig buses are equipped with a ramp in the front of the vehicle that can be operated manually in case a ramp malfunction arises. The Operators are trained on this procedure, so no immediate assistance is required at any time. The Operator does report the problem to the Dispatcher so we can either switch the vehicle with a spare one or write it on a defect sheet so it can be repaired at the end of the shift. The 20'/25' LTV Cut-Away & Conversion Vans are equipped with a manual back up lift pump that can be used to load and unload a passenger in case of a lift malfunction. Once the passenger is taken care of, the Operator will radio the Dispatcher to inform them of the problem and arrangements will be made to have the vehicle replaced with a spare one, so the vehicle with the lift problem can be brought to the shop for repairs. The 35' Nova buses are equipped with a rear fold out step lift that can not be operated manually by the Operator so the **While In Service** procedure described above must be followed whenever a problem arises.

Garage Repair Procedures

A vehicle with a malfunctioning lift will be kept out of service until the necessary repairs are made by the maintenance personnel. Also, any lift problems with vehicles that are under warranty, must be addressed by following the corresponding warranty procedures depending on the vendor. In some cases, parts are sent to the maintenance shop, so we can make the repairs or a field tech will be scheduled to make the repairs on site.

When ever a vehicle lift is down due to parts or waiting outside service, a notification will be put on the daily **Vehicle Operational Status** sheet to make sure it **does not get scheduled for revenue service**.

These procedures must be following at all times to ensure proper compliance to FTA & ADA vehicle lift requirements.

Juan J. Larregui

Automotive Supervisor

Attachment F

FAST ADA Training Materials

ADA Law

The Americans with Disabilities Act (ADA) prohibits discrimination against people with physical or cognitive disabilities. A disability is defined as a permanent or temporary physical or mental impairment that substantially limits one or more major life activities. The ADA law also protects those who have a record of, or who are regarded as having, such an impairment.

Federal law mandates providing accessible transit service to people with disabilities.

Notes:

BE AWARE

Not all disabilities and signs of aging are visible. Many disabilities are hidden.

Visible signs:

- ☒ Mobility aids (wheelchair, walker, cane, 3-wheeled scooter);
- ☒ Guide or companion dog, other service animals;
- ☒ Hearing aids;
- ☒ Speech that is slow or impaired;
- ☒ Use of an oxygen tank cart;
- ☒ Physical movement that is slow, deliberate, erratic or irregular.

Less obvious signs:

- ☒ Physical disabilities such as a heart condition, diabetes, ability to walk or stand for only a short time, sensitivity to heat or cold, etc;
- ☒ Cognitive disabilities such as inability to read, inability to process information such as naming things, dyslexia, impaired short-term memory, etc.

What can you do if you sense a person might have a disability?

- ✓ Speak clearly and distinctly, while facing the customer;
- ✓ Write down what you said on a pad of paper;
- ✓ Assist them in boarding and alighting;
- ✓ Write down simple directions or instructions;
- ✓ Draw a picture;
- ✓ Augment your speech with hand gestures or body language.

PROVIDING ASSISTANCE

ADA requires operators to assist persons with disabilities whenever they request help with the boarding and alighting process.

Anticipate your customers' needs. Always ASK if they need help.

Things that can be done to assist:

- ☒ Kneel bus;
- ☒ Deploy lift or ramp;
- ☒ Allow time to be seated;
- ☒ Secure mobility devices (e.g. wheelchair, scooter);
- ☒ Keep priority seating clear.

Notes:

ANNOUNCE STOPS

Bus operators are required under the ADA regulation to announce stops. Although you may think this is not necessary because you do not have a blind customer on board, you may not know if you have cognitively- impaired customers who cannot read, or a sight- impaired person with seriously degraded fields of vision on board.

Items to remember:

- ☒ Announce stops loudly and clearly;
- ☒ Check PA during your pre-trip inspection, before leaving the terminal;
- ☒ Announce stops, transfer points, landmarks and major intersections.

Notes:

ANSWERING QUESTIONS AND PROVIDING INFORMATION

Speak clearly, distinctly, and directly to the person when talking and answering questions. Do not embarrass customers with disabilities in any way. Treat them as you would any other customers.

How can you be sure your communications are understood?

- ☒ Form your words clearly and slowly;
- ☒ Face directly toward the person;
- ☒ Watch to make sure the person follows the directions given.

Look directly at the customer so that a hearing-impaired customer may read your lips and watch your eyes and body language for clues.

Notes:

CUSTOMERS WITH VISUAL IMPAIRMENTS

If you see a person with a white cane or guide dog or suspect that a person waiting at a bus stop is blind follow these tips:

- ☒ Place the bus slowly and properly in the bus stop;
- ☒ Park close to the curb and look for hazards;
- ☒ Announce your route and destination;
- ☒ Use your voice to help guide the customer to the door;
- ☒ Ask able body passengers to move from priority seating;
- ☒ Ask blind persons where they would like to alight;
- ☒ Announce stops;
- ☒ Verbally guide them to an empty seat;
- ☒ When there is already a guide dog onboard, let boarding blind persons know there is currently a guide dog on board. Let it be their decision if they wish to board.

ADA law requires the operator to announce all:

Major intersections

Transfer points

Time points

Stops

Major destinations

At sufficient intervals to orient customers

Any stop requested by the customer

If a PA system is available it must be used.

CUSTOMERS WITH HEARING IMPAIRMENTS

Customers with hearing impairments can travel freely on public transit if you give them the assistance they may need.

Tips:

- ☒ Speak directly and slowly to the person;
- ☒ Be prepared to write down the message.

Some customers with hearing impairments may use a service animal.

Notes:

ASSISTING CUSTOMERS IN WHEELCHAIRS

Tips and Requirements:

- ☒ You must ask customers to move from the securement area.
- ☒ Customers in wheelchairs may ride the lift facing either direction.
- ☒ You are required to assist and are responsible for the proper securement of the wheelchair.
- ☒ You must pick-up and alight customers using wheelchairs at all stops on the route.
- ☒ Notify the customer if you feel the stop is unsafe and recommend an alternative stop.
- ☒ In the event of a collision, do not remove customers using a wheelchair unless there is imminent danger.
- ☒ If you are unable to board a wheelchair customer for any reason, you must contact the dispatcher.
- ☒ For their safety, you may request customers using wheelchairs to transfer to fixed seating, but you cannot require it.
- ☒ When necessary, you may deposit the customer's fare into the farebox.
- ☒ An attendant traveling with the customer in a wheelchair is not required to assist you with the boarding, alighting, or securement process.

ASSISTING CUSTOMERS IN WHEELCHAIRS (CONT.)

Securement of the wheelchair includes use of:

- ☒ Wheelchair locks or clamps;
- ☒ Floor tension restraints or straps secured to the frame (not the wheels) of the wheelchair;
- ☒ A seat belt or lap belt around the customer, which is attached to the wheelchair floor restraint device;
- ☒ A shoulder harness/belt.

It is your responsibility to ensure the wheelchair is secured with all the tie-downs provided by the manufacturer.

Recommend the customer use the shoulder harness. However you cannot require it.

If the lap belt is attached to the floor restraints and is part of the wheelchair securement system, you can require that it be used.

If the wheelchair cannot be secured using the manufacturer's tie-down devices, the dispatcher must be contacted immediately for instructions.

ADA Summary: Bus Operator Guidelines

- ☒ You must provide the same service to a customer with a disability as provided to able-bodied customers.
- ☒ You cannot require a person with a disability to travel with an attendant. A customer with a disability is allowed to have one attendant, for whom no fare is charged.
- ☒ You cannot require customers with disabilities to use priority seating or able-bodied customers to move.
- ☒ Wheelchair lifts and ramps must be cycled daily and records maintained. You are required to check the operation of the lift or ramp and securement devices.
- ☒ Whenever a person with disabilities must be delayed in their travel, it must be reported to the dispatcher.
- ☒ You are required to ensure that the wheelchair is secured.
- ☒ You may recommend that the customer transfer from the wheelchair or 3-wheeled scooter to a normal seat, but cannot require it.
- ☒ You are required to provided assistance, including securing a wheelchair and storing a walker or crutches.
- ☒ You are required to allow customers with disabilities to use the lift or ramp.
- ☒ Customers with disabilities may board the lift facing either direction (Follow lift manufacturer's recommendations).
- ☒ Seat belts and shoulder harnesses must be provided to customers in wheelchairs, but you cannot require the customer to use them.
- ☒ You are required to announce bus stops and transfer points from inside the bus. Outside your bus, you must announce your route number at bus stops and transfer points.

ADA Summary: Bus Operator Guidelines (cont.)

- ☒ You are required to use all accessibility equipment, including the PA system, if the bus is so equipped.
- ☒ Customers with respiratory conditions that require oxygen may bring the oxygen cart aboard and it must be secured.
- ☒ You are required to give customers with disabilities more time to board and alight.
- ☒ You must permit service animals to board the bus.
- ☒ You must be trained in issues relating to disability awareness and sensitivity, and customer assistance techniques.

QUESTIONS

Which stops are you required to announce under the Americans with Disabilities Act?

Are younger customers sitting in the priority seating required to move if requested?

When should you kneel the bus for customers?

When are you required to assist a customer in the securement of a wheelchair?

When are customers in wheelchairs required to use the lap and shoulder belts?

Who may use the lift or ramp to board the bus?

The Council for Disability Rights

Advancing rights and enhancing lives of people with disabilities

The Americans with Disabilities Act:
Frequently Asked Questions

What is the ADA?
The ADA is a federal civil rights law for people with disabilities, comparable to civil rights law passed in the 1960s for other minorities. It covers employment, state and local government services, public accommodations, and telecommunications for the deaf.

Why do we need it?
43 million Americans have physical or mental disabilities. Too often they are excluded from the mainstream of American life by attitudes and inaccessible environments. 67 percent of all people with disabilities are unemployed, even among college graduates. The ADA benefits all of us. Each of us has a 20 percent chance of becoming a person with a disability and a 50 percent chance of having a family member with a disability.

Who does the ADA cover?
All people with disabilities, visible and hidden, including:

- a person with a physical or mental impairment that substantially limits one or more major life functions (eating, breathing, caring for oneself, working, walking, etc.), OR
- a person with a record of such an impairment (even if that record is inaccurate), OR
- a person who is regarded as having such an impairment.

Some people are explicitly excluded from coverage, including:

- current users of illegal drugs (but those with a history of drug or alcohol abuse are covered, and an employer may continue to conduct drug tests on employees for illegal drugs.)
- those with "sexual behavior disorders" such as transvestitism or transsexualism, AND
- those who have the conditions of compulsive gambling, kleptomania, or pyromania.

What does the ADA not cover?
Housing except for hotels and other temporary housing (see the Fair Housing Act Amendments), buildings with primarily religious or private functions.

Title II: State and Local Government

What are the requirements for state and local governments?
Are they different from privately owned public accommodations?
Similar to Section 504 of the Rehabilitation Act of 1973, no state or local government entity may discriminate on the basis of disability in its programs or services. In addition to that general prohibition, state and local government entities must assure that all of its programs and services, when viewed in their entirety, are accessible. Thus every program must be accessible, but not every facility must be accessible.

Accessible features must be maintained in working order. All newly constructed or altered streets and walkways must have curb ramps regardless of the source of funding. The requirements apply not only to the state and local government entity, but also any private entity with which the government contracts to provide services. Thus, no government should contract with an entity which is totally inaccessible.

What constitutes discrimination by state and local governments?
Providing unequal, less effective, different or separate aids, services or benefits; providing services through an agency which discriminates; or denying the right to participate in planning or advisory boards are discriminatory. Using criteria or methods of administration, site selection for facilities, and licensing or certification which would have the effect of discrimination on the basis of disability violates the ADA. Services must be provided in the most integrated setting possible. Examples would include using written applications or only providing services in inaccessible locations.

If a government contracts with a private entity, are they subject to Title II?
Yes. If the government contracts with a private entity to provide services, then the delegate agency must comply with Title II (and will also have Title II obligations).

Are there specific requirements for transportation?
Yes. Both Title II and Title III (public accommodations offered for transportation services offered by private entities) provide specific (and lengthy) requirements for transportation services offered by state and local governments and private operators.

In general:

- All new public buses and commuter trains must be accessible (lift-equipped, proper signage, warning symbols, etc.). For those people with disabilities who cannot use mainline transportation, para-transit (door-to-door) service must be offered with service response time, cost and availability comparable to the mainline service.
- At least one car per commuter train must be accessible; key stations must also be accessible.
- Over the road buses (Greyhound) will be "studied."
- All new Amtrak trains must be accessible; one car per train must be accessible; intercity rail stations must be accessible by 2010.
- New buses purchased by private entities not in the business of transportation (e.g., hotel shuttle services, buses offered to tour facilities such as the

Chicago Botanic Garden) which seat more than 16 people (including the driver) must be accessible; if the service is "demand responsive" (available on demand) not all buses need to be accessible. If the buses purchased hold fewer than 16 people, the entity providing the service must assure that the service "when viewed in its entirety" is accessible to people with disabilities. The entity must be able to show that it can meet the demand for its services by people with disabilities within the same time frame as it meets the demand by non-disabled persons.

Are air carriers and airlines covered by the ADA?
Air transportation is not covered by the ADA, but is covered under the federal Air Carriers Act.

Title III: Public Accommodations

What is a public accommodation?
Public accommodations are any place, building, or outdoor space which a member of the public can enter with or without a fee. It does not include "private clubs" (those for which membership must be voted on by other members) and operations owned or operated by religious entities.

Categories of public accommodations listed in the ADA are:

- places of lodging (e.g., hotels, motels)
- establishments serving food and drink (e.g., restaurants, bars)
- places of exhibition or entertainment (e.g., theaters, stadiums)
- places of public gathering (e.g., auditoriums, convention halls)
- sale or rental establishments (e.g., bakeries, clothing stores, video stores)
- service establishments (e.g., professional offices of doctors, dentists, lawyers, gas stations, funeral parlors)
- stations used for public transportation
- places of public display or collection (e.g., museums, gardens, galleries)
- places of recreation (e.g., parks, zoos)
- places of education (e.g., private schools)
- social service centers (e.g., homeless shelters, day care centers)
- place of exercise or recreation (e.g., gymnasiums, golf courses).

What in general must a public accommodation do or not do?
A public accommodation:

· cannot deny goods or services because a person has a disability or is associated with a person with a disability,
· cannot offer only unequal or separate benefits, AND
· must offer services in the most integrated setting possible.

Special programs for people with disabilities can still be offered, as long as the programs offered to all other people are still available to those with disabilities.

DOT ADA Requirements

Nondiscrimination
49 CFR § 37.5(a)

"No entity shall discriminate against an individual with a disability in connection with the provision of transportation service."

Other Nondiscrimination Provisions

- Cannot prevent a person with a disability from using the transportation service for the general public if the individual is capable of using the system. **§ 37.5(b)**
- Cannot require that a person with a disability use the designated priority seating. **§ 37.5(c)**

Other Nondiscrimination Provisions Reasonable Modification

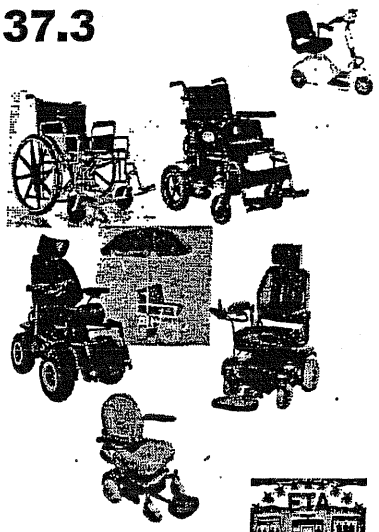
- Although the ADA mandates complementary paratransit service and specific requirements for fixed route service accessibility, transit systems must still modify its services where:

1. Modification is **necessary** for the rider to use the service, **because of the rider's disability**
2. The Modification is **reasonable**
3. Does not constitute a fundamental alteration **or** direct threat

The "Common Wheelchair"

49 CFR § 37.3

- Aid for persons with mobility impairments
- 3 or 4 wheeled device
- Appropriate for indoor use
- No larger than 30 x 48 inches (measured 2 inches above the ground)
- Weighs no more than 600 pounds when occupied



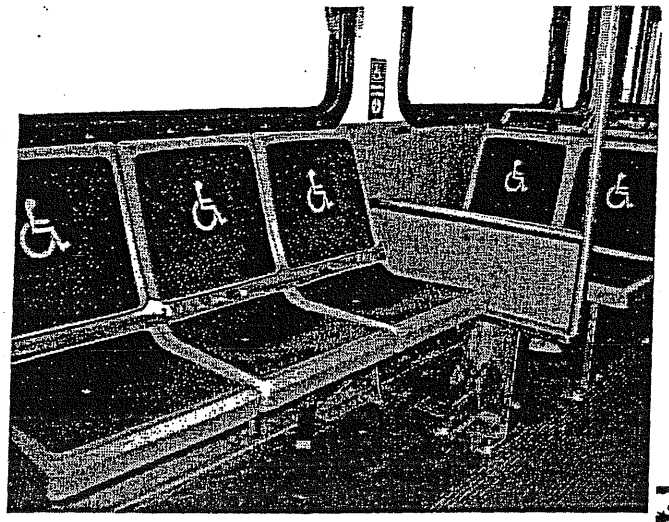
You do not have to transport over "600"

Other Service Requirement

49 CFR § 37.167

- Entity must ensure that operators make use of accessibility features and equipment
- Information regarding transportation services must be made available in usable alternative formats. Drivers are to call out stops.
- Persons with disabilities must be allowed to exit at any stop unless it would damage the lift or there are temporary conditions beyond the entity's control

Priority Seating



Priority Seating

49 CFR § 37.167 and Part 38

- Each vehicle shall contain sign(s) which indicate that seats in the front of the vehicle are priority seats for persons with disabilities
- Include that other passengers should make such seats available to those who wish to use them; should comply with requests by transit provider personnel to vacate their seats to make room for an individual with a disability (buses)
- At least one set of forward-facing seats shall be so designated.

Service Animals
49 CFR § 37.167(d)

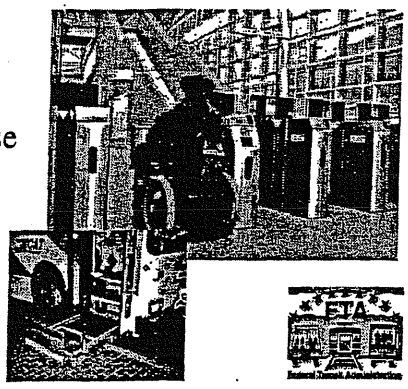
- Follow DOJ guidance (http://www.ada.gov/svcanimb.htm): "...animals that are individually trained to perform tasks for people with disabilities..."

www. project i org.

Maintenance of Accessible Features
49 CFR § 37.161-163

Applies to buses, rail, and all other fixed route. Covers lifts/ramps, securement devices, elevators, signage, public address systems.

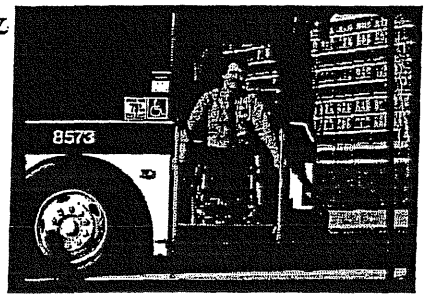
- Must be repaired promptly.
- Must take reasonable steps to accommodate persons with disabilities who would otherwise use the feature.
- Does not prohibit isolated or temporary interruptions due to repair or maintenance.



Keeping Lifts Operable
49 CFR § 37.163

Public/non-rail entities must:

- Establish system of regular & frequent maintenance checks
- Report failures as soon as possible
- Provide alternative transportation if the headway to the next accessible vehicles exceeds 30 minutes



Keeping Lifts Operable
49 CFR § 37.163

POPULATION > 50K

If there is no spare -

May keep the vehicle in operation for no more than **3** days from the date the lift is discovered to be inoperative.

POPULATION < 50K

If there is no spare -

May keep the vehicle in operation for no more than **5** days from the date the lift is discovered to be inoperative.

Wheelchair Lift & Securement Requirements

- Securement systems on all accessible buses **§ 37.165**
- Transport all common wheelchairs **§ 37.165(b)**
- Establish a policy to secure all wheelchairs, or transport wheelchairs unsecured **§ 37.165(c)(3)**
- May not refuse to transport person because the chair cannot be satisfactorily restrained **§ 37.165(d)**

Wheelchair Lift & Securement Requirements

- Must secure wheelchair upon request **§ 37.165(f)**
- Must assist with securement systems, ramps and seatbelts upon request **§ 37.165(f)**
- Must allow standees to use the lift on request **§ 37.165(g)**
- May require wheelchairs to remain in designated securement locations; persons <u>may</u> transfer, however may not require person to transfer **§ 37.165(b),(e)**

Effective Practice

- Tri-Met Shared Bus Stop Procedure:
- Pulling forward to the first position and making external announcements are essential to ensuring that intending customers, especially those with visual impairments or other disabilities, board the correct bus.

Training to Proficiency

49 CFR § 37.173

- Ensure that personnel are trained appropriate to their duties
- Operate vehicles and equipment safely
- Properly assist riders with disabilities with courtesy and respect
- With attention to the differences among riders with disabilities

FAYETTEVILLE AREA SYSTEM of TRANSIT

Gillig Bus Operation Training

This form is to acknowledge that you have been trained in the operation of the new 35' LF Gillig Bus. All operators and maintenance personnel must complete this training prior to operating this vehicle. Is the employee responsibility to continue to properly operate this vehicle on a daily basis to the best of his/her ability. If additional training is needed the employee musty request the training from a supervisor.

Task	**Training Date**	**Employee Initial**
Pre-Trip Inspection	_____	_____
Engine Start Up	_____	_____
Warning Gauges	_____	_____
Seat/Steering Adjustment	_____	_____
Sun Screens	_____	_____
Lights/Turn Signals	_____	_____
Climate Control	_____	_____
Kneel & W/C Ramp	_____	_____
Wipers/Mirrors	_____	_____
Destination Sign	_____	_____
Door Operation	_____	_____
Parking Brake	_____	_____
Trans Shifter	_____	_____
W/C Securement	_____	_____
Road Test/Retarder	_____	_____
Battery Disconnect	_____	_____

Employee Signature_____ Date_____/_____/_____

Trainer Signature _____ Date_____/_____/_____

Attachment G

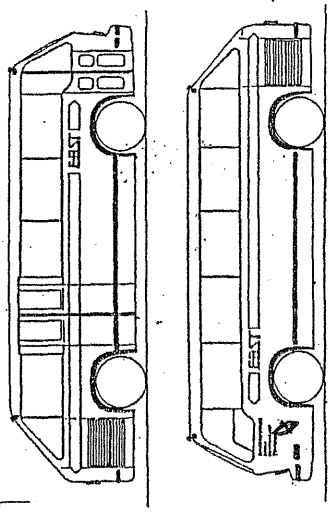
FAST Daily Vehicle Condition Report and Street Supervisor Daily Report

Fayetteville TRANSIT

FAST
Daily Vehicle Condition Report
Precheck at Shop or on Run

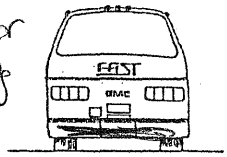
Date 3-4-10
Coach # 636
Run # 914

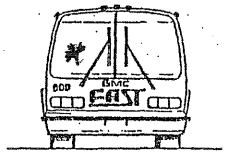
- ☐ Check Notices to Driver Board
- ☐ Start engine, use fast idle
- ☐ Bump tires
- ☐ Observe any damage such as scratches, dents, missing items, etc.
- ☐ Look for oil and water leaks under the coach
- ☐ Check for unlatched windows and interior damage
- ☐ Check all lights, including "tell-tale"
- ☐ Check horn, wipers, and operation of doors
- ☐ Check for air leaks at the doors while holding brake pedal down
- ☐ Operate wheelchair lift one complete time before leaving yard
- ☐ Check brakes!!
- ☐ Replenish inboard route schedules
- ☐ **At the gate,** call dispatcher for radio and time check
- ☐ Defects noted prior to leaving yard _____



Return defect sheet to dispatcher prior to leaving the yard!

- ☐ Defects noted after leaving the yard Seat behind driver not locking. + lift not releasing flap.
- ☐ Defects noted on shift change vehicle. Vehicle # _____





At the end of your shift

Comments: _____

Driver Signature [signature] Dispatcher Int. _____

TRANSIT-013-90 (Rev. 1/11/95)

Street Supervisor Daily Report

OPERATOR AUDIT

Street Supervisor: Ballard **Date:** 3-1-10

Operators Name Graham **Scheduled Sign In Time:** _____

Actual Sign In Time: _____

Location	Scheduled Departure	Actual Departure	Differ	Bus #	Route #	Comments Explanation
Base				634	917	D/R

Wheel Chair Lft Cycled	YES / NO	PASS	FAIL	Comments
Video System	YES / NO	PASS	FAIL	Comments
Fare Box Login	YES / NO	PASS	FAIL	Comments
Destination Signs, Talking Bus, PA Sys	YES / NO	PASS	FAIL	Comments N/A
DVI Report Filled Out	YES / NO	PASS	FAIL	Comments
Driver Appearance Uniform / Carry on Items	YES / NO	PASS	FAIL	Comments

Comments or Explanation.

Wheelchair ~~she~~ box has a short, garage replaced box on the yard.

Supervisor Signature: Ballard Date: 3-1-10

Attachment H

Sample FAST Maintenance Work Order

Work Order Detail for Equipment FAT-656

AssetWORKS

Report Date: 3/4/2010

Work Order: **NFAT01-2008-1295** Status: **CLOSED**

Dept: **FAT-FR - FAYETTEVILLE FIXED ROUTE** Warranty: **NO**

Asset No:		Opened By:	**LSPRUILL**	Date In:	**10-6-2008 12:12 PM**
License:	**95105-R**	Current Equip Status:		Date Due:	**10-6-2008 4:12 PM**
Serial No:	**4RKPNTGA2XR833944**	Account:	**45330**	Opened:	**10-6-2008 12:12 PM**
Job Type:	**REPAIR**	Reference WO:		Finished:	**3-9-2009 1:35 PM**
Meter 1:	**101,871**	Shop Hours:	**1,436.38**	Closed:	**3-13-2009 10:03 PM**
Meter 2:	**0**	User Hours:	**0.00**	Estimated Hours: **0.0**	Warranty Expire:

Priority: **2 - INTERNAL SHOP PRIORITY** Accident:

Incident: Project:

Non Service Request Tasks

Task: **(01-001) Air Conditioning Assembly** Warranty: **NO**

WAC: **06 - INSPECT** Reason: **MA - MALFUNCTION**

Work Class: **2 - NON-SCHEDULED** Comments:

Labor	Labor Hrs	Cost
Emp: **(70543) Spruill, Lettee**	**0.50**	**31.00**

Parts	Qty Issued	Issue Price	Total Cost
(12-00299-01-0) SWITCH; SWTCH A/C LOW PRESS 97-99 NOVA	**1**	**29.00**	**29.00**

Task: **(02-037) Seat Assembly** Warranty: **NO**

WAC: **04 - EXCHANGE - REBUILT** Reason: **MA - MALFUNCTION**

Work Class: **2 - NON-SCHEDULED** Comments:

Labor	Labor Hrs	Cost
Emp: **(70543) Spruill, Lettee**	**0.75**	**46.50**

Commercial	Labor Hrs	Labor Cost	Parts Cost	Misc Cost	Total Cost
Vendor: **(39440) Gonguis Upholstery Shop**	**0.00**	**225.00**	**55.00**	**0.00**	**280.00**

Task: **(39-000) Wheelchair Lift Diagnosis** Warranty: **NO**

WAC: **10 - UPDATE TASK** Reason: **MA - MALFUNCTION**

Work Class: **2 - NON-SCHEDULED** Comments:

Labor	Labor Hrs	Cost
Emp: **(440680) Thrash, C**	**3.28**	**203.36**

Task: **(39-002) Electrical System** Warranty: **NO**

WAC: **10 - UPDATE TASK** Reason: **MA - MALFUNCTION**

Work Class: **2 - NON-SCHEDULED** Comments:

Labor	Labor Hrs	Cost
Emp: **(70543) Spruill, Lettee**	**0.62**	**38.44**
(11279) Morrisey, Michael	**4.48**	**277.76**
(70543) Spruill, Lettee	**0.50**	**31.00**
(70543) Spruill, Lettee	**2.43**	**150.66**
(11279) Morrisey, Michael	**3.25**	**201.50**
(70543) Spruill, Lettee	**1.35**	**83.70**
(11279) Morrisey, Michael	**4.28**	**265.36**
(11279) Morrisey, Michael	**2.43**	**150.66**
(70543) Spruill, Lettee	**1.30**	**80.60**
(11279) Morrisey, Michael	**2.93**	**181.66**
(70543) Spruill, Lettee	**6.17**	**382.54**

Parts	Qty Issued	Issue Price	Total Cost
(G120212-0) NEW PART; SENSOR ASSY-ST STL	**4**	**105.08**	**420.32**
(G120211-0) NEW PART; SENSOR ASSY-ST STL	**2**	**81.73**	**163.46**
(G1016100-0) NEW PART; PROXIMITY SWITCH-PARK SENSE	**1**	**144.14**	**144.14**

Notes

User ID	Comment	DateTime Stamp
LSPRUILL	70543 - VIEWED EQUIPMENT HISTORY	10-6-2008 9:12AM
MMORRISEY	11279 - VIEWED EQUIPMENT HISTORY	10-6-2008 10:18AM
JLARREGUI	67230 - VIEWED EQUIPMENT HISTORY	10-14-2008 7:45AM
JLARREGUI	W/C LIFT NOT GETTING THE FLOOR LEVEL/STEP LOCK SIGNAL. WILL ORDER NEW SENSORS. 147961	10-14-2008 8:04AM
JLARREGUI	HAVE DRIVER SEAT REPAIR AT GOPNGUIS 147963	10-14-2008 11:46AM
JLARREGUI	GONGUIS SEAT REPAIR W.O. IS 147964 NOT 963	10-14-2008 11:47AM
DFLEMING	107182 - VIEWED EQUIPMENT HISTORY	10-16-2008 5:24PM
CTHRASH	440680 - VIEWED EQUIPMENT HISTORY	10-28-2008 2:36PM

Comments:

Internal Parts Cost:	$756.92
Internal Labor Cost:	$2,124.74
Commercial Parts Cost:	$55.00
Commercial Labor Cost:	$225.00
Commercial Misc Cost:	$0.00
Overhead Costs:	$0.00
Sub Total:	**$2,881.66**
Commercial Total:	**$280.00**
Work Order Total:	**$3,161.66**

Attachment I

FAST Fixed Route Fleet Roster

FAST

ROLLING STOCK STATUS REPORT

MB & LTV BUS

As Of 2/28/2010

Qty	Veh #	Year	Make/Model or Veh Description	Date In Service	Out of Service	Fed Useful Life (Yr)	Actual Service (Yr)	Remaining (Yrs)	Remaining % Based On (Yrs)	Actual Mileage	Minimum Useful Life Mileage	Remaining % Based On Miles	Total Federal Share	Remaining FED Share Based On Yrs	Remaining FED Share Based On Miles
1	400	2009	25' FORD E-450 Lift LTV 18-Pass	6/26/2009	In-Service	5	0.92	$ 4.08	81.64%	38,870	150,000	74.09%	$52,849.60	$43,148	$39,155
2	401	2009	25' FORD E-450 Lift LTV 18-Pass	7/13/2009	In-Service	5	0.87	4.13	82.58%	29,323	150,000	80.45%	$52,849.60	$43,641	$42,518.2
3	402	2009	25' FORD E-450 Lift LTV 18-Pass	7/27/2009	In-Service	5	0.83	4.17	83.34%	33,978	150,000	77.35%	$52,849.60	$44,046	$40,878.1
4	403	2009	25' FORD E-450 Lift LTV 18-Pass	11/2/2009	In-Service	5	0.56	4.44	88.71%	18,334	150,000	87.78%	$52,849.60	$46,884	$46,390.0
5	642	1999	35' NOVA BUS RTS	4/23/1999	In-Service	12	11.10	$ 0.90	7.49%	446,618	500,000	10.68%	$250,956.00	$18,793	$26,793.1
6	646	1999	35' NOVA BUS RTS	4/19/1999	In-Service	12	11.11	0.89	7.40%	469,795	500,000	6.04%	$206,114.30	$15,247	$12,451.4
7	650	1999	35' NOVA BUS RTS	5/3/1999	In-Service	12	11.07	0.93	7.72%	413,098	500,000	17.38%	$201,004.34	$15,511	$34,935.4
8	656	1999	35' NOVA BUS RTS	4/19/1999	In-Service	12	11.11	0.89	7.40%	489,137	500,000	2.17%	$201,261.29	$14,888	$4,372.6
9	660	1999	35' NOVA BUS RTS	4/19/1999	In-Service	12	11.11	0.89	7.40%	480,886	500,000	3.82%	$199,170.86	$14,733	$7,613.9
10	664	1999	35' NOVA BUS RTS	4/20/1999	In-Service	12	11.11	0.89	7.42%	378,346	500,000	24.33%	$200,843.39	$14,903	$48,866.8
11	672	1999	35' NOVA BUS RTS	4/23/1999	In-Service	12	11.10	0.90	7.49%	425,884	500,000	14.82%	$200,537.84	$15,017	$29,726.1
12	680	1999	35' NOVA BUS RTS	4/23/1999	In-Service	12	11.10	0.90	7.49%	432,737	500,000	13.45%	$210,872.59	$15,791	$28,367.8
13	694	1999	35' NOVA BUS RTS	4/29/1999	In-Service	12	11.08	0.92	7.63%	479,242	500,000	4.15%	$193,108.38	$14,726	$8,017.1
14	700	2008	35' GILLIG BUS LF	6/13/2008	In-Service	12	1.95	10.05	83.72%	80,124	500,000	83.98%	$283,424.25	$237,287	$238,006.1
15	701	2008	35' GILLIG BUS LF	6/16/2008	In-Service	12	1.95	10.05	83.79%	64,825	500,000	87.04%	$283,424.25	$237,481	$246,678.3
16	702	2008	35' GILLIG BUS LF	6/16/2008	In-Service	12	1.95	10.05	83.79%	89,234	500,000	82.15%	$283,424.25	$237,481	$232,842.1
17	703	2008	35' GILLIG BUS LF	6/16/2008	In-Service	12	1.95	10.05	83.79%	83,280	500,000	83.34%	$283,424.25	$237,481	$236,217.1
18	704	2008	35' GILLIG BUS LF	6/18/2008	In-Service	12	1.94	10.06	83.84%	76,624	500,000	84.68%	$283,424.25	$237,610	$239,990.1
19	705	2009	35' GILLIG BUS LF	8/5/2009	In-Service	12	0.81	11.19	93.26%	31,730	500,000	93.65%	$283,424.25	$264,335	$265,438.1
20	706	2009	35' GILLIG BUS LF	8/6/2009	In-Service	12	0.81	11.19	93.29%	34,809	500,000	93.04%	$283,424.25	$264,400	$263,692.8
21	707	2009	35' GILLIG BUS LF	8/7/2009	In-Service	12	0.80	11.20	93.31%	31,852	500,000	93.63%	$283,424.25	$264,465	$265,369.0
22	682	1997	35' NOVA BUS RTS	2/5/1997	Yes	12	13.31	0	0%	453,959	500,000	9.21%	$193,108.38	$0	$17,781.8
Avg, all in service							5.49								
Avg, all in service excl LTVs							6.59								

Attachment J

Fixed Route Driver Interview Form

Fixed Route Driver Interview Form FAST:

This interview will take about 15 minutes. Your comments will be summarized with other driver's responses and you will not be identified individually. Feel free to let me know if there is a question you do not wish to answer.

Tell me a little about yourself…

1. How long have you been a bus driver for FAST? _____
2. Are you a ____full-time or ____part-time/relief driver?
3. Do you usually drive a ___ lift-equipped bus or ____ ramp-equipped bus or ____ both
4. How often do you transport a person using a wheelchair or scooter? (daily, weekly…)

Training

5. When you started working for FAST, how much and what type of training were you given about the use of lifts, ramps, securement systems, and passenger assistance?

6. Was the training adequate? *(What would make it better?)*

7. Is there refresher/update training for lift, ramp, and securement use? What type and how often?

Lift/Ramp/Securement Information

8. When and how often do you test cycle the lift/ramp? *(Listen for daily during pre-trip inspection)*

9. What do you do if a lift/ramp doesn't work when you are test cycling it? *(How reported/action taken?)*

10. If you report that a lift/ramp is broken, how quickly is it fixed?

11. Are you ever sent out with a bus that has a broken lift/ramp? If so, how often?

12. If the lift/ramp breaks while you are in service, what do you do?

13. If you are driving a bus with a broken lift/ramp, what do you do if you see a person who uses a wheelchair waiting at a stop?

14. Do you usually deploy the ramp/lift in the street or on a sidewalk?

15. What type of assistance do you offer to people who use wheelchairs when they are boarding?

16. If someone using a "scooter" gets on the bus and there are no standard places to attach the securement system straps, what do you do?

17. What do you do if a person with a disability gets on the bus and asks for priority seating but the priority seats are taken?

18. Is there anything else you would like to tell me about wheelchair lifts, ramps or securements that I didn't ask?

Attachment K

Record of Lift/Ramp Cycling/
Working Condition of Lifts and Access Features

Reviewer: _____ Date: _____ Time: _____

Transit Agency ____Fayetteville Area System of Transit

Record of Lift Cycling/Working Condition of Lifts and Access Features

Bus #:_____ Route #:_____ □ Ramp □ Lift (check one)

Cycled By: □ Driver □ Mechanic □ Starter (check one)

Lift/Ramp Worked? □ Yes □ No _____

Operator Familiar with Equipment: □ Yes □ No _____

Ramp Tool on Bus? □ Yes □ No _____

Kneeler Worked? □ Yes □ No _____

Illuminated front and side destination signs? □ Yes □ No _____

Sign requesting passengers to vacate securement area upon request? □ Yes □ No _____

Securements available and functional? □ Yes □ No _____

Three-point passenger restraint available and functional? □ Yes □ No _____

Securements and passenger restraints clean? □ Yes □ No _____

PA Worked? □ Yes □ No_____

Auditory & visual stop request? □ Yes □ No _____

Comments: _____

Bus #:_____ Route #:_____ □ Ramp □ Lift (check one)

Cycled By: □ Driver □ Mechanic □ Starter (check one)

Lift/Ramp Worked? □ Yes □ No _____

Operator Familiar with Equipment: □ Yes □ No _____

Ramp Tool on Bus? □ Yes □ No _____

Kneeler Worked? □ Yes □ No _____

Illuminated front and side destination signs? □ Yes □ No _____

Sign requesting passengers to vacate securement area upon request? □ Yes □ No _____

Securements available and functional? □ Yes □ No _____

Three-point passenger restraint available and functional? □ Yes □ No _____

Securements and passenger restraints clean? □ Yes □ No _____

PA Worked? □ Yes □ No _____

Auditory & visual stop request? □ Yes □ No _____

Comments: _____

Attachment L

Bus and van Specification Checklist

Bus and Van Specification Checklist

Name of Recipient: Fayetteville Area System of Transit

Fleet # Assigned by Recipient/Operator (if applicable): _____

Type of Vehicle: (check one) ___ **Minivan** ___ **Van** ___ **Minibus (< = 22')**

___**Minibus(> 22')** ___ **Bus (> 22')**

Make/Model:_____ **Year** _____

Name of Person Conducting Review:_____

Signature:_____ **Date:**_____

Following is a summary of the provisions of Subpart B of 49 CFR Part 38 - the "Americans with Disabilities Act (ADA) Accessibility Specifications for Transportation Vehicles". This portion of the new ADA regulations applies to all new, used, or remanufactured buses and vans (except over-the-road, intercity buses). Also, if portions of a vehicle are modified in a way that affects or could affect accessibility, each portion must comply, to the maximum extent practicable.

Vehicles purchased by public as well as private entities operating services covered by the ADA, regardless of whether or not they receive federal funding, must comply with these specifications. Existing inaccessible buses do not have to be retrofitted to be brought into compliance.

All dimensions listed are subject to conventional engineering tolerances, including normal anticipated wear not exceeding accepted industry-wide standards and practices.

For each required specification below, indicate in the left-hand margin if the vehicle meets the specification, does not meet the specification, or the specification is not applicable to the vehicle being inspected. If the vehicle does not meet the specification, note actual measurements in the space provided to the right. Clearly indicate what the measurements are.

For some specifications (such as lift design load, securement strength, etc.), it may be appropriate to refer back to manufacturers information that was provided with the vehicle.

Lift Specifications: ___ N/A (ramp specs p. 4)

— **The design load of a lift must be at least 600 pounds. Working parts must have a safety factor of at least six. Non-working parts shall have a safety factor of at least three.**

— **Controls must be interlocked with the brakes, transmission, or door so that the vehicle cannot move unless the interlock is engaged.**

— **Controls must be "momentary contact type" (meaning they require constant pressure) and must allow the up/down cycle to be reversed without causing the platform to "stow" while occupied.**

— **Lifts must be equipped with an emergency back-up system. The emergency back-up system shall be capable of being operated both up and down without the platforms "stowing" while occupied.**

— **Must be designed so that in the event of a power failure, the platform cannot fall faster than 12 inches per second.**

— **Must have an inner barrier or inherent design feature to prevent the mobility aid from rolling off the side closest to the vehicle until the platform is in its fully raised position.**

— **Side barriers must be at least one and one-half inches high.**

— **The "loading-edge" (or outer barrier) shall be sufficient to prevent a power wheelchair from riding over or otherwise defeating it (note that this test must be performed with the wheelchair facing both toward the vehicle and away from the vehicle as boarding in both directions must be permitted). If this barrier is automatic, it must close when the platform is no more than 3 inches off the ground. If the outer-barrier is to be driver operated, it must have an interlock or inherent design that prevents the platform from being raised until the barrier is closed or other system is engaged.**

— **The platform surface must be slip-resistant with no protrusions over 1/4 of an inch.**

— **The platform must be at least 28 1/2 inches wide measured at the platform surface and at least 30 inches wide measured from 2 inches above the platform surface to 30 inches above the**

surface. It must also be at least 48 inches long measured from 2 inches above the surface to 30 inches above the surface.

- **Gaps between the platform surface and any barrier can be no more than 5/8 of an inch. Semi-automatic lifts can have a handhold in the platform that measures no more than 1 1/2 inches by 4 1/2 inches.**

- **When in the fully raised position, the platform surface must be vertically within 5/8 inch of the finished floor and horizontally within 1/2 inch of the finished floor.**

- **The ramp from ground to platform (often the lowered outer barrier) must have a slope of no more than 1:8 for a maximum rise of 3 inches (i.e., if platform I inch off the ground, ramp must be at least 8 inches long). If the threshold from ground to ramp (i.e., the thickness of the ramp material) is more than 1/4 inch; it must be beveled with a slope no greater than 1:2.**

- **The platform must not deflect more than 3 degrees in any direction when a 600 pound load is placed on the center of the platform.**

- **The platform must move at a rate of no more than 6 inches per second. The platform must be stowed or deployed at a rate of no more than 12 inches per second. Horizontal acceleration can be no more than .3g.**

- **Lift must be designed to allow boarding in either direction.**

- **Must be equipped with two handrails which move in tandem with the lift platform. Handrails must be 30 - 38 inches above the platform surface and must have a useable gasping area of at least 8 inches. Handrails must be capable of supporting 100 pounds, must have a cross-sectional diameter of 1 1/4 to 1 1/2 inches, and must have at least 1 1/2 inches of "knuckle clearance".**

- **Lifts may be marked to identify the preferred standing position.**

Ramp Specifications: ____ N/A

— **Ramps 30 inches or greater in length must have a design load of 600 pounds. Ramps under 30 inches in length must have a design load of 300 pounds.**

— **Ramp surface must be continuous and sup-resistant. Protrusions can be no more than 1/4 inch.**

— **Ramps must be at least 30 inches wide.**

— **Ramps must accommodate both three-wheeled and four-wheeled mobility aids (e.g., they must be designed to support a wheel in the center of the ramp).**

— **If the threshold from the ground to the ramp surface (e.g., the thickness of the ramp surface) exceeds 1/4 inch, it must be beveled with a maximum slope of 1:2.**

— **Side barriers, at least 2 inches high, must be provided.**

— **Ramps must have the least slope practicable. When the ramp is deployed to ground level the slope cannot exceed 1:4 (i.e., for a vehicle with a finished floor 12 inch above the ground, a 48 inch ramp would be needed). When deployed to a 6 inch curb the following maximum slopes would apply:**

finished floor height above 6 inch curb	maximum slope
3" or less	1:4
6" or less, but > 3"	1:6
9" or less, but > 6"	1:8
greater than 9"	1:12

— **The ramp must be firmly attached to the vehicle.**

— **Gaps between the ramp and vehicle finish floor can be no more than 5/8 of an inch.**

— **A compartment or securement system must be provided for the ramp to keep it from impinging on the space set aside for mobility aid users and to keep it from becoming a hazard in the event of a sudden stop.**

— **Handrails are not required. If they are provided, however, they must support 100 pounds, be between 30 inches and 38 inches above the ramp surface, have a cross-sectional diameter of 1 1/4 to 1 1/2 inches, be continuous for the full length of the ramp, and provide at least 1 1/2 inches of "knuckle clearance".**

Securement Area:

— **Vehicles over 22 feet in length must have two (2) securement locations. Vehicles 22 feet and under must have one (1) securement location. Vehicles are to be measured from the front-most part to the rear-most item (including the bumpers).**

— **Wheelchairs and mobility aids must be oriented as follows:**

- **For vehicles greater than 22 feet in length, at least one securement position must be forward facing. Other securement areas can be either forward or rear-facing.**

- **For vehicles 22 feet in length or less, the one required position can be either forward or rear facing.**

— **If wheelchair and mobility-aid-users are secured in a rear-facing orientation, a padded barrier must be provided. The barrier must be 18 inches wide and extend from 38 inches to 56 inches above the floor.**

— **Securement systems must have the following design loads:**

- **For vehicle with a GVWR of 30,000 pounds or more: 2,000 pounds for each strap/clamp, and 4,000 pounds per mobility aid.**

- **For vehicles with a GVWR of less than 30,000 pounds: 2,500 pounds per clamp/strap, and 5,000 pounds per mobility aid.**

— **Securement area must be located as close to the accessible entrance as possible.**

- **A clear floor area of 30 inches wide by 48 inches long must be provided for each securement area. This can include an area up to 6 inches under a seat as long as there is a vertical clearance of at least 9 inches. If flip-seats are utilized, they cannot obstruct the required floor area. The required floor area can overlap the access path (the path of travel from the accessible entrance to the securement area).**

- **The securement system must accommodate all common wheelchairs and mobility aids (any mobility aid not exceeding 30 inches in width and 48 inches in length and weighing no more than 600 pounds when occupied) and be able to be operated by someone with average dexterity who is familiar with the system.**

- **Securement systems must keep mobility aids from moving no more than 2 inches in any direction.**

- **The securement system must be located to be readily accessed when needed, but must not interfere with passenger movement or be a hazard to passengers. It should also be reasonably protected from vandalism.**

- **A seat belt and shoulder harness must be provided for each securement position. The seat belt and shoulder harness must be separate from the securement system for the mobility aid.**

- **A sign must be provided which indicates that the securement area is to be used by persons who use wheelchairs and mobility aids. Characters on these signs shall have a width to height ratio between 3:5 and 1:1 and a stroke width to height ratio between 1:5 and 1:10. Minimum character height (using a capital X) shall be 5/8 inch. Wide spacing shall be used (generally the space between letters shall be 1/16 the height of upper case letters). Letters must contrast with the sign's background color.**

General Vehicle Specifications:

— **Aisles, steps, and floor areas must be slip resistant.**

— **Step edges, thresholds, and the boarding edge of ramps or lift platforms must have a band of color which contrasts with the step/floor surface. Typically, white or bright yellow is used to contrast against dark floors.**

— **The height of doors at accessible entrances and the interior height along the path of travel between accessible entrances and securement areas shall be as follows:**

- **For vehicles 22 feet or longer, the clearance from the raised lift platform or the ramp surface to the top of the door must be at least 68 inches.**

- **For vehicles less than 22 feet, the overhead clearance must be at least 56 inches.**

— **At least one set of forward-facing seats must be designated as priority seats for persons with disabilities. Signs identifying these as priority seats must be provided. Characters on these signs shall have a width to height ratio between 3:5 and 1:1 and a stroke width to height ratio between 1:5 and 1:10. Minimum character height (using a capital X) shall be 5/8 inch. Wide spacing shall be used (generally the space between letters shall be 1/16 the height of upper case letters). Letters must contrast with the sign's background color.**

— **Interior handrails and stanchions should not interfere with the path of travel of a common wheelchair from the accessible entrance to the securement areas.**

— **Handrails and stanchions shall be provided in the entrance area and through the fare collection area to assist persons with disabilities as they enter and pay a fare. Some portion of this handrail/stanchion system must be able to be grasped from outside the vehicle to assist the person as they start to board. Handrails shall have a cross-sectional diameter of between 1 1/4 and 1 1/2 inches, shall provide a minimum of 1 1/2 inches of "knuckle clearance," and shall have eased edges with corner radii of not less than 1/8 inch.**

- **On vehicles 22 feet in length or longer which have fare collection systems, a horizontal assist shall be provided across**

the front of the vehicle to allow a person to lean against the assist while paying a fare.

- **Handrails and stanchions shall also be provided to assist with on-board circulation, sitting and standing, and exiting the vehicle.**

- **For vehicles longer than 22 feet, an overhead handrail or handrails shall be provided which are continuous from front to back except for a gap at the rear doorway.**

- **For vehicles longer than 22 feet which have front door lifts or ramps, vertical stanchions immediately behind the driver shall either terminate at the lower edge of the aisle-facing seats or be "dog-legged" so that the floor attachment does not impede or interfere with wheelchair footrests.**

- **If the driver's seat must be passed by a wheelchair user, the pedestal shall not extend into the aisle or vestibule beyond the wheelhousing, to the maximum extent practicable.**

- **Lighting of at least 2 foot-candles, measured on the step treads or lift platform, shall be provided in the stepwell or doorway immediately adjacent the driver. Lighting shall activate when the door is opened.**

- **Other stepwell and doorways shall have similar lighting at all times.**

- **Lighting of at least 1 foot-candle shall be provided outside all doorways to illuminate the street surface for an area up to 3 feet perpendicular to the bottom step tread outer edge. Lighting shall be located below window level and shall be shielded to protect the eyes of entering and exiting passengers.**

- **Fareboxes are to be located as far forward as possible and must not obstruct traffic in the vestibule area, particularly wheelchairs and mobility aids.**

- **Vehicles in excess of 22 feet used in multiple-stop, fixed route service must be equipped with a public address system.**

- **For vehicles in excess of 22 feet where passengers are permitted to exit at multiple stops at their option, a "stop request" control must be provided adjacent to the securement locations. The system shall provide both auditory and visual indications that the stop has been requested. Controls shall be located from 15**

inches to 48 inches above the floor, shall be operable with one hand, shall not require tight grasping, pinching, or twisting of the wrist, and shall be activated by a force no greater than 5 lbf.

——If destination or route information is displayed on the exterior of a vehicle, illuminated signs shall be provided at the front and boarding side of the vehicle. Characters on these signs shall have a width to height ratio between 3:5 and 1:1 and a stroke width to height ratio between 1:5 and 1:10. Minimum character height (using a capital X) shall be I inch for signs on the boarding side and 2 inches for front "headsigns". Wide spacing shall be used (generally the space between letters shall be 1/16 the height of upper case letters). Letters must contrast with background color.