

APPENDIX B

DRAFT EMERGENCY MANAGEMENT PLAN

**INTERIM REPORT
NOVEMBER 2009**



**EMERGENCY PLANNING
AND
RECOMMENDATIONS**

**PREPARED BY
ALL CLEAR FIRE TRAINING AND CONSULTING**

**FOR
NEVADA COMMISSION FOR THE RECONSTRUCTION
OF THE V&T RAILWAY**

Fax (775) 883-0554
Phone (775) 883-0232
Cell (775) 720-1990

INTRODUCTION

(11-2009)

All Clear Fire Training and Consulting developed a proposal of emergency response safety considerations and recommendations to the NEVADA COMMISSION for the RECONSTRUCTION of the V&T RAILWAY (the "COMMISSION"). All Clear is performing this work under contract to GEOCON Consultants Inc. who is under contract to Manhard Consulting the Project Engineer for the Commission. The scope of work in our proposal dated May 1, 2009 consisted of the following,

- A. Provide the COMMISSION with a document that details emergency response and safety considerations.
- B. Provide the COMMISSION with a template of what reasonable emergency response safety considerations they may wish to impose on future train operator(s).

The consultant tasks were determined by developing a Request for Proposal (RFP) dated 5-1-09 from GEOCON Consulting Inc. The resulting report and subsequent recommendations are listed in this document which **scope is limited to emergency response and emergency planning issues related to the use of the V&T Railway tourist railroad operation.**

This document should be considered a general overview or interim report and is not technically complete at this time. Our recommendations are based upon input from GEOCON Consultants and MANHARD Consulting, a review of regulatory documents, interviews with other train operators and feedback provided by affected local area emergency response agencies.

The listed proposals/recommendations are intended for the sole and exclusive use of the COMMISSION or their designated agents to make informed decisions concerning how emergencies may best be prevented or in the worst case handled by any future operator and how said operator will interface with emergency responders.

Since no permanent operator has been selected, we do not know what any future operator will bring to the table in terms of emergency response plans, procedures or equipment. The recommendations were based upon the fact that operator brings nothing to the table and the COMMISSION will have to set the terms of emergency plans/response and equipment.

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P.O. Box 367
Carson City, NV 89702

Fax (775) 883-0554
Phone (775) 883-0232
Cell (775) 720-1990

Every effort has been made to provide options or alternatives in the decision making process. All Clear cautions that the use of the “low bid is best approach” is inappropriate as we are dealing with life safety and survival as well as the future reputation of the V&T Railway COMMISSION.

GENERAL DISCUSSION/OVERVIEW

The following will be a general discussion that should provide the reader with an overview of the challenges that face the COMMISSION/operator and the obligations to protect the riding public as well as identify problems that emergency responders will be facing. Specific recommendations are listed at the conclusion of this general discussion.

One issue that will be cause for careful consideration is that the introduction of a railroad taking the place of a 4 Wheel Drive (4-WD) travel corridor where one has not existed since 1941. This will require a thoughtful approach by the COMMISSION as well as challenge the emergency response community.

Perhaps the biggest challenge will be to get first responders (Law Enforcement, Fire and Emergency Medical Services) to the location of an emergency in/on the rail corridor at those remote areas where slopping terrain and the lack of roads restrict access by conventional methods (vehicles). This access challenge particularly applies to the portions of the route in the Carson River Canyon and the American Flat areas.

Plausible scenarios requiring an emergency response in or around the rail corridor are:

- Emergency Rescue due to injury in, on or near the rail corridor.
- Wildland Fire caused by the train or wildland fire in or near the train corridor
- Train Fire
- On Board Medical Emergency (customer/employee/maintenance crew)
- Train/Vehicle collision at a crossing or in the rail corridor.
- Train Derailment with Mass Casualty Incident (MCI)
- Tunnel Issues
- Disabled Train-Remote area away from a crossing

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P.O. Box 367
Carson City, NV 89702

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Phone (775) 883-0232
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The COMMISSION must prepare and develop contingencies for getting first responders to any or all of these potential emergencies by gaining access to the rail corridor in some fashion.

A. Currently none of the response agencies have any equipment that can operate on the rail.

B. In many areas the rail corridor is not reachable by dirt or paved road.

Any of these scenarios will require emergency responders to either access the rail (if the train cannot move) or meet the train at a crossing in the case of an on board emergency medical emergency. Emergency Responders must be able to gain access to the rail in a timely fashion.

In the recommendation section we will address possible solutions to this access problem.

Response time to emergency incidents becomes critical as just a few minutes delay may determine survival when someone is critically injured. Along with access issues communications also becomes an integral part of the process and how the railroad employees will effectively communicate with three different 911 centers (Carson-Lyon and Storey).

The communication link between train dispatcher and the 911 centers is a must for factual and prompt early notifications during emergencies as well as basic monitoring of movement, equipment on the tracks. We envision a dispatcher in a **control center** at a fixed location (existing V&T shop Drako Way) with computerized map showing the Global Positioning System (GPS) tracking location of the trains (train movements) utilizing a fixed phone system where by the dispatcher could report emergencies. This is a must fill position and one that will be pivotal to over all successful outcomes of true medical or other emergencies.

It is our understanding that cell phones are expressly prohibited for train operations therefore that handicaps the train conductor for reporting emergencies. Public service agencies use radio's on a given band width regulated and approved by the federal government. Railroads also use radios on a different bandwidth as approved and regulated by the federal government. As mentioned previously in this document the recommended use of a **"control center"** as well as a **"trained dispatcher"** form a critical link for notifications to emergency responders.

The development and use of General Orders (written procedures) for the dispatcher to follow once again becomes paramount to meeting the communication and response

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P.O. Box 367
Carson City, NV 89702

Fax (775) 883-0554
Phone (775) 883-0232
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challenges. Taking away the use of cell phones reduces the redundancy capability that is relied upon for backup and effective communications.

Another issue that must be addressed is that the train will be operating in three different counties and that translates into the reality that the train dispatcher will be dealing with three different 911 centers (or more) to report emergencies. Intimate knowledge of county boundaries and exactly in which jurisdiction the train is operating at a given time will be important to alerting the correct agency for response.

As mentioned there will be a need for a train dispatcher (Control Center) to be on duty anytime train or equipment is operating and the chief duty of the dispatcher will be train monitoring and will be the vital communications link from train to the 911 centers as well as for other train related communications. Since cell phones are not allowed to be used by train employees while on the train, the radio becomes the primary communication tool.

If the operating train were to encounter say an on board medical emergency then that incident would be reported by the conductor to the dispatcher in the control center and the dispatcher would alert via 911 the **correct agency** and report what the situation is and when (and what time) the train will arrive at the next crossing. The train by General Order would stop at the next closest crossing and allow the paramedics to tend to the ill or injured patient.

Added complexity to this problem may come in this fashion, say a medical emergency arises on the train while it is moving in Storey County (southbound) but the next road access or crossing is in Lyon County. The train dispatcher will have to notify the proper 911 center and provide the correct crossing location for responders to rendezvous with the train.

Partial solution would be to have the dispatcher monitor the train movement via Global Positioning System (GPS) locator in the engine. More discussion is provided in the section regarding communications issues.

RISK MANAGEMENT/FIRE PREVENTION

Trains and wildland fires have a long history so the operator and the COMMISSION must put forth a good faith effort in seeing to it that they are not the cause of accidental fires resulting from normal operations.

All Clear envisions a wildland fire resulting from an accident or negligence that could leave the operator and the COMMISSION potentially named as litigants and or under Nevada law be held responsible for suppression cost. Some consideration must be given

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P.O. Box 367
Carson City, NV 89702

Fax (775) 883-0554
Phone (775) 883-0232
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to providing chase vehicles that will shadow the train when the wildland fire threat exceeds moderate.

The wildland fire agencies through the California Department of Forestry and Fire Protection have published a guide to train fire prevention and that guide can be found on the web at <http://cdfdata.fire.ca.gov/pub/fireplan/pupload/fppguidepdf100.pdf>

While this guide is intended for commercial application it does address diesel and steam powered locomotives fire prevention principles, techniques and shall/should be followed by the train the operator. Other valuable portions of this guide that should be considered and are found on pages 24-25 as well as Page 65.

It would be prudent that one senior member of the operators staff be assigned risk management duties to include accident/fire prevention for daily operations as well as track maintenance. In addition I would suggest that the operator and the immediate response agencies develop an operating agreement on how best to address the 911 issues and response, with the risk manager as the single point of contact for the train operator. The results of this effort can be rolled into the emergency plan.

A strong set of General Orders should be drafted utilizing proven risk management techniques for accident and fire prevention concerning daily operations.

We make the assumption those governmental regulators such as the Federal Bureau of Land Management (BLM), State and Local governments who utilize the National Fire Protection Associations (NFPA) life safety codes and ordinances under the “Authority Having Jurisdiction” clause will require the operator/COMMISSION to meet certain standards before trains are used for the intended purpose. Such details as the number and type of fire extinguishers and water cars (for firefighting), spark arresters and the like will most likely be mandated by those agencies.

Code of Federal Regulations (CFR)

CFR Title 49 deals with transportation safety and standards, while the V&T Railway would be considered in part a “insular railroad” (because it does not connect to any main line RR) it still must adhere to those portion of the CFRs that apply to tourist and steam engine railroads that cross an at grade highway crossing or go over a highway.

According to CFR 49 Part 238.3 and some portions of CFR 238 and 39 **do not apply** to a tourist, scenic, historic or excursion operations, CFR part 238 deals with passenger equipment safety and is applicable. The current understanding is that the railroad will not be transporting (for commerce) hazardous materials or freight at this time.

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P.O. Box 367
Carson City, NV 89702

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The following statement is quoted from the Federal Railroad Administration (FRA).

“There are some FRA regulations that do not presently apply to tourist railroads that are not operated over a general system.”

However, FRA’s “Emergency Order Authority” permits it to address a true safety emergency arising from conditions (e.g., the proper functioning of air brakes) covered by those regulations or any other regulations (e.g., the track safety standards) that do not apply outside the general system. Thus, even insular or off the system tourist railroads should understand that the FRA has jurisdiction to inspect their operations and to take emergency action if those operations pose an imminent hazard to the public for injury or death.”

It seems from the language found in the above paragraph that while portions CFR 238-39 are not binding on the COMMISSION or its operator, **not to follow that part of the CFR would place all parties at considerable risk and perhaps create an unacceptable liability issues.**

Perhaps the glue that will bind all of these emergency response issues together will be the formal writing and adoption of an emergency response plan; said plan will be mentioned numerous times in this document and should be recognized and adopted by the COMMISSION as living document for the future operator.

To this point our focus has been on when the trains are running or active, one cannot assume that emergencies will not arise simply because the trains are inactive. Since the rail corridor interfaces with open spaces used by outdoor enthusiasts and off road vehicles there is always the chance there will be incidents. Because of the rail corridor being placed on what has been used as four wheel drive corridor the likelihood of vandalism as well as acts of domestic terrorism are a consideration.

The COMMISSION must consider how the Public Service Agencies can access the rail corridor to handle emergencies as they rise during periods of inactivity where off road access is not an option.

The question of how many hi-rail vehicles or combination of vehicles when addressed will also trigger the need for housing the vehicles. If multiple vehicles are selected then one could be placed in Virginia City and one at the Eastgate siding. Access to the rail and housing for these vehicles will no doubt become a future consideration.

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P.O. Box 367
Carson City, NV 89702

Fax (775) 883-0554
Phone (775) 883-0232
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The following items are a list of proposals/recommendations, the first paragraph of each proposal will list the task (s) that the consultant was charged to address via the Request for Proposal (RFP).

Item 1

The RFP requires the consultant to arrange and conduct a meeting of the emergency response agencies with statutory response obligations and other governmental agencies that may be affected by the train corridor.

The meeting was conducted on 6-3-09 with discussion of the rail corridor impacts on emergency service delivery. In addition discussion was conducted on how these agencies may gain access to the rail corridor for emergencies related to the train or not.

Agencies represented were: Carson City, Storey County, Lyon County, Nevada Division of Forestry (NDF), Nevada Dept. of Wildlife (NDOW), and Bureau of Land Management (BLM), Emergency Managers, Fire, Law Enforcement, Carson City Parks, Emergency Medical Services (EMS) and Carson open space were in attendance.

Meeting Feedback from Response Agencies:

Managers in attendance were generally receptive to the project but expressed reservations about gaining access to the Carson River Canyon portion of the project for emergency law enforcement, medical and fire responses once the track is in place or the existing corridor access is shut down.

Carson Parks and NDOW expressed concern on how recreational enthusiasts could access the corridor once the track consumes the existing road way or access is denied.

Recommendation 1

Overview

All Clear is proposing a multiple vehicle approach as possible solution to the access question for all first responders.

As mentioned in the discussion portion a General Order would have to be prepared that would instruct/provide direction to train employees on what action to take during an on board medical emergency. The General Order may read something like the following:

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Carson City, NV 89702

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Phone (775) 883-0232
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Upon determining that there is an on board medical situation that is deemed to be an emergency, the conductor will advise the dispatcher via radio of the situation and his/her location, direction of travel, nearest mile marker and GPS location. The Dispatcher will then activate the 911 system for that jurisdiction advising of the nature of the incident and request a response.

The dispatcher will determine from the conductor where the closest crossing is and have the proper jurisdiction respond to that crossing. Upon approaching the crossing the engineer will stop the train so that the first responders can gain access to the patient. The dispatcher will relay to the 911 center at which crossing the train will arrive. Once a determination on the patient (s) has been made the train can proceed on its schedule.

In the event of a derailment or an emergency where the train cannot move under its own power, the first responders challenge becomes how to get to the incident. The following are recommendations and options on how that may be accomplished.

Another issue that will have to be addressed is when the first responders may need access to the rail for emergencies on the rail corridor when the train is not be operating.

Possible Solutions

Vehicle One

Purchasing a hi-rail vehicle (s)* would be a consideration for gaining access to the rail corridor. We see a need for a chase vehicle when the train is running during periods of wildland fire danger.

*Hy rail or Hi rail vehicles are normal over the road vehicles that have been especially equipped with a flanged steel wheel system that allows them access and movement on the rail.

A 4 Wheel Drive $\frac{3}{4}$ ton 4 door short or long bed pick-up should be acquired and equipped with hi-rail gear. Additionally a skid mount firefighting package would need to be purchased consisting of fiber glass tank, pump and hose reel. The skid mount unit could be removed during the winter months and the pick-up could be used as a utility vehicle.

Additionally, specially trained personnel familiar with the V&T Railway safety protocols will be needed to man this equipment and respond in a timely fashion.

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P.O. Box 367
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Fax (775) 883-0554
Phone (775) 883-0232
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Vehicle Two

A larger perhaps two ton flat bed stake side truck be purchased and equipped with hi-rail gear as well as emergency supplies such as stokes baskets, spinal back boards, neck braces, ropes, oxygen and other related first aid supplies. This vehicle would be operated by personnel supplied by the train operator during times of emergencies, and be used to ferry emergency paramedics and others to the scene as well as bring injured out in the event of a worst case scenario Mass Casualty Incident (MCI). Consideration should also be given to adding a pump, water tank and fire extinguishers for class C fires as well as firefighting foam.

All of the equipment could be stored and configured in a skid mount fashion so the vehicle could do other duty in the off season.

To bolster the argument for this vehicle, trains are heavy and the type of heavy duty rescue gear needed to perform victim extrication may require a large vehicle to get to the site of a derailment. Once again we do not know what equipment the operator may bring to the table but this is an issue that must be addressed.

Option One

In lieu of hi-rail equipped vehicles a lesser option may be to equip an A-4-A Fairmont 6 man Speeder that can pull a cart with the skid mount unit in it for responder access and fire prevention chase duties or perhaps taking first responders to the scene of a medical call on the tracks.

Option Two

No doubt that the train operator will have a diesel powered locomotive for miscellaneous track duty. During periods of high fire danger this locomotive should have a water car attached that has a pump capable of delivering 500 GPM @ 150 PSI with National Standard Threads both 1 1/2" and 2 1/2" discharge outlets.

In addition a box car could be used to house the skid mounted emergency medical supplies and the locomotive could be summoned during emergencies.

The draw back here is the start-up and response time and we still have to consider the need to get emergency responders to the scene as quickly as possible.

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Carson City, NV 89702

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Option Three

Petition the emergency response agencies to see if they have some older yet reliable equipment that they would be willing to donate to the cause and have the train operator equip that with hi-rail gear.

Option Four

Have two hi-rail response vehicles with redundant gear on them, one stationed in Virginia City and one located at the Eastgate siding.

Option Five

Ask the three counties if there is a flavor to submit a grant for a custom built emergency response hi-rail vehicle through the Federal Emergency Management Agency (FEMA) granting process. This should be viewed as long term and along wait solution as the process may take years and never be accepted by FEMA.

At this point I'm still concerned with gaps in these recommendations such as using the train emergency response equipment for off season responses that may come about especially in the Carson River corridor. Additional concerns that have not been adequately addressed are the fire response issue (equipment and personnel) and since this is the initial discussion and direction document I will defer until further comments can be obtained by the Fire Departments.

During periods when the wildland fire danger is above moderate a chase vehicle such as mentioned in option one must be deployed to shadow the train movement at a 10 minute delay to check and extinguish fires started by the train. A lesser but effective option may be to add a water car to the train equipped to lay down a stream of water near the tracks as the train moves through the corridor.

Although railroads are charged by the FRA to remove vegetation near tracks in the spring or the fall, we can still see wildland fires resulting from train operations. These fires may be started by hot wheels, poorly maintained exhaust manifolds or humans among others. A good recommendation for the COMMISSION would be to prohibit smoking on the train.

Conclusion

A combination of the above mentioned options may have to be utilized in order to meet the perceived and real threat posed by emergencies that may occur during times when trains are moving through the corridor.

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Carson City, NV 89702

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The ability to get first responders to the scene must always be a consideration when selecting an option or vehicle as mentioned above.

Training/Certifications

Operators of these vehicles would be required to have training commensurate with the level of expectations such as:

- Minimum of medical first responder, Emergency Medical Technician is better.
- Engineer's Card
- Wildland suppression classes at the incipient level or greater
- Communication Skills
- Understanding of the Emergency Response Plan and how to use it.

A determination may have to be made as to what level of training train employees must have in terms of providing emergency medical care. Basic first aid coupled with CPR would be the minimum; Emergency Medical Technician is the next level. Automatic Electric Defibrillators (AEDS) could play a positive role in cases where cardiac arrest may occur.

Item 2

All Clear will develop a preliminary list of recommendations for GEOCON Consultants Inc. and The V&T COMMISSION on what emergency response responsibilities the train operator must put in place prior to operation. This will include a preliminary draft of the train operator's obligations concerning emergency response plan overview and a written emergency response plan.

Recommendation 2

- A.** The operator and its employees must follow the provisions for Alcohol and Drug Testing as provided in the Code of Federal Regulations (CFR) 49-Part 219.
- B.** The operator either presents its own emergency response plan for review or adopts a written comprehensive emergency response plan similar to the one found at the Northern Nevada Railway or, Any plan shall include the following:
 - A comprehensive list of General Orders**

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Carson City, NV 89702

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- A List of Standard Operating Procedures/Guidelines**
- Table of Contents, Revision Log, Authority to Operate, Situation and Assumptions, Concept of Operation, Mission Assignments, Emergency Response, Support, Special Resources, Summary and Glossary of Terms.
- Under Concept of Operations it must include the following:
 - Preparedness/Pre/Fire and Emergency Plans
 - Emergency Response
 - Recovery Direction and Control
 - 24 hour/365 day Emergency Notification Phone Number for incidents that may involve railroad property.
- How the operator interfaces with the emergency response agencies.
- How the operator reports an emergency and what constitutes an emergency.
- Required Levels of Training*** and Annual Refresher Training.
- Annual Review, Testing The Plan and Exercises.

Additional Consideration is warranted and shall include the following:

- Railroad Time Table.
- List of the Mile Markers (and whose county the markers are in).
- A Control Point (Center) where the train dispatcher is located at.
- A list of all rail siding locations and how long they are.
- List of possible Landing Zones for helicopters and there GPS locations.
- General Code of Operating Rules with any Special Instructions such as speed restrictions, when the chase vehicle is required etc.
- Competencies and Procedures
- If the issue of the V&T railroad is not addressed and the Commission authorizes an operator then a Joint Railroad Agreement will be needed to include a notification of who is on who's track and when.
- Public Information Officer Role and Responsibilities.

** May be separate documents from the plan but still must include vital operating directions and procedures for employees to follow. General Orders are written for specific actions and not intended to allow the employee any while Standard Operating Procedures do allow for the employees to operate with in written boundaries with discretion.

*** It is strongly recommended that all train employees who have no National Incident Management System (NIMS) experience or training be instructed to take the FEMA On-line course known as ICS-100a. This on line class will take approximately three hours introduces the employee to terms that will be associated with emergency responders. This course can be found on the web at:

www.fema.gov/Emergency/nims/NIMSTrainingcourses.shtm

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P.O. Box 367
Carson City, NV 89702

Fax (775) 883-0554
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It would be best to go on line and download the study material and then go back on line complete the required test and submit for your certificate all in one session.

Item 3

All Clear will explore communications issues relating to how the train operator will effectively report emergencies and then communicate with emergency responders. This effort will explore communications devices that the train operator can/will utilize and which may have interoperability with current emergency responder's communications systems.

Recommendation 3

Establishment of a 24 hour phone hotline be provided for the public to use incase of problems arising involving railroad right of way issues i.e. an off road vehicle becomes entangled or is blocking the rail line. This number would need to be posted along the right of way at periodic intervals. This number would have to be made available to the public services agencies as well.

The commission should/shall consider either providing or demanding that the train operator provide a communications platform to include the following:

According to the Motorola folks they have a **digital** communication platform that uses repeaters, hand helds, mobile and fixed radios. This system is known as MOTOTRBO and can be used in conjunction with computer, servers to allow for fleet GPS tracking.

It would appear at this time that there would be a need for two repeaters one near Virginia City and one near the mouth of the Carson River Canyon i.e. the existing commission building on Drako way. Testing would have to be conducted to determine if these two repeaters would adequately cover the rail corridor. In addition a location would be needed to mount the repeater and in Storey County that may put it in a historic district limiting height and location.

Each engine/hi-rail would have a mobile radio and employees could be equipped with hand-held units. The engine radios would deliver from 25-40 watts of transmitting power and the hand-held units around five watts of power.

The MOTOTRBO platform could provide location services and the ability to track people and assets, such as trains, speeders and hi-rails vehicles.

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Carson City, NV 89702

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This advanced approach takes advantage of the GPS modem and receiver integrated within both the portable and mobile radio's, combined with the MOTOTRBO location services software application.

The dispatcher will be attending a computer display that includes the GPS coordinates of anything on the rail that has a system radio in the on position; this would allow the dispatcher to have knowledge of movement on the rail, equipment location even without a radio transmission.

The text-ing portion of the system should not be purchased.

Application can be made to the FCC to operate this digital platform on 6.25 kHz narrowband. The system provider advises they will assist in the application process.

It remains to be seen if this platform can be configured so that train operators can speak directly to emergency responders those issues need to be worked out with further research and agreement with the response agencies once a radio system is purchased.

If this system was selected then a communication model would be formed and general orders written to address how, when and where emergency notifications would be made.

If the county line boundaries can be added to this system as to indicate which county the train was operating in then the dispatcher will have an easier time of identifying which 911 center to call. Each 911 center by law has to have an "inside number" that could be used to report emergencies and we will look into utilizing this for possible reporting.

The problem here will be if the "Control Center" and the dispatcher are based in Carson City for example and the train transmits an emergency call while in Lyon or Storey County and the dispatcher uses the local landline he/she will be routed into Carson City 911 center. This issue can be addressed with the input of the 911 center managers and the

writing of specific General Orders that mandate the dispatcher to follow a certain procedure.

SPOT is a device that pilots and hikers use and allows them to send four messages to a designated computer or web address via satellite. The messages the user can send are:

1. Ask for help non-emergency
2. Checking In (Gives GPS coordinates)
3. Tracking Progress (Indicates where the user has been and is now)
4. Calls 911 to a predetermined center and provides GPS coordinates and a request for help.

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The map overlay for this system is Google earth. These units are about \$150.00 but due carry a monthly subscriber fee. One of these could be used as part of the redundancy communications to alert the dispatcher if there is radio failure.

It is not known at this time how this unit may function in the Carson River Canyon area of the rail corridor.

Redundancy is the key here and what ever communication platform is decided upon it must include back-up systems so if one fails the other can be relied upon to transmit distress or emergency situations.

Conclusion

It would appear that at this time the most difficult challenge may be getting the emergency responders to the scene of an incident because there are areas of the rail corridor where no roads exist. This situation can be overcome with a combination of hi-rail vehicles or speeders and other equipment.

At this time it remains unclear just who would operate these vehicles (on the rail) and how fast they could respond to an incident. In the worst case scenario of derailment with a mass casualty incident getting emergency crews to the scene in a timely fashion will be paramount. Conversely getting the critically injured to a hospital in one hour (golden hour) will be a considerable challenge.

The commission the operator, and the response agencies all will have a major stake in how to adequately address this issue once a determination of equipment purchases are made.

There is no need to re-invent the wheel on the remaining issues as listed in the recommendations except to address the idiosyncrasies of this particular insular railroad system.

Employee and passenger safety cannot be compromised and strict adherence to the operating rules and General Orders with a proactive engagement in prevention and accident prevention will minimize risks to emergency incidents.

Finally, All Clear does not know as of this writing what the selected operator will bring to the table in terms of prior expertise equipment and the like. During the selection process discovery of what each operator may bring to the table can be crossed check against these recommendations.

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P.O. Box 367
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Public Service Agencies Comments

On 08-31-09 a final draft copy of the recommendations was sent to the following public service agencies for comment:

Carson Fire
Carson Sheriff
Carson City Parks
Lyon County Sheriff
Central Lyon County Fire
Storey County Fire
Storey County Sheriff
Bureau of Land Mgt Fire
NV Dept of Wildlife

Each agency was asked to return written comments no later than 09-15-09, because only two comments were returned by that date we extended the period to 10-01-09. Not receiving any further comments we then placed phone calls to the principles and inquired as to why they had not submitted comments.

The consensus seemed to be while they generally liked the recommendations they would rather defer comment until they saw which of the recommendations the Commission would adopt. The other comment was that while some agencies may have statutory authority they again wanted to see which recommendations were accepted prior to commenting.

The Storey County Fire Chief phoned and stated:

- The document was well prepared as written and they would have no further comment pending what the COMMISSION would adopt and impose on the train operator.

The Carson Fire Dept. submitted the following and includes our responses to there questions as well as comments.

Thanks for the opportunity to provide comments on this document. The whole thing is such a change for all of us that wrapping our hands around it is going to take some doing. We have specific comments and I'll refer to the page number and section relative to this - then some general comments. This entire document was run through our whole staff, so these comments are from several perspectives.

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Page 2 - Check boxes

Other issues that could be listed include; environmental emergencies (haz mat issues), train de-railment without injuries (unlikely, but possible), law enforcement issues

Page 4 - 4th paragraph

I think it bears mentioning in this section that things will be further complicated by the fact that people will be calling in an emergency via cell phone. In fact, I think it is more likely that the first anyone will hear about a medical emergency on the train it will be from a citizen and not a train employee. This can make things very complicated because the whole concept of managing the trains stopping point is contingent upon the train operator knowing that an emergency exists. I think this component of the process has the potential to get very complicated. A person calling 9-1-1 from a cell phone along the train route could end up in any of the four county PSAP, or could even end up on the Reno PSAP. Don't have a suggestion on how to deal with this, except that it probably needs to be discussed.

All Clear Comment: We have given that issue consideration and feel that those types of situations can be addressed to a degree by having train personnel instruct riders to inform the staff of an incident when it happens. Additionally the Public Safety dispatchers will need to confirm any situation with the train dispatcher to avoid further confusion.

Page 8 - 3rd paragraph

I think you addressed this later in the document, but at this point I made a note to ensure that the operator carries an AED and a basic first aid kit. I think they should also be required to have someone with CPR and maybe basic first aid on every run.

All Clear Comment: We gave consideration in addressing that issue such as back boards AEDs, O2 as well as staff training requirements but we do not know at this time what the future operator will bring to the table. Once we see what the operator brings to the table those concerns can be addressed along with fire extinguishers etc.

Page 8 - 7th paragraph

I made a note here regarding the train people and that they will be operating the vehicle. I do have concerns about civilians operating as firefighters. I don't know if your intention was that these people would just operate (as in drive) the hi-rail units, or if they would be responsible for actually extinguishing the fire. If they are extinguishing fires and are required to do so as part of their job - this implies a whole litany of requirements that the train operator would have to comply with (as you know). So, I just was wondering if that shouldn't be clarified or addressed.

All Clear Fire Training and Consulting

P.O. Box 367
Carson City, NV 89702

Fax (775) 883-0554
Phone (775) 883-0232
Cell (775) 720-1990

All Clear Comment: We are in concurrence with your comment and once again we must see what an experienced operator brings in terms of emergency plan and staff requirements. If the operator does not provide adequately trained staff members then the COMMISSION will have to mandate.

Page 9 - 4th paragraph

What is a "A-4-A Fairmont 6"????

All Clear Comment: The Fairmont is typically a unit equipped for rail use that is designed to haul workers and equipment for track maintenance. These units may be powered by a six or eight cylinder motor and usually carry a crew of four or six. Additional "cars" can be attached that would resemble the size of a pick truck bed.

Page 9 - 9th paragraph

In general, any of these options would require the development of interlocal agreements regarding operation, maintenance, and response. I think this bears mentioning at some point in the document.

All Clear Comment: We agree with this thought process but can only recommend at this time until the COMMISSION adopts the recommendations.

General Suggestions

1. A pre-plan book - similar to the wildland pre-plan document NDF (Jim Reinhardt) did years and years ago in Carson City would be a good idea. This pre-plan book should include siding locations, meeting points, access issues, maps, mile markers, helispots, jurisdictional boundaries, etc. I think a document like this will be very handy for each of the fire/law enforcement agencies, the train operator, and the comm centers.

All Clear Comment: As mentioned on page 12 in the bulleted items those issues would be addressed in the emergency plan.

2. Given that a hi-rail vehicle may be very expensive, maybe a small unit, such as a specially equipped ATV or Ranger (again, stationed at each end) may be a short term solution.

All Clear Comment: These issues must be worked out prior to the future operator starting operation, we suggested larger equipment do to MCI issues and the pure weight of the train may require heavy rescue equipment.

3. Do you have any ideas what other tourist railroad emergency response agencies are doing. Maybe we are making a bigger deal out of this than we need to. Might be interesting to see what is happening in other locations.

All Clear Fire Training and Consulting

P.O. Box 367
Carson City, NV 89702

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All Clear Comment: Many of our recommendations are based upon what other tourist railroads are recommending as well as what may be imposed by the authority having jurisdiction.

4. Finally, and I'm probably sounding like a broken record here, but.....if the train's path is removing access into an area with already restricted access, they should be responsible for looking for alternative access routes and providing those for emergency response.

It should be noted that Mr. Tom Gray from the Virginia and Truckee Railroad was provided a copy of the recommendations and indicated that he wished to comment on the content. Unfortunately he had many scheduling conflicts and was unable to find the time to meet with us for discussion and inclusion into the comment section prior to the printing deadline.

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P.O. Box 367
Carson City, NV 89702

Fax (775) 883-0554
Phone (775) 883-0232
Cell (775) 720-1990

Executive Summary (11-2009)

INTRODUCTION

The NEVADA COMMISSION for the RECONSTRUCTION of the V&T RAILWAY is in the process of rebuilding the historic Virginia and Truckee rail line from Carson City to Virginia City. Sufficient track has been completed to begin limited operation.

The COMMISSION will be seeking a permanent operator to run the tourist rail line that will require an emergency response plan and procedures governing the rail line operation. GEOCON Consultants using All Clear Fire Training and Consulting has developed a list of recommendations for the COMMISSIONS consideration.

The above mentioned recommendations have been circulated to the Public Service Agencies with whom the train operator will have to develop a working relationship. It must be noted here as of this date the recommendations have **NOT** been acted upon by the COMMISSION at this time.

GOALS and OBJECTIVES

The goals are to proactively provide maximum safety for train passengers, employees the environment as well as the three counties the train will traverse through. The objectives will be the physical management and application of a comprehensive emergency and risk management plan coupled with the recommendations as detailed elsewhere in this document.

CHALLENGES

- The selection of a train operator, adopting fire and safety recommendations, as well as the subsequent development and application of an all hazard all risk plan is the first hurdle.
- Initial and continuing compliance with governmental regulations is absolute as well as continued oversight by the COMMISSION or its designee.
- Other major challenges will be in the area of getting first responders to the scene during times of critical need along with adequate equipment, effective wireless (legal) communications and a well trained and properly staffed work force.
- A critical component of the emergency plan must include the ability of the operator to track, locate, communicate with the train and then direct emergency crews to the scene of incident.

All Clear Fire Training and Consulting

P.O. Box 367
Carson City, NV 89702

Fax (775) 883-0554
Phone (775) 883-0232
Cell (775) 720-1990

CONCLUSION

The COMMISSION has a duty to insure that the riding public is afforded a safe and accident free tour via the train ride. Every effort must be made with a diligent proactive approach to safety. The use of applicable risk management techniques will take form as adopted by the COMMISSION and then applied by the train operator.

Continued safe and reliable train operations will go a long way to insuring that the riding public will return again and again to enjoy the areas rich history and cultural attractions.

Accidents are a fact of life, when and if one does occur the preparation and diligence put forth now will pay dividends later.

A through reading of the recommendations found else where in this document should be mandatory reading for those in a position of authority.