Establishing a Damage Assessment Process for El Paso County

Emergency Services Division

James Reid

El Paso County Sheriff’s Office, El Paso County, Colorado

December 2008
Appendix Not Included. Please visit the Learning Resource Center on the Web at http://www.lrc.dhs.gov/ to learn how to obtain this report in its entirety through Interlibrary Loan.
CERTIFICATION STATEMENT

I certify that this paper constitutes my own product, that where the language of others is set forth, quotation marks so indicate, and that appropriate credit is given where I have used the language, ideas, expressions, or writings of another.

Signed:___________________________
Abstract

The problem was that El Paso County (EPC) does not currently have a procedure to perform either rapid damage assessment or a full damage assessment following a major incident, creating an injurious situation to the community. The purpose of this action research project was to review and discuss methods currently utilized by agencies that have either had to complete a damage assessment, both rapid and full and to recommend procedures for EPC. It is expected that this project will be used to establish procedures for the damage assessment process within EPC. This research project considered the following questions: 1) Who would be utilized to provide initial and long term damage assessment?, 2) What procedures will be followed for the damage assessment?, 3) What process will be used for the initial (rapid) and later for the final damage assessment?, 4) How will this research project impact the damage assessment process within the County Emergency Response Plan? Methods utilized will include literature review, interviews of key individuals who have participated in this process, and a documented evaluation of the suggested process by the EPC local emergency managers or key players within the plan. Recommendations include: establishing a rapid and long term damage assessment policy, identifying key personnel who will collect and interpret the gathered information and formulating and implementing guidelines to communicate and record damage assessment information.
Introduction

The problem is that El Paso County (EPC) has no established policy for damage assessment, either rapid or long term. El Paso County is subject to flash flooding, major wildland fires including wildland urban interface fires, winter blizzards and possible terrorist activity due to five military bases located within the county.

El Paso County (EPC) works closely with 25 fire districts during major events. The Office of Emergency Management works under the direction of the County Fire Marshal. The Emergency Operations Plan has been under an intense rewrite for several months. During my attendance at the National Fire Academy, Executive Analysis of Fire Service Operations in Emergency Management it was very clear that a process for damage assessment needed to be researched and established within El Paso County. El Paso County’s exposure to a large loss of structures and infrastructure is great considering the extensive wildland urban interface areas within the county and the high potential for tornados and floods on the prairie. The purpose of this action research project is to provide a damage assessment plan that meets local, state and federal requirements that covers both rapid and long term assessments. A comprehensive plan will ensure that the residents of EPC, the local emergency responders and government leadership is properly informed and served.

The objectives of this project are to explore and research methodologies from the experience of others and literary research in order to provide a product that provides a comprehensive and systematic approach. This product should provide local emergency responders, emergency managers and government leadership the information needed to make
decisions that are in the best interest of the community. The listed below research questions will be researched in order to compile the plan:

1) Who would be utilized to provide initial and long term damage assessment?

2) What procedures will be followed for the damage assessment?

3) What process will be used for the initial (rapid) and later for the final damage assessment?

4) How will this research project impact the damage assessment process within the County Emergency Response Plan?

**Background and Significance**

El Paso County is located in south-central Colorado Pikes Peak Region and includes portions of the Rocky Mountains as well as the western plains. The area is known as the “Front Range” of the Rockies, with canyon and arroyo pocked plains, rising mountains and elevation changes that extend from 6000 MSL to over 14,000 MSL. The County is the most populous in the state with over 550,000 residents, (US Census Bureau, 2007) and encompasses an area twice the size of Rhode Island with 2,126 square miles (US Census Bureau, 2007). It includes mountainous terrain in the western portion and prairie or valley and vale pocked plains in the eastern sector. The elevation of the County varies from the top of Pikes Peak (14,110 feet) to Black Squirrel Creek on the southern county line at 5,095 feet. The majority of the county’s land area is unincorporated.

El Paso County is urban along the Interstate 25 corridor but primarily rural elsewhere. This urban area contains a large Wildland Urban Interface (WUI) with an estimated 36,000
homes in the WUI. There are over 20 census recognized small population centers, communities and incorporated towns within the County, as well as one large city that is Colorado Springs. Located at an elevation of 6,035 feet above sea level, it is the second largest city in the county and is growing bedroom communities into the wildland interface. Colorado Springs has an estimated population of 403,000. The city accounts for approximately 70 per cent of the county's population of approximately 575,850 (State of Colorado estimates since the 2000 census). There are 6 other municipalities that include Palmer Lake, Monument, Calhan, Green Mountain Falls, Manitou Springs, and Fountain. There are numerous population centers in the unincorporated area of the county that include Black Forest to the north; Security and Widefield to the south; Cascade and Chipita Park to the west, and Peyton, Falcon, and Ellicott to the east. There are also 5 military installations that are Schriever Air Force Base, Peterson Air Force Base, Fort Carson, Cheyenne Mountain Air Station, and the U.S. Air Force Academy. The County has a growth rate that is above the national average, which accounts for the rapid population expansion in the unincorporated areas of the County. Additionally, Fort Carson will increase in population between 2007 and 2010 by approximately 20,000 active duty personnel who will bring their families.

The economic lifeline is Interstate 25, a major north-south transportation route linking Interstate 70 and Highway 24, and a major rail line (Burlington Northern Santa Fe/Union Pacific) that supplies coal from Cheyenne, Wyoming to Las Cruces, New Mexico. These transportation routes are also major transportation routes for extremely hazardous material including Type III radiological material. Highway 24 is also a major HAZMAT route into the mountain communities that have major mining operations. Materials such as Quick Lime and hydrogen cyanide are routinely transported on this highway.
According to the County’s Pre-Disaster Mitigation (PDM) Plan, the hazards in the County include wildland fire, severe weather, hazardous materials spills, disease outbreak (human and animal), rock and landslides, earthquakes, military accidents, airplane crashes, extreme acts of violence in schools, terrorism, dam breach, and drought. The PDM further states that, based on historical factors (e.g. 10 year drought), population centers, and other factors such as weather trends (tornado and blizzard occurrence), the highest risks hazards are wildland fires, severe weather, hazardous material spills, pandemic flu, rock and landslides, and extreme acts of violence in schools.

One hazard not ranked high for probability of occurrence had one of the highest risks for damage which was an earthquake. According to the U.S. Geological Society, there are two active faults within El Paso County with a maximum estimated ranking on the Richter scale of 6.2. The impact of an earthquake of this magnitude would have a severe impact on the entire Interstate 25 corridor including the municipalities of Palmer Lake, Monument, Colorado Springs, Manitou Springs, and Fountain. Additionally, the location of the two fault lines could have an impact on several dams in the area. Of specific concern is Rampart Dam that if breached would send a wall of water 15 feet high through the U.S. Air Force Academy, down the Interstate 25 corridor impacting Colorado Springs, Fountain, and a large unincorporated area of El Paso County (person conversation with Patty Baxter, 2008).

Of the 6 high risk hazards listed in the PDM, three (wildland fire, severe weather, and hazardous material spills (specifically rail car caused) have the greatest potential for damage and the need for efficient damage assessment. Additionally, one hazard of low probability for occurrence but high probability of damage (earthquake) also requires well coordinated and
efficient damage assessment to ensure that personal as well as economic recovery is a speedy process.

The amount of exposure (potential) and the area that El Paso County covers (1,400 sq mile minus the 700 square miles of the City of Colorado Springs) makes it imperative that El Paso County have an organized and trained force for rapid and long term assessment.

This project is intended to meet the National Fire Academy operational objective (D) “to promote within communities a comprehensive, multi-hazard risk reduction plan led by the fire service organization”. By producing a systematic approach to damage assessment it is the intent of this project to provide guidance that will aid in developing a plan that will provide for a quick and accurate assessment of damage to a community. This systematic approach will allow for decisions to be made that will ensure the speedy recovery of the county’s residents and the infrastructure of the impacted community. This systematic approach is critical to the speed in which the affected community will be able to recover.

**Literature Review**

The purpose of this literature review is to gather information in order to provide the El Paso County Emergency Manager a recommended standard operating procedure for completing initial and final damage assessment. This standard operating procedure will include:

1. Who will be used for initial and long term damage assessment after an event?

2. What procedures will be followed?

3. What process will be used for the initial assessment and later for the final damage assessment?
Establishing a Damage Assessment Process for El Paso County

It is expected that portions of this suggested standard operating procedure is utilized to create El Paso County’s response plan to the Emergency Operations Plans for damage assessment.

In 2007 a risk assessment was completed by the El Paso Emergency Manager. This assessment produced the following risk hazards: Wildfire, Hazardous Material Spills, Severe Weather (Flooding, Tornados, Snowstorms, Lighting), Disease Pandemic, Landslides/Rockslides, Extreme Acts of Violence in Schools, Earthquake, Terrorism, Airplane Crashes, Dam Breach, Military Accident, Avalanche and Drought (Baxter, 2008). Based on conditions that make a certain hazard favorable the following hazards were considered highly likely to occur within the county: wildland fire, hazardous materials spills, severe weather, pandemic flu, and landslides/rockslides.

A survey of over 200 residents was conducted (via e-mail) to obtain public opinion on their perception of hazards and the probably of the hazard occurring. The residents overwhelmingly agreed that the following were the top 5 hazards of concern: wildland fire, severe weather, hazardous materials spills, extreme acts of violence, and pandemic flu.

Further, in the El Paso County Pre-Disaster Mitigation Plan it lists a short history of declared disasters. In 1999 the County suffered a severe flood worthy of a Presidential disaster declaration, in 2000 and 2002 a USDA declared drought, in 2003, 2006 and 2007 Declared Winter Storm Emergencies (Baxter, 2008). As the population within the County continues to grow with so many potential disaster scenarios the need for a systematic approach to damage assessment becomes more critical.

Damage assessment is defined as:
A coordinated process of determining the scope of local disaster impacts, including emergency needs, types of damages, and the extent of the impacts to the public infrastructure, residences and businesses (FEMA, 2007).

The key words in this definition are “a coordinated effort”. With all of the various first responders in the county it is critical that the effort applied to the damage assessment process is in fact coordinated.

The National Fire Academy (NFA) Executive Analysis of Fire Service Operations in Emergency Management (EAFSOEM) course damage assessment was one of the key areas of instruction. NFA provides for and defines two types of assessments. The first is the “Immediate Damage Assessment” (EAFSOEM, 2002, p. 6-5) and the second as the “Post Incident Assessment” (EAFSOEM, 2007, P. 6-7).

According to the NFA the immediate damage assessment is very important to determine what impact the incident will have to the community and the services that the government provides. This assessment is started when the first unit arrives on scene and provides a status report (EAFSOEM, 2002, p. 6-5). The culmination of initial reports would in fact provide some sort of picture albeit incomplete to some extent as to the impact of the event. One of the suggestions from the NFA is to utilize a helicopter as the quickest method of initial damage assessment (EAFSOEM, 2002, p. 6-6).

The Post incident damage assessment is defined by the NFA as a “detailed examination of the total damage at a specific site or within the incident area (EAFSOEM, 2002, p. 6-3). This assessment usually occurs after the emergent portion of the event is completed and the situation is stabilized (EAFSOEM, 2002, p. 6-7). This particular assessment is not as time critical and is a
more detailed evaluation of the event. This assessment is critical to determine actual cost of repairs for reimbursement from the appropriate agencies (EAFSOEM, 2002, p. 6-5). What is important is that NFA suggests that this assessment be completed by a team of experts from multiple agencies (EAFSOEM, 2002, p. 6-5).

FEMA breaks the damage assessment process into three phases, Rapid Assessment, Initial Damage Assessment and Preliminary Damage Assessment. Rapid assessment is used to identify public safety impacts such as hospitals and utilities interruptions, access to roads, bridges airports and is primarily used to address immediate public safety needs. Initial damage assessment is used to identify the extent of the damage to infrastructure, homes, and businesses, determine how many people are displaced, determine possible funding needs and is the beginning of the short term recovery. Preliminary damage assessment is a formalized local, state and federal inspection, more detailed, used to determine federal disaster assistance and is based on the initial damage assessment (FEMA, 2007). It is important to understand these three phases as they directly relate to process in which operates. If federal assistance will be applied for then it is importance that the process used closely mirror FEMAs’ approach.

Initial assessment determines response requirements and resources required to respond to an event. This assessment is broad in scope and will focus on the magnitude, impact and responder capacity. It also determines the other threats (or secondary effects), that may arise and at what level (Plantiz, 1999).

Plantiz further defines that a detailed assessment is aimed at long term recovery and develops the requirements for that recovery. It should cover the future economic and social
development strategy. As in EAFSOEM, Plantiz too states that this type of assessment should be carried out by specialists (Plantiz, 1999).

On May 23rd, 2008 the town of Windsor Colorado suffered a major tornado incident. Approximately 200 homes were damaged and half of those were destroyed (Nicholson K., 2008). Chief Brain Martens was contacted to discuss his process for damage assessment and the role of the fire department. The fire department in this case did not participate in the damage assessment other than the initial response. Once the danger had passed Chief Martens was able to get a bird’s eye view of the damage via a news helicopter that was covering the story. Using the media for an initial overview is not uncommon in El Paso County as this has been the practice for several wildland fires. The Colorado Division of Emergency Management (CDEM) ordered a Type III Incident Management team that arrived on scene within a few hours; their planning team started organizing the initial damage assessment (B. Martens, personal conversation December 5, 2008). The process for total damage assessment was started with the FEMA Team the very next morning. The damaged area was divided into 6 divisions and every house was photographed and the damage documented (B. Martens, personal conversation December 5, 2008). Chief Martens was asked if the City had enough personnel to work with the FEMA inspectors to inspect the infrastructure. Chief Martens sated “There were not enough city inspectors; however, engineering inspectors from Northern Colorado volunteered to come to the city to assist in the assessment process so there was enough assistance (B. Martens, personal conversation December 5, 2008)”. Once a unified command was established with the Police Department and the area of damage was secured the Fire Departments role was very minimal in
regards to the damage assessment as it became a key role of the City’s Office of Emergency Management.

Damage assessment needs, the design of that assessment, and the process by which that assessment should be carried out should be planned in advance. It is recommended that specialist in the field should be surveyed to determine what data is required and what is the best way to obtain that data. It is suggested that survey techniques, checklist and procedures be established for an event (Plantiz, 1999). Plantiz has also stated that assessments should be carried in 4-5 member teams with multi-disciplinary backgrounds. Again, a similar recommendation was made in the EAFSOEM course (EAFSOEM, 2007, P. 6-7).

The Red Cross has a system to assess and track damages (Williams, 2008). In fact the Red Cross has trained teams that assess damage along with geographical information to determine what their response needs will be. The Red Cross works closely with FEMA to share their Geographical Information System. By utilizing their system they are able to look up an individuals home to determine the extent of the damage. This information is critical when determining the level of assistance the Red Cross will provide to that family (Williams, 2008).

Damage assessment activities should be performed as soon as reliable estimates become available (Department of Local, 2007). Guidance from the Department of Local Affairs includes:

1. Assigning a damage assessment coordinator

2. Perform a windshield survey (initial)

3. Obtain maps and highlight infrastructure and other affected areas
4. Divide the area into sectors

5. Completely document all costs

6. Complete situation reports

7. Determine the need for outside technical support

Damage assessment is vital in the initial minutes of disaster response. This assessment determines the impact and the resources needed to address the impact and to establish strategic priorities (McEntire & Cope, 2004). Before a disaster can be declared at the federal level, sufficient evidence must be gathered about damages and financial loss (McEntire & Cope, 2004). This would place a strong emphasis on the Preliminary Damage Assessment (PDA).

Another key player in the damage assessment process is the insurance companies, especially when it comes to Individual Assistance. In Colorado there is an organization that is comprised of several insurance companies by the name of the Rocky Mountain Insurance Association (RMIA). The Association was contacted to determine their role in the event of mass destruction. RMIA has a mobile unit in Denver that is staffed by several insurance adjustors. The adjustors are members of the major insurance carriers in the state. This team of adjustors will self deploy to a location in an attempt to start the process of claims adjustment as soon as possible (C. Roffet, personal conversation, December 15, 2008). A couple of key points were discovered during a later conversation with the manager of RMIA. The insurance companies can provide general consumer information to displaced residents (C. Walker, personal conversation December 15, 2008). The Hayman Fire in 2002 several jurisdictional lines were crossed which caused a lot of confusion for the RMIA when trying to accomplish the damage assessment
process. RMIA can be very helpful during the damage assessment process for the local responders. Training can be provided to first responders on determining the extent of the damage, assistance with the actual cost assessment can occur and being part of the Joint Information Center (JIC) RMIA can assist with reporting accurate damage costs to the public. RMIA can also provide information for the Individual Assistance requirements as to which homes are insured and those that are not. RMIA is fully automated and can bring that resource to bear to any community that may need it for the purposes of assessment tracking. Also, if possible having an insurance adjustor as part of the PDA assessment team is critical for determining the actual loss and repair of replacement costs of homes and in many cases infrastructure (C. Walker, personal conversation, December 15, 2008).

The Colorado Division of Emergency Management point of contact for recovery Marylyn Galley was contacted as to what she thought was some key points that should be included in a damage assessment plan.

- A single point of contact that understands damage assessment and can provide the actual cost should be established. Too many times FEMA has arrived to find that the Department of Transportation has a piece of information, the various utilities representatives have some information and the first responders have information. Problem is no one has the big picture (C. Roffet, personal conversation, December 15, 2008).

- Someone should be available to support the FEMA team when they arrive to complete the PDA. The information they will be looking for is knowledge of
the county or city infrastructure, what has been damaged and what will it cost for repair or replacement.

- The municipality risk manager should be aware of what is insured and to what level is that facility or piece of infrastructure is insured.

In many cases the fire departments initial assessment gets confused with the State’s request for an initial assessment. Experience has shown that the fire department’s initial assessment is based on needs to handle the situation; our initial assessment is to determine at what level we start asking for assistance. There are times when the two get confused (M. Galley, personal conversation, December 17, 2008).

El Paso County suffered a blizzard in 1997 that crippled the entire county for almost 48 hours. The damage assessment could not really begin until the sun was up and first responders could mobilize. One of the things that we could have done better as a result of that incident was to sector the hardest hit areas of the county into smaller search areas and document time and hours spent on search and rescue missions more thoroughly. That would have made us working with out FEMA partners much easier when it was time to complete the claim (J. Mesite, personal conversation, November 24th, 2008).

The damage assessment threshold for disaster declaration by El Paso County is currently assessed at $1,437,063. The State of Colorado’s threshold is $4,301,261 before a federal disaster declaration can be accomplished. These thresholds are based on the current population of the county and the state and a per capita dollar value per resident (Baxter, 2007). These are key numbers that will drive the notification levels during damage assessment process.
Procedures

The purpose of this applied research project was to establish a suggested standard operating procedure for the damage assessment process. This was completed through literature review and interviews. During the EAFSOEM course the importance of damage assessment became very clear and it was evident that El Paso County needed some type of formal guidance in this matter.

Research for this applied research project began at the NFA in Emmitsburg, Maryland while attending the EAFSOEM course. Several key words such as damage assessment, rapid assessment, windshield survey and damage assessment plans were used as a search. Several articles, applied research projects and reports were located. References were gathered at that time.

The multiple references were located and studied to see how they applied to the research questions. Some of the literary research was conducted through the internet using www.google.com as the search engine. The internet yielded multiple plans and resources for this project. The FEMA website provided excellent resource material.

Telephone interviews were conducted with Chief Brain Martens, Patricia Baxter, Jim Mesite, Cathy Roffet, Carol Walker, Jaici Williams, and Marylyn Galley to discuss the processes that were used during actual events or to gather ideas that would be critical for a good damage assessment plan.

Chief Martens is the fire chief for the Windsor Fire Department and the initial incident commander on the scene of the tornado. His role in the damage assessment process is important
to this project. When asked his role in the assessment process he initially did not think he actually had one. It was discovered though that he used a helicopter to fly over the damaged areas and reported that information back to the office of emergency management.

Patricia Baxter is the OEM Manager for El Paso County. Patty recently completed the pre-disaster mitigation plan for the county and has a wealth of knowledge of what disasters face El Paso County.

Jim Mesite is the previous OEM Manager for El Paso County and has on at three occasions (2 blizzards and 1 flood) declared disasters and gone through the PDA process. Jim retired after serving El Paso County for 15 years. He was an excellent resource regarding the FEMA inspection process.

Cathy Roffet and Carol Walker are the two key personnel in the RMIA. They have responded to several disasters such as the Los Alamos Sierra Hunte fire and the Hayman fire. Their combined experience as private sector members who have worked with FEMA closely on IA and PDA claims was important to this research as their combined experience brought forth some critical elements of the proposed disaster plan.

Marylyn Galley from the Colorado State Office of Emergency Management has worked with FEMA representing the State of Colorado for many years. Whenever there is an IA or PDA claim being accomplished within the State Marylyn is there to assist the filing agency and walk them through the FEMA process. Marylyn also provided some key points for the proposed plan.

A meeting was held on December 18th, 2008 with the El Paso County Emergency Manager Patricia Baxter, Memorial Health Systems Emergency Manager Cindy Corsaro, the
City of Fountain Emergency Manager Fire Chief Darin Anstine, the Teller County Emergency Manager Greg Griswould, and the Pikes Peak American Red Cross Emergency Services Coordinator Jaici Williams to discuss the proposed standard operating procedure. Other area emergency managers were invited but did not attend. The intent of the meeting was to determine the applicability and completeness of the suggested SOP. The results of that meeting are in the results section of this project.

Information for the Background and Significance portion of this applied research project was derived from the El Paso County Pre-Disaster Mitigation Plan, El Paso County Assessors website, Colorado College website, USGS website, and the United State Census Bureau.

For the questions, answers were located in the American Red Cross website, Colorado Department of Local Affairs Handbook, Federal Emergency Management (FEMA) website and handbooks, National Fire Academy EAFSOEM in residence course and student manual, Quick Response Report for the Paso Robles Earthquake and the South Pacific Disaster Reduction Programme downloaded from the internet.

The telephone interviews were instrumental to get the prospective of individuals as to what went well for them and what process or procedure could they have done better during the damage assessment process.

**Limitations**

This research revealed the abundance of research completed on just the initial assessments for fire departments. Many of the applied research projects discussed in great detail
the need for procedures and training for initial assessments that will be completed by their department.

El Paso County is unique in the fact that there are 25 fire protection districts within the county. The turn-over in these departments can be great often times creating inconsistency. This in itself poses a problem for uniform initial assessments. El Paso County Office of Emergency Management (EPCOEM) which is under the direction of the Fire Marshal has no authority over any of the fire districts. Henceforth the direction of this project was to formulate a standard operating procedure for the emergency operations plan that can be utilized across the county.

There were no limitations as to the amount of research material available. In fact there was an overwhelming amount of reference material available for this project.

**Results**

Question 1 dealt with who would be responsible for the initial and later the long term damage assessment process. This was answered several times in the FEMA, EAFSOEM and in the telephone interviews with Chief Martens of Windsor Fire Department and Marylyn Galley of the Colorado State Division of Emergency Management. The first responders would provide an initial assessment to determine the needs to handle the situation. Once the area is secured, a more focused assessment will occur by experts such as the Red Cross, County Assessor and possibly with the participation of RMIA.

Question 2 dealt with what procedures will be utilized for the damage assessment? One of the key elements that was repeated was to ensure that responsibilities were defined and that the information regarding the damage was centrally monitored. This was successful in the
Windsor tornado because the Windsor Office of Emergency Management coordinated the damage assessment process and collected all of the information. Ms. Galley expressed the same concern regarding a single point of contact that would have all of the information. In the recommended plan the El Paso County Assessors Office is the central hub for all of the damage assessment information. This office should be able to provide accurate valuations of both government infrastructures for the PDA and private home values for IA.

Question 3 dealt with what processes will be utilized for initial and later for final damage assessment? In the recommended plan processes have been established for El Paso County based on the make up of the county and what would be available to the Office of Emergency Management. The processes listed are very similar to the suggested process by FEMA and the EAFSOEM course material. Most of the previous processes in the old plan were updated.

Question 4 dealt with how will research project impact the damage assessment process within the County Emergency Response Plan? The proposed plan is much more detailed and uses existing FEMA forms. The proposed detailed process will hopefully clarify exactly who is responsible for what. By using existing FEMA forms the transfer of information should go smoothly. Experience has shown that FEMA may utilize different pricing than the County Assessment Team. This is why it is important that the local experts and FEMA members work together to settle any monetary disagreements (M. Galley, personal conversation, December 17, 2008). Using standardized forms should eliminate some of the confusion.

Results of the meeting to review the plan brought forth some lively discussion. Ms. Corsaro liked the detail of the plan. She will most likely adopt most of the plan that she can
apply to the main hospitals. Mr. Griswould of Teller County does not have the resources, specifically the experts that El Paso County has, and discussed mutual aid efforts between the his county and El Paso County that could be utilized. He especially liked the fact that existing FEMA forms were used. Chief Anstine thought the plan was well thought out and very detailed. He felt that the fire department could probably assist more in the area of working with the DAT teams to provide scene safety monitoring. Ms. Williams from the Red Cross also liked the detail and that the tasks were broke down by discipline. Ms. Baxter the El Paso County OEM Manager wants to brief the plan to the key players and then practice each of the procedures with the responsible parties. All agreed that the plan should be exercised prior to approval or adoption.

**Discussion**

Because of the geographical diversity of El Paso County it is poised for several natural and man made disasters. The county has wide expanses of dry arid prairie, large wildland urban interfaces, 5 military installations, seasonal severe lighting storms, blizzards and flooding. The housing market has only recently slowed down with the poor economy.

Damage assessment is essential to determining the type and amount of assistance that the community will need and or qualify for (FEMA, 2007). The initial assessment completed by the first responders will provide the county emergency manager with the information required to determine if State or Federal assets are required. Insurance agents are a great resource for procedures and training because this is a part of what they do for a living. In fact it is helpful that they are part of the assessment process because they can work closely with the FEMA assistance team in determining actual loss (C. Walker personal communication, December 17, 2008).
Being prepared for an organized damage assessment event will address a multitude of issues. There is the Public Assistance (PA) portion of the assessment and the Individual Assistance (IA). Qualification for PA is based on meeting established state thresholds. PA is aid to the state or local governments to pay part of the costs of rebuilding of the community’s damaged infrastructure, usually around 75% (The Disaster Process, 2007). Individual assistance makes available to the those private citizens who have suffered a great loss such programs as disaster housing, disaster grants, low interests loans and other disaster aid programs (The Disaster Process, 2007).

Rapid assessment must be conducted, at least initially, most likely with local resources only. In any event, rapid assessment information lays the foundation for determining immediate response efforts (National Fire Academy(a), 2007 P. 1).

Staffing is key and involves teamwork. Initially the staffing may be limited to first responders such as fire, law enforcement personnel, public works and possible other community resources (National Fire Academy(a), 2007 P. 1). With 25 volunteer fire districts staffing may not be an issue depending on the time of the day. The County could always utilize City fire inspectors to assist initially. Success for the damage assessments conducted in Paso Robles, California was attributed to exercising the plan before the event (McEntire & Cope, 2004). After a short discussion with the El Paso County Fire Chiefs Forum on November 24th it was discovered that not one of the 12 departments in attendance had plans or any type of training in damage assessment. The consensus of the group was that our office establish the procedures so that they could be trained on the process and requirements.
From all of the literature reviewed it was reinforced that a good plan is required for a successful damage assessment process. Damage assessment is critical for determining immediate community needs and the affect the damage has on the community’s infrastructure. The information gathered both initially and later into the incident will determine the type of assistance required in order to get the community on the road to recovery after a major event. It is important to know how damage assessment information is obtained and processed, and how it can be used to facilitate a community’s recovery from a disaster (National Fire Academy, 2007, P. 6-3).

Recommendations

The first recommendation is that the El Paso County OEM Manager take portions of the proposed plan and discusses them in detail with the proposed key player to ensure feasibility. This plan will have to be fluid as El Paso County has just recently closed several departments due to the financial crisis it is facing. Appendix A Contacts was left blank for this reason. Since the time the proposed plan was submitted several departments have been eliminated.

The second recommendation is that once the El Paso County OEM Manager is satisfied with the plan that a State OEM review occur prior to adoption. By informing the State OEM Office of the plan they are aware of the actions that will occur prior to their arrival and assistance.

A third recommendation is to determine what role RMIA has in the damage assessment process. They were not placed in the proposed plan due to possible liability and legal issues that
must be further explored. Discussions have already been planned to discuss training and damage record establishment and coordination of efforts.

The damage assessment plan needs to be practiced. Homeland Security has placed a large emphasis on exercise and training. Damage assessment should always be part of either the table top exercises or the full scale functional exercises.

Finally, El Paso County should adopt this damage assessment plan.
References


Baxter, P. (2008), *All-Hazards Pre-Disaster Mitigation Plan,* El Paso County, CO

Pre-Disaster Mitigation Plan.


Appendix A