Emergency Support Function #2 – Communications

ESF Coordinator:

Information Technology Department

Support Agencies:

Tucson Fire Department
Parks and Recreation Department
Tucson Police Department
Tucson Water Department
Cell Phone Network Providers
Other Phone Service Providers
Pima County Office of Emergency Management & Homeland Security
R.A.C.E.S.

Primary Agency:

Information Technology Department
General Services Department

Purpose

The purpose of Emergency Support Function #2 – Communications is to organize, establish and maintain the communications capabilities necessary to meet the operational requirements of the City of Tucson in preparing for, responding to, and recovering from emergencies and disasters.

It also provides guidance for rapid alerting and warning to key officials and the general public of a potential or occurring emergency or disaster.

Scope

ESF #2 discusses the use and maintenance of telecommunications systems for emergency management functions within the City of Tucson government during times of disaster. Those systems include voice, data and radios. Specific operating procedures and protocols are addressed in procedure manuals of participating departments.
Situation

Emergency/Disaster Conditions and Hazards
The City of Tucson will periodically experience emergency situations that require heavy use of current communications systems. Some communications systems may be damaged or destroyed due to natural or technological disasters. The high demand for communications equipment during these times may dictate a need for reprioritization or reallocation of working systems.

Emergency or disaster warning may originate from any level of government or other sources. Some weather related disasters are foreseeable for several days prior to the incident. Weather warnings, watches, and advisories are issued by the National Weather Service well in advance whenever possible. Floods and fires sometimes build over several hours or days, allowing some time for warning and preparation. Other incidents such as severe thunderstorms or hazardous materials releases offer no opportunity for warning, though in some cases impacts may be lessened by actions taken after the incident.

Planning Assumptions
- An Automated Emergency Notification System exists in the City of Tucson or Pima County that will alert citizens to threatening disaster or emergency situations (MyStateUSA).
- There will be occasions when there is no time or mechanism to provide warning.
- Communications systems are vulnerable and may be damaged, destroyed, or overwhelmed during and following an emergency or disaster. Due to disrupted transportation routes, weather conditions, a lack of resources, or the level of damage, repairs to communications equipment and the infrastructure could take days, weeks, or months.
- The Emergency Alert System (EAS) transmits warnings initiated by local, state, or federal authorities, relying on radio and television broadcasters to relay messages to the public. Broadcasters are not required to relay local or state warning messages, yet are required to relay presidential messages initiated by the National Warning Center. Once the initial warning is accomplished, public information officers within the City and County EOCs will keep the public informed of what actions to take to prevent injury or property loss (see ESF #15 – Public Information for further information).
- Alternate communications systems such as the Pima County RACES (Radio Amateur Civil Emergency System) amateur radio system will be used in a manner consistent with the procedures of the Pima County Office of Emergency Management and Homeland Security.
Concept of Operations

General
Reliable communications capabilities are necessary for day-to-day government operations, warning the public of impending events, management of response and recovery efforts, search and rescue missions, and coordination with other organizations. Communications capabilities must be available for emergency management functions in the City of Tucson Emergency Operations Center, alternate EOCs, and in the field.

Methods of warning key officials and the public of threatening situations include the Automated Emergency Notification System (MyStateUSA), the Emergency Alert System, the National Weather Service, media broadcasts, telephone or radio notification, public address announcements, person-to-person contacts, and the Internet.

The City of Tucson Communications Center maintains multiple levels of redundant voice and data communications capabilities (including backup power generation), for notification and warning of key officials and the public. The center also maintains redundant systems for receiving and sending warning messages. Procedures addressing the operations of communications equipment in the Communications Center may be located in their Standard Operating Procedures (SOPs).

Specific systems in place within the City of Tucson include:
- Facsimile machines and broadcast fax
- Internet communications
- Radio networks
- Fiber networks
- Microwave networks
- Pagers
- Telephones, satellite phones, and cellular phones
- Local television, and AM/FM radio stations.

Comprehensive Emergency Management

Preparedness
ESF #2 primary and support agencies are responsible for ensuring that the following preparedness items are fully addressed:
- Review and revise their Standard Operating Procedures (SOPs)/Standard Operating Guidelines (SOGs) annually
- Establish procedures for alerting their own personnel and other key employees in an Incident of Local or Regional Significance
- Update equipment and resource listings on an annual or more frequent basis, and distribute them appropriately
- Revise mutual aid agreements as needed
- Train employees on specific ESF functions
- Develop interests and partnerships with businesses and communications support agencies
- Regularly attend scheduled tabletop exercises and all other applicable training events
• Review and analyze lessons learned in emergency/disaster incidents that have occurred elsewhere, and make appropriate corrections/additions to their respective SOPs/SOGs and this ESF

Response

ESF #2 primary and support agencies are responsible for ensuring that the following response items are fully addressed:
• Establish and maintain contact with the Incident Commander and/or appropriate Emergency Operations Center (EOC) for instructions
• Determine operational capacity of all communications systems available in the City of Tucson, Pima County, and the region
• Maintain ongoing information exchange with ESF #5- Emergency Management
• Maintain complete and accurate documentation of all related costs, actions, and communications

Recovery

ESF #2 primary and support agencies are responsible for ensuring that the following recovery items are fully addressed:
• Consult with ESF #5 and ESF #14 – Long-term Community Recovery & Mitigation regarding needed recovery strategy
• Restore and temporarily repair critical City of Tucson communication facilities and systems
• Assess losses of equipment and personnel, develop estimates of monetary loss, and identify possible funding sources
• Assess the need for critical incident stress management for personnel

Mitigation/Prevention

• Conduct threat, risk, and vulnerability assessments of key ESF infrastructure
• Review and analyze lessons learned in emergency/disaster incidents that have occurred elsewhere, and make changes where applicable
• Reconstruct damaged or destroyed facilities and mitigate deficiencies where appropriate
• Replace equipment, vehicles and/or personnel

Responsibilities

Primary Agencies: Tucson Information Technology Department (IT), and General Services Department
IT is responsible for ensuring that communication functions and operations are protected and reconstituted as soon as possible following an Incident of Local or Regional Significance. As such, their duties/responsibilities include:
• Pre-incident planning and coordination.
• Coordinate the maintenance and continued operations of Internet communications during times of disaster. This includes the assessment and restoration of Internet connectivity for the City of Tucson’s Emergency Operations Center.
• Coordinate the restoration and continued operations of the City’s radio network(s), data networks, wireless networks, landline telephone service, and cell phone and satellite phone services with other City departments and the private sector.
• Manage the financial aspects of ESF #2 response, including the funding of mission assignments and/or reimbursable agreements.
• Maintain ongoing contact with ESF primary and support agencies.
• Conduct periodic ESF meetings and/or conference calls.
• Coordinate ESF activities relating to Incidents of Local or Regional Significance, catastrophic incident planning, and critical infrastructure preparedness, as appropriate.
• Coordinate training and strategies with the appropriate local, regional, state, or federal agencies.
## Support Agencies

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| Tucson Fire Department                      | • Personnel in the Department’s Communication Section will provide assistance and expertise to ensure the radio dispatch system is maintained and kept in an operable condition.  
• When feasible, the department’s mobile communications center may be used to supplement the overall communications mission of the City.                                                                                                         |
| Parks and Recreation Department             | • May provide radio assistance, if available.                                                                                                                                                                                                                                                                                           |
| Tucson Police Department                    | • Personnel in the Department’s Communication Division will provide assistance and expertise to ensure the radio dispatch system is maintained and kept in an operable condition.  
• When feasible, the department’s Mobile Command Post may be used to supplement the overall communications mission of the City.                                                                                                                                 |
| Tucson Water Department                     | • Personnel in the Department’s Communication Center will provide assistance and expertise to ensure the radio dispatch system is maintained and kept in an operable condition.  
• May provide radio assistance, if available.                                                                                                                                                                                                                                      |
| Cell Phone Network Providers                | • Coordinate the provision of cell phone service in the event of an Incident of Local or Regional Significance                                                                                                                                                                                                                           |
| Other Phone Service Providers               | • Coordinate the provision of phone service in the event of an Incident of Local or Regional Significance                                                                                                                                                                                                                               |
| Internet Service Provider                   | • Coordinate the provision of internet service in the event of an Incident of Local or Regional Significance                                                                                                                                                                                                                           |
| Pima County Office of Emergency Management & Homeland Security | • Develop and maintain operational procedures for activating and testing the Emergency Alert System (EAS). PCOEM will coordinate with the local, state, and federal agencies and members of the media regarding improvements to EAS activation procedures.  
• Coordinate with state and federal agencies regarding the use of state and federal communications on a daily basis and during emergencies and disasters.                                                                                                         |
| Radio Amateur Civil Emergency Services (R.A.C.E.S.) | • Provide amateur radio service for the region that will be initiated and coordinated by the Pima County Office of Emergency Management and Homeland Security.                                                                                                                                   |