



Hazard Mitigation in the Guadalupe River Basin

Protecting the Region Against All Hazards

2004 - 2009

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Executive Summary

Purpose and Process of Development

This Hazard Mitigation Plan for 2003-2008, entitled, “Hazard Mitigation in the Guadalupe River Basin: Protecting the Region Against All Hazards,” was prepared by twenty-six cities and counties with the support of the Guadalupe-Blanco River Authority (GBRA) and its contractor, H2O Partners, Inc. of Austin, Texas.

This Hazard Mitigation Plan is a five-year blueprint for the future, aimed at making GBRA and communities in the Guadalupe River Basin disaster resistant by reducing or eliminating the long-term risk of loss of life and property from the full range of natural and man-made disasters. It meets the requirements of the Disaster Mitigation Act of 2000 (P.L. 106-390); Part 44 of the Code of Federal Regulations, Part 206; and State of Texas Division of Emergency Management standards. An open public process was established to provide multiple opportunities for all sectors in the basin to become involved in the planning process and make input during its drafting stage.

Hazards Facing the Guadalupe River Basin

The Plan identifies and assesses the potential impact of twelve natural and man-made hazards that threaten the Guadalupe River Basin. Hazards were identified based upon a review of historical records, national data sources, existing plans and reports and discussions with local, regional and national experts. The hazards were each profiled based on their severity of impact, frequency of occurrence, seasonal patterns, warning time, cascading potential and existing warning systems. An inventory of populations, buildings, critical and special facilities and commercial facilities at potential risk was conducted. The probability of occurrence and potential dollar losses from each hazard were estimated using the Federal Emergency Management Agency’s Hazards U.S. (“HAZUS”) Multi-Hazards Model and other HAZUS-like modeling techniques. The hazards were then prioritized based on potential damages in terms of lives lost, dollar losses and other community factors. In order of priority, they are:



- Hurricanes
- Flooding
- Thunderstorms
- Drought
- Hailstorms
- Tornadoes
- Urban and wildland fires
- Winter storms
- Hazardous materials incidents
- Energy pipeline failures
- Dam failures
- Terrorism

Mitigation Vision

Based upon the hazard identification and risk assessment, a vision statement, six goals and nineteen objectives were developed to guide the jurisdictions in the Guadalupe River Basin in reducing or eliminating the long-term risk of loss of life and property from the full range of natural and man-made disasters. The mitigation vision for the Guadalupe River Basin is:

- Intergovernmental coordination and cooperation on mutual issues of concern related to floodplain management and hazard mitigation.
- Local governments and regional entities with high levels of capability for hazard mitigation planning and project implementation, leveraging State, Federal, and private resources for investments in mitigation;
- Buildings located outside of hazardous areas and built to withstand the natural and man-made hazards that threaten them;
- An informed citizenry aware of the risks they face and the measures that can be taken to protect their families, homes, workplaces, communities and livelihoods from the impact of disasters; and
- Basin communities integrating hazard mitigation concerns into routine planning and budgetary decisions and plans for future growth and development; with disaster resistance an integral part of the livability and sustainability of the basin.



Goals and Objectives

The goals of the Plan are stated below. Objectives in support of these goals are reported in Section 17 of this Plan.

Overall Goal

To reduce or eliminate the long-term risk of loss of life and property damage in the Guadalupe River Basin from the full range of disasters.

- GOAL 1. Increase the coordination and cooperation among intergovernmental entities in carrying out hazard mitigation.**
- GOAL 2. Build the capability for carrying out hazard mitigation activities.**
- GOAL 3. Heighten public awareness and support for hazard mitigation.**
- GOAL 4. Protect public health and safety.**
- GOAL 5. Protect existing and new properties.**
- GOAL 6. Promote growth in a sustainable manner.**

Mitigation Actions

First, this Hazard Mitigation Plan sets forth twelve basin-wide mitigation actions to be taken collectively by the jurisdictions in concert with the Guadalupe-Blanco River Authority. These are presented in priority order. Secondly, it sets forth mitigation actions to be undertaken by the GBRA. And thirdly, it sets forth mitigation actions and action plans to be carried out individually by the 26 participating jurisdictions to reduce the risks to these hazards. Each action is presented in the Plan along with a description of the action, estimated costs, benefits, the responsible organization for implementing the action, an implementation schedule, objective(s) to which it relates, priority, and potential funding sources.

Some of the actions are directed at reducing the risk from a single hazard, such as flooding. Other actions pertain to multiple hazards or all twelve hazards. These twelve hazards differ in important



ways, such as in their predictability, length of warning time, speed of onset, magnitude, scope, duration of impact, and the possibilities of secondary impacts. Many of the demands on the emergency management infrastructure they generate, however, arise not from their differences but from their commonalities.

Organization of the Plan

Sections 1 and 2 of the Plan outline the purpose of the Plan and the process of development. Section 3 describes “The Guadalupe River Basin at a Glance,” and profiles the geography, population, economy, land use, government, and disaster declaration history.

Section 4 identifies the major natural and man-made hazards that the Basin faces and the property at risk. Sections 5 through 16 present background on each individual hazard, including why the hazard is a threat, a hazard profile, the location of hazardous areas, history of hazardous events, people and property at risk and potential damages and losses.

Section 17 sets forth a vision statement and mitigation goals and objectives for the Plan. Section 18 presents information on previously implemented mitigation actions. These include those supported by Federal and State agencies as well as local programs relating to building and fire codes and floodplain management ordinances. Sections 19 and 20 include basin-wide mitigation actions, GBRA actions, and those of individual jurisdictions. Section 21 includes plan maintenance procedures, including how the plan is to implemented, maintained and evaluated, and how the public will continue to be involved.

Appendices include a list of acronyms used (A), detailed information on potential Federal and State funding sources that may support the mitigation actions (B), the results of a survey to elicit information from the public on issues of concern about hazard mitigation (C), identification of members of the Hazard Mitigation Team that helped to develop this Plan (D), and the Governing Body resolutions approving the Plan (E, forthcoming upon Plan adoption).



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