

**CITY CLERK
ORIGINAL**

**C-10787
04/12/2016**



**JURISDICTIONAL SUMMARY
FOR THE
CITY OF GLENDALE**

**MARICOPA COUNTY
MULTI-JURISDICTIONAL
HAZARD MITIGATION PLAN
2015**



CITY OF GLENDALE JURISDICTIONAL SUMMARY

Across the United States, natural and human-caused disasters have led to increasing levels of death, injury, property damage, and interruptions of business and government services. The toll on families and individuals can be immense and damaged businesses cannot contribute to the economy. The time, money and effort to respond to and recover from these emergencies or disasters divert public resources and attention from other important programs and problems. With 54 federal or state disaster declarations and a total of 524 other recorded events, the 28 jurisdictions participating within Maricopa County, Arizona and engaged in this planning effort, recognize the consequences of disasters and the need to reduce the impacts of natural and human-caused hazards. The County and jurisdictions also know that with careful selection, mitigation actions in the form of projects and programs can become long-term, cost effective means for reducing the impact of natural and human-caused hazards.

The elected and appointed officials of Maricopa County and the 27 other participating jurisdictions demonstrated their commitment to hazard mitigation in 2009-2010 by preparing the first update of the Maricopa County Multi-Jurisdictional Hazard Mitigation Plan (2009 Plan). The 2009 Plan covered all 28 participating jurisdictions and FEMA approved that plan on April 30, 2010. The county and jurisdictions must perform a full plan update and comply with congressional regulations to obtain FEMA approval.

To that end, the Maricopa County Department of Emergency Management (MCDEM) secured a federal planning grant and hired JE Fuller/ Hydrology & Geomorphology, Inc. to assist the County and participating jurisdictions with the update process. MCDEM reconvened a multi-jurisdictional planning team (MJPT) comprised of veteran and first-time representatives from each participating jurisdiction, and other various county, state, and federal departments and organizations such as the National Weather Service and Arizona Public Service. The MJPT met monthly beginning in November 2014 and finishing in April 2015. Portions of the group conducted subsequent "catch up" meetings through June 2015 to assist several communities with finalizing assignments. The first draft of the updated 2015 Plan was issued in July 2015. The meetings and MJPT worked in a collaborative effort to review, evaluate, and update the 2009 Plan keeping the single, consolidated multi-jurisdictional plan format and approach.

The group eliminated the accompanying 2009 Tribal Annexes for the only two participating Indian Tribes, and the pertinent data from each annex was updated and incorporated into the main body of the 2015 Plan. The 2015 Plan will continue to guide the County, tribes and participating local jurisdictions toward greater disaster resistance in full harmony with the character and needs of the community and region. The working group prepared the 2015 Plan under Section 322 of the Robert T. Stafford Disaster Relief and Emergency Assistance Act (Stafford Act or the Act), 42 U.S. C. 5165, enacted under Sec. 104 the Disaster Mitigation Act of 2000, (DMA 2000) Public Law 106-390 of October 30, 2000, as implemented at Title 44 CFR 201.6 and 201.7 dated October, 2007. The Plan includes risk assessments for multiple natural hazards, a public outreach effort at two phases of the planning process, and development of a mitigation strategy that incorporates measures intended to eliminate or reduce the effects of future disasters throughout the County.

The Disaster Mitigation Act of 2000 established a national program for pre-disaster mitigation, streamlined administration of disaster relief at both the federal and state levels, and controls federal costs of disaster assistance. Congress envisioned that implementation of these new requirements would result in the following key benefits:

- Reduction of loss of life and property, human suffering, economic disruption, and disaster costs.
- Prioritization of hazard mitigation planning at the local level, with an increased emphasis placed on planning and public involvement, assessing risks, implementing loss reduction measures, and ensuring that critical services/facilities survive a disaster.
- Establishment of economic incentives, awareness and education via federal support to state, tribal, and local governments that would result in forming community-based partnerships, implementing effective hazard mitigation measures, leveraging additional non-Federal resources, and establishing commitments to long-term hazard mitigation efforts.



CITY OF GLENDALE JURISDICTIONAL SUMMARY

The DMA 2000 legislation requires all local, county, and tribal governments to develop a hazard mitigation plan for their respective communities in order to be eligible to receive certain federal non-emergency mitigation funds including Hazard Mitigation Grant Program (HMGP) and Pre-Disaster Mitigation Program (PDM). The Plan satisfies FEMA's Flood Mitigation Assistance Program (FMA) planning requirements as long as flooding is addressed.

Under DMA 2000, Glendale must identify natural hazards that affect the city, assess the vulnerability and risk posed by those hazards to community-wide human and structural assets, develop strategies for mitigation of those identified hazards, present future maintenance procedures for the plan, and document the planning process. The Plan is divided into the following eight primary sections:

- Section 1 – Local Plan Adoption and FEMA Approval
- Section 2 – Introduction
- Section 3 – Planning Process
- Section 4 – Community Description
- Section 5 – Risk Assessment
- Section 6 – Mitigation Strategy
- Section 7 – Plan Maintenance Procedures
- Section 8 – Plan Tools

The following are the contact details for the Plan primary point of contact for the City of Glendale:

Anthony Butch
Captain / Emergency Planner
Fire Department - Office of Emergency Management
6829 N. 58th Dr.,
Glendale, AZ 85301
Work: 623.872.5090
Email: abutch@glendaleaz.com

For information purposes, the following summarizes contact details for the Plan primary point of contact for Maricopa County:

Andrew Brady
Emergency Services Planner
Maricopa County Department of Emergency Management
5636 E. McDowell Rd.
Phoenix, AZ 85008
Work: 602.273.1411
Fax: 602.275.1638
Email: andrewbrady@mail.maricopa.gov



CITY OF GLENDALE JURISDICTIONAL SUMMARY

The following table summarizes the Local Planning Team (LPT) for Glendale and roles of each person.

| Name | Department / Division / Branch | Title | Planning Team Role / Description of Duties |
|--------------------------------------|---------------------------------------|---|--|
| Jon Froke | Planning | Planning Director | Planning Director |
| Jessica Eastman | Planning | Planning Tech | Planning Department Representative |
| Chris DeChant | Fire | Executive Assistant Fire Chief | Fire Department Representative |
| Tim Wayne | Fire/ Emergency Management | Deputy Chief/Emergency Manager | Emergency Management Director |
| Tom Gill | Water Services | Operation Superintendent | Water Services Representative |
| Megan Sheldon | Water Services | Environmental Program Manager | Water Services Representative/Storm water Representative |
| James Delaittre | GIS Analyst | Information Technology | IT Representative |
| Devlin Fung | Sr. GIS Analyst | Information Technology | IT Representative/ GIS Representative |
| Kevin Link | Transportation | Transportation Manager | Transportation Representative |
| Michael Collin | Engineering | GIS Coordinator | GIS Representative |
| Justine Cornelius | Building Safety | Building Safety Manager | Building Safety Representative |
| Mike Lively | Police | Commander | Police Department Representative |
| Kim Larson | Marketing | Marketing and Community Program Manager | Marketing & Communication Representative |
| Paul King | Community Partnership | Recreation Manager | Community Partnership Representative |
| Anthony Butch | Fire/ Emergency Management | Captain/ Emergency Planner | Point of Contact/Facilitator and Local Planning Team Coordinator |
| <i>PROMULGATION AUTHORITY</i> | | | |
| Jerry Weiers | City Council | Mayor | Plan Promulgation |
| Ian Hugh | City Council | Vice Mayor | Plan Promulgation |
| Gary Sherwood | City Council | Council Member | Plan Promulgation |
| Lauren Tolmachoff | City Council | Council Member | Plan Promulgation |
| Sammy Chavira | City Council | Council Member | Plan Promulgation |
| Jamie Aldama | City Council | Council Member | Plan Promulgation |
| Bart Turner | City Council | Council Member | Plan Promulgation |



CITY OF GLENDALE JURISDICTIONAL SUMMARY

Risk assessment is one of the key elements to the hazard mitigation planning process. In performing a risk assessment, a community determines “what” can occur, “when” (how often) it is likely to occur, and “how bad” the effects could be. Under DMA 2000, risk assessment primary components are generally categorized into the following measures:

- Identify Hazards**
- Profile Hazard Events**
- Assess Vulnerability to Hazards**

The risk assessment for Glendale utilized information developed by the LPT and county-wide hazard profile data. The results of the vulnerability analysis were compiled at both a Glendale specific community level as well as on a County-wide basis. Only Glendale data is presented in this jurisdictional summary.

The MJPT and LPT considered only natural hazards relevant to Glendale and Maricopa County for this update. The groups reviewed and compared a list of hazards in the 2009 Plan and the 2013 State Plan¹ in an initial screening using a systematic process that considered relevance, historical significance and experience, and catastrophic potential. The list of hazards identified by the MJPT as relevant to multi-jurisdictional planning area are listed in the table below. The Glendale LPT determined that all of the Plan hazards pertain to the city and are candidates for mitigation.

| Natural Hazard List for the Plan and Glendale | |
|--|--|
| <ul style="list-style-type: none"> • Dam Inundation • Drought • Extreme Heat • Fissure • Flooding/Flash Flooding | <ul style="list-style-type: none"> • Levee Failure • Severe Wind • Subsidence • Wildfire |

The group developed hazard profiles for each of the above by researching and mapping historic hazardous events, obtaining other hazard mapping, analysis and studies, and in Arizona, estimating the Calculated Priority Risk Index (CPRI)². Maps specific to Glendale are provided following the text of this summary.

In addition, the LPT performed a vulnerability analysis to assess and evaluate the City’s population and critical facility exposure risk to the identified hazards. The risk was quantified as a tabulation of economic losses due to exposure and human population exposure to the hazards. Using FEMA’s Hazards of the United States (HAZUS) program, both the MJPT and LPT identified “Critical Infrastructure” and residential facilities, as well as population concentrations throughout the City. The groups estimated that there are at least \$4.1 billion dollars³ worth of critical and non-critical facilities within Glendale. Using this data, the group estimated the replacement value for residential buildings within Glendale amounts to over \$21.0 billion. The 2014 City population estimate is 232,680. The following table summarizes the general results of the vulnerability analysis for each of the Plan hazards in the City.

¹ State of Arizona, Division of Emergency Management, 2013, *State of Arizona Multi-Hazard Mitigation Plan*.

² The CPRI is explained in detail in the Section 5.2.3 of the main Plan

³ This estimate is likely to be inexact as detailed replacement estimates were not available under the plan development schedule.



CITY OF GLENDALE JURISDICTIONAL SUMMARY

| Hazard | Exposure Estimates ^a | | |
|--|---------------------------------|-----------------|-------------------------|
| | Critical Facilities | Residential | Population ^b |
| Dam Failure (High Hazard) | \$0 | \$0 | 0 |
| Drought | (None estimated) | | 232,680 |
| Extreme Heat | (None estimated) | | 232,680 |
| Fissure (High Hazard) | \$3.0 million | \$1.0 million | 7 |
| Flooding (High Hazard) | \$0 | \$365.8 million | 3,132 |
| Levee Failure (High Hazard) | \$25.0 million | \$97,000 | 2 |
| Severe Wind | (None estimated) | | 232,680 |
| Subsidence | \$3.3 billion | \$15.7 billion | 179,410 |
| Wildfire (High Hazard) | \$24.0 million | \$31.0 million | 181 |
| ^a – These numbers represent estimates of exposure that may result assuming all delineated hazard areas are impacted at the same time. Actual event losses may not impact the entire area during a single event. | | | |
| ^b – These numbers represent the total human population potentially exposed to the hazard. | | | |

The MJPT and Glendale LPT developed a strategy for mitigating the hazard risks identified within the City. The mitigation strategy provides the “*what, when, and how*” of actions that will reduce or possibly remove the City’s exposure to hazard risks, and is generally categorized into the following components:

- Goals and Objectives**
- Capability Assessment**
- Mitigation Actions/Projects**
- Implementation Strategy**

The MJPT reviewed and discussed the 2009 Plan goals and objectives and compared them to the 2013 State Plan. The result of the discussions resulted in establishing one goal and four clear objectives as follows:

- **GOAL:** Reduce or eliminate the risk to people and property from natural hazards.
 - ◆ **Objective 1:** Reduce or eliminate risks that threaten life and property in the incorporated, unincorporated, and Tribal jurisdictions within Maricopa County.
 - ◆ **Objective 2:** Reduce risk to critical facilities and infrastructure from natural hazards.
 - ◆ **Objective 3:** Promote hazard mitigation throughout the incorporated, unincorporated, and Tribal jurisdictions within Maricopa County.
 - ◆ **Objective 4:** Increase public awareness of hazards and risks that threaten the incorporated, unincorporated, and Tribal jurisdictions within Maricopa County.

This goal and four objectives will be used by all participating jurisdictions in the Plan.



CITY OF GLENDALE JURISDICTIONAL SUMMARY

The Glendale LPT reviewed and updated the community’s capability assessment regarding legal, regulatory, technical/staff, and financial resources. The following tables summarize the results:

| Legal and regulatory capabilities for Glendale | | |
|---|--|---|
| Regulatory Tools for Hazard Mitigation | Description | Responsible Department/Agency |
| CODES | <ul style="list-style-type: none"> • 2012 International Building Code • 2012 International Residential Code • 2012 International Mechanical Code • 2012 Uniform Plumbing Code. • 2011 National Electrical Code • 2010 Americans with Disabilities Act • Accessibility Guidelines and the City Code • 2012 International Fuel Gas Code • 2012 International Plumbing • 2012 Energy Codes • 2009 International Fire Code | <ul style="list-style-type: none"> • Building Safety • Engineering • Fire Marshalls Office |
| ORDINANCES | <ul style="list-style-type: none"> • City of Glendale Zoning Ordinance and associated PAD and PRD documents, Landscape Ordinance • Floodplain Ordinance • Grading and Drainage Ordinance • Sub-Division Ordinance | <ul style="list-style-type: none"> • Building Safety • Engineering • Planning |
| PLANS, MANUALS, and/or GUIDELINES | <ul style="list-style-type: none"> • City Department SOP’s • City of Glendale Emergency Operations Plan • Multi-Jurisdictional Mitigation Plan • General Plan 2025 • North Valley Specific Area Plan • Glendale Centerline • Western Area Plan • West Glendale Avenue Development Plan • Commercial and Industrial Design Guidelines • Residential Design & Development Manual • Adopted State Erosion Standard • Engineer Design and Construction Standards • Middle New River Master Plan | <ul style="list-style-type: none"> • Emergency Management • Engineering • Planning |
| STUDIES | <ul style="list-style-type: none"> • 2003 Maricopa County Transportation Study • 2001 COG Transportation Plan • Storm Water Master Plan Update | <ul style="list-style-type: none"> • Transportation • Planning |



CITY OF GLENDALE JURISDICTIONAL SUMMARY

| Technical staff and personnel capabilities for Glendale | | |
|---|-------------------------------------|---|
| Staff/Personnel Resources | <input checked="" type="checkbox"/> | Department/Agency - Position |
| Planner(s) or engineer(s) with knowledge of land development and land management practices | <input checked="" type="checkbox"/> | Planning, Planners |
| Engineer(s) or professional(s) trained in construction practices related to buildings and/or infrastructure | <input checked="" type="checkbox"/> | Engineering, Engineers – Architecture, Architects Building Safety-Structural Engineers and Architects |
| Planner(s) or engineer(s) with an understanding of natural and/or human-caused hazards | <input checked="" type="checkbox"/> | Planning, Engineering, Utilities Dept, Building Safety |
| Floodplain Manager | <input checked="" type="checkbox"/> | Engineering Dept |
| Surveyors | | Street, Public Works, Utilities Dept |
| Staff with education or expertise to assess the community's vulnerability to hazards | <input checked="" type="checkbox"/> | Neighborhood Services Dept, Human Services, Emergency Management, Building Safety, Fire Dept, Police Dept, Public Works, Streets, Engineering, Architecture, Utilities Dept |
| Personnel skilled in GIS and/or HAZUS | <input checked="" type="checkbox"/> | IT Department, Fire Dept, Police Dept |
| Scientists familiar with the hazards of the community | <input checked="" type="checkbox"/> | Police Dept, Utilities Dept, Fire Dept |
| Emergency manager | <input checked="" type="checkbox"/> | City Manager's Office, Emergency Manager |
| Grant writer(s) | <input checked="" type="checkbox"/> | All Depts |
| Others | | |

| Fiscal capabilities for Glendale | | |
|--|---|--|
| Financial Resources | Accessible or Eligible to Use (Yes, No, Don't Know) | Comments |
| Community Development Block Grants | Yes | Community Partnerships |
| Capital Improvements Project funding | Yes | Finance Department/Management and Budget |
| Authority to levy taxes for specific purposes | Yes | Function of Legislation (see COG website-Appendix 18 FAQ under levy taxes) |
| Fees for water, sewer, gas, or electric service | Yes | Utility Department |
| Impact fees for homebuyers or new developments/homes | Yes | Public Works Administration |
| Incur debt through general obligation bonds | Yes | Management and Budget |
| Incur debt through special tax bonds | Yes | Management and Budget |
| Other | | |

Using the vulnerability analysis, capability assessment, and goals and objectives allowed the Glendale LPT to develop an updated list of mitigation actions/projects with a clearly defined implementation strategy. The group evaluated each action/project and prioritized it based on: 1) Direct Impact on Life and/or Property; 2) Long-Term Solution; and 3) Benefit vs. Cost. The table on the following page summarizes the updated mitigation action/project list for Glendale. Projects listed in *italics font* are recognized as being more response and recovery oriented, but are considered a significant part of the overall hazard management goals of the community.



CITY OF GLENDALE JURISDICTIONAL SUMMARY

| Mitigation Action/Project | | Implementation Strategy | | | | | | | |
|---------------------------|---|-------------------------|-------------------------------------|----------------|------------------|--|-----------------------------|---|-----------------------|
| ID No. | Description | Hazard(s) Mitigated | Community Assets Mitigated (Ex/New) | Estimated Cost | Priority Ranking | Planning Mechanism(s) for Implementation | Anticipated Completion Date | Primary Agency / Job Title Responsible for Implementation | Funding Source(s) |
| 1 | In partnership with The Salvation Army, provide respite care and dehydration stations. This effort mitigates loss of life during extreme temperature. | Extreme Heat | Existing | Staff time | High | Facilities Staff | On-going | Emergency Management | Donations |
| 2 | Perform a public information campaign in coordination with the City of Glendale Marketing Department and Fire Department to educate and inform citizens of safety during periods of extreme heat. | Extreme Heat | Existing | Staff time | High | Fire Department/ Marketing Staff | On-going | Fire Department Emergency Management Marketing | GDEM/FD Budget |
| 3 | Ordinance compliance and maintenance of property (weed/brush abatement) | Wildfire | Existing | Staff time | High | Code Compliance Staff | On-going | Code Compliance | General Fund Budget |
| 4 | Conduct regular inspections of washes and take corrective action by enforcing existing ordinances to prevent a corridor for wildfires. | Wildfire | Existing | Staff time | High | Staff and Coordinated inspections | On-going | Building Safety and Public Safety | General Fund Budget |
| 5 | Maintenance of Emergency Action Plan of Covered municipal water storage reservoir with a capacity of 12 million gallons. (Thunderbird Reservoir). | Dam Failure | Existing | Staff time | High | Water Services Staff | On-going | Water Services | Water Services Budget |
| 6 | Participation in the Annual ADWR inspection and survey of the Thunderbird Reservoir. | Dam Failure | Existing | Staff time | High | Water Services Staff | On-going | Water Services | Water Services Budget |
| 7 | Participation in the bi-monthly EAP drills and table top exercises. | Dam Failure | Existing | Staff time | High | Water Services Staff | On-going | Water Service | Water Services Budget |
| 8 | Water Conservation Office conducting educational outreach to the public on best practices, via classes, flyers, website, social media | Drought | Existing | Staff time | High | Water Services Staff | On-Going | Water Services | Water Services Budget |
| 9 | Encourage permanent reduction in amount of water used for landscaping purposes through Landscape Rebate up to \$750.00 for residential and \$3000 for non-residential. | Drought | New | Staff time | High | Water Services Staff | On-going | Water Services | Grant |





CITY OF GLENDALE JURISDICTIONAL SUMMARY

| Mitigation Action/Project | | Implementation Strategy | | | | | | | |
|---------------------------|---|----------------------------------|-------------------------------------|----------------|------------------|--|---|---|-------------------------|
| ID No. | Description | Hazard(s) Mitigated | Community Assets Mitigated (Ex/New) | Estimated Cost | Priority Ranking | Planning Mechanism(s) for Implementation | Anticipated Completion Date | Primary Agency / Job Title Responsible for Implementation | Funding Source(s) |
| 10 | Update Drought Management Plan (2004) to assist in management of operations when a drought is declared. | Drought | Existing | Staff time | High | Water Services Staff | On-going | Water Services | Utilities Budget |
| 11 | Conduct landscape classes (promote xeriscape) to encourage use of drought-resistant landscaping | Drought | Existing | Staff time | High | Water Services Staff | On-going | Water Services | Utilities Budget |
| 12 | Manage storm-water at its source to reduce water used for landscaping and prevent flooding. Funded in part by a grant from Water Infrastructure Finance Authority of Arizona, to develop a toolkit of low impact development options. | Drought Flood Extreme Heat | New | Staff time | High | Water Services/ Engineering | On-going | Water Services/ Engineering | Grant with City of Mesa |
| 13 | City-wide plan to control stormwater pollution, including identification of problem areas (drainage issues, illicit discharges, etc.). | Flood | Existing | Staff time | High | Engineering Staff | On-going Submitted to ADEQ for review/ approval in 2014 | Engineering | Engineering Budget |
| 14 | Maintain emergency generators at water and wastewater plants, water pumping station and wastewater lift stations | Severe Wind | Existing | Staff time | High | Facilities/Water Services Staff | On-going | Various Departments | City Budget |
| 15 | Maintain emergency generators at fire stations and Glendale Regional Public Safety Training Center. | Severe Wind | Existing | Staff time | High | Facilities/FD | On-going | Various Departments | Fire Budget |
| 16 | Work with federal and state agencies, and local coalition to evaluate awareness of fissure risk zones and the problems caused by fissures. | Fissures | Existing | Staff time | High | Development Services/Planning | On-going | Development Services | City Budget |
| 17 | Geological hazards addressed in General Plan and will be incorporated in the planning process for the next General Plan. | Fissures | Existing | Staff time | High | Development Services/Planning | On-going | Development Services | City Budget |





CITY OF GLENDALE JURISDICTIONAL SUMMARY

| Mitigation Action/Project | | Implementation Strategy | | | | | | | |
|---------------------------|---|-------------------------|-------------------------------------|----------------|------------------|---|-----------------------------|---|-------------------|
| ID No. | Description | Hazard(s) Mitigated | Community Assets Mitigated (Ex/New) | Estimated Cost | Priority Ranking | Planning Mechanism(s) for Implementation | Anticipated Completion Date | Primary Agency / Job Title Responsible for Implementation | Funding Source(s) |
| 18 | Utilization of Development Services plans and procedures to survey and monitor elevations in the City of Glendale to determine and establish long term mitigation strategies. | Subsidence | Existing | Staff time | High | Development Services/ Engineering | On-going | Development Services | City Budget |
| 19 | Development Services has utilized the risk as a regular risk of development and public work projects. The lands used for such projects are inspected for subsidence issues prior to projects starting. | Subsidence | Existing | Staff time | High | Development Services/Public Works | On-going | Development Services | City Budget |
| 20 | Educate the public through publication partnering with the Community Services Department and Parks and Recreation to inform citizens of risks associated to flood risks areas (parks multi-use pathways). | Levee Failure | Existing | Staff time | High | Community Services Department | On-going | Community Services Department | City Budget |
| 21 | Work with Flood Control District of Maricopa County to determine potential effects of levee failure | Levee Failure | Existing | Staff time | High | Emergency Management, Public Works, Engineering (GIS) | On-gong | Emergency Management | City Budget |
| 22 | Participate in annual Flood Control District of Maricopa County Drill/Exercises | Levee Failure | Existing | Staff time | High | Emergency Management | On-going | Emergency Management | City Budget |
| 23 | Enforce currently adopted building codes (2012 IBC and IRC) to mitigate damages due to severe wind events. | Severe Wind | New | Staff time | High | Development Review and Building Inspection Processes | On-going as needed | Development Services | City Budget |
| 24 | Encourage homeowners to use tie-down straps and/or anchors to secure ancillary buildings and metal awnings or porches to mitigate the potential for flying debris during severe wind events. | Severe Wind | Both | Staff time | High | | On-going as needed | Development Services | City Budget |
| 25 | Use website and social media sources to raise public awareness to the impacts of flood and severe winds associated with monsoon season. | Flood, Severe Wind | Both | Staff time | High | | On-going and seasonal | Emergency Management | City Budget |





CITY OF GLENDALE JURISDICTIONAL SUMMARY

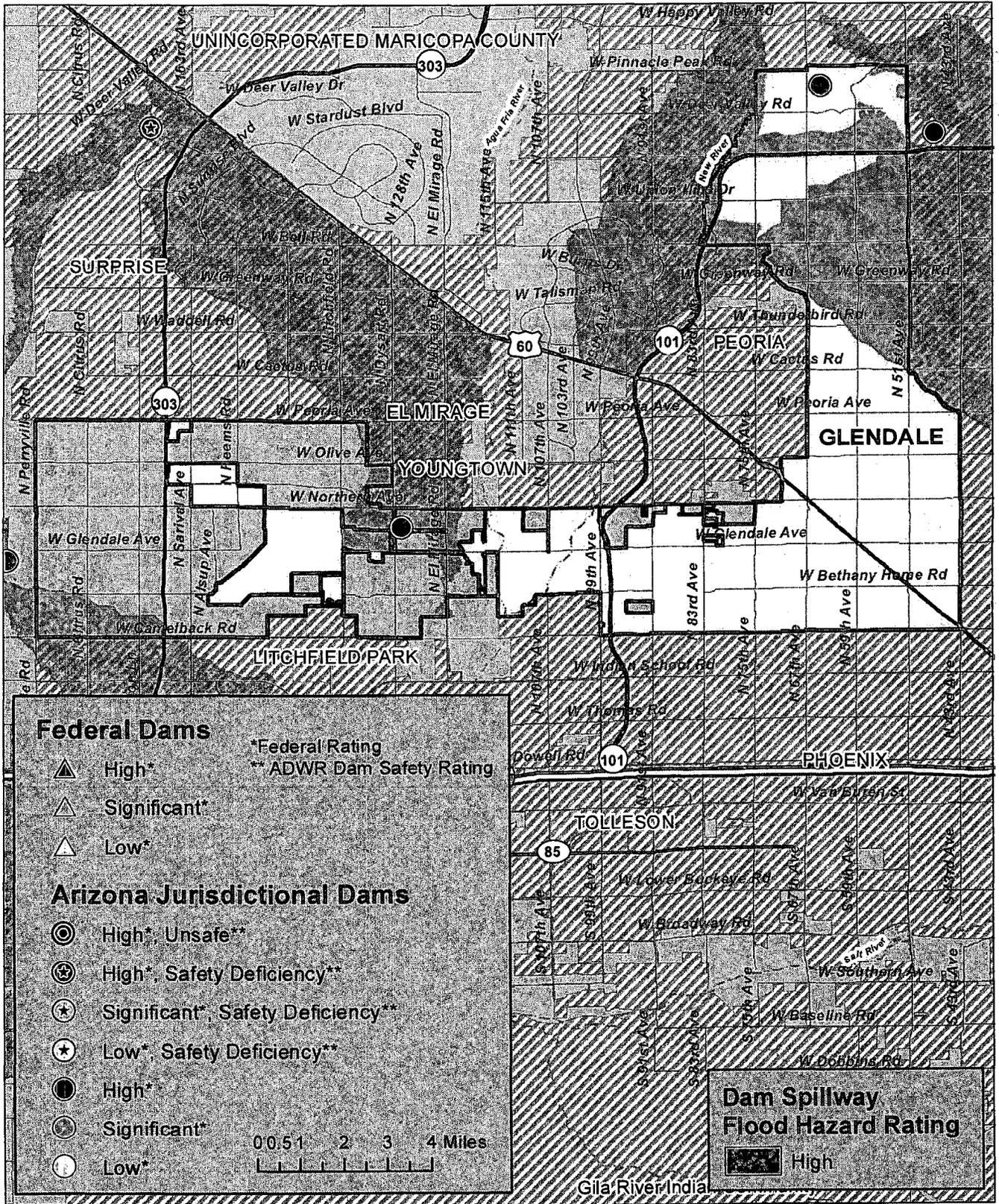
As a final step in the planning process, the MJPT developed plan maintenance procedures to establish guidelines for maintaining, reviewing, and updating the Plan over the next five (5) years. The MJPT reviewed the current DMA 2000 rules, the October 2011 FEMA guidance documents, and discussed a strategy for performing the required monitoring and evaluation of the Plan over the next 5-year cycle. The MJPT has established the following monitoring and evaluation procedures:

- **Schedule** – The Plan shall be reviewed on at least an annual basis. MCDEM will take the lead to send out an email request to each jurisdiction via the MJPT on or around the month of May.
- **Review Content** – Using an email matrix, MCDEM will require each jurisdiction to periodically provide responses to the following questions:
 - **Hazard Identification:** *Have the risks and hazards changed?*
 - **Goals and Objectives:** *Are the goals and objectives still able to address current and expected conditions?*
 - **Mitigation Projects and Actions:** *For each mitigation action/project summarized in Section 6.3.2:*
 - *Has there been activity on the project – Yes or No?*
 - *If Yes, briefly describe what has been done and the current status of the action/project.*
- **Documentation** – Using email, each jurisdiction will review and evaluate the Plan as it relates to its community and document responses to the above questions. MCDEM will archive the responses in a digital format and store with the Plan for incorporation during the next Plan update. Any hard copies will be included in Appendix E.

Should a major update to the Plan be proposed before the next five-year Plan update, the jurisdiction's LPT will provide a formal presentation to its Council or Board.

At the five year update, the following actions will occur:

- ✓ One year before the plan expiration date, the MJPT will re-convene to review and assess the materials accumulated in Appendix E of the Plan.
- ✓ The MJPT will update and/or revise the appropriate or affected portions of the plan and produce a revised plan document.
- ✓ The revised plan document will be presented before the respective Councils and Boards for an official concurrence/adoption of the changes.
- ✓ The revised plan will be submitted to ADEM and FEMA for review, comment and approval.



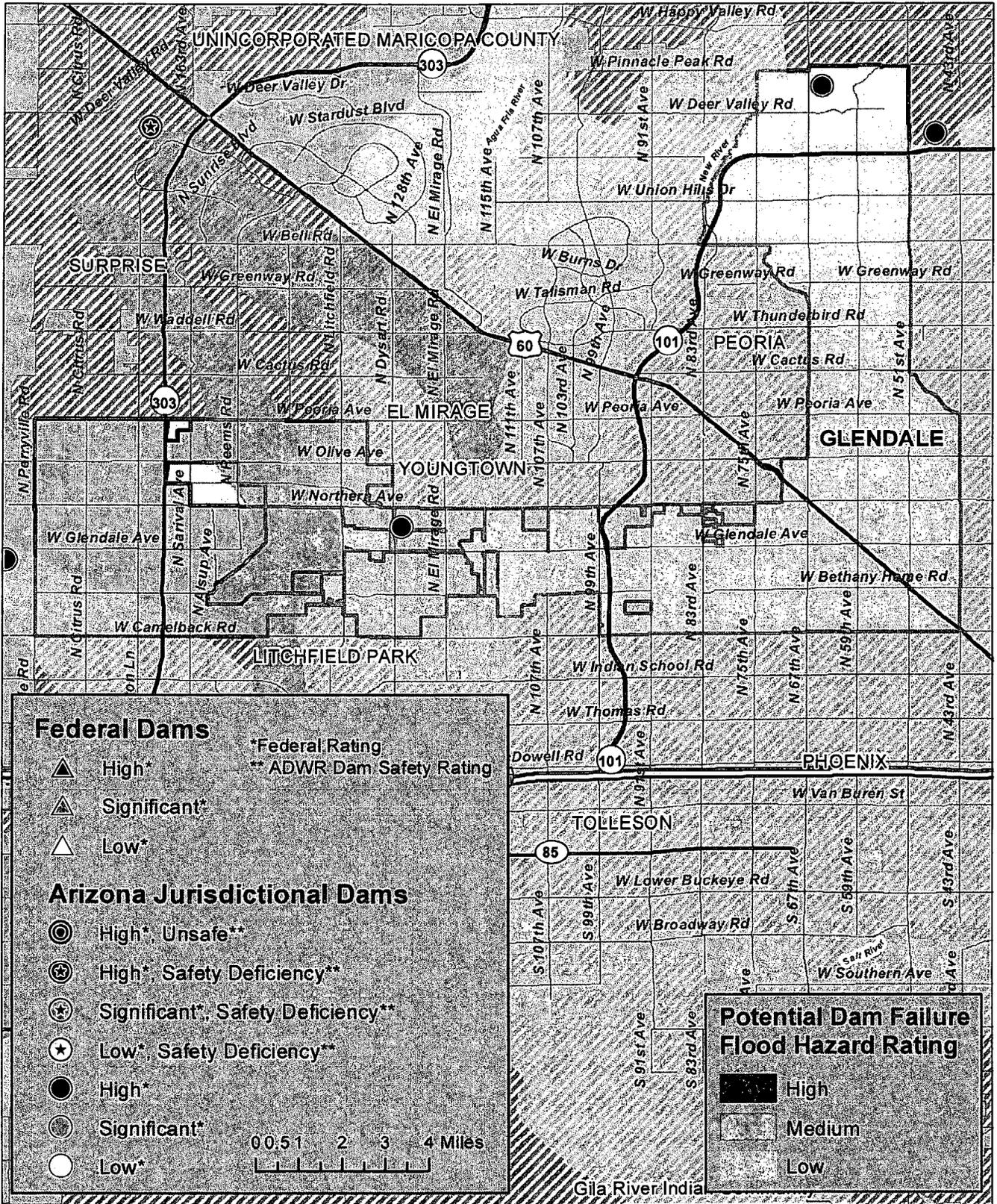
Legend

- Arterial Road
- Major Streams
- Glendale
- Maricopa County
- ▨ Other Communities

N

Maricopa County Multi-Jurisdictional Hazard Mitigation Plan

Map #1D11
City of Glendale
Dam Spillway
Flood Hazard Map
 as of Jan. 2015



Legend

— Arterial Road

--- Major Streams

□ Glendale

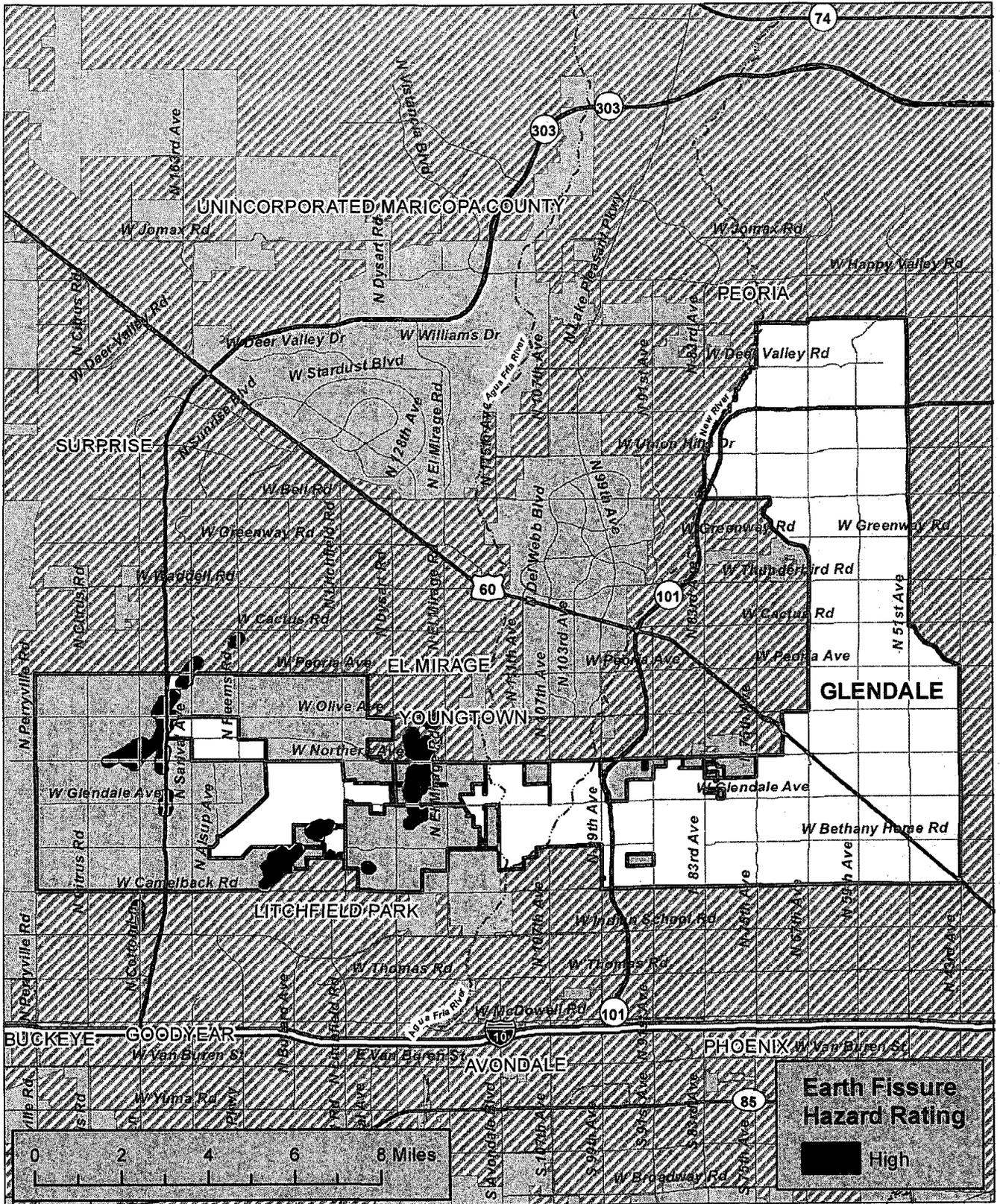
▒ Maricopa County

▨ Other Communities

N

Maricopa County Multi-Jurisdictional Hazard Mitigation Plan

Map #2D11
City of Glendale
Potential Dam Failure Flood Hazard Map
 as of Jan. 2015



Legend

— Arterial Road

Communities

▭ Glendale

▨ Maricopa County

▩ Other Communities

— Major Streams

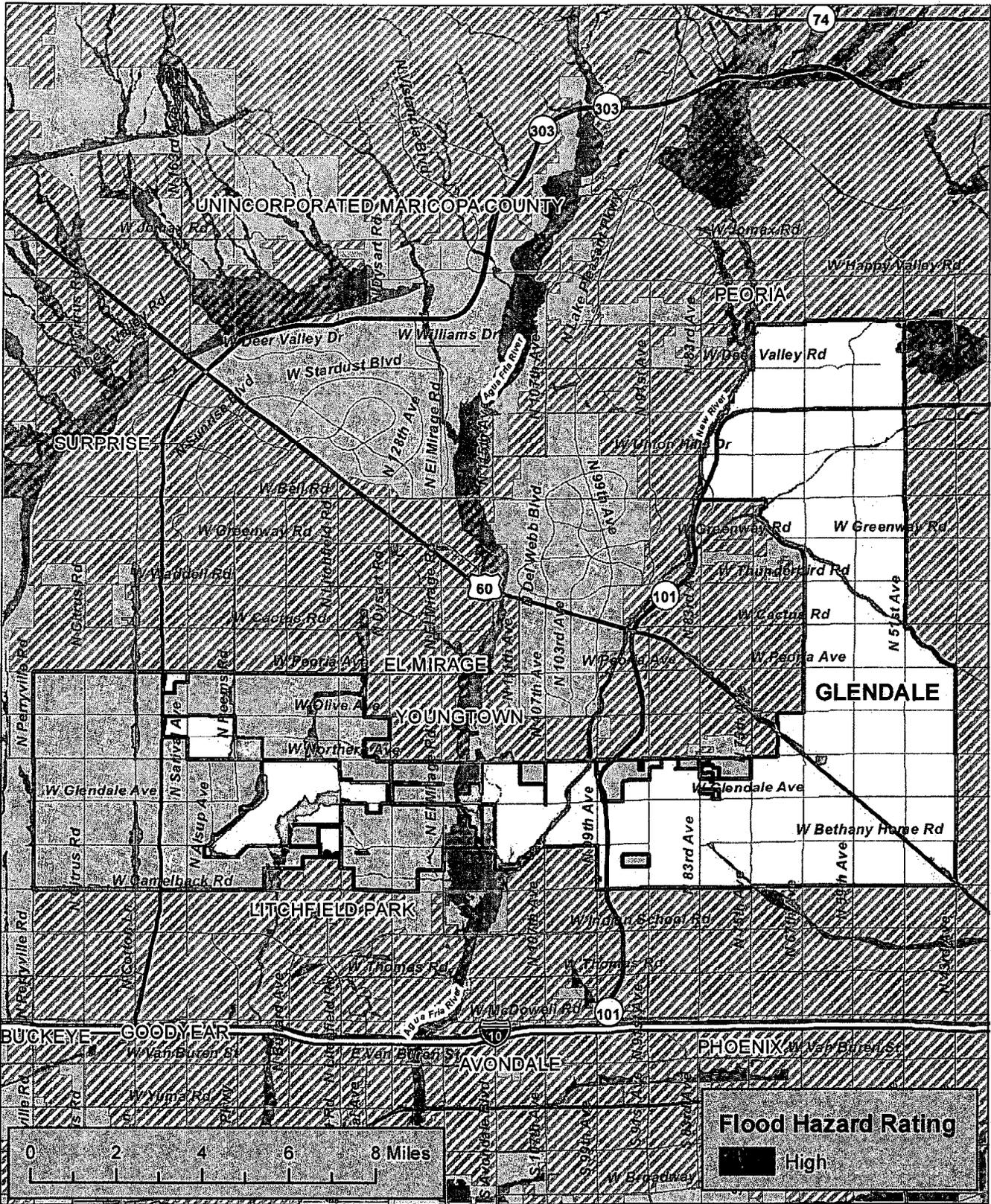
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Maricopa County Multi-Jurisdictional Hazard Mitigation Plan



Map #3D11
City of Glendale
Earth Fissure Hazard Map
 as of Jan. 2015





Legend

- Arterial Road
- Major Streams
- Glendale
- Maricopa County
- Other Communities

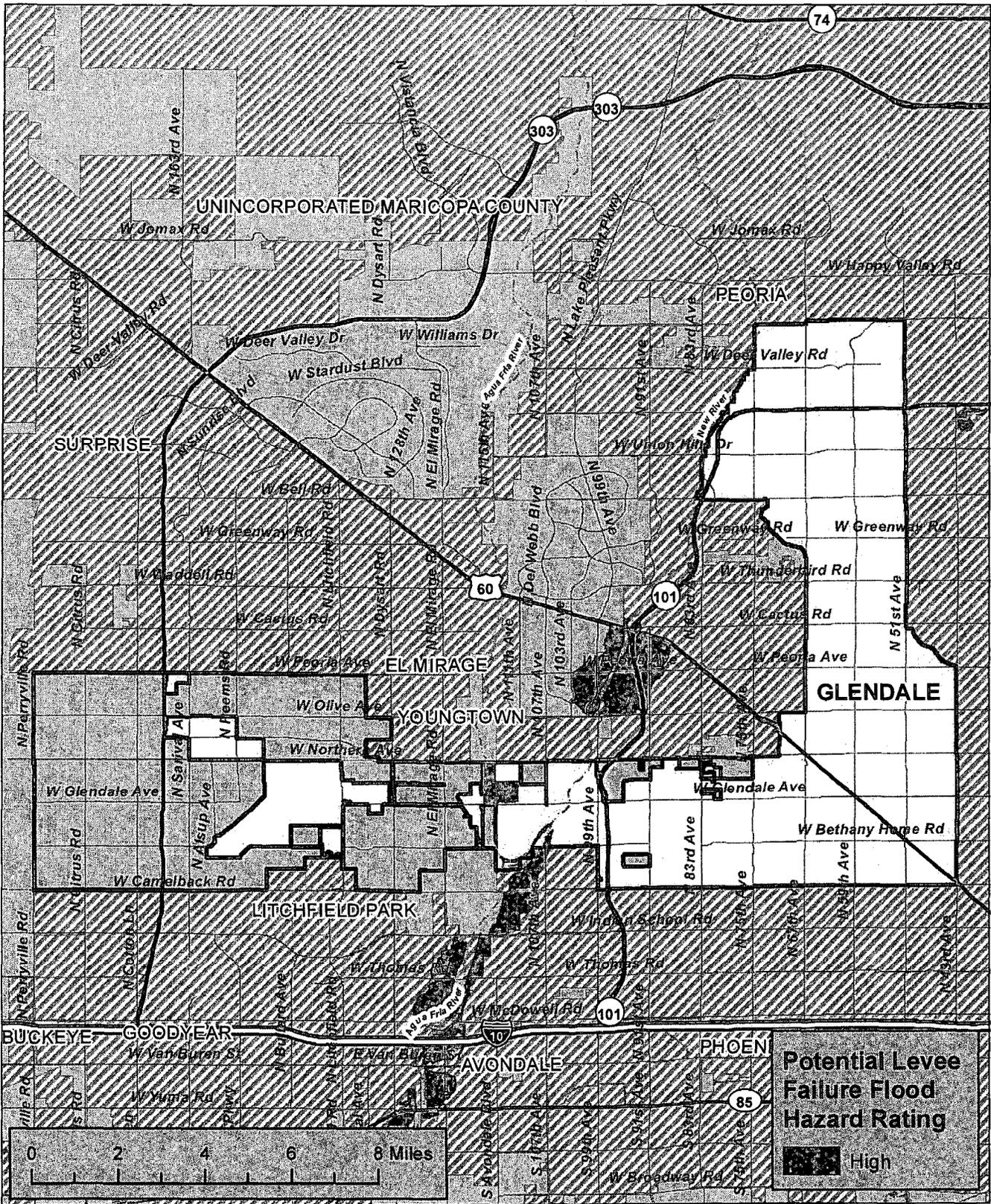
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Maricopa County Multi-Jurisdictional Hazard Mitigation Plan



Map #4D11
City of Glendale
Flood Hazard Map
 as of Jan. 2015





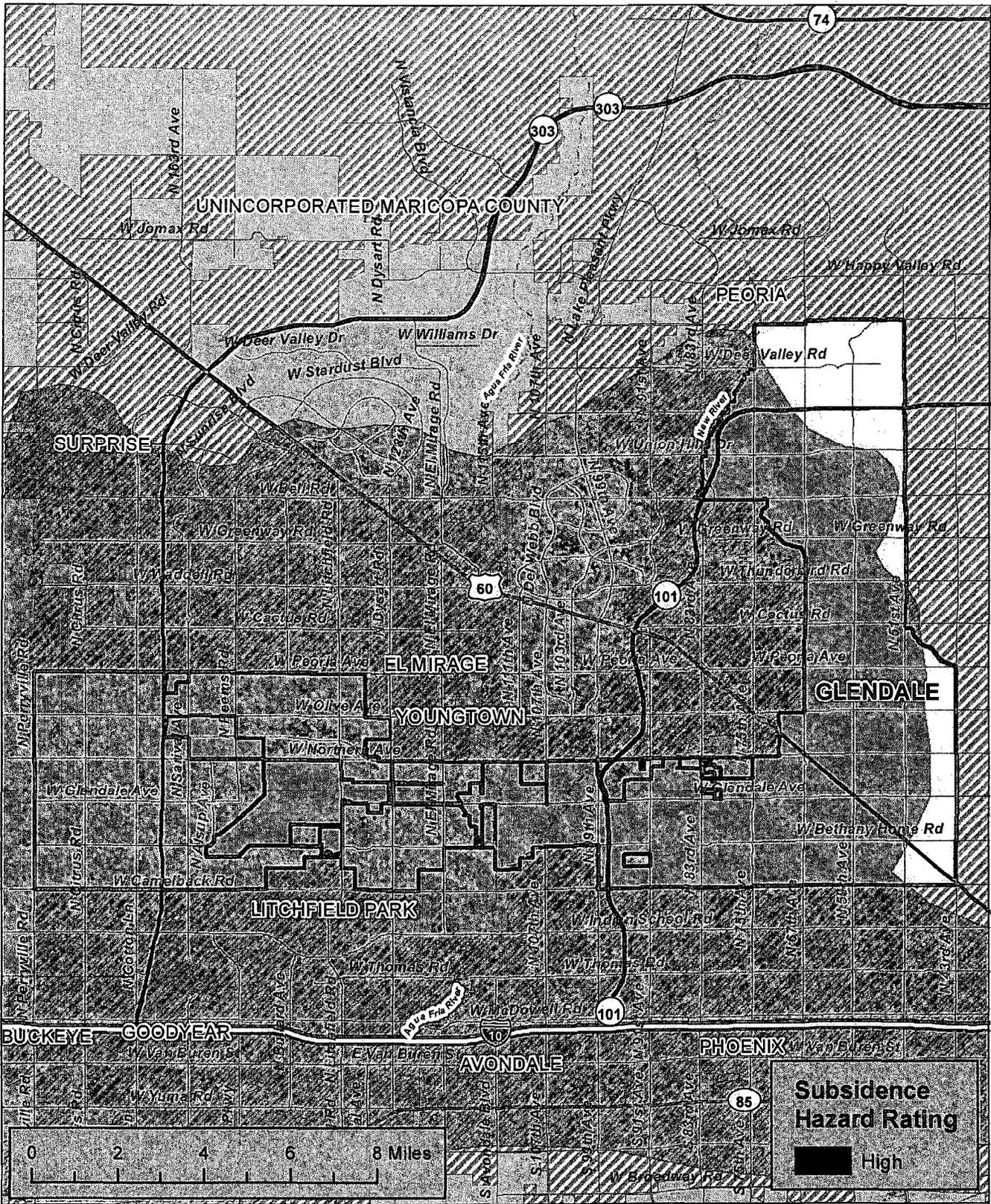
Legend

- Arterial Road
- Major Streams
- Glendale
- Maricopa County
- Other Communities

N
▲

Maricopa County Multi-Jurisdictional Hazard Mitigation Plan

Map #5D11
City of Glendale
Potential Levee Failure
Flood Hazard Map
 as of Jan. 2015



Legend

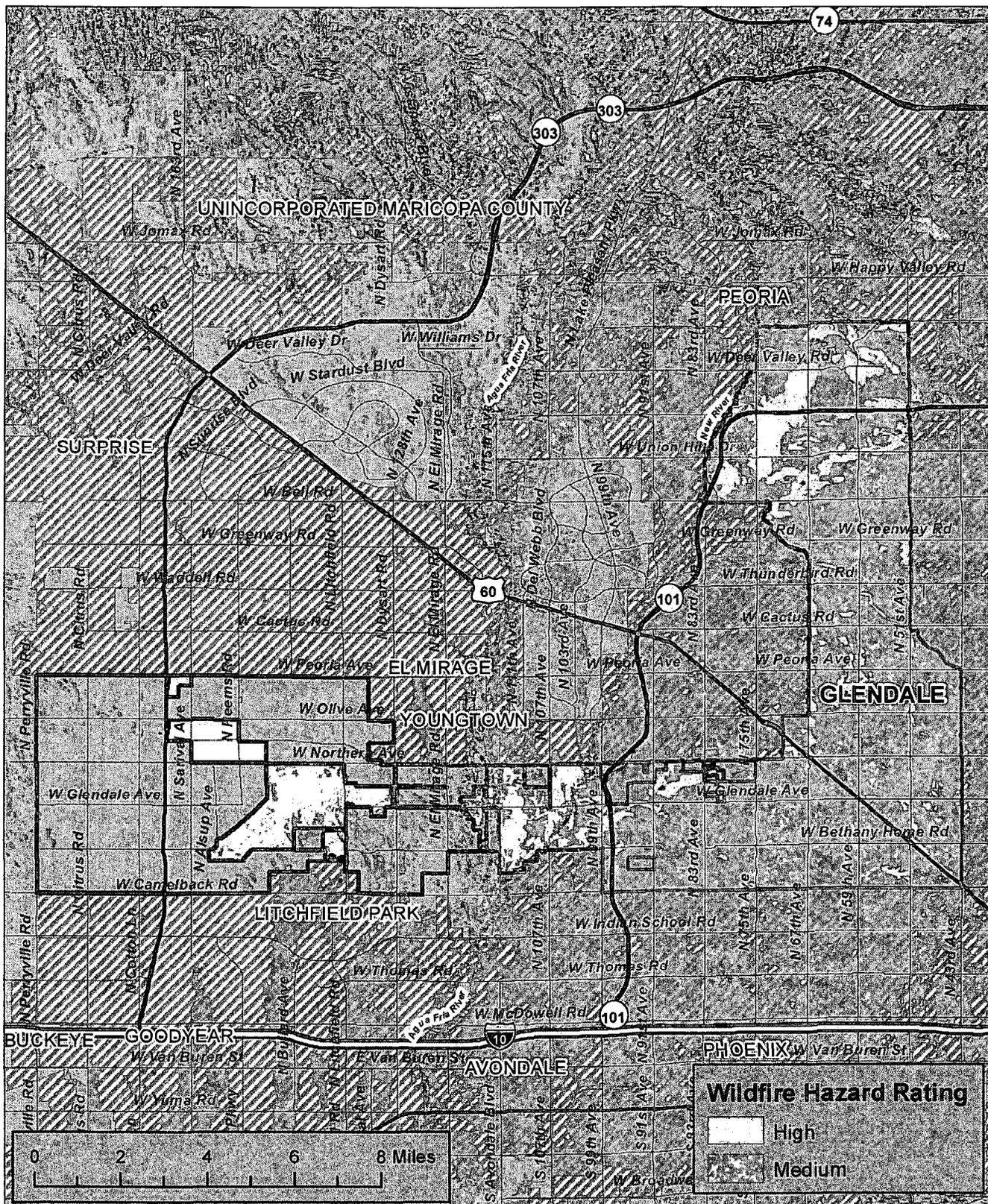
- Arterial Road
- Major Streams
- Glendale
- Maricopa County
- Other Communities

N
▲

Maricopa County Multi-Jurisdictional Hazard Mitigation Plan

GLENDALE

**Map #6D11
City of Glendale
Subsidence Hazard Map
as of Jan. 2015**



Legend

— Arterial Road

— Major Streams

Glendale

Maricopa County

Other Communities

N

Maricopa County Multi-Jurisdictional Hazard Mitigation Plan

Map #7D11
City of Glendale
Wildfire Hazard Map
as of Jan. 2015

CITY OF GLENDALE, an Arizona
municipal corporation



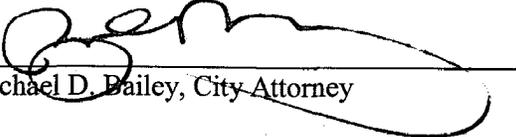
Kevin R. Phelps, City Manager

ATTEST:



Pamela Hanna, City Clerk (SEAL)

APPROVED AS TO FORM:



Michael D. Bailey, City Attorney