

Washington State Hazard Mitigation Grant Program

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Natural Hazards in Washington

Four main topics:

1. Mitigation vs. Preparedness
2. Mitigation and Root Cause Analysis
3. FEMA funded mitigation grants
4. Most common mitigation grant projects

Mitigation reduces or eliminates disaster impacts

Preparedness gets us ready to deal with existing disaster impacts

Mitigation is different than preparedness

EXAMPLE: A water utility is highly vulnerable to a large earthquake

- ▶ Most water tanks not up to current seismic codes and some will likely fail during a M9.0 earthquake

<p>MITIGATION ACTIONS:</p> <ul style="list-style-type: none"> • Structural seismic retrofits to water tanks <ul style="list-style-type: none"> • enhance concrete foundation • add chair anchors • isolation valves • flex couplings • Strategic interties and MOAs with neighboring water utilities 	<p>PREPAREDNESS ACTIONS:</p> <ul style="list-style-type: none"> • contingency plans • continuity of operations plans • site safety protocols • drills and exercises • upgrade and test warning and alert systems
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Preparedness asks: *what will we do if and when that water tower fails during an earthquake?*

Mitigation asks: *what can we do to keep that water tower from failing during an earthquake?*

The best mitigation projects address underlying, root causes to reduce long-term risk

Root Cause Analysis and Mitigation

Problem: Façade deterioration on the Lincoln and Jefferson Memorials

WHY?
Because harsh chemicals and lots of water are needed to properly clean them

WHY?
Because there's a lot of bird droppings on the memorials

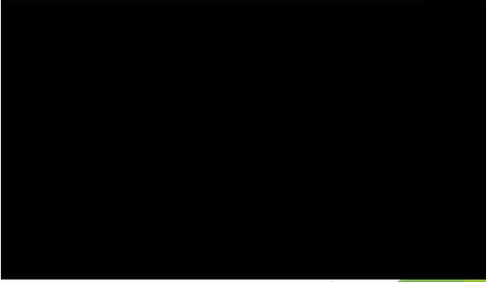
WHY?
Because there are a lot of spiders and other food sources now live on the memorials

WHY?
Because insects swarm in and around the memorials starting at dusk

WHY?
Because they're attracted to the floodlights lighting up the memorials

Mitigation Action: Reduce the number of hours that floodlights are used at the memorials

Not all Root Cause Analysis leads to mitigation projects...



Hazard Mitigation Plans (HMPs) facilitate Root Cause Analysis of hazards and risks

- ▶ Are you part of your local jurisdiction's HMP?
 - ▶ 36 of WA's 39 counties have them.
- ▶ Special purpose districts and other utilities can annex to a County or City HMP

Being part of a FEMA-approved HMP makes you eligible to apply for FEMA Hazard Mitigation Assistance grants.

Hazard Mitigation Assistance Grants: Federal-State-Local partnerships

- ▶ Cost-Share grants
- ▶ 3-year Periods of Performance
- ▶ Reimbursement-based
- ▶ Available to eligible entities only
- ▶ Competitive




2 FEMA mitigation grants you should know about:

1. Hazard Mitigation Grant Program (HMGP)
2. Pre-Disaster Mitigation grant (PDM)

Hazard Mitigation Grant Program (HMGP)

- Cost-Share: 75% Federal, 12.5% State, 12.5% Local (applicant)
- Application period: usually 9-12 months
- Period of Performance: 3 years
- Competitive statewide (not nationally)
- Frequency: only available after a Presidential Declaration is declared in WA
- Eligibility: Governments, special purpose districts, qualifying non-profit organizations that have, or are annexed to, a FEMA-approved Hazard Mitigation Plan
- Funding: Fixed to 20% of overall FEMA relief funds given to the state for the Disaster Declaration



Pre-Disaster Mitigation (PDM) Grant

- Cost-Share: 75% Federal, 25% Local (applicant)
- Application period: usually 2-3 months
- Period of Performance: 3 years
- Nationally Competitive
- Frequency: Annual (FEMA typically issues announcement in Spring)
- Eligibility: government entities and special purpose districts that have, or are formally Annexed to, a FEMA-approved Hazard Mitigation Plan
- Funding: determined annually by Congress. 2016 was ~\$85m



Most common infrastructure project submissions for FEMA hazard mitigation grants:

- ▶ Seismic retrofits
- ▶ Localized flood control measures
- ▶ Undergrounding or elevating critical components
- ▶ Backup generators for critical facilities

Seismic Retrofit Projects

Retrofitting water tanks and critical facilities, adding Flex Couplings, isolation valves, etc.





Localized Flood Control projects

Increasing flow capacity, creek/stream channel improvements, increasing culverts, detention ponds, adding buffers and riparian areas, etc.





Undergrounding Damage-Prone sections of Power Line



Backup Generators for Critical Facilities

Design/engineer, purchase and install backup generators for critical facilities





Contact WA EMD's Mitigation Section to discuss grants, project ideas, planning opportunities

- ▶ EMD's Mitigation Section email: HMGP@mil.wa.gov
- ▶ Website: mil.wa.gov/emergency-management-division
- ▶ Find WA EMD on Facebook and Twitter
- ▶ Tim Cook, State Hazard Mitigation Officer: tim.cook@mil.wa.gov

