

TERMS OF REFERENCE: TARANAKI VULNERABILITY STUDY

CDEM Resilience Fund project application

DATE OF APPLICATION	27 September 2016
APPLICANT	Taranaki Emergency Management Office
CDEM GROUP AFFECTED	Taranaki
BACKGROUND	<p>The Taranaki region sits within a complex hazardscape, under the shadow of Mount Taranaki volcano. Our communities are built on fault lines and in hazard zones. They are also vulnerable to severe weather rolling off the Tasman Sea.</p> <p>Our reliance and critical dependence on lifeline utilities leaves us vulnerable should these be compromised in an event. Furthermore, the region's economic prosperity relies on our dairy farming and oil and gas activities, which are vulnerable to a number of hazards.</p> <p>Included in our lifeline utilities are services such as transport (road, rail, sea and air), water supply, wastewater, drainage, energy generation and distribution telecommunications and broadcasting. These assets typically traverse large geographical areas and are vulnerable to natural hazards.</p> <p>It is now time to determine how Taranaki's lifeline utilities may further contribute to the effectiveness of Taranaki CDEM's Group Plan.</p>
OBJECTIVE	To assess the potential impacts of hazards on the region's lifelines infrastructure and identify mitigation strategies to reduce that risk.
DELIVERABLE	<p>A comprehensive report covering, in relation to the region:</p> <ul style="list-style-type: none">• Hazard information for all the major natural hazards including volcanic eruption, slope instability (Mt Taranaki), earthquake, flooding, tsunami, damaging winds and tornadoes and liquefaction.• Hazard information for all the major non-natural hazards including biosecurity incursion, infectious human disease, information and communication technology failure (long term).• Identification of regionally critical sites such as those of lifeline utilities, emergency services, hospitals, CDEM sites (EOCs, ECCs and CDCs), fast moving consumer goods, banking, education, corrections, large industrial consumers.

	<ul style="list-style-type: none"> • Description of lifeline infrastructure including criticality (significance of failure) ratings based on significance nationally, regionally and locally. • Lifeline utility interdependency. • Identification of lifeline Hotspots and Pinchpoints . • A hazard risk assessment for lifeline utilities to include Hotspots and Pinchpoints for each event type determined from the hazard information. • Mitigation options and suggested ongoing work programme for the Lifelines Group. <p>A PowerPoint suited to presentation at a CEG meeting is to be prepared summarising the comprehensive report.</p> <p>The report and PowerPoint are to be consistent with the risk management framework set out in <i>AS/NZS ISO 31000:2009 Risk Management – Principles and Guidelines</i>.</p>
<p>INTENDED AUDIENCE</p>	<p>The intended audience is the:</p> <ul style="list-style-type: none"> • Taranaki CDEM Group (CEG and officers), the Taranaki Lifelines Advisory Group (LAG), and • lifelines utilities in the Taranaki Region <p>The wider audience includes others with an interest in regional resilience including central government Ministries and science community / researchers.</p>
<p>APPROACH / METHODOLOGY</p>	<p>A Consultant will be appointed under contract to deliver the project. The Consultant will appoint a Project Manager who will:</p> <ul style="list-style-type: none"> • Report to the chairperson of the LAG or their appointed representative on a regular basis including when project milestones are due. • Work actively with lifeline utilities and other stakeholders (see next section) to obtain relevant information (templates and workshops envisaged) • Prepare the report, clearing drafts with lifeline utilities and other stakeholders as chapters are prepared.
<p>STAKEHOLDERS TO BE CONSULTED</p>	<ul style="list-style-type: none"> • Lifeline utilities • Lifeline Utility Coordinators • Territorial authorities in the Taranaki region • Owners/operators of main community services

OVERSIGHT	The chairperson of the LAG or their appointed representative will provide oversight of the project assisted by a small project management advisory group. It is envisaged that most members of the advisory group will be Lifelines Advisory Group members.
RESOURCES	<p>Cost: \$45,000+GST</p> <p>Funding: MCDEM Resilience Fund</p> <p>Infrastructure information to be obtained from lifeline utilities</p> <p>Information on positions of main community service sites to come from the services' owners/operators.</p> <p>Taranaki Regional Council will provide:</p> <ul style="list-style-type: none"> • information on location of natural hazards • GIS capability.
TIMING	<p>Milestones</p> <ol style="list-style-type: none"> 1. Hazard information <ul style="list-style-type: none"> - 1 months from contract commencement 2. Identification of critical sites and interdependencies <ul style="list-style-type: none"> - 4 months from contract commencement 3. Hazard risk assessment <ul style="list-style-type: none"> - 5 months from contract commencement 4. Draft report <ul style="list-style-type: none"> - 7 months from contract commencement 5. Final report: <ul style="list-style-type: none"> - 9 months from contract commencement 6. Completion including presentations: <ul style="list-style-type: none"> - 10 months from contract commencement
APPROVAL OF CEG CHAIR	