



Submission on the Commerce Commission's Draft Resilience Principles: Decision-Making Framework for Critical Infrastructure Providers

14 August 2026

We welcome the opportunity to comment on the Commerce Commission's draft Resilience Principles: Decision-Making Framework for Critical Infrastructure Providers.

We support its publication and offer the following comments to help the final guidance become a tool that benefits sector customers through clarification and national direction on resilience and asset management maturity.

Our goal is to help ensure the framework integrates seamlessly with the everyday water service provider requirements, making it an accessible tool that lifts maturity and strengthens resilience across the entire sector.

The draft guidance is cohesive and provides a strong baseline for establishment of resilience guidance. Table 3.1 is practical, and the distinction between risk tolerance and risk-bearing capacity is well-made. We also credit the Commerce Commission for recognising regulatory and governance relationships as genuine interdependencies.

Summary of recommendations

- 1. Integrate resilience within existing asset management systems:** We recommend aligning the terminology throughout the principles framework directly with ISO 55001 and the Global Forum of Asset Management Landscape. This helps providers view resilience as a natural part of their current planning and risk processes, rather than an extra framework to follow. It also ensures that New Zealand's practice is in step with global practice.
- 2. Embed core asset lifecycle factors as inputs:** We recommend adding asset health, standard of build e.g., IL rating and service demand alongside hazard data. Bringing these elements together rounds out the investment logic, ensuring we are collectively testing and building business cases for whole-of-life value.
- 3. Support sector-wide maturity with scaled pathways:** It is important that there is an achievable maturity pathway for service providers. We suggest introducing a two-tiered "Foundational" and "Mature" evidence pathway aligned to an established asset management

maturity scale. This gives smaller or transitioning providers a practical, achievable first step while keeping the long-term direction clear.

4. **Link risk assessment directly to prioritisation and whole-of-system resilience:** We see an opportunity to evolve the treatment of risk throughout to elevate it as a key lens for all asset management and investment decisions, including evolving Principle 10 by carrying the risk baseline directly into portfolio ranking. Using risk as a key lens for all strategic analysis and portfolio decision-making ensures that all asset decisions actively strengthen the system.
5. **Streamline regulatory alignment to reduce duplicate effort:** We encourage specifying exactly where this resilience evidence should live within standard strategic planning and decision-making processes and documentation. This prevents providers from duplicating work across different regulatory frameworks or treating subject-specific direction such as this as a separate task under competing requirements.

We have provided further detail below, covering each of the recommendations.

Recommendations for strengthening the framework

1. Frame resilience within the asset management system

Paragraph 1.18 sets service delivery in opposition to asset management. The two aren't alternatives – assets exist to deliver services, and asset management exists to deliver them efficiently across the asset lifecycle. The guidance also draws its taxonomy from the ResOrgs report. That's a valuable resilience lens, but its language sits apart from ISO 55001, the Global Forum for Maintenance and Asset Management (GFMAM) Asset Management Landscape, and the Āpōpō Guide the sector is increasingly building its asset management systems around – and risks reading as a separate discipline as a result.

Recommendations:

- Rec 1a** Redraft the final sentence of 1.18: *"Effective resilience investment prioritisation depends on a clear consumer and service delivery focus, rather than on physical asset solutions alone."*
- Rec 1b** Replace the ResOrgs taxonomy in paragraph 1.19 with structural alignment to the ISO 55001, GFMAM Landscape, and Āpōpō Guide as detailed in Appendix A. Treating organisational capability (ISO 55001 cl. 5 & 7) and lifecycle delivery (ISO 55001 cl. 8) as integrated components ensures resilience is treated as a cross-cutting risk function rather than a separate corporate silo.
- Rec 1c** Add a short glossary defining resilience, reliability, criticality, interdependency, risk tolerance, risk-bearing capacity and maturity, since these terms carry specific and sometimes differing meanings across sectors.
- Rec 1d** Note that other standards particularly ISO31000 and ISO9000 cover risk from different perspectives and are likely to also be part of current and future mature water service providers. Resilience should also be considered in the context of these standards.

2. Investment decisions need demand, condition, asset quality and design standards as inputs

The investment guidance focuses heavily on external hazards. However, hazard data alone cannot answer the whole-of-life value test. To determine if an organisation is doing the right work, on the right asset, at the right time, the investment logic must include asset health (e.g., condition, performance), standards of build, and user demand (current and future).

Operational responses belong in the same optioneering as capital ones. Response capability, spare parts, temporary supply, standing contractor and restoration arrangements are often the more efficient way to manage a resilience risk, and should be assessed alongside asset solutions rather than treated as a separate category.

Recommendation:

Rec 2a Add service demand, remaining asset life, and asset design standards as mandatory inputs to the criticality and options processes. We can do this by merging Principle 8 (Costs and Benefits) and Principle 9 (Option Effectiveness). Investment timing and scalability already belong inside a full cost-benefit analysis. Joining them together frees up space to include asset health and demand forecasts as core requirements.

3. Scale expectations to provider maturity

The current "what we expect to see" boxes primarily describe an advanced, mature standard. This creates an unachievable initial hurdle for lower-maturity or smaller utilities, who risk treating the guidance as a paper-based compliance exercise and are unable to make meaningful advances for the benefit of customers.

It also helps to separate two things the guidance currently runs together: proactive network-wide resilience planning, and the analysis needed for a specific investment case. Multi-hazard, interdependency and criticality assessments are network-level work, done once and maintained, not repeated for every project. Distinguishing the two would let providers carry network-level analysis into individual cases proportionately, rather than rebuilding it each time.

Recommendations:

Rec 3a Express each principle's evidence requirements in two distinct bands: Foundational and Mature (refer worked example below and full schedule in Appendix B).

Rec 3b Base the foundational band on the honest, structured use of data providers already hold, such as existing risk registers, asset condition data, and localised operational knowledge.

Rec 3c Align the banding to an established asset management maturity scale rather than a new one and set the target band by the provider's context and the criticality of the service – recognising that the appropriate level of maturity varies, and that the highest band is not the right target for every provider.

Worked Example:

Principle 1: Multi-hazard risk awareness

Draft guidance expectation	Foundational band	Mature band
Multi-hazard forecasting through a structured framework, with GIS layers across the network.	Hazards identified and recorded against critical assets in the existing risk register or asset management plan.	Quantified multi-hazard forecasting, including simultaneity and cascade, mapped in GIS across the network.

4. Link risk assessments directly to prioritisation and whole-of-system resilience

The guidance applies risk well when assessing individual investments. Principles 1 and 2 establish hazard, exposure (including vulnerability) and consequence as the basis for understanding infrastructure resilience current state. Principle 10 does not carry that basis through. It treats prioritisation as a sorting exercise across projects, and as coordination of timing, rather than as a risk-led judgement about where investment most strengthens the system. Connection with asset criticality is also not clear – this is vital especially where multiple competing assets are at significant (same) risk.

Two shifts would close this.

First, make the risk assessment the explicit basis for prioritisation. The hazard, exposure and consequence analysis built under Principles 1 and 2 should be what ranks the portfolio, so that prioritisation is continuous with the risk work already done rather than a separate step.

Second, prioritise at the system level using tools including criticality across cross asset sectors and within them, not the project level. Ranking projects against one another orders a queue. Whole-of-system resilience comes from asking how each investment strengthens the network as a whole, so that lifecycle renewals and major upgrades are assessed against the same risk picture and together improve the resilience of the wider system.

Asset criticality is the lens that turns a risk baseline into a prioritised portfolio. Risk, criticality and resilience are overlapping but distinct: risk describes exposure and consequence, criticality ranks assets by the consequence of their failure, and resilience is the outcome the investment protects. Criticality is what distinguishes between assets facing the same hazard, and it matters most where several assets sit at comparable risk. Drawing the three out explicitly, rather than treating criticality as implicit within risk, gives providers a clearer basis for prioritisation.

Together these treat risk as a continuous lens across portfolio decisions rather than a stage that closes once individual investments are assessed.

Recommendations:

- Rec 4a** Establish the risk assessment from Principles 1 and 2 (hazard, exposure, consequence) as the explicit baseline for capital portfolio prioritisation under Principle 10.
- Rec 4b** Link that risk-led ranking to network-level planning, so individual project selections are assessed for how they collectively strengthen whole-of-system resilience.
- Rec 4c** Use asset group and component level criticality as the explicit link between the risk assessment and the prioritised portfolio, so that assets facing comparable risk are ranked by the consequence of their failure.

5. Align the regulatory response and reduce documentation duplication

The highest-value next step for the sector is not further business case guidance but specifying exactly where resilience decision-making should be evidenced within standard documentation. Paragraph 1.14 leaves information disclosure-only providers with materially less clarity than price-quality regulated ones. This lack of specificity creates a high risk of parallel evidence trails and duplicate paperwork, which is particularly inefficient for transitioning water services organisations facing massive investment cycles.

Recommendations:

- Rec 5a** Map the framework's evidence requirements directly into standard documents that providers already produce, such as Strategic Asset Management Plans (SAMPs), Activity Management Plans, and existing information disclosures.
- Rec 5b** Reference existing sector-owned capability frameworks in Chapter 5 to give providers a practical, clear route to progressively build the required organisational maturity.

6. Align regulatory incentives with the resilience outcomes sought

The guidance asks providers to look beyond asset hardening to operational, adaptive and non-asset responses. The regulatory settings can pull the other way. Where a provider earns a long-term return on its regulated asset base, capital solutions are rewarded over their life, early asset retirement is penalised, operating expenditure earns no return, and savings in operating expenditure are rewarded only in the short term.

The effect is a bias toward capital and toward hardening in particular – a new sea wall that fixes a pipe in place can be favoured over relocating the pipe, increasing monitoring for adaptive planning, or investing in cyber security. The ResOrgs report opens by noting that resilience is multi-dimensional and extends beyond asset hardening. The guidance will realise that intent most fully if the incentive structure is aligned to it, so that operational and adaptive responses can compete with capital solutions on their merits.

Recommendation:

Rec 6a In finalising the guidance, consider how price-quality and revenue-setting mechanisms can avoid favouring capital solutions over equally effective operational, adaptive or non-asset responses, so the framework's intent is not undercut by the incentives providers face.

Closing comments

We support the Commission's direction and see this guidance as a genuine step toward more consistent, risk-led resilience investment across New Zealand's infrastructure sectors.

The framework will land best, and be adopted fastest, if it is expressed as an integrated part of the asset management systems providers already need to build, scaled to where each provider is at, and aligned with the other regulatory settings resilience decisions already sit within.

We would welcome the opportunity to discuss any of the above further as the guidance is finalised.

Technical Appendices

Appendix A:

Mapping the ResOrgs framework to asset management system language

This table sets out one way of expressing the four ResOrgs areas used in paragraph 1.19 of the draft guidance in the language of ISO 55001, the Global Forum for Maintenance and Asset Management (GFMAM) Asset Management Landscape and the Āpōpō Guide.

It is the basis for Recommendation 1 in the main submission – that resilience be framed as integrated within the asset management system rather than as a separate framework. We suggest risk be shown as a cross-cutting element rather than a fourth, discrete area, since hazard, exposure, vulnerability, consequence, criticality, optioneering and prioritisation are all parts of a single risk-led decision-making process that runs through the other three.

ResOrgs framing	Asset management equivalent	ISO 55001:2024 reference	GFMAM Asset Management Landscape reference	Āpōpō Guide reference
Organisational resilience	Organisational capability, competence and support	ISO 55001 cl. 5 & 7;	GFMAM: 4. Leadership and People	Āpōpō Guide Chapter 4. Leadership and People
Information and planning systems	Asset information and asset management planning	ISO 55001 cl. 6 & 7.5;	GFMAM: 3. Asset Management Planning, 5. Data and Information	Āpōpō Guide Chapter 3. Asset Management Planning, 5. Data and Information
Physical system attributes	Lifecycle delivery – design standards, condition, criticality, network configuration	ISO 55001 cl. 8;	GFMAM: 3.6. Life cycle Value Realization, 5.5 Configuration Management	Āpōpō Guide Chapter 3.6. Lifecycle Value Realisation, 5.5. Configuration Management
Investment decision-making	Lifecycle decision-making and capital investment prioritisation	ISO 55001 cl. 6;	GFMAM: 3.5 Decision-Making	Āpōpō Guide Chapter 3.5. Decision-Making

Risk (cross-cutting): *distributed across all of the above – lifecycle risk-led decision-making. ISO 55001 cl. 6.1, 9 & 10; GFMAM Asset Management Landscape: 2.6 Risk, Āpōpō Guide 2.6 Risk.*

This same mapping could be extended to Chapter 5 to point providers to the specific ISO 55001 clause, GFMAM Asset Management Landscape subject area, or Āpōpō Guide Chapter under each principle, rather than only to the ISO 22372:2025 standard the guidance currently aligns itself to.

Appendix B:

Full table of principle-by-principle expectations (Foundational / Mature)

This is the complete set underlying the single worked example (Principle 1) in the main submission. It proposes that each 'what we expect to see' box in Chapters 2 and 3 be expressed as two bands, set against the asset management maturity pathway a provider is already on. The foundational band is designed to be achievable now, from information a provider already holds; the mature band describes the fuller standard the guidance currently sets as the single bar for everyone.

Principle 1: Multi-hazard risk awareness

Draft guidance expectation	Foundational band	Mature band
Multi-hazard forecasting through a structured framework, with GIS layers across the network.	Hazards identified and recorded against critical assets in the existing risk register or asset management plan.	Quantified multi-hazard forecasting, including simultaneity and cascade, mapped in GIS across the network.

Principle 2: Understanding risk at different scales

Draft guidance expectation	Foundational band	Mature band
GIS modelling at multiple return periods, consumer impact assessment, community engagement beyond desktop analysis.	Known exposure at asset and consumer level from data already held; obvious vulnerable communities identified.	Multi-return-period modelling, targeted engagement, CDEM and Lifelines Group information incorporated.

Principle 3: Accounting for interdependencies

Draft guidance expectation	Foundational band	Mature band
Mapping of impacts to other interdependencies, with losses included in the commercial assessment.	Key dependencies documented and contacts identified.	Quantified cross-sector loss included in the economic case; alternative supply options discussed with dependent parties.

Principle 4: Consideration of distributional impacts

Draft guidance expectation	Foundational band	Mature band
Consumer categorisation, willingness-to-pay evidence,	Consumer types categorised; likely disproportionate burdens	GIS or impact assessment by consumer group; engagement

Draft guidance expectation	Foundational band	Mature band
engagement with vulnerable and iwi/hapū communities.	identified from existing knowledge.	informing the assessment; coordinated with other providers.

Principle 5: Risk tolerance and risk-bearing capacity

Draft guidance expectation	Foundational band	Mature band
Common framework aligned to ISO 31000, engagement, defined thresholds, tolerance distinguished from capacity.	Significant investments assessed against organisational risk tolerance already defined in the existing risk framework.	Documented tolerance framework, targeted engagement, explicit distinction between tolerance and capacity, thresholds established.

Principle 6: Clearly defined asset criticality

Draft guidance expectation	Foundational band	Mature band
Documented criticality framework combining physical vulnerability and socio-economic impact, applied to prioritisation and design standards.	Existing criticality assessment applied to the resilience decision, reflecting who depends on the asset and its condition and remaining life.	Socio-economic and cultural consequences incorporated; criticality used to inform design standards and service levels.

Principle 7: Structured optioneering

Draft guidance expectation	Foundational band	Mature band
Wide range of options considered, including do-nothing; structured assessment; consideration of co-benefits.	Avoid, control, transfer, accept and do-nothing options considered and documented, alongside demand-side options.	Full structured assessment against agreed criteria, including co-benefits and consideration of who is best placed to deliver.

Principle 8: Comprehensive costs and benefits evaluation

Draft guidance expectation	Foundational band	Mature band
Comprehensive social cost-benefit analysis, using a framework proportionate to the investment.	Proportionate cost-benefit analysis (Better Business Case level), with material community impacts identified.	Full social cost-benefit analysis at network or regional level, including real options, multi-criteria analysis or MERIT where appropriate.

Principle 9: Option effectiveness

Draft guidance expectation	Foundational band	Mature band
Benefit-cost ratio, optimal timing, scalability, comparison across multiple return periods.	Options compared on cost and timing, with timing explicitly linked to asset condition, planned renewals and demand change.	Return-period comparison, deferral value and adaptive trigger points assessed.

Note: Principles 8 and 9 overlap substantially – the timing dimension in Principle 9 sits comfortably inside a comprehensive cost-benefit evaluation. Worth flagging to the Commission as a possible merge, which would also make room to strengthen the treatment of demand, condition and design standards as core inputs, without expanding the framework beyond eleven.

Principle 10: Investment prioritisation

Draft guidance expectation	Foundational band	Mature band
Documented prioritisation framework, multi-criteria analysis, cross-provider coordination.	Resilience considered within the existing capital prioritisation process, alongside renewals, growth and compliance investment, using a common risk basis.	Multi-criteria prioritisation, cross-provider and Lifelines Group coordination, with iwi and hapū impacts reflected.

Principle 11: Dealing with uncertainty

Draft guidance expectation	Foundational band	Mature band
Monte Carlo simulation, real options analysis, dynamic adaptive pathways, documented assumptions, board reporting.	Uncertainty in key assumptions acknowledged and documented; scenarios applied to major investment options.	Adaptive strategies, staged investment with defined triggers, quantified uncertainty, regular board reporting.