The *Productivity Commission's Circular Economy Interim Report* outlines a vision of more efficient materials use through circular principles but remains embedded within the existing single-metric economic model. While it acknowledges the limits of the current linear system, it stops short of adopting a fully transformative approach to economic value. A deeper shift, one that reflects whole-of-value-chain transparency and introduces a second metric to measure real cost, is both necessary and overdue.

Unlocking a Regenerative Circular Economy: Beyond Waste, Towards Whole-System Value

1. Reframing the Circular Economy

The interim report correctly identifies Australia's slow progress on circularity and the urgency of improving material productivity. However, improving recycling and minimising waste, while useful, will not by themselves regenerate ecological or social systems. A more transformative pathway recognises that the core failure is not just material inefficiency—but a lack of visibility and accountability across the full lifecycle of goods and services.

A true circular economy must go beyond outputs and consider the unseen but embedded elements—energy, materials, and information—that underpin every product. These elements must be traced from origin to outcome. Every transaction must carry two types of information: financial price and ecological cost. Only then can the full burden and value of a product be known.

2. Government's Role: Enablement, Not Ownership

The report outlines well the roles of government in regulation, procurement, and coordination. But to lead a genuine transition, government must also take a foundational step: embed dual metrics in policy frameworks—financial and environmental—so that both producers and consumers are guided by the full truth of their choices.

Just as a financial cost steers behaviour, so too must a clear, universally understood environmental cost. This can be achieved by requiring products and services to disclose their ecological cost—embodied energy, carbon, and material input—alongside price. Done well, this shift enables markets to function in service of the commons, not just capital.

3. Prioritisation Must Be Physically Grounded

The Commission's sectoral focus is valid—particularly the built environment—but prioritisation must be grounded in physical science, not just economic value. For instance, sectors must be ranked not only by their GDP contribution or waste output, but by their carbon intensity and resource depletion rates across time and place.

A regenerative prioritisation framework should include:

- **Material Entropy**: How degraded are resources post-use?
- **Energy Source**: How renewable is the energy throughout the supply chain?
- **Information Integrity**: Can the origin, impact, and ownership of the resource be known?

4. Built Environment: Rebuilding How We Build

The built environment is responsible for vast material flows, long-lived infrastructure, and high embedded emissions. The report rightly identifies prefabrication, recycled inputs, and modular design as priorities—but misses the opportunity to shift the frame.

What's needed is full lifecycle traceability of materials. Bricks, beams, and fixtures must be tagged not only by type and grade but by their origin and embodied energy. Every construction element should carry a second metric—a "resource label"—equivalent in prominence to price, but representing environmental load.

Procurement should be mandated to consider both metrics. In doing so, the construction sector would not just "use less" but shift to using better, more recoverable materials, guided by real-time visibility of ecological load.

10. System-Wide Arrangements: Towards Transparent Value Streams

System-wide progress cannot be achieved through piecemeal reforms or fragmented indicators. Instead, a new foundational architecture is required: a universal method of measuring, verifying, and sharing the resource and carbon content of every transaction.

This requires:

- **A dual-metric standard** for procurement, labelling, and reporting.
- **Distributed information systems** (e.g., digital ledgers) for real-time traceability across supply chains.
- **Open ecological accounting frameworks** to enable both large and small entities to participate.

Such an approach aligns with insights from current research and industry leaders, which calls for redefining energy, material, and information as core economic value streams. By treating these as foundational—not abstracted behind monetary proxies—we can build a system where accountability and regeneration are inherent, not aspirational .

Conclusion: Regeneration Through Redefinition

The report sets a necessary direction but lacks the mechanism for deep change. To achieve the circular economy's promise, Australia must move beyond a single-metric economy. Only by embedding a second metric—an ecological cost that is visible, countable, and connected across supply chains—can we achieve the depth of transparency and justice that our moment demands.

This is not merely a technical fix; it is a redefinition of value. It's a shift from extraction to stewardship, from opacity to visibility, from singular profit to shared regeneration.

The next step is clear: **every transaction must carry both a price and a cost**. Only then can we restore integrity to our economy and balance to our planet.