AEMC Level 15, 60 Castlereagh Street Sydney NSW 2000

Submission opposing Draft Rule Determination – Accelerating Smart Meter Deployment ERC0378

I am writing to express my concerns and opposition to the enforced installation of smart meters in homes across Australia. While the intention behind smart meters—improving energy efficiency and providing detailed energy usage information—appears beneficial, several significant issues warrant a reconsideration of this mandate. Specifically, I would like to address the potential health implications and environmental concerns.

Health Issues

One of the primary concerns is the potential health risk associated with the radiofrequency (RF) radiation emitted by smart meters. These devices emit RF radiation continuously to communicate with utility companies. Research indicates that prolonged exposure to RF radiation may have adverse health effects. For instance, a study published in the 'Environmental Research journal found an association between RF radiation exposure and an increased risk of cancer and other health problems (Belpomme et al., 2018). Another study published in the 'International Journal of Hygiene and Environmental Health' suggested that long-term exposure to RF radiation could affect cognitive functions and cause neurological disturbances (Wilke et al., 2018). The current ARPANSA standard only considers short-term heating as the only health concern, and this is not the case (McCredden 2022).

Environmental Issues

Smart meters also raise environmental concerns. The manufacturing and disposal of smart meters involve significant resource consumption and generate electronic waste (e-waste). According to a report by the 'United Nations University' (Baldé et al., 2017), e-waste is one of the fastest-growing waste streams globally, with severe implications for environmental health. The production of these devices demands substantial amounts of raw materials and energy, contributing to environmental degradation and carbon emissions. Additionally, the disposal of smart meters, which contain hazardous materials, can lead to soil and water contamination, affecting both ecosystems and human health.

Supporting Research

Recent studies underscore these issues. The World Health Organization's International Agency for Research on Cancer (IARC) has classified RF electromagnetic fields as possibly carcinogenic to humans (Group 2B), based on an increased risk for glioma, a malignant type

of brain cancer (Baan et al., 2011). Furthermore, the 'BioInitiative Report 2012' reviewed over 1800 studies and concluded that prolonged exposure to RF radiation from various sources, including smart meters, poses a risk to human health, potentially leading to cancer, neurological disorders, and reproductive issues (Sage & Carpenter, 2012).

Given these substantial health and environmental concerns, I urge the policy enforcing smart meter installation to further assess the risks and ensure public safety be explored. These might include wired smart meters, which do not emit RF radiation, or enhancing energy efficiency through other means that do not pose such risks.

Please consider these concerns seriously and take appropriate action to protect the health and well-being of Australian residents and the environment.

Thank you for your attention to this critical issue.

Yours Sincerely,

Dr Katie Pattison (TCM) BHSc

References

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