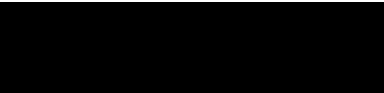


04 October 2018



Dear 

**Re: Official Information Act Request – ECT in the last ten years**

Thank you for your Official Information Act request, with regard to Electroconvulsive Therapy (ECT) over the last ten years, which was partially transferred by the Ministry of Health to Waitemata District Health Board (DHB) on 24 September 2018.

The following, before I respond to your specific questions, may be useful to provide some context about our services and assist your understanding. Waitemata DHB serves a population of 630,000. The Specialist Mental Health and Addiction Services is the largest service of its kind in the country, by volume of service-users seen. The speciality comprises Adult Mental Health Services, Child Youth and Family Mental Health Services, Takanga a Fohe (Pacific mental health), Whitiki Maurea (Kāupapa Māori mental health), Community Alcohol and Drug Services (an Auckland regional service) and the Regional Forensic Psychiatry Service (covering Northland and greater Auckland regions). For the purposes, of your request we have included data from Mental Health Services for Older Adults. We have endeavoured to show how we have interpreted your questions in our responses below:

**5. How many people were left brain damaged by ECT in the last 10 years in New Zealand?**

We are not able to provide this information as we are only able to answer on behalf of Waitemata DHB. Note also that in this case we do not collect data in a way that would allow us to easily respond to your question. To gather this information, we would need to track and read the health records of all people treated by ECT in the last 10 years.

We have considered whether charging for the time required to collate this information would assist us to manage this request. We have formed the view that it would not because it would require the input of clinical staff with mental health backgrounds who are experienced in using our records system to review patient files. This would, in turn, impact on our ability to meet the needs of our patients.

We have also considered contracting staff to undertake this work but do not see this as a viable option due to a national shortage of experienced mental health personnel.

However, the psychiatrist who leads our ECT service says there is a common misconception that ECT causes brain damage. This psychiatrist has spent decades doing ECT in New Zealand, Australia, South Africa and the UK but has not observed any incidences of brain damage. In addition, there have been animal models and people studied with magnetic resonance imaging (MRI) with ECT and there is no evidence of any brain damage<sup>1</sup>. Modern anaesthesia and ECT techniques make the risk of any anoxic injuries an unlikely experience. We do know that Long Term Potentiation is saturated in the hippocampus as a result of the inducing electrical fields and may account for the temporary anterograde changes noted during acute treatment. However, these changes reverse within a month (80% within two weeks) of stopping ECT. The only longer-term considerations relate to some retrospective autobiographical memory issues that were more common with the older sine wave machines<sup>2</sup>. This is less common with our modern machines, not as severe, and usually will not last longer than six months.

**6. How many people have been followed up on after receiving ECT in New Zealand to see if they have improved or become worse?**

We are only able to answer this question in relation to Waitemata DHB. All patients are assessed and monitored for their target symptoms before, during and after the ECT. The team that refers the patient also does the follow up monitoring, which is coordinated through our local ECT team.

**7. How much does each ECT treatment cost in New Zealand?**

We are only able to answer this question in relation to Waitemata DHB. The estimated cost per ECT procedure is \$812.

Waitemata DHB, like other agencies across the state sector, supports the open disclosure of information to assist the public's understanding of how we are delivering publicly-funded healthcare.

This includes the proactive publication of anonymised Official Information Act responses on our website from 10 working days after they have been released. If you feel that there are good reasons why your response should not be made publicly available, we will be happy to consider this.

Yours faithfully



Dr Susanna Galea-Singer  
Specialist Mental Health & Addiction Services  
Waitemata District Health Board

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<sup>1</sup> Abrams R. Electroconvulsive Therapy, 4th Edition. Oxford, 2002

<sup>2</sup> Sackheim HA et al. Neuropsychopharmacology (2007) 32, 244–254.