New Zealand doctors should be allowed to prescribe cannabis for pain

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YES

New Zealand doctors should not only be allowed to prescribe cannabis for pain, but ought to be doing so, both for practical and ethical reasons. As with any pharmaceutical there are caveats.

There is currently one legally available prescription cannabinoid in New Zealand, the oromucosal spray Sativex. For other formulations, including the use of raw cannabis, there would need to be a change in the law. This has been subject to a recent Law Commission report, which recommended more clinical trials to define the role of cannabis in pain management.[1]

Cannabis extract was part of the US pharmacopoeia until 1942,[2] and in the UK until 1973, having originally been introduced in the 1840s for treatments including pain and the treatment of opium poisoning.[3] Cannabinoid receptors are present throughout the mammalian nociceptive system, from the periphery through to the supraspinal systems, including the limbic system.[3]

Cannabinoids have been clearly documented to be both analgesic and anti-hyperalgesic in inflammatory and neuropathic models of pain in animals. The analgesic activity, particularly in the acute pain model, may be solely a consequence of activity on the limbic system and, in particular, involving the amygdala.[4] Rigorous double-blind clinical trials over the last couple of decades using 'raw' cannabis and of extracted alkaloids have been performed. The more recent systematic reviews have concluded that there is a real and significant benefit to be gained from cannabinoids in neuropathic pain conditions.[2,5,6] The results from studies in acute pain are less clear, but some trials have shown a dose-related analgesic response,[6] and this could be important with the current trend to reduce use of opioids for post-surgical pain control. Better understanding of the place of cannabinoids will only come about by further clinical trials of cannabinoids.

We therefore need to consider the caveats of treatment. As with any drug treatment directed to pain management, there is an imperative to follow good practice. There needs to be adequate controls in place so as not to repeat the opiate prescribing epidemic of the last few decades. Foremost of these steps is the need for an accurate diagnosis, and with the current evidence base, this treatment should be used for persistent neuropathic pain not responsive to conventional therapy. There also needs to be good control of prescribing. In Colorado and Arizona, this is backed up by licensing and registering users,[2] and a similar scheme applies in Canada.[7]

Secondly, there is a need to consider the side effects of therapy. Cannabinoids have been found to have mild or moderate side effects in the clinical trials which did not lead to significant withdrawals, unlike in studies using, for example,

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BACK TO BACK this issue:


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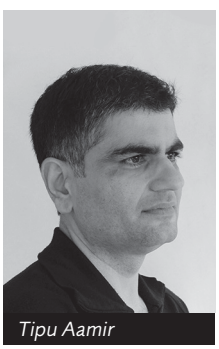
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While evidence can help inform best practice, it needs to be placed in context. There may be no evidence available or applicable for a specific patient with his or her own set of conditions, capabilities, beliefs, expectations and social circumstances. There are areas of uncertainty, ethics and aspects of care for which there is no one right answer. General practice is an art as well as a science. Quality of care also lies with the nature of the clinical relationship, with communication and with truly informed decision-making. The **BACK TO BACK** section stimulates debate, with two professionals presenting their opposing views regarding a clinical, ethical or political issue.

opioids.[5] Most of the troublesome side effects are due to receptor agonist tetrahydrocannabinol and it would appear that a 1:1 combination of the two major cannabinoids—tetrahydrocannabinol and cannabidiol—gives the best results, with least side effects.[8] These side effects include dizziness, dry mouth, nausea, feeling 'spaced out', sedation, anxiety and poor coordination.[2,5] The cannabinoids are undoubtedly sedative and affect psychomotor function, and as with any such medication, need to be avoided if contemplating driving. For example, it has already been noted that there is a significant incidence of cannabis use among drivers involved in accidents.[1]

These side effects, however, need to be seen in perspective. Side effects are common with all currently available analgesics and other drugs used for neuropathic pain. One clear statistic emerges though—unlike with other analgesic drugs, whether that is paracetamol, NSAIDs, opiates, antidepressants or anticonvulsants, there have been no deaths directly attributable to cannabinoids.

Evidence for use would also suggest that currently there is a need to avoid use in some groups, particularly children, pregnant women and individuals known to be susceptible to psychosis.[2] With respect to psychosis, the jury is still out as to whether this is a drug effect or whether individuals prone to psychosis are more likely to experiment with psychoactive drugs. Interestingly, cannabinoids have been used successfully in the management of schizophrenia.[6]

Thirdly, there is the issue of route of administration. While cannabis is regularly smoked or vaporised, it can be extracted in to oils to be taken orally, although bioavailability may be lower.[2] Extracted cannabinoids may be converted into tablets or used as an oromucosal spray. Smoking or vaporising is the least desirable option because of the defined health risks of smoking and the not insignificant public health risk of passive smoking, which in the case of cannabis could lead to the uncontrolled delivery to other than the intended applicant. There is no such problem with oral or oromucosal use, which can deliver a predictable, prescribed dose of intended medication. Use of pharmaceutically prepared product may have the advantage of quality control of dosage units and may be a preferred option. However, the pharmaceutical preparations do carry a prohibitive cost to patients. For example, the currently legally available cannabinoid in New Zealand, Sativex, is not subsidised and even light use costs over $1,000 per month. Dried plant extract could provide a more available, cheaper alternative for use, but would require a change in law to allow this to be used. State control of the raw product, as in the Netherlands[9] has been demonstrated to lead to a more reliable formulation, allowing prescription of plant material safely and with quality control.

There is, therefore, incontrovertible evidence that cannabis and cannabinoids are effective for neuropathic pain. The cannabinoids, including dried plant products, are much safer drugs than drugs we currently use. The side effect profile is mild to moderate and can be controlled by patient dosing. Many people worldwide are currently using cannabis to self-medicate for persistent pain control.[2] More states in the US are changing their laws to permit medical use of cannabinoids.

There is an ethical dimension to this. Given that we have an available, effective treatment for a disabling condition where no other treatment exists, not to prescribe may be considered to be unethical, even negligent.

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