thebmj

BMJ 2017;356:j741 doi: 10.1136/bmj.j741

EDITORIALS

Challenges of managing chronic pain

Start by ensuring realistic expectations

Jianren Mao *Richard J Kitz professor of anesthaesia research*

Division of Pain Medicine, Massachusetts General Hospital, Harvard Medical School, Boston, MA, USA

BMJ: first published as 10.1136/bmj.j741 on 17 February 2017. Downloaded from http://www.bmj.com/ on 19 April 2024 by guest. Protected by copyright.

Chronic pain is an individualised experience with multifactorial aetiology.[1] It can cause unexpectedly prolonged suffering when, for example, an initial injury evolves into a complex disease state. A transient ankle sprain may turn into a complex regional pain syndrome lasting for months to years; or a week long episode of shingles may cause post-herpetic neuralgia with disabling pain for months or years. Moreover, chronic pain can be an accompanying symptom of largely irreversible underlying disease, such as degenerative arthritis (osteoarthritis), spinal stenosis, or compression fracture resulting from osteoporosis in older people. Chronic pain can also be a primary complaint of clinical conditions such as fibromyalgia and trigeminal neuralgia, for which neither the aetiology nor mechanism is currently well understood.

Chronic pain is therefore not simply a chronological extension of acute pain and requires different diagnostic approaches and management strategies. For example, diagnostic tools such as radiography and magnetic resonance imaging are less informative in identifying the source because the severity of chronic pain can be disproportionate to the underlying cause[2]; chronic pain is typically associated with and exaggerated by coexisting conditions such as anxiety, depression, catastrophising, and disability; and the effectiveness of medications used for acute pain can diminish over time because of tolerance (for example, with opioids) or increased side effects.[3] Chronic pain is a unique challenge to health professionals that demands a sensible and pragmatic management strategy.

Setting realistic expectations—Managing chronic pain is to fight a "war" not a "battle." Both clinicians and patients must start with the right expectations and develop a long term strategy with full awareness of the complexity of the problem. Patients with diabetes do not expect control after a single course of treatment—they expect a long term plan that includes diet, exercise, medication, education, and prevention. Patients with chronic pain (and their doctors) should expect a similar long term multifaceted approach. Unrealistic expectations of a "quick fix" can become an iatrogenic source of anxiety for patients and result in unnecessary medicating and dose escalation (including overprescribing opioids) or overzealous interventions (such as unnecessary surgery or nerve blocks) by clinicians looking for short term gains.

Recognising limitations of pain medications—All commonly used analgesics have important limitations when used for chronic pain. For example, prolonged use of paracetamol (acetaminophen) can cause changes in liver function that are exacerbated by concurrent alcohol consumption,[4] and non-steroidal anti-inflammatories are associated with potentially serious renal, gastrointestinal, and cardiovascular side effects.[5] Opioid analgesics have been increasingly used in many countries over several decades, particularly in the US.[6] But aside from well known side effects such as constipation and sedation (particularly in older people), long term treatment with opioids can also lead to tolerance, hyperalgesia, addiction, and misuse.

These serious issues are at the heart of an ongoing and well publicised "opioid crisis" in the US that includes worsening overprescribing and rising rates of overdose related deaths.[6,7] An opioid prescription should not be a litmus test of the adequacy of individual pain management plans. Opioids can and should be used when indicated, but a plan without opioids should not be viewed as incomplete or inferior.

The idea of a comprehensive pain management strategy is now more valuable than ever. Primary care clinicians, surgeons, and emergency department doctors are in the frontline of pain management, and they have a pivotal role in initiating and developing a long term strategy that includes prompt referral to pain specialists. Other key components of a comprehensive management plan include treating underlying conditions; using multiple drugs, including muscle relaxants, antidepressants, anticonvulsants, and topical agents as well as conventional analgesics, to optimise the effectiveness and minimise side effects[8]; adding psychological interventions and physical therapy; and considering integrative approaches such as acupuncture and mind-body therapy.[9,10]

It helps to remember that pain is a defence signal and its proper function is necessary for our survival. The aim of chronic pain management is not to get rid of the defence signal but to adjust its threshold so that the signal will not go off inappropriately. This goal is perhaps the ultimate challenge in managing chronic pain and has been the subject of decades of effort in pain research.[2]

jmao@partners.org

For personal use only: See rights and reprints http://www.bmj.com/permissions Subscribe: http://www.bmj.com/subscribe

Competing interests: I have read and understood BMJ policy on declaration of interests and have no relevant interests to declare.

Provenance and peer review: Commissioned; not externally peer reviewed.

1 Cohen S, Mao J. Neuropathic pain: mechanisms and their clinical implications. *BMJ* 2014;348:f7656. doi:10.1136/bmj.f7656pmid:24500412.
2 Mao J. Current challenges in translational pain research. *Trends Pharmacol Sci* 2012;33:568-73. doi:10.1016/j.tips.2012.08.001pmid:22959652.
3 Vorobeychik Y, Gordin V, Mao J, Chen L. Combination therapy for neuropathic pain: a review of current evidence. *CNS Drugs* 2011;25:1023-34. doi:10.2165/11596280-000000000-00000pmid:22133325.
4 Bunchorntavakul C, Reddy KR. Acetaminophen-related hepatotoxicity. *Clin Liver Dis* 2013;17:587-607, viii. doi:10.1016/j.cld.2013.07.005pmid:24099020.
5 Gupta A, Bah M. NSAIDs in the treatment of postoperative pain. *Curr Pain Headache Rep* 2016;20:62. doi:10.1007/s11916-016-0591-7pmid:27841015.
6 CDC guideline for prescribing opioids for chronic pain.https://www.cdc.gov/drugoverdose/prescribing/guideline.html
7 Hurley R. US surgeon general: doctors have central role in solving opioid epidemic. *BMJ* 2017;356:j715doi:10.1136/bmj.j715.
8 Mao J, Gold MS, Backonja MM. Combination drug therapy for chronic pain: a call for more clinical studies. *J Pain* 2011;12:157-66. doi:10.1016/j.jpain.2010.07.006pmid:20851058.
9 Chen L, Houghton M, Seefeld L, Malarick C, Mao J. A survey of selected physician views on acupuncture in pain management. *Pain Med* 2010;11:530-4. doi:10.1111/j.1526-4637.2010.00815.xpmid:20202145.
10 Qaseem A, Wilt TJ, McLean RM, Forciea MA. Noninvasive treatments for acute, subacute, and chronic low back pain: a clinical practice guideline from the American College of Physicians. Ann Intern Med 2017. doi:10.7326/M16-2367.

Published by the BMJ Publishing Group Limited. For permission to use (where not already granted under a licence) please go to http://group.bmj.com/group/rights-licensing/permissions

BMJ: first published as 10.1136/bmj.j741 on 17 February 2017. Downloaded from http://www.bmj.com/ on 19 April 2024 by guest. Protected by copyright.