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# FOCUS ON OPIOIDS IN PERSISTENT NON-MALIGNANT PAIN

## IMPACT OF CHRONIC PAIN

An estimated 14 million people live with chronic pain in England. The experience of chronic pain is consistently linked with poor quality of life and disability, and the significant burden of living with chronic pain means that people who experience it are often high users of healthcare.

*It has been reported that chronic pain sufferers visit their GP up to 5 times more frequently than other patients.*

In 2004, primary care management of patients with chronic pain was estimated to account for 4.6 million appointments per year (equivalent to 793 whole time GPs at a cost of approximately £69 million).

Recent data shows that 21.7 million prescriptions for opioids (not including opioid substitution treatment for addiction) were issued in 2013, with a total cost of nearly £290 million. The average opioid daily dose has increased in the last 5 years.

## FACTS ABOUT CHRONIC PAIN

Chronic non-cancer pain has no physiological purpose. It continues after tissue injury would be expected to have healed and is strongly affected by a variety of emotional, social and cognitive factors.

Medications are less effective for chronic non-cancer pain than for other types of pain. They should therefore be used in combination with other treatment modalities, supporting biological, psychological, social and cultural function.

## TREATMENT FOR CHRONIC PAIN:

Chronic pain causes low mood, poor sleep, impaired mobility, irritability and lack of energy. It is difficult to treat, and most treatments help less than a third of patients. Treatment is therefore focused on self-management and functional improvement. Whilst different treatment options will benefit different individuals, medications (particularly opioids) are often relatively ineffective for chronic pain. More benefit may be seen from education, reassurance, physiotherapy-guided rehabilitation and exercise, acupuncture and TENS, and psychological strategies including mindfulness meditation. An understanding of chronic pain mechanisms helps patients to focus on appropriate self-management techniques by addressing fears about further tissue damage and flare-ups.

## CONCERNS ABOUT OPIOIDS FOR PERSISTENT PAIN

**Lack of effectiveness:** while opioids are effective at treating acute pain and cancer-related pain, there is little to suggest their efficacy in persistent non-malignant pain. There is also no data to demonstrate improved quality of life for patients taking opioids for persistent pain.

**Chronic pain is complex:** pain is a complex sensory and emotional experience. It is influenced by biological as well as social, psychological and cultural factors and needs to be managed in this context. Therapy for chronic pain should focus on improving quality of life despite ongoing symptoms.

**Prescription opioid 'epidemic' in the USA:** the increased prescribing of opioid medication has also been seen in the USA, where it has been associated with a parallel increase in misuse of prescription opioids, as well as opioid related harms such as overdose and death. For example, in 2011 there were 15,000 prescription opioid deaths in the USA. Although there are some important differences between the USA and the UK, we should be aware of the potential for similar misuse closer to home.

## COMMON OPIOID SIDE EFFECTS

Side effects are very common with opioid medications. Clinical trials suggest that 50–80% of patients experience at least one side effect.

Most side effects are predictable pharmacological consequences of opioid action including:

- *Nausea*
- *Vomiting*
- *Constipation*
- *Dizziness*
- *Itching*
- *Dry mouth*
- *Sedation*
- *Tolerance*
- *Dependence*

Constipation and itching usually persist for the duration of opioid treatment.

Susceptible individuals, especially those with obstructive sleep apnoea, may experience upper airway obstruction, respiratory depression and inadequate tidal volumes due to the effects of opioids on respiratory physiology.





## LONG TERM HARM FROM OPIOID THERAPY

Doses exceeding 120mg oral morphine (or equivalent) per 24 hours are known to have long term harmful effects on the body. Doses as high as this are also unlikely to be of analgesic efficacy.

## LONG TERM EFFECTS NEED TO BE CONSIDERED ON:

### ENDOCRINE SYSTEM

Hypogonadism and adrenal insufficiency have been demonstrated in men and women, leading to:

- *Amenorrhoea in women*
- *Erectile dysfunction in men*
- *Infertility*
- *Depression and fatigue*
- *Reduced libido*

Patients should be aware of these facts before starting opioids, especially if they are of child-bearing age.

Endocrine function should be monitored regularly and patients should be asked about symptoms consistent with dysfunction.

**Recommended tests include:** blood pressure, fasting glucose, thyroid function, bone density, testosterone/LH/FSH/oestradiol.

There is not sufficient evidence to recommend routinely monitoring asymptomatic patients taking long term opioids.

### FALLS AND FRACTURES

Opioids increase the risk of falling. They can also reduce bone density, leading to an increased risk of fractures.

### IMMUNE SYSTEM

Although there is currently no evidence about their clinical relevance, studies have demonstrated an immunomodulating effect of opioids, due to the opioid receptors on immune effector cells and the central nervous system. This has been shown to have effects on antimicrobial response and anti-tumour surveillance in animal studies.

### OPIOID INDUCED HYPERALGESIA

Although the prevalence of this in clinical practice is unknown, studies have shown that prolonged opioid use can lead to hyperalgesia (increased sensitivity to painful stimuli). This can be difficult to distinguish from tolerance to the opioid medication.





## KEY POINTS

If opioids are to be prescribed for chronic pain, consider doing so for a trial period. Outcomes of the trial should be agreed with the patient.

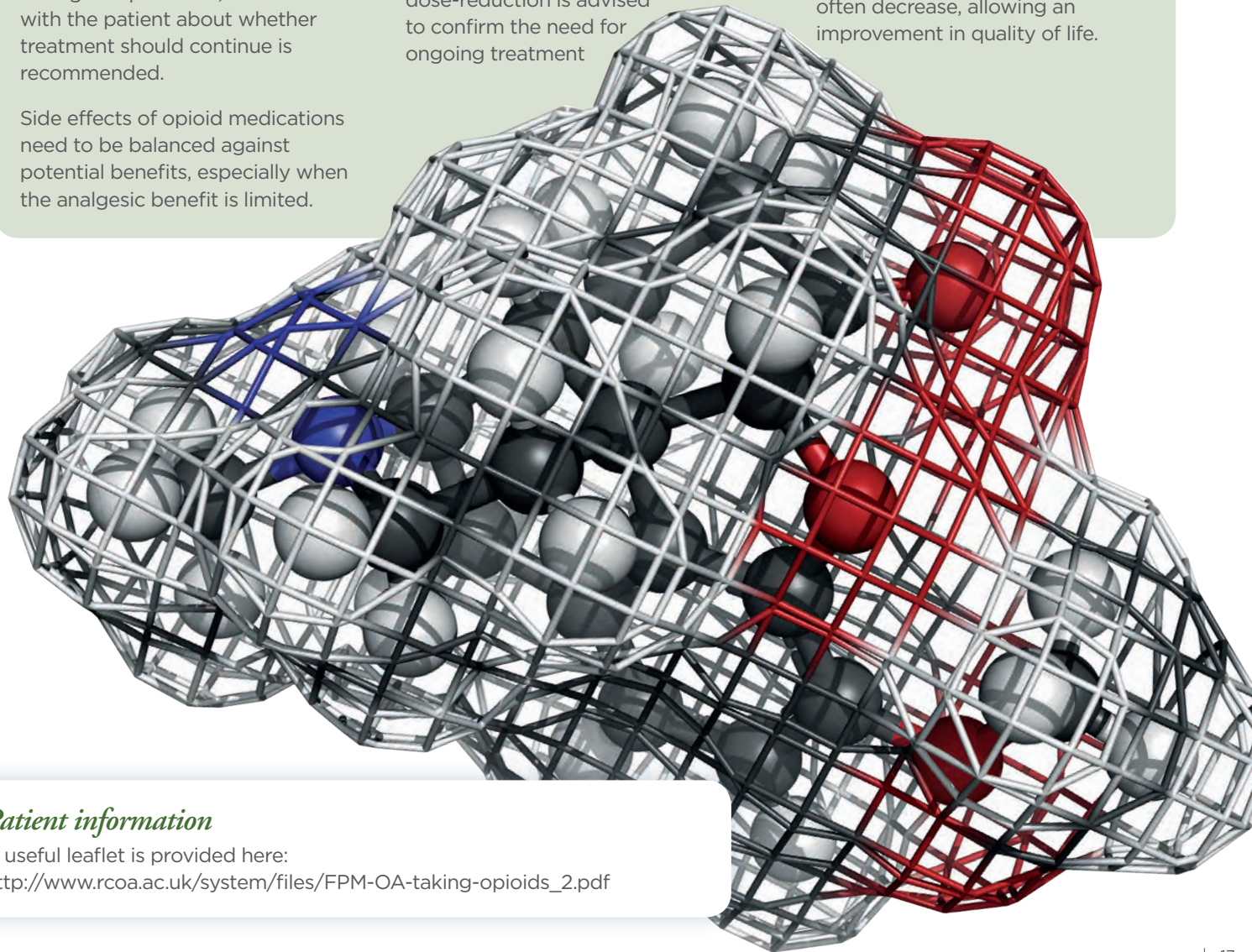
If outcomes are not achieved during an opioid trial, discussion with the patient about whether treatment should continue is recommended.

Side effects of opioid medications need to be balanced against potential benefits, especially when the analgesic benefit is limited.

It is unlikely to be beneficial to increase the dose of an opioid medication that is not helping. All medication prescribed for pain should be reviewed regularly to assess efficacy, and periodic dose-reduction is advised to confirm the need for ongoing treatment

## REDUCING OPIOID DOSES

Many patients on long term opioids find that they can reduce their opioid dose without experiencing any increase in pain intensity. Side effects often decrease, allowing an improvement in quality of life.



### *Patient information*

A useful leaflet is provided here:  
[http://www.rcoa.ac.uk/system/files/FPM-OA-taking-opioids\\_2.pdf](http://www.rcoa.ac.uk/system/files/FPM-OA-taking-opioids_2.pdf)