

# QIPP Detail Aid

Providing support for quality in prescribing

## BUPRENORPHINE PATCHES – a high price for convenience?

### WHAT IS THE PROBLEM?

Buprenorphine is a strong opioid similar to morphine. Although it has both opioid agonist and antagonist properties this makes little difference to its clinical use. It is generally used like other opioids in chronic pain.

Buprenorphine patches cost several times more than oral morphine in equivalent doses. In the last year (to April 2012), the East Midlands spent nearly £800,000 on buprenorphine patches, the majority of which (£650,000) was on the weaker strength of patches (Butrans<sup>®</sup>, which are similar in efficacy to co-codamol or tramadol), at an average cost per item of over £31.

### MAJOR CONSIDERATIONS

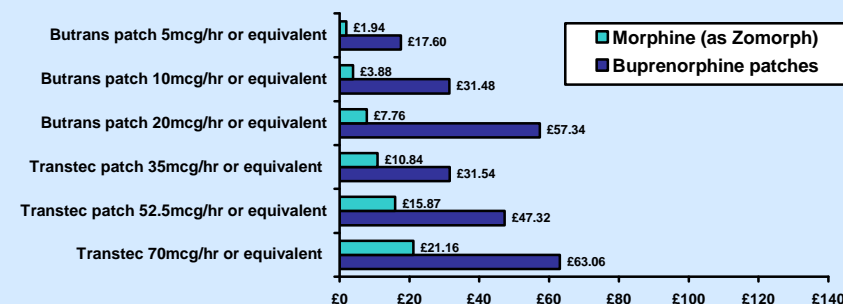
- Patches containing buprenorphine (Transtec<sup>®</sup>, Butrans<sup>®</sup>) are an alternative to oral opioid analgesics. The two brands are not interchangeable as they deliver different amounts of buprenorphine (Butrans is the weaker) and the time each patch is applied is different – 7 days for Butrans and 4 days for Transtec.
- The patches are not suitable for titrating the dose upwards in acute or unstable pain due to a delay in achieving higher blood levels. It may take up to 72 hours after a dose change for blood levels to reach a new stable level. After removal of a patch, a reservoir of active drug may remain in the skin and continue to be absorbed for several days and can cause difficulties in switching to alternative analgesics.
- A review of trials involving lower dose buprenorphine patches for chronic non cancer pain found that efficacy was similar to tramadol or co-codamol and that the patches have a considerable placebo effect.<sup>1</sup> Data on equivalent doses for these agents are lacking.

### Dose equivalents of oral morphine and buprenorphine patches

NB These doses are a guide only. They are based on a ratio of 100:1 potency, though this may not be applicable to all patients. This data should not be used to switch treatments.

Buprenorphine 5 micrograms/hr	12mg morphine in 24 hours
Buprenorphine 10 micrograms/hr	24 mg morphine in 24 hours
Buprenorphine 20 micrograms/hr	48 mg morphine in 24 hours
Buprenorphine 35 micrograms/hr	84 mg morphine in 24 hours
Buprenorphine 52.5 micrograms/hr	125 mg morphine in 24 hours
Buprenorphine 70 micrograms/hr	168 mg morphine in 24 hours

### WHAT ARE THE COSTS? (28 days, MIMS September 2012)



Comparison of cost of buprenorphine patches at each dose with approximate equivalent dose of Zomorph<sup>®</sup>. NB Patients should be monitored closely if any changes in dose or formulation are made.

### KEY MESSAGES

- Buprenorphine patches at lower doses are broadly as effective as codeine or tramadol but much more expensive. Oral analgesics should generally be preferred as first line therapy in chronic non-cancer pain.
- The patches are unsuitable for acute or unstable pain due to the need for slow titration of doses; it may take up to 72 hours to achieve a stable blood level after a change in dose.
- Exposure of patches to heat while being worn may lead to increased absorption of the drug and consequent adverse effects. Patients should be warned of the symptoms of excessive absorption.

Reference: 1. MTRAC review [here](#)