

How to achieve safe implementation of oral chemotherapy for cancer

Educating patients and health professionals about oral chemotherapy is critical for patient safety, a recent meeting was told. **Joanna Lumb** reports

Cancer chemotherapy by the oral route has been available for many years but has been confined to small scale use. With the introduction of new drugs, and positive National Institute for Clinical Excellence guidance, this is set to change. By 2005, tens of thousands of patients could be receiving oral anticancer treatment.

The British Oncology Pharmacy Association is developing a position statement on safe practice and the pharmaceutical care of patients receiving oral anticancer chemotherapy. This will emphasise that although oral therapy has perceived advantages to patients and to the NHS, it also presents new challenges as home-based treatment may continue for weeks at a time without direct professional supervision. Education of patients and primary care professionals about the use of oral chemotherapy is critical for patient safety.

Not a soft option

"Oral chemotherapy is no more or less safe than IV chemotherapy. It is not a soft option," said Neil Watson, chief pharmacist, Royal Marsden NHS trust. "It is an important and expanding area of practice, and centres need to look at how they are going to introduce the new drugs into routine practice."

At the Royal Marsden NHS Trust, oral capecitabine is now approved for use but Nicky Browne, general manager, common cancers, explained that switching from IV 5-fluorouracil to capecitabine had not been an easy process.

From a management perspective, she said, there initially appears to be no debate: infusional 5FU involves inpatient admission and insertion of a Hickman line, which takes up theatre time and is associated with quality of life and safety issues. Oral therapy appears much more straightforward.

But the financial aspects to the trust are less positive, with increased drug costs and loss of income. The main driver for change has been NHS breast cancer targets, which have proved difficult to meet because of insufficient theatre time. Clinicians were keen to switch drugs. The NICE guidance on capecitabine, in March 2003, substantially influenced PCTs' decision to fund the oral treatment.

"We took a huge financial risk on capecitabine. But we have managed to offer patients a much improved service and we have met targets," Ms Browne commented.

Caroline Waters, directorate pharmacist, gastrointestinal unit, Royal Marsden NHS Trust, said that, historically, oral chemother-

apy has had widest use in lymphomas and leukaemias. There has been some prejudice that IV therapy is more effective but the recent success of two drugs — imatinib and capecitabine — has raised the profile of oral treatment. Capecitabine in particular has had a major impact because of its use in two common cancers: breast and colorectal.

Support procedures essential

Ms Waters said that it is essential that procedures are in place to support the implementation of oral chemotherapy. Most patients prefer oral treatment provided this is not at the expense of efficacy. It is more convenient and the patient has increased control over treatment. It is sometimes assumed that treatment is less toxic "because it is just a tablet" but this is not the case: toxicity could be the same or greater than with IV therapy (for example, the incidence of hand-foot syndrome is higher with capecitabine than with infusional 5FU).

Patients need to be able to recognise side effects and to know when treatment should be interrupted to prevent toxicity becoming more serious. Compliance is critical, with particular risk from over-compliance. "The patient may forget whether they have already taken a tablet or they may decide to carry on despite side effects."

Ms Waters added: "The responsibility for administration of the drug lies with the patient but it is the responsibility of all members of the multidisciplinary team to provide appropriate support to ensure patients are well informed about their treatment and understand when they need to seek advice from a health care professional. We are relying on patients to recognise and act on their toxicity."

As well as patient education, it is important to educate primary health care professionals, principally so they can recognise side effects, especially unusual ones, such as chest pain with capecitabine. Shared care is not appropriate in such cases but it is vital that GPs are aware of a patient's treatment.

Introduction of capecitabine at the Royal Marsden Hospital involved development of protocols and clinical guidelines. It had an important impact both on the pharmacy's aseptic services and its dispensary services. Prescriptions for oral chemotherapy are screened by accredited pharmacists using the same process as for any other type of chemotherapy.

Hospitals that have switched to capecitabine need systems for monitoring patients taking the drug.

At the Beatson Oncology Centre, Glasgow, a pharmacist/nurse-led clinic has been set up. Mary Maclean, regional cancer care pharmacist from the West of Scotland Cancer Network, said that the clinic gave patients more time for counselling and a smooth, planned journey with minimal waiting times. Patients are routinely seen by a nurse or pharmacist but there are structured protocols on when to refer to the doctor, eg, for any toxicity greater than grade 2 or if the patient reports disease-related symptoms.

Pharmacist assessment and co-ordination of prescribing/dispensing helps to streamline the process. "For pharmacists, benefits of the clinic include having more time to counsel and plan patients' care, and the opportunity to intervene prospectively and to take a more active role in the multidisciplinary team," Ms Maclean said. The service enables doctors to allocate more time to complex cases.

Karen Harrold, clinical nurse specialist at Mount Vernon Centre for Cancer Treatment, agrees that multidisciplinary involvement is essential. "Nursing and pharmacy intervention is needed for all oral chemotherapy. It is a risk management issue," she said. The amount of education needed to help the patient decide between oral and IV therapy and, if oral therapy was chosen, to enable them to understand how to use the drug safely, required a team approach.

Thalidomide risk management

Thalidomide provides an extreme example of the precautions needed for safe use of oral chemotherapy. The drug is currently available on a compassionate-use basis but a licence application has been submitted for multiple myeloma and it is being evaluated in several other cancers.

With the main aim of preventing exposure of an unborn child, manufacturer Pharmion has set up a risk management programme based on managed distribution. Stephen Slack, Pharmion general manager, said that the programme involves registration and education of doctor, pharmacist and patient. Pregnancy testing is required before each monthly prescription for women of childbearing potential. To date, over 1,000 patients in the UK are registered for thalidomide.

The meeting was organised by the **British Oncology Pharmacy Association** and took place at the Royal Marsden Hospital in London on 10 December. It was supported by an unrestricted educational grant from Roche Products Ltd