



Mr Tom Osborne HM Senior Coroner Milton Keynes City Council

14 November 2023

Dear Mr Osborne

Regulation 28 Report following an Inquest into the death of Mrs Jacqueline Anne Carrey

I am writing following receipt of a regulation 28 Report, following on from the Inquest concluded on 18 October 2023. Mrs Carrey died on account of opioid toxicity 9 days after discharge from hospital. She had a long history of opioid use, and the potential for misuse had been noted in that community dispensing of some of her medicines had been restricted to a 7-day supply. This 7-day restriction was identified by colleagues here in the hospital, but this information was not effectively communicated to all parties involved in Mrs Carrey's admission and subsequent discharge: she was discharged on 16 May 2023 with a 14-day supply of medicines with a potential for misuse (including opioids). Whilst difficult to be sure of the precise circumstances, it is likely that this excess supply contributed to Mrs Carrey's subsequent death through opioid toxicity.

In order to strengthen measures in place which may reduce the risk of recurrence, there are two underlying processes which are pertinent: (1) medicines reconciliation and (2) procedures for the prescription, validation and dispensing of discharge medications.

Medicines reconciliation is a multi-stage process whereby the patient's medicines history is understood and recorded by hospital staff. It typically involves three steps:

1. A medication history is taken and recorded in the Electronic Health Record (EHR) by the assessing clinician. This medication history would usually be taken directly from the patient or their carer. It may or may not involve review





of repeat prescription forms or hand-written records proffered by the patient. It may involve review of medicines themselves (e.g., bags or boxes of medicines brought to the hospital, or a multi-dose container – 'Dosette box' – prepared either by the patient or the community pharmacy). Increasingly, assessing clinicians will access primary care prescribing information with the Health Information Exchange, HIE (a window from the hospital's *eCare* system into elements of primary care's *SystmOne* record).

- 2. The next stage is typically undertaken by a registered Pharmacy Technician. This involves the confirmation and recording of the patient's medicines history from two separate sources e.g., the patient and primary care records. This step may on occasion be a repetition of the initial history described above. However, the process is more standardised, and will include all medicines whilst the work of the assessing clinician (above) will inevitably focus on medicines pertinent to the presenting complaint and/or those deemed to be 'high risk' (if missed etc...). This medicines history work is recorded within the EHR on a form known as the 'Pharmacy Medication History Form'.
- 3. The final stage of medicines reconciliation involves a registered Pharmacist cross-checking and validating the work undertaken by the Pharmacy Technician. This is also recorded in the 'Pharmacy Medication History Form'.

The medical record is made up of many elements: documents which form the core of the narrative record (e.g., entries by nurses, doctors and ward-based clinicians which build up over time); the prescription record or 'drug chart' which sits within a module of the record known as ePMA; and, a number of discrete forms which are part of the record but 'sit in the background' available for reference later rather than forming part of the readily visible narrative record. The pharmacy steps of medicines reconciliation involve the 'Pharmacy Medication History Form' which is – appropriately – stored in the record for future reference rather than featuring in the headline patient narrative documentation. Where the pharmacy team identifies issues through the medicines reconciliation process (for example, medicines which appear to be incorrect or absent), they bring these to the attention of the medical staff either through direct contact (face-to-face or telephone), or by posting specific 'pharmacy intervention messages / alerts' within the medical record. Prior to the introduction of electronic prescribing, pharmacists would have made these interventions through use of notes and 'green ink' on the paper medicines prescription chart.





The **prescription**, **validation** and **dispensing** of **discharge** medications occurs later in the patient's stay as discharge is being planned. The precise timing of discharge can often be difficult to predict for a variety of patient-related and external factors. This means that sometimes plans for discharge medications need to be confirmed again (or altered) if an anticipated discharge is subsequently delayed or brought forward. The **prescription** stage is undertaken by a prescriber (usually, but not exclusively, a doctor). The validation and dispensing stages are undertaken by pharmacy staff. **Validation** usually takes place face-to-face on the ward (although it can be undertaken virtually). **Dispensing** involves the sourcing of medicines from the ward (either from the patient's own supplies or, on occasion, ward-held stock) and from the Trust's pharmacy department.

As you are aware following evidence given at Inguest, Mrs Carrey's planned discharge was delayed for clinical reasons. I shall not go over events, which you heard about in evidence, in detail. Plans for that discharge were likely sound: opioids were prescribed but the pharmacist involved had identified that Mrs Carrey had a supply at home and therefore dispensing was not required. It is likely that the first pharmacist did look at the 'Pharmacy Medication History Form' and would therefore have been aware of the 7-day restriction but given that no opioids were going to be dispensed at this time, the information was less pertinent. This discharge did not go ahead and when Mrs Carrey was discharged on 16 May, a second pharmacist did authorise dispensing of a 14-day supply of opioids. Mrs Carrey had said in the interim that she did not in fact have a supply at home. The second pharmacist made the - in retrospect flawed - assumption that the doctor's opioid prescription was valid and did not repeat this element of validation. This was - in the pharmacist's mind - a question of supply not the appropriateness of the prescription itself. The second pharmacist did not therefore seek out and review the 'Pharmacy Medication History Form' where the information about Mrs Carrey's 7-day supply restriction was recorded. The recording of the supply restriction in the 'Pharmacy Medication History Form' was in essence 'free text' - it was not held as codified information and did not therefore drive any particular actions or alerts within the EHR.

Action Taken

In addition to using Mrs Carrey's case for awareness raising and education within the broad pharmacy team, we have reviewed our EHR to determine whether additional safety steps can be incorporated in such a way as they do not negatively impact the timeliness of high-volume processes in a disproportionate way.





We have been able to incorporate new measures which – at their core – codify information / recommendations around the restriction of medicines supplied at discharge (i.e., exceptions to the contractual 14-day supply expectation). The 'Pharmacy Medication History Form' now includes the question 'Does this patient get a limited supply in community', requiring a 'yes' or 'no' answer. The user can still add free text narrative but the fact of selecting 'yes' in response to this question fires specific actions downstream when clinicians are looking to progress the patient's discharge.

When doctors begin to prescribe discharge medicines, a prominent 'limited supply' alert comes to their attention. When pharmacists begin the validation process, a similar alert comes to their attention and clearly signposts the 'Pharmacy Medication History Form' for review prior to dispensing. Screenshots demonstrating these changes are appended.

Workflows within Electronic Health Records (EHRs) are relatively standardised by supplier (rather than being bespoke to individual healthcare providers). We shall share our learning from Mrs Carrey's case with Oracle Cerner (global supplier of our EHR), both such that it can be shared with other UK NHS clients but also considered internationally.

I trust that this response is helpful.

Yours sincerely,



Chief Executive

Enclosed





Screenshots in relation to modified workflows on supply limitation of discharge medications