Scottish Parliament Region: Lothian

Case 200501332: Lothian NHS Board

Summary of Investigation

Category

Health: Hospital; General Medical

Overview

The complainant (Mrs C) raised concerns that staff failed to monitor her son (Mr A) following an operation and that when his condition deteriorated they failed to telephone her although staff had been advised of current contact numbers.

Specific complaint and conclusions

The complaints which have been investigated are that:

(a) staff failed to monitor Mr A appropriately following the operation *(partially upheld);*

(b) staff did not take adequate action to inform Mrs C that Mr A's condition had deteriorated *(upheld)*; and

(c) staff hid in Mr A's room and watched television *(no finding)*.

Redress and recommendation(s)

The Ombudsman recommends that the Board:

(i) undertake an audit of the standards of record keeping on Ward 15 and review whether there is a training requirement to make staff aware of the role of the Diabetes and Gastroenterology specialist nurses;

(ii) adopt a process to ensure that current contact details are recorded accurately on admission and in particular that when a patient is transferred, that the details are reviewed. Secondly that the Board ensures that communication with carers (when a patient's condition deteriorates) is raised with staff as being a key and integral aspect of documentation; and

(iii) adopts a process by which the nurses allocated to a patient's care on each shift are easily identifiable within the records and that any discussion with those staff as a result of a complaint are routinely documented.

The Board have accepted the recommendations and will act on them accordingly.

Main Investigation Report

Introduction

1. On 21 November 2005 the Ombudsman received a complaint from Mrs C about the treatment provided to her late son, Mr A, by staff at St John's Hospital, Livingston (the Hospital) following an operation on 10 September 2004.

2. The complaints from Mrs C which I have investigated are that:

(a) staff failed to monitor Mr A appropriately following the operation;

(b) staff did not take adequate action to inform Mrs C that Mr A's condition had deteriorated; and

(c) staff hid in Mr A's room and watched television.

Investigation

3. In writing this report I have had access to Mr A's clinical records and correspondence relating to Mrs C's complaint. I made a written enquiry of the Board. I sought clinical advice from the Ombudsman's professional medical adviser (Adviser 1) and nursing adviser (Adviser 2). I have not included in this report every detail investigated but I am satisfied that no matter of significance has been overlooked. An explanation of the abbreviations used in this report can be found at Annex 1 with a glossary of medical terms at Annex 2. Mrs C and the Board were given an opportunity to comment on the draft of this report.

Medical background

4. Mr A who was aged 36 was admitted to the Hospital on 24 June 2004. Mr A had been found unconscious in his flat by Mrs C on that evening. It was unclear how long Mr A had been unconscious. The conclusions drawn by the medical team were that he had suffered a severe hypoglycaemic attack. Mr A had a previous medical history of insulin dependant diabetes mellitus and would have been required to balance his food intake and physical activity with his medication, to keep his blood glucose within normal limits and prevent complications. Mr A was initially cared for on the intensive care unit of the Hospital, he made a poor neurological recovery and it was clear by the beginning of July 2004 that he was going to be highly dependant for his care needs for a considerable period of time. The potential for rehabilitation and further recovery was uncertain. On 2 July 2004 Mr A had an operation to insert a Jejunostomy feeding tube. This was an

alternative to the naso-gastric feeding that he had been receiving up until this point. This form of feeding can be problematic in patients with gastro-paresis. A combination of his condition and possibly Mr A's neurological impairment had resulted in his aspirating food from his stomach and it spilling over into the lungs causing damage and infection. In addition the unpredictability of stomach emptying made Mr A's diabetes more difficult to control, since the time taken for glucose to enter the blood stream was always uncertain. On 6 July 2004 Mr A was transferred to the Surgical High Dependency Unit (SHDU) of the Hospital and then to the Medical High Dependency Unit (MHDU). From the MHDU, Mr A was transferred to a medical ward, Ward 15, on 18 July 2004.

5. On 10 September 2004 Mr A underwent a procedure to insert a gastrostomy to enable feeding. The jejunstomy tube that had been inserted was a short term measure and the site was becoming problematic. This procedure was carried out under sedation and prophylactic antibiotics were given. In view of Mr A's gastro-paresis rather than the usual feeding system a jejunal extension was fitted so that liquid food and medication could be passed into the jejunum rather than directly into the stomach. This had the potential to reduce the likelihood of aspiration of the feed, although since the stomach would still have secretions in it the potential for aspiration remained. Although Mr A made a successful recovery from the procedure, establishing feeding with the new system was problematic. He was fed on the evening of 13 September 2004. On 14 September 2004 at 07:00 Mr A was noted to be chesty with lower oxygen saturations. He was reviewed by the medical staff but became very unwell later in the morning. He suffered a cardio-respiratory arrest at 11:55 and did not respond to resuscitation measures.

(a) Staff failed to monitor Mr A appropriately following the operation

6. Mrs C wrote to the Board that Mr A had been in hospital for nearly three months and could not speak or press the call button and was dependent on hospital staff to look after him, therefore, he required close supervision. The family had noticed a marked improvement in Mr A's condition until late August when they were told that staff were going to take away the tube from his intestines and replace it with a permanent one into his stomach. On 9 September 2004 Mrs C visited Mr A and she found him in bed and quieter than usual. Mrs C visited Mr A on 10 September 2004, prior to the operation, and he was lying in bed looking very sad. Mrs C visited after the operation and stayed for an hour as Mr A was awake

but sleepy. The following day Mrs C found Mr A sitting in a wheelchair and not looking well. The nurses said that a specialised nurse had checked Mr A's new tube. Mrs C was concerned that the nurses who were looking after Mr A did not have sufficient knowledge to care for him. On 13 September 2004, Mr A was sick and again did not look at all well. Mrs C was holding his hand when he woke up and his hand and stomach started to shake as if he was suffering a fit or seizure. A nurse told Mrs C she would keep a check on him. Mrs C telephoned the ward that evening and was told he was fine and was being fed which she was concerned about as he had been sick earlier. Mrs C telephoned the ward at 09.30 on 14 September 2004 and asked about Mr A's condition because she was concerned and would have taken the day off work if required. She was told Mr A had been sick during the night but they were keeping an eye on him. Mrs C complained that she and her family all noticed that Mr A was not well prior to the operation and that he deteriorated quickly following the operation, therefore, why did the doctors and nurses not notice. She felt that staff did not check Mr A often enough and by the time they realised something was wrong it was too late to save his life.

7. The Board Divisional Chief Executive (the Chief Executive) responded with details of the treatment Mr A received and that the cause of death was as a consequence of massive aspiration pneumonia, which is a recognised complication of diabetic gastro-paresis and can occur with percutaneous feeding. Mr A required an alternative means of feeding over a longer period of time to support him nutritionally other than the tube that had been placed initially in the intensive care unit. The consultant responsible for Mr A's treatment (Consultant 1) did not mention that death could be a complication of the PEG procedure as this is extremely uncommon. Mr A's death was not related to the PEG insertion but was a complication of his long-standing problems with gastric motility related to his diabetes mellitus, which prevented his stomach from emptying properly and would be a continuing risk to him from any form of feeding.

8. The Chief Executive said that the earliest slot for the operation was arranged for Friday 10 September 2004. Nursing staff routinely monitored Mr A's condition over that weekend and they did seek medical support and advice as necessary. It was routine practice for the medical team to be off at the weekend and cover for medical inpatients is provided by the on-call team for the weekend, who also provide service for medical admissions. However, following Mr A's death a review

of all the circumstances was undertaken and a Risk Management Root Cause Analysis review initiated. A revised policy had now been initiated whereby PEG tube insertions would now not be carried out on a Friday so as to ensure that specialist gastroenterological advice would be available in the days following the procedure. It was noted from the Clinical Review Meeting that Mr A had vomited twice on 13 September 2004 at 11:45 and 23:30 and was prescribed Metoclopramide to reduce vomiting and to promote motility of his stomach and gut to help them empty more effectively. Mr A had no further episodes of vomiting and his feeding was continued at the previous rate. The outcome of the Clinical Review Meeting had been to adjust the care protocol to include advice that the volume and nature of any vomit is recorded and that feeding be discontinued until the patient ceased vomiting, then feeding can be started at a lower rate. As Mr A's vomiting had settled his feed was recommenced. Mr A was monitored regularly by nursing staff, due to having the PEG tube insertion, and it was noticed immediately when he had become unwell and medical advice was sought at that time. Despite intervention, Mr A's condition deteriorated rapidly and also at that time there were members of senior medical staff, intensive care staff and surgical staff in attendance.

9. Adviser 1 said that to understand the medical aspects of Mr A's final illness, it is necessary to understand the implications of the fact that he had diabetes mellitus type 1. Someone with this condition is unable to produce insulin which is required to maintain the normal level of glucose in the blood and tissues. Insulin can only be given by injection. In order to maintain health, the blood glucose level has to be maintained within strict limits. The only practical way of doing this is to take a diet of the same total calorie content each day so that the blood sugar can be controlled within reasonably normal limits by the same daily dose of insulin. Too much insulin or insufficient food will cause coma (hypoglycaemic coma) because the blood sugar will fall too low. Because glucose is the major source of nutrition for the brain, prolonged hypoglycaemia can cause permanent brain damage. Mr A was admitted to the Hospital after having been found in hypoglycaemic coma at home. Sadly, brain damage had occurred and Mr A failed to recover properly from the coma and, therefore, needed to be fed artificially through a tube inserted through the abdominal skin into his gastrointestinal tract. Long-standing diabetes causes damage to the blood vessels that supply all the tissues of the body, including nerve tissue. This causes serious damage to the nerves which are then

unable to function properly. The movements of muscles within the gastrointestinal tract are normally highly coordinated and under the control of a special series of nerves called the 'autonomic nervous system'. When these nerves are damaged by diabetes, the coordination of the contractions of the muscles in the wall of the stomach and intestines is seriously impaired and the stomach and intestine become partially paralysed (paresis). When the stomach becomes largely paralysed, it fails to empty properly and becomes large and dilated (diabetic gastro-paresis).

10. Adviser 1 continued that this has several unfortunate effects: copious vomiting of the gastric contents occurs; reflux of gastric fluid up a dilated gullet can result in inhalation of gastric fluid into the lungs causing severe pneumonia (inhalation pneumonia). Inhalation pneumonia can also occur as a result of vomiting when a patient's normal protective reflexes are impaired by unconsciousness; the unpredictable rate at which food may enter the intestine (where it is absorbed) from the abnormal stomach makes the amount of insulin required to control the blood glucose equally unpredictable. Thus the diabetes becomes very difficult to control. This was sadly the case with Mr A. The risks and complications of vomiting, inhalation and poor diabetic control cannot be eliminated but can be reduced by ensuring that administered feeds bypass the stomach and are delivered straight into the duodenum or jejunum. These are the names of those parts of the small intestine immediately distal to the stomach. In Mr A's case, a tube into the jejunum (jejunostomy) was initially placed surgically. Later, this was replaced by a smaller tube (PEG tube) placed into the stomach using an endoscope but with a special extension to allow food to be delivered into the jejunum. This is a simple procedure normally undertaken with light sedation and local anaesthetic.

11. Adviser 1 told me that the clinical record is an integrated record in which medical, nursing and paramedical staff notes are recorded together in chronological sequence. This is generally regarded as best practice. In Mr A's records, some entries are not signed and it is sometimes not clear whether the entry was recorded by medical or nursing staff. The medical entries are somewhat scant but, in Adviser 1's opinion, probably reach the minimum standard that would be regarded as acceptable. The management plan is discernable – to support Mr A's very slow recovery until he was well enough to be taken into the

rehabilitation service for a full assessment of his potential. The record of the placement of the PEG tube with extension indicates that the procedure was uneventful and satisfactory, despite the fact that Mr A appeared to have spent almost one and a half hours in the endoscopy room. This is significantly longer than would normally be expected but the positioning of the extension in a person with poor intestinal motility may account for this. Mr A was held in the endoscopy area under observation for 15 minutes after the procedure before being returned to the ward. Two sets of observations are recorded in this time which indicated he was fit to return.

12. Adviser 1 continued that observation of temperature, pulse, blood pressure and respiration were recorded only daily on the ward but he would regard this as appropriate for a stable, long-stay patient particularly as he was clearly being seen much more frequently for estimation of blood glucose. Adviser 1 noted that Mr A's blood glucose level was low at 2.2 at 09:00 on 11 September 2004. 50% glucose was administered at 10:20. Adviser 1 regarded this as a slow response – particularly in the context of previous hypoglycaemic brain damage. Mr A's blood glucose responded and was 13.7 by 10:45. The evening dose of insulin was 60 units when the blood glucose was 16.9. This is compatible with his previous evening doses which had given reasonable morning levels the following day. Apart from the rather tardy administration of Glucose Adviser 1 would not criticise this regimen. Mr A is recorded as vomiting twice on 13 September 2004, apparently after being given 1 litre of water. This was appropriately treated with Metoclopramide. However, by 07:00 the following day he was noted to be ‘chesty’ and to have low oxygen saturation levels. Mr A was seen immediately by a house officer who noted a generalised wheeze in the chest. Almost certainly in this clinical context, this would indicate an episode of inhalation – possibly caused by the vomiting of the previous night. Despite prompt diagnosis and treatment, Mr A sadly followed a rapidly downhill course and died of inhalation pneumonia. Adviser 1 could find no evidence to suggest that the care of Mr A fell below a standard to be expected.

13. Adviser 2 reviewed the nursing records and told me she had considerable concerns about their quality and the lack of a comprehensive nursing assessment being carried out after Mr A's transfer to Ward 15. There were poorly completed observation charts particularly in relation to fluid balance and a lack of care

planning documentation. There is no documentation in the progress notes following the insertion of the PEG on 10 September 2004 and Adviser 2 would have expected a confirmation of Mr A's return to the ward, details of the procedure and guidance for management that day. There are no clinical observations recorded on Mr A's chart for 10 September 2004 whereas Adviser 2 would have expected, at a minimum, a recording of his pulse, respiration, and blood pressure on return to the ward and possibly, given that he had been sedated, a recording of his oxygen saturations. In addition, as Mr A was not fed that day Adviser 2 would have expected more frequent monitoring of his blood glucose. The chart indicates that it was monitored at 19:40 and 22:00 but not overnight despite the fact that Mr A received Insulin on the evening of 10 September 2004 (62 units - 2 units more than his dose the previous day). On the morning of 11 September 2004 Mr A's blood glucose was very low, (2.9 normal is 4-7). The medical team were informed and prescribed a bolus of Intravenous Dextrose as emergency treatment. Mr A's blood sugars remained low for the remainder of that morning and his insulin dose was 60 units that evening. According to the fluid chart feeding was commenced at 14.30 on 11 September 2004. The progress notes for that day provide no further information on his progress although frequent monitoring of Mr A's blood glucose was carried out during that day. On 12 September 2004 there is an un-timed nursing entry indicating concerns about the positioning of the jejunostomy tube extension. Telephone advice was obtained from the gastroenterology nurse specialist but the problem was not resolved and the decision made not to give the feeds. It is documented in the notes that the gastroenterology nurse would review on 13 September 2004 but Adviser 2 could find no record of this in the notes, only a discussion note from the Senior House Officer. The Insulin dose was administered for the night of the 12 September 2004 and blood glucose monitored overnight.

14. Adviser 2 said that on the morning of 13 September 2004 a decision was made to recommence feeding with 1000 mls of sterile water at 13:45 until the commencement of the feeding regime at 21:00. Two episodes of vomiting are recorded in the progress notes (11:45 and 23:30 when an anti-sickness medication was prescribed) but not documented on the fluid chart as would be normal practice. During the afternoon of 13 September 2004 elevated blood glucose is also recorded and the Insulin dose for that day increased to 64 units. On the morning of 14 September 2004 there is only one nursing entry that indicated a

change in Mr A's respiratory status by the night nurse at 07:00. In summary during this period although Mr A was monitored with regularity Adviser 2 was concerned that the potential feeding problems, and as a result problems in managing his blood glucose levels, were not thought through prior to the procedure having been carried out. Although staff reacted to changes in Mr A's condition Adviser 2 did not detect they had a clear understanding of his vulnerabilities and put care in place to respond to this.

15. Adviser 2 reviewed additional policy documentation provided by the Board and found that the assessment and care planning documentation was comprehensive and provided an appropriate format to aid assessment, care planning and monitoring. She commented that the introduction of the Standardised Early Warning System (SEWS) chart is a welcome addition to the monitoring of patients particularly those with complex health needs but she did emphasise the importance of auditing the use of those documents.

16. Adviser 2 said that the information in relation to care of PEG tube is very useful and the job descriptions for the Diabetes and Gastroenterology nurse specialists indicate the role they have in supporting both staff and patients at ward level. Adviser 2 suggested that nursing staff be further encouraged to make use of these services and that there is consideration of their involvement in multidisciplinary case discussions and ward rounds where appropriate. In addition, she considered the policy documents and training materials available were of an appropriate standard and, therefore, it is suggested the lack of utilisation of these resources in this case by staff was of concern and required further exploration by the Division. Adviser 2 suggested that this case warrants a review of the documentation in relation to enteral feeding administration on Ward 15, to evaluate the quality of records (in relation to the existing guidelines) and the uptake of educational provision at ward level through more structured continuing professional education routes.

(a) Conclusion

17. It is clear from Mrs C's evidence that she was aware when Mr A was experiencing better periods and when he appeared to her to be significantly less well. Adviser 2 has raised questions about certain aspects of the monitoring by nurses of Mr A, however, the advice I have received about Mr A’s clinical care

overall is that it was reasonable. In particular that following the operation on 10 September 2004 medical and nursing staff monitored Mr A's condition and took appropriate action when his condition deteriorated. I hope Mrs C will accept the explanations provided by the Advisers and accept that Mr A received reasonable treatment. However, the Advisers have highlighted deficiencies in the standard of record keeping and some aspects of monitoring. They have suggested that the Board take action to review this issue with a view to improving standards in both respects. Accordingly I partially uphold this complaint.

(a) Recommendation

18. The Ombudsman recommends that the Board undertake a review of the standards of record keeping on Ward 15 and review whether there is a training requirement to make staff aware of the role of the Diabetes and Gastroenterology specialist nurses.

(b) Staff did not take adequate steps to inform Mrs C that Mr A's condition had deteriorated

19. Mrs C complained to the Board that because she had been assured that staff were looking after Mr A at 09:30 on 14 September 2004 she decided to go to work. She works in a large open plan office and nearly three hours later she received a telephone call from Consultant 1 to say that Mr A had passed away. Mrs C thought that was unforgivable considering she had provided the Hospital with her home number, her work number, her mobile number and her daughter's number. The Hospital should have contacted her earlier when Mr A was giving cause for concern rather than after he had died. (Note: I have seen two admission sheets in Mr A's clinical records and one only contains Mrs C's home telephone number and her daughter's telephone number.)

20. The Chief Executive responded that they had been unable to speak to the nurse who spoke to Mrs C at 09:30 as she was no longer employed having emigrated to Australia without leaving a forwarding address. They could not answer why the nurse told Mrs C there was no cause for concern. When Mr A's condition gave cause for concern, Consultant 1 contacted Mrs C's daughter and he thought she might have contacted Mrs C to alert her of the situation. Consultant 1 later found Mrs C's work's number on a database but by that time Mr A had died and he thought it in order to say so, rather than cause additional distress. An

apology was given for any distress caused by the manner in which Mrs C received the sad news.

21. Both advisers said Mrs C was clearly misinformed about her son's condition at 09:30 on 14 September 2004. There is no evidence to indicate why this had happened. Adviser 2 suggested that in relation to the recording of relatives contact details, that the Hospital adopts a process to ensure when a patient is transferred to other areas of care that all relevant contact details are checked and recorded.

(b) Conclusion

22. Clearly staff were concerned about Mr A's condition at 07:00 and Mrs C should have been informed of this. It has not been possible to establish why the nurse did not advise Mrs C of this when she telephoned at 09:30. Matters were compounded when staff could not contact Mrs C later to inform her that Mr A had deteriorated and by the time Consultant 1 had found her work's telephone number it was too late as Mr A had died. I appreciate that Mrs C would have been extremely shocked when she received the unexpected telephone call from Consultant 1 but as Mr A had already died then Consultant 1 could have been criticised if he had not fully explained the situation. Where matters failed was that staff did not make sure up to date contact details were in a prominent position in Mr A's clinical records. I uphold this aspect of the complaint and note that the Board have already apologised to Mrs C in this regard.

(b) Recommendation

23. The Ombudsman recommends that the Board adopts a process to ensure that current contact details are recorded accurately on admission and in particular that when a patient is transferred, that the details are reviewed. Secondly that the Board ensures that communication with carers (when a patient's condition deteriorates) is raised with staff as being a key and integral aspect of documentation.

(c) Staff hid in Mr A's room and watched television

24. Mrs C complained that when she asked a nurse if Mr A slept all night she was told that it depended whether the television was on. She was told sometimes if he was awake, staff would hide in his room and watch television with him until he fell asleep and if he was asleep when staff looked in they would switch the television

off. Mrs C wondered who was looking after the other patients if staff were hiding in Mr A's room.

25. The Chief Executive responded that staff did not hide in Mr A's room but were on hand to attend to his needs until he went to sleep. Staff on the ward were extremely busy and there would be no time or opportunity to hide and this might have purely been a turn of phrase used by staff. He continued that staff were very fond of Mr A and would endeavour to spend as much time caring for him as they could. The Board subsequently informed me that the then assistant general manager had had several meetings with the charge nurse throughout the investigation. Each member of staff had been spoken to and no evidence was found to support the allegation.

(c) Conclusion

26. This aspect of the complaint concerns whether staff told Mrs C that they hid in Mr A's room until he went to sleep. Mrs C is clear that staff told her this yet the Board's investigation showed no evidence that this took place. Matters which relate to what was said between patients and relatives and staff are extremely difficult to reach firm conclusions on in the absence of truly independent witnesses and nothing further is achieved for any of the parties. In view of the conflicting accounts and due to the time which has elapsed since the event it is unlikely that additional evidence would be obtained in this regard. I make no finding on this complaint.

(c) Recommendations

27. The Ombudsman recommends that the Board adopts a process by which the nurses allocated to a patient's care on each shift are easily identifiable within the records and that any discussion with those staff as a result of a complaint are routinely documented.

27 February 2007

Annex 1

Explanation of abbreviations used

Mrs C	The complainant
Mr A	Mrs C's son
The Hospital	St John's Hospital, Livingston
Adviser 1	The Ombudsman's professional medical adviser
Adviser 2	The Ombudsman's professional nursing adviser
SHDU	Surgical High Dependency Unit
MHDU	Medical High Dependency Unit
The Chief Executive	The Divisional Chief Executive responsible for the hospital
Consultant 1	The consultant responsible for the majority of Mr A's treatment while in the Hospital
PEG	Percutaneous feeding

Annex 2

Glossary of terms

Cardio Respiratory Arrest	Cessation of Cardiac and Respiratory Function
Gastro-paresis	Paralysis of the movements of the stomach caused by damage to its nerve supply which results in retention of food and dilatation of the stomach
Hypoglycaemic	Coma resulting from low blood glucose level
Insulin dependent Diabetes Mellitus	A chronic health condition where the body is unable to produce insulin and properly breakdown sugar (glucose) in the blood
Intravenous dextrose	Glucose administered through a vein
Jejunostomy feeding Tube	Tube which allows for liquid feeding directly into the small intestine
Metoclopramide	Medication to promote stomach emptying
Naso gastric feeding	Liquid feeding delivered by a tube passed via the nose and back of the throat into the patient's stomach
Percutaneous feeding (PEG)	Feeding via a tube into the stomach
Prophylactic antibiotics	Antibiotics that are administered to prevent, rather than treat, an infection
Standardised Early Warning System (SEWS)	Observation Chart which flags up issues for concern