Failure to review post operative chest X-ray (12HDC01133, 19 June 2012)

District health board ~ Intensive care unit ~ Chest X-ray ~ Tension pneumothorax ~ Standard of care ~ Continuity of care ~ Communication ~ Rights 4(1), 4(5)

An 87-year-old man was admitted to hospital with lower abdominal pain and vomiting black bile. Three days later a CT scan indicated gallstone ileus and the man was referred for laparotomy surgery and removal of his gallstone. That evening the man's condition deteriorated and a plan was put in place for the man to be admitted to the Intensive Care Unit (ICU) post-operatively. A pre-operative chest X-ray indicated aspiration pneumonitis, and the man was taken to surgery urgently.

Following surgery the man was transferred to ICU in the early hours of the morning. During handover to ICU, the anaesthetic team advised that the man would require a post-operative chest X-ray for confirmation that the central venous line placed during surgery had been placed correctly. The anaesthetic team also advised that the man was currently having oxygenation and ventilation problems.

The ICU associate charge nurse ordered a post-operative chest X-ray for the man. The associate charge nurse and another ICU registered nurse assessed the man and both concluded that his presentation was consistent with having aspirated prior to surgery and that he was developing aspiration pneumonia.

At 3.24am radiology performed the post-operative chest X-ray. The man continued to deteriorate and the ICU registrar maintained regular phone contact with the consultant on call. The consultant did not ask for the results of the X-ray. At 8.15am the ICU night team performed handover to the ICU day team. Following handover, the day ICU consultant implemented palliative care for the man in consultation with his family. That afternoon, the man died.

The following day, the man's X-rays were reviewed for the first time at a multi-disciplinary radiology meeting. A large tension pneumothorax was visible on his chest X-ray which had not previously been detected by any member of staff. The District Health Board (DHB) concluded that the tension pneumothorax contributed to and "possibly directly caused" the man's death.

It was held that the DHB failed to provide clear direction to staff about management and review of post-operative care and failed to undertake a timely review of the X-ray. Further, the DHB was responsible for failures within the ICU team to consider differential diagnoses. The DHB did not provide services with reasonable care and skill, breaching Right 4(1). The DHB was also responsible for the failures by its staff to adequately communicate with each other regarding the man's condition. The failure to communicate affected the quality and continuity of services provided to the man, breaching Right 4(5).

Adverse comment was made regarding the ICU registrar as the clinician with primary responsibility for reviewing the X-ray. Further adverse comment was made regarding the day ICU consultant, that clinicians should always ensure that they are aware of relevant information when making a decision regarding a consumer's care and treatment, especially when making decisions regarding withdrawal of active treatment or commencement of palliative care.