Whanganui District Health Board

Registered Nurse, RN D

Registered Nurse, RN E

A Report by the

Health and Disability Commissioner

(Case 15HDC00432)

Health and Disability Commissioner
Te Toihau Hauora, Hauātanga

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Executive summary

1. In Month1[1], Mrs B, aged 80 years at the time, injured her right foot. She attended her general practitioner (GP), Dr F, who referred her to Whanganui District Health Board (DHB) for assessment. Dr I, an orthopaedic surgeon at Whanganui DHB, was unable to read the referral. As a result, he did not triage the referral and he returned it to Dr F on 4 Month3.

2. On the same day, 4 Month3, Dr F referred Mrs B to a podiatrist for an urgent assessment. The podiatrist referred Mrs B to the district nursing service for the care of her wound, and to Whanganui DHB for further assessment. On 15 Month3, Dr J, a surgical consultant at Whanganui DHB, triaged the referral as semi-urgent. The district nurses began their visits on 6 Month3, and they noted that the wound was very painful.

3. Registered nurse (RN) RN E, a clinical nurse specialist, was asked by the district nursing service to assess Mrs B's wound. On 10 Month3, RN E assessed the wound and referred Mrs B to Whanganui DHB for an urgent vascular assessment.

4. On 18 Month3, Dr H, a surgical consultant at Whanganui DHB, triaged RN E's referral. He was unaware of the other referrals and, based on the information in the referral, he triaged the referral as semi-urgent. An appointment was made for 23 Month5.

5. Mrs B's condition continued to deteriorate. A district nurse, RN D, visited Mrs B on numerous occasions in Month3 and Month4 but did not monitor Mrs B's pain levels objectively. RN D was aware that Mrs B's appointment at Whanganui DHB was not until 23 Month5 and advised Mrs B to contact Whanganui DHB to obtain an earlier appointment. A new appointment was made for 26 Month4.

6. RN E saw Mrs B again on 9 Month4 and noted that her pain had increased and that she had still not been seen by Whanganui DHB. RN E was aware that Mrs B was seeing Dr F that afternoon, but took no further action.

7. RN D also continued to visit Mrs B but did not assess her pain. By 23 Month4, RN D noted that the foot was swollen and pale and that Mrs B's pain was persisting, but RN D took no further action.

8. Mrs B was seen by Dr H at Whanganui DHB on 26 Month4 and was diagnosed with critical limb ischaemia.[2] Various limb salvaging procedures were performed, but Mrs B suffered complications and passed away.

[1] Relevant months are referred to as Months 1-5 to protect privacy.
[2] Critical limb ischaemia is a severe obstruction of the arteries, which markedly reduces blood flow to the limbs.

Findings

9. Whanganui DHB breached Right 4(1) of the Code of Health and Disability Services Consumers' Rights (the Code)[3] by failing to ensure that there were systems in place to allow the individual clinicians involved in triaging Mrs B's referrals access to all relevant information, including recent referral history and previous referral documentation.

10. RN E breached Right 4(1) of the Code by failing to follow up the urgent referral for vascular assessment with Whanganui DHB, and for failing to escalate Mrs B's care when she became aware of Mrs B's increased pain.

11. RN D breached Right 4(1) of the Code by failing to document objective measures of pain adequately, and for failing to escalate Mrs B's care when her condition deteriorated.

12. Adverse comment is made about Dr F's documentation, and of the support he provided to Mrs B.

Recommendations

13. It is recommended that Whanganui DHB provide an update on the progress of the pilot of its "clinical portal" system, within two months of the date of this report, and create and implement a training programme for district nurses on pain management, within six months of this report. It is also recommended that Whanganui DHB provide the results of the audit of documentation for pain, the surveillance audit of changes already undertaken, and the tracer audit monitoring the district nurse service, within 12 months of this report.

14. It is recommended that, within four months of the date of this report, RN D report back to HDC with details of her attendance at pain assessment training. RN D has already attended training in documentation. It is recommended that the Nursing Council of New Zealand consider whether a review of RN D's competence is warranted.

15. It is recommended that Whanganui DHB and RN E both provide a written apology to Mrs B's family for the failings identified in this report. The apologies are to be sent to HDC within three weeks of the date of this report, for forwarding to Mrs B's family. RN D has already provided an apology.

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[3] Right 4(1) of the Code states: "Every consumer has the right to have services provided with reasonable care and skill."

Complaint and investigation

16. The Commissioner received a complaint from Mr A[4] about the services provided to his mother, Mrs B (dec), at Whanganui DHB in 2015.

17. The following issue was identified for investigation:

Whether Whanganui District Health Board provided an appropriate standard of care to Mrs B between Month1 and Month4.

18. On 14 February 2017 the investigation was extended to include the following issue*:*

Whether RN D provided an appropriate standard of care to Mrs B between Month1 and Month4.

19. On 27 March 2017 the investigation was extended to include the following issue:

Whether RN E provided an appropriate standard of care to Mrs B between Month1 and Month4.

20. The parties directly involved in the investigation were:

Mr A	Complainant/consumer's son
Ms C	Consumer's daughter
Whanganui District Health Board	Provider
RN D	Provider/registered nurse
RN E	Provider/registered nurse

21. Information was also reviewed from:

DHB2	Provider
Dr F	Provider/general practitioner
Mr G	Provider/podiatrist
Dr H	Provider/consultant surgeon
Dr I	Provider/orthopaedic surgeon
Dr J	Provider/general surgeon

22. Independent expert advice was obtained from a general surgeon, Dr Patrick Alley (**Appendix A**), and a registered nurse, RN Julie Betts (**Appendix B**). In-house advice was obtained from GP Dr David Maplesden (**Appendix C**).

[4] The complaint was supported by Mrs B.

Information gathered during investigation

Background

23. At the time of these events, Mrs B was aged 80 years. She had multiple co-morbidities including type 2 diabetes, COPD,[5] hyperlipidaemia,[6] hypertension,[7] spinal stenosis,[8] and polymyalgia rheumatic.[9] She lived at home with weekly home help and the support of her daughter, Ms C.

Dr F

24. Mrs B's GP was Dr F. Dr F told HDC that Mrs B had been a patient of his general practice for many years. He said that he keeps his patient records in hard copy note cards, which was the format when he took over the practice. He stated that he also has A4 hard copy files for patients who came to him with such files. Dr F stated: "I like to keep hard copy notes but use Medtech PMS[10] with details of Prescriptions, Lab results, Specialist reports, Cardiovascular Risk Assessments etc."

First referral to Whanganui DHB — Dr F

25. Mr A told HDC that Mrs B fell out of bed and hurt her right foot. On 20 Month2 she saw Dr F, who recorded: "[F]ell out of bed [in Month1] … pain [right] [anterior] thigh … ? neuropathic[11] foot problem." An X-ray and blood tests were performed. The X-ray did not show any bony injury.

26. On 21 Month2, Dr F referred Mrs B to the Orthopaedic Department of the public hospital. The handwritten referral states:

> "[S]he has ongoing problems [right] sciatica with some numbness feet and 2 small ? neuropathic sores R foot. Has pain management problem. Morphine (M-Eslon[12] makes her feel sleepy) as well as Tramadol.[13] X-ray shows facet

[5] Chronic obstructive pulmonary disease (COPD) is an umbrella term used to describe progressive lung diseases including emphysema, chronic bronchitis, refractory (non-reversible) asthma, and some forms of bronchiectasis. COPD is characterised by increasing breathlessness.
[6] Abnormally elevated levels of lipids or lipoproteins in the blood.
[7] High blood pressure.
[8] Spinal stenosis is an abnormal narrowing of the spinal canal causing a restriction to the spinal canal, resulting in a neurological deficit. Symptoms include pain, numbness, paraesthesia, and loss of motor control.
[9] Polymyalgia rheumatica is a disorder in which certain muscle groups become inflamed, causing pain and stiffness.
[10] An electronic patient management system.
[11] Neuropathic pain is a complex, chronic pain state that usually is accompanied by tissue injury.
[12] M-Eslon is a sustained-release morphine capsule.
[13] Tramadol is an immediate release opioid pain medication.

> arthropathy[14] + previously diagnosed as spinal stenosis. Can you please review her ? for MRI.[15]"

27. The referral does not indicate any concern about the vascular status of Mrs B's right leg.

28. On 27 Month2, Mrs B was seen at an accident and medical clinic, because her right foot was infected. She reported ongoing pain in her foot. Mrs B was prescribed antibiotics, and the wound was dressed. She was advised to return as required.

29. On 4 Month3, the first referral was triaged by an orthopaedic surgeon, Dr I. Dr I wrote on the referral: "[S]orry can't read it." He told HDC that he found the GP referral illegible and could not decipher enough information to make a sound decision as to the level of urgency. He stated: "My understanding was that as a result of my response, the referral would have been returned to the GP for review." The referral was returned to Dr F with the box "Insufficient information" ticked. Dr F took no further action in respect of the first referral.

30. Dr F stated:

> "I believe it would be more helpful if, as sometimes happens, triage staff rang my nurse for clarification or to refer to the Patients Hospital notes to fill in any gaps in communication."

31. Whanganui DHB told HDC that although there was no specific written policy or procedure in place at the time (regarding illegible referrals), it has always been the DHB's standard practice that referrals that cannot be deciphered are sent back to the referrer. Whanganui DHB told HDC:

> "All referrals are triaged by a senior medical officer and are categorised as urgent, semi urgent or routine — if a referral does not contain enough information to reach a decision then it is returned to the GP with a message to that effect so that the GP can provide more detailed information. If a referral does not meet the threshold to be seen then it is returned to the GP for management in primary care …"

Mr G

32. On 4 Month3, while his first referral was being triaged and returned, Dr F made an urgent referral to a podiatrist, Mr G. Mr G is a registered podiatrist who runs a community-based, high-risk diabetes mellitus foot programme. Mr G said that his service is defined as primary rather than secondary care, and that there is no secondary podiatry service in the area. However, he said that because of Mrs B's history, he treated her "as if she was [being] seen in secondary care, podiatry service".

[14] A degenerative disease that affects the joints of the spine and the disintegration of cartilage on those joints.
[15] MRI (magnetic resonance imaging) is a procedure used to obtain images of areas inside the body for diagnostic purposes.

33. Mr G saw Mrs B on 4 Month3. He reported to Dr F that his check of Mrs B's pulses by Doppler[16] indicated that her left foot was biphasic[17] and regular on both sides, but the right foot was monophasic[18] and the dorsal pulse[19] was barely audible. Mr G referred Mrs B to the district nursing service.

District nursing 6–9 Month3

34. District nurse visits to Mrs B commenced on 6 Month3. Three different nurses provided care to Mrs B, and they all noted that Mrs B's right foot was extremely painful.

35. On 6 Month3, an RN noted that Mrs B would require a wound care nurse assessment "due to [the] complexity of [the] wound". That day, Mrs B reported her pain as being 9/10. There is no record of analgesic options being discussed.

36. On 7 Month3, an RN noted: "Wound very painful." By 9 Month3, Mrs B's foot remained very sore and she had oedema[20] of the foot. She had broken skin on her sacrum[21] as a result of prolonged sitting. A referral to the wound care nurse at Whanganui DHB was completed, and the "very painful wound" was noted as a concern. There is no record of the district nurses having considered Mrs B's ongoing severe pain.

Second referral to Whanganui DHB — Mr G

37. On 9 Month3, five days after he examined Mrs B and referred her to the district nursing service, Mr G also sent a referral to the surgical team at the public hospital. In his referral Mr G stated that he suspected that Mrs B had arterial insufficiency causing a foot ulcer, and that she would benefit from further investigations. He documented: "I would think a referral would come via the GP. Nevertheless it [may] help to have the letter brought to your attention and scanned into [the computer system].[22]"

Third referral to Whanganui DHB — RN E

38. RN E was employed by Whanganui DHB, and she told HDC that she has many years' experience as a clinical nurse specialist in wound care.

39. RN E told HDC that on 9 Month3 she received a referral from the district nurses to assess Mrs B, and visited her at her home on 10 Month3. RN E documented that Mrs B had a stinging burning pain in her right foot, which became worse when mobilising

[16] A Doppler ultrasound is a test that uses high-frequency sound waves to measure the amount of blood flow through the arteries and veins, usually those that supply blood to the arms and legs.
[17] The three basic waveforms for blood flow are triphasic, biphasic and monophasic. Triphasic flow is considered normal, and monophasic flow is considered abnormal. (Most authors consider biphasic flow abnormal, although some authors classify it as a normal waveform.)
[18] Monophasic flow indicates poor arterial health.
[19] The dorsal pulse is in the ankle.
[20] Oedema is a build-up of fluid in the body, which causes the affected tissue to become swollen.
[21] The sacrum is a large wedge-shaped vertebra at the bottom of the spine. It forms the solid base of the spinal column where it intersects with the hip bones to form the pelvis.
[22] Used at the public hospital to record patients' medical information.

after resting. Mrs B told RN E that she had obtained some relief from the pain with codeine and paracetamol, but that morphine had made her drowsy and did not relieve the pain.

40. RN E noted in the clinical records that Mrs B's right foot was purplish in colour when elevated, there was oedema in the foot, and there were no palpable pulses. There was a wound on the outside of Mrs B's right foot, which measured 0.9cm x 0.9cm. There was also a black area on the top of her third right toe, and her left buttock had a wound that measured 5mm x 5mm. A Doppler investigation revealed no audible sounds on Mrs B's right foot.

41. RN E stated that on 12 Month3 she came in on her day off to complete a referral to the public hospital for an urgent vascular assessment of Mrs B. She addressed the referral to Dr H at the public hospital. RN E's referral notes that Mrs B lived alone and had a very supportive daughter and home help once a week, but that her mobility had reduced over the previous two months owing to the severe pain in her foot. The referral included the information set out in the preceding paragraph, and concluded: "Your assessment and treatment recommendations are urgently required for this patient please."

42. RN E told HDC that at this point she did not consider Mrs B's condition warranted a referral to the emergency department at Whanganui DHB. She said that she knew that a vascular clinic was to be held at Whanganui DHB on 26 Month3 and that at least one surgical clinic would be held during the week. RN E also told HDC that in her 15 years at Whanganui DHB she could not recall an occasion on which one of her urgent referrals had been downgraded to semi-urgent.

43. RN E also sent a referral to occupational therapy for a pressure-relieving cushion and a bed cradle to hold Mrs B's bedding off her leg and foot.

District nursing 11–18 Month3

44. District nursing visits continued. On 11 Month3, Mrs B was seen by an RN who made no record of the extent of Mrs B's pain.

45. The next visit was on 13 Month3, when RN D visited Mrs B.

RN D

46. RN D is employed by Whanganui DHB as a district nurse, and her first contact with Mrs B was on 13 Month3. RN D stated that they discussed the pain in Mrs B's foot. RN D said that she asked Mrs B what analgesia she was taking and how often she took it, and advised her to take the medication regularly, not just when her foot was sore.

47. RN D stated that her next visit was on 16 Month3 and, as Mrs B had had problems with the previous dressing, she changed the dressing to a less adhesive dressing.

48. On 18 Month3, RN D noted that she had advised Mrs B to see her GP regarding analgesia. RN D stated that Mrs B mentioned that her family had bought her a pain

relief patch, which she was trialling. RN D said that she did not see the patch or obtain the name of it. She did not record anything about Mrs B's pain or the pain relief patch.

Triaging of the second referral

49. Dr J, a surgical consultant, triaged the referral from Mr G (the second referral) on 15 Month3. Dr J stated that it was obvious from the information obtained in the letter that Mrs B had peripheral arterial disease[23] of the right lower extremity. Dr J stated:

> "This problem was chronic, at least two months in duration. The referring letter did not suggest that the patient had critical limb ischaemia.[24] Therefore, I triaged the referral letter as to see [Mrs B] in the surgical outpatient clinic on a semi-urgent basis.[25]"

Triaging of the third referral

50. Surgical Consultant Dr H triaged the referral from RN E (the third referral) on 18 Month3. Dr H told HDC that he is the sole specialist managing patients with vascular disease and/or ulcers at a monthly clinic at Whanganui DHB. He stated: "As the clinic only runs once a month, **it is not the place to which patients who need acute care are referred.**" (Emphasis in original.)

51. Dr H stated that the referral letter from RN E was received by the Surgical Department triaging centre on 13 Month3 and given to him on 18 Month3 for triaging. Dr H said that he was unaware of the treatment provided by the district nurses or the referrals dealt with by Dr J and Dr I.

52. Dr H said that the referral described the wound as painful, but had no formal pain grading score. He said that the referral contained no mention of Mrs B having pain while walking prior to the incident on 25 Month1, or whether she had pain at rest from peripheral artery disease. Dr H said that the description of RN E's examination indicated to him that Mrs B had peripheral artery disease. He stated: "With swelling of the right foot, caused by infection and/or trauma it may be difficult to feel a pulse or hear an audible pulse even in normal patients." He stated that information as to whether Mrs B's femoral pulse was palpable would have been helpful to determine the degree of peripheral artery disease in the right foot.

53. Dr H said that he made a judgement on the information given to him. He concluded that swelling from trauma and infection could account for Mrs B's pain, given the background of her chronic pain due to polymyalgia, arthritis, and deteriorating spinal stenosis. Dr H said that, although RN E had requested an urgent assessment, he concluded that Mrs B had a history of conditions other than critical ischaemia, which

[23] Peripheral arterial disease is a narrowing of the arteries causing a decrease in the supply of fresh oxygenated blood to limbs. Critical limb ischaemia is an advanced stage of peripheral arterial disease.
[24] Ischaemia is a restriction in blood supply to tissues, causing a shortage of oxygen and glucose needed for cellular metabolism (to keep tissue alive). Ischaemia is generally caused by problems with blood vessels, with resultant damage to, or dysfunction of, tissue. Critical limb ischaemia is an advanced stage of peripheral arterial disease.
[25] Whanganui DHB advised HDC that the time frame to be seen for semi-urgent B referrals was up to 120 days.

caused pain, and that her pain would not necessarily be the result of ischaemia. Dr H stated: "[W]ith the information given to me through this letter, I triaged her as semi-urgent B, to be seen within 90 days."

54. Dr H stated that clinical nurse specialists are able to contact him in several ways — they can see him at his outpatient clinic at the hospital; there is a fixed meeting in the General Surgical Department, which the clinical nurse specialists attend to discuss the management of hospital patients; and, further, he attends a monthly vascular wound clinic with clinical nurse specialists. Dr H said that, in addition, his weekly schedule is known to the nurses and is available at the hospital, together with his mobile telephone number.

55. On 2 Month4, an appointment for an outpatient assessment of Mrs B was scheduled for 23 Month5.

District nurse visits 19 Month3 to 4 Month4

56. Regular district nursing visits continued. RN D visited Mrs B again on 20, 23, 25, and 27 Month3. At those visits she made no record of Mrs B's pain levels. RN D stated that she did not question Mrs B about the patches she had been using and did not recommend that Mrs B consult her GP. RN D stated: "These are all things that I routinely do at my home visits for all my patients so I can't explain why it didn't happen on this occasion." RN D noted in the nursing notes on 29 Month3 that Mrs B's referral by RN E to Dr H had been triaged as semi-urgent.

57. On 2 Month4, an RN visited Mrs B and recorded that her foot was "still painful ++".

58. RN D saw Mrs B again on 4 Month4. RN D said that Mrs B told her that she had received an outpatient appointment with Dr H for 23 Month5. RN D said that she acknowledged that a three- to four-month wait was too long and suggested to Mrs B that she ask her family to telephone Central Patient Scheduling to see whether an earlier appointment was available, and told Mrs B that her family should take her to the GP if they had any concerns.

59. RN D said that at that time she had been experiencing difficulty getting Central Patient Scheduling to return her calls regarding patient follow-ups, but she knew that other patients had been successful in obtaining earlier appointments if they approached the service directly. She said that if a patient was not happy to contact Central Patient Scheduling, she would normally do it herself.

60. RN D said that she discussed with Mrs B the process of having the referral re-triaged. RN D told Mrs B that to do so she would need to return to her GP and have a further referral sent, and that that referral would need to document the change in circumstances, such as an increase in pain, the non healing of the wound, and the general condition of her foot.

Visit by RN E

61. On 9 Month4, RN E saw Mrs B and noted: "The pain has increased in the R foot. [S]eeing GP [in the afternoon] to review pain relief."

62. RN E told HDC that at this appointment she became aware that Mrs B had not yet attended a clinic based on her referral. RN E was also aware that Dr F was going to see Mrs B that afternoon to review her pain relief. RN E said that normally she would have telephoned the GP either before or after the visit to inform the GP of any deterioration or concerns, and that she should have done so in this case. However, it was a busy period at that time and she did not contact Dr F.

Dr F's review

63. On 9 Month4, Mrs B saw Dr F. Dr F prescribed a fentanyl patch[26] and oxycodone[27] for Mrs B's pain. There is no documentation of the nature of her pain or of any examination. There is no record of any assessment of the vascular status of Mrs B's right foot.

64. Mrs B had recently been treated at DHB3 for the removal of facial skin cancers. Dr F sent a referral to the district nursing service requesting visits for dressings to the surgical site on Mrs B's left eye, in addition to the management of her foot ulcer.

Further district nurse visits 9–18 Month4

65. On 11 and 13 Month4, RN D and a student nurse visited Mrs B. There is no reference to an assessment of Mrs B's pain. However, on 13 Month4 it is documented that RN D changed Mrs B's fentanyl patch. RN D told HDC that when she visited Mrs B on 13 Month4 she discussed the use of fentanyl with her. RN D said that although it is not documented, Mrs B felt that the patches had been of some benefit. RN D stated:

> "I did assume that the prescriber would be reviewing the patient once this was commenced to ascertain if it had been effective and if any changes were needed."

66. On 16 Month4, RN D noted that Mrs B's "foot area [was] still quite tender" and, on 18 Month4, RN D noted that Mrs B's foot was quite oedematous.[28] There is no record of any assessment of Mrs B's pain.

Outpatient appointment rescheduled

67. RN E told HDC that on 18 Month4 she received a telephone call from the Central Patient Scheduling staff to ask whether Mrs B should be given an earlier outpatient appointment, as her daughter had telephoned requesting an earlier appointment. Mrs B's appointment was rescheduled for 26 Month4.

Further district nurse visits 20–26 Month4

68. On 20 Month4, Mrs B was visited by an RN, who noted that Mrs B's wound pain had increased.

[26] Fentanyl is an opioid painkiller. For chronic pain, a patch containing fentanyl may be prescribed to apply to the skin. Patches contain fentanyl in a reservoir and release it gradually over a period of time to give continual pain relief.
[27] Oxycodone is an opioid pain medication used to treat moderate to severe pain.
[28] Swollen.

69. On 23 Month4, RN D and a student nurse visited Mrs B. The clinical record states that Mrs B's right lower foot remained swollen and the third and fourth toes on her right foot appeared pale. The wound remained sloughy,[29] and Mrs B said that her pain was persisting.

70. Mrs B told RN D that she had an appointment with Dr H for 26 Month4. RN D told HDC that Mrs B said that she could manage the dressings herself, as she found it more comfortable to be able to replace the dressing when she wanted to. RN D said that Mrs B was advised to telephone the district nursing service if she had any concerns or needed a visit. RN D stated:

> "I accept and acknowledge that I should have sent [Mrs B] directly to [the Emergency Department] as is usual practice and I can't understand why I didn't do so on this occasion."

26 Month4

71. Dr H saw Mrs B at the vascular clinic on 26 Month4. He stated that he had not received any further referral letter or communication about Mrs B between his triaging of the referral letter and the clinic appointment.

72. Dr H stated:

> "[Mrs B] looked as though she was at the end of her life on the day of her consultation. The woman that I saw in front of me was different than described in the referral letter. She was a frail, elderly lady with severe chronic diseases. She informed me that her leg had deteriorated." (Emphasis in original.)

73. Dr H noted in the medical record that on examination Mrs B's blood pressure was 140/70mmHg[30] and she had an irregular heartbeat. He noted:

> "On examining her legs, she has no femoral pulse on the right. She has a faint femoral pulse on the left. No distal pulses palpable. From the right leg on continuous wave Doppler, she has a monophasic flow over the popliteal tibialis posterior[31] and dorsalis pedis. I was unable to get any indexes done."

74. Dr H diagnosed Mrs B with critical ischaemia, and she was admitted to the public hospital for fluid resuscitation prior to referral to DHB2. Dr H said that he spoke to Mrs B's family and explained that he felt that Mrs B was, in many aspects, at the end of her life. He said that Mrs B's family asked that full treatment be provided.

DHB2

75. Mrs B was transferred to DHB2 on 27 Month4. Various limb-salvaging procedures were performed, but eventually Mrs B required a below-knee amputation, which was

[29] Consisting of dead tissue.
[30] Normal is between 90/60 and 120/80mmHg.
[31] Artery in the lower leg that carries blood to the posterior compartment of the leg.

performed on 11 Month5. Mrs B suffered peri-operative complications and died at DHB2.

Whanganui DHB — further information

76. Whanganui DHB advised that the Receipt of Standard Referral Procedure has been updated to reflect the standard practice for referrals from GPs that are difficult to decipher. It states:

> "If a referral is illegible return referral to referrer requesting a legible referral to be re-submitted … Reinforce the requirement for the referrer to supply a legible referral to enable timely processing."

77. Whanganui DHB also advised that the "current referral system does not allow clinicians to be informed or have access to previous referrals already received and/or discharged as all referrals are treated separately in the existing system".

78. Whanganui DHB advised that in June 2016, it implemented the regional "clinical portal" clinical information system. A pilot has commenced involving uploading orthopaedic referrals into the referral folder to provide a streamlined and safer way to view clinical information without having to rely on paper notes and printed test results. Whanganui DHB advised that once the pilot has been completed and the system functions as required, this practice will be extended to all clinical specialities. Whanganui DHB also advised that, in time, part of the system will include e-referrals, which will allow clearer visibility of referral letters for clinicians when triaging.

79. Whanganui DHB advised that it is actively working on regional implementation of a patient administration system called WebPas, which will significantly enhance referral management and visibility.

80. Whanganui DHB said that the documentation of the care provided by the district nursing service was deficient, and that the DHB has identified that there were deficits in the care provided by the service to Mrs B.

81. Whanganui DHB stated that the district nursing service has a wound evaluation form for assessment and measurement of pain on each visit. However, there is inadequate documentation of Mrs B's pain in her notes. The DHB stated that the district nurses involved acknowledge that their documentation was inadequate and that there was a need for improvement in their practice regarding this aspect of care. The DHB stated: "The necessity for accurate and comprehensive information has been strongly reiterated to all [district nursing] clinical staff and we have noted a vast improvement in this regard."

82. Whanganui DHB stated that it is normal practice for district nurses to report and escalate significant changes for specialist management and treatment. The DHB stated:

> "With the benefit of hindsight, we can see that the processes around escalation to specialist care has room for improvement with follow-up by clinical leadership to ensure 'best practice' is adhered to at all times."

83. Whanganui DHB said that, in Mrs B's case, the only indication of critical ischaemia in the referral letters was reference to pain and, as Mrs B had a history of conditions other than ischaemia that caused her pain, the pain would not necessarily be the result of ischaemia, and was not reported as such. Whanganui DHB stated that it may have been more appropriate for Mrs B to have been referred to the Emergency Department with critical ischaemia. It stated that the district nursing service should have been alerted by the information in Mr G's referral and Mrs B's description of the severity of her pain, and stated:

> "There was a lack of sound clinical judgment and decision making at the time of the initial assessment and this caused an unexpected delay in the required treatment, and exposed [Mrs B] to the subsequent unfavourable care she received from the service. We sincerely regret this occurrence."

84. Whanganui DHB said that a number of the district nurses who attended Mrs B appear not to have addressed her pain. It advised that changes have been made to the district nursing service to allow for more clinical time for district nurses during their day-to-day practice. The Clinical Nurse Manager and the Clinical Co-ordinator have met with the district nurses and discussed Mrs B's care.

85. A major review of the district nursing service was carried out, and changes to the service's Patient Management System, workloads, and roster were introduced from 3 August 2015. The DHB stated that among other factors identified in the review was that part of the district nurses' clinical time was compromised by non-clinical tasks they carried out during their day-to-day care of patients. The non-clinical work has now been shifted to non-clinical personnel, such as administrative staff.

86. Whanganui DHB stated that the Clinical Co-ordinator is working very closely with the district nurses, and allocates workloads according to acuity and time per shift. A review of the referral process now involves a feedback system where district nurses follow up to make sure that a referral has been received by the clinician to whom they are referring. The district nursing service also feeds back to those referring to the service confirming receipt and acceptance of the referral.

87. Whanganui DHB said that the district nurses hold fortnightly clinical meetings with the clinical nurse specialists and the Clinical Co-ordinator for support, peer reviews, and case reviews. A communication book is in place for comments or other information to alert clinical leadership and the team.

RN D — further information

88. RN D said that she has spent a lot of time reflecting on this incident and her own practice, and has made changes.

89. RN D stated that her documentation is now a lot more in-depth and comprehensive. Any conversations that she has with patients on a day-to-day basis regarding wound care, analgesia, and appointments are now documented.

90. RN D said that recently she attended a study session on documentation with fellow district nurses, and they are all implementing changes in their day-to-day note writing. All patient documentation is now required to be completed in a timely manner prior to leaving the patient's home.

RN E — further information

91. RN E advised that she was unaware that her urgent referral was triaged by Dr H on 18 Month3 and changed to semi-urgent B. She stated that because the referrer is not advised who has been allocated the referral, or what the outcome is, it precludes any ability to discuss the referral outside the referral pathway. RN E stated: "[Dr H] did not raise his decision to change the referral to [s]emi-[u]rgent B with me as the wound clinical nurse specialist who had referred it to surgical urgently."

92. RN E stated that, in hindsight, she accepts that, following the visit to Mrs B on 9 Month4 she should have followed up with a telephone call to Mrs B's GP. RN E stated that usually she contacts GPs to inform them of any deterioration or concerns, and documents the outcome in patients' records. She said that she does not know why this did not occur in this case, and stated: "I regret not contacting the GP to discuss the unmanaged pain for [Mrs B] following my visit on 9 [Month4]."

93. With regard to changes made since these events, RN E stated that, in addition to the monthly vascular clinic, she now runs her weekly clinic alongside a general surgeon, so that earlier appointments can be made and patients can be assessed by herself and the surgeon at the same time. She stated that this has improved communication, and patients are now seen more promptly.

Dr F — further information

94. Regarding his record-keeping, Dr F told HDC that he had intended to set up a transcribing system, but it had been technically challenging. Dr F said that he works in a sole practice, so he does not need his records to be as comprehensive as those in medical centres where there are multiple doctors seeing the same patient.

95. In respect of his referral on 21 Month2, Dr F stated that GPs are fully occupied in running their business, and cannot set up a secondary chain of communication of trying to justify their referrals. He also told HDC that there are financial consequences for patients if they have to return to the GP for re-referrals. Dr F told HDC:

> "[The district nurses] have a line of direct referral to [the] surgical department for their difficult management cases and I had expected this liaison to occur directly with [Mrs B]."

Responses to provisional opinion

Mr A and Ms C

96. Mr A and Ms C were given an opportunity to comment on the "information gathered" section of the provisional opinion, and they both provided a response.

Whanganui DHB

97. Whanganui DHB advised HDC that Dr H, Dr I, and Dr J were given an opportunity to comment on the provisional opinion, and that they had no further comment to make.

98. Whanganui DHB acknowledged the findings regarding the DHB and supported the recommendations regarding the "clinical portal" roll-out and the creation of a programme for pain management for district nurses.

99. Whanganui DHB also advised HDC that a review of its systems had resulted in the following changes: a revised wound assessment form; daily visit recordings that record a pain scale; education by the New Zealand Nurses Organisation on documentation and the district nurses' responsibilities as registered nurses; a prompt card for documentation; a formal process to gain qualifications for wound debridement; an improved process for district nurses to elevate concerns to the clinical nurse wound specialists; education to wound care nurses on following up a referral to a specialist team; weekly or fortnightly meetings with GPs to discuss patients of concern; supervisory visits by clinical nurse wound specialists with district nurses to ensure best practice in wound care delivery; and an audit in which each district nurse was followed by a senior member of staff for an entire shift to assess the standard of care.

100. In addition, Whanganui DHB advised HDC that it proposed to conduct regular audits to review documentation (including pain assessment), to conduct four surveillance audits to ensure that the changes that have been introduced are embedded, and to conduct tracer audits to monitor the service provided in the district nursing service.

RN E

101. RN E was given an opportunity to comment on the provisional opinion, as it relates to her. She advised HDC that she accepted the findings and that she will provide a letter of apology to Mrs B's family. In addition, where relevant, her response has been incorporated into the "information gathered" section above. RN E also advised HDC that she has now resigned from Whanganui DHB and retired from nursing practice.

RN D

102. RN D was given an opportunity to comment on the provisional opinion, as it relates to her. She advised HDC that she accepted the findings and she provided HDC with an apology to be sent to Mrs B's family. RN D also advised HDC that she had attended training in documentation, and that she would attend training for pain assessment.

Dr F

103. Dr F was given an opportunity to comment on the provisional opinion as it relates to him. Dr F has not provided a response to the provisional opinion.

Other relevant standards

104. The Medical Council of New Zealand publication "The Maintenance and Retention of Patient Records" (August 2008) states:

"**Introduction** — Records form an integral part of any medical practice; they help to ensure good care for patients and also become critical in any future dispute or investigation.

01: Maintaining Patient Records

(a) You must keep clear and accurate patient records that report:

- Relevant clinical findings
- Decisions made
- Information given to patients
- Any drugs or other treatment prescribed.

(b) Make these records at the same time as the event you are recording or as soon as possible afterwards."

105. The Nursing Council of New Zealand publication "Competencies for registered nurses" (December 2007) states:

"Competency 2.3 Ensures documentation is accurate and maintains confidentiality of information.

Indicator: Maintains clear, concise, timely, accurate and current health consumer records within a legal and ethical framework.

Indicator: Demonstrates literacy and computer skills necessary to record, enter, store, retrieve and organise data essential for care delivery.

…

Competency 2.6 Evaluates health consumer's progress towards expected outcomes and partnership with health consumers.

Indicator: Identifies criteria for evaluation of expected outcomes of care.

Indicator: Evaluates the effectiveness of the health consumer's response to prescribed treatments, interventions and health education in collaboration with the health consumer and other health team members.

…

Competency 4.1 Collaborates and participates with colleagues and members of the health care team to facilitate and co-ordinate care.

Indicator: Collaborates with the health consumer and other health team members to develop plan of care.

…

Makes appropriate formal referrals to other healthcare team members and other health related sectors for health consumers who require consultation."

106. The Nursing Council of New Zealand "Code of Conduct for Nurses" (June 2012) states:

> "Principle 4. Maintain health consumer trust by providing safe and competent care.
>
> Standards:
>
> 4.1 Use appropriate care and skill when assessing the health needs of health consumers, planning, implementing and evaluating their care.
>
> …
>
> 4.7 Deliver care based on best available evidence and best practice.
>
> 4.8 Keep clear and accurate records."

Opinion: Whanganui DHB — breach

Introduction

107. District health boards are responsible for the operation of the clinical services they provide, and can be held responsible for any service failures. Whanganui DHB had a duty to ensure that Mrs B received quality services and continuity of care. This meant ensuring that the providers involved in Mrs B's care were able to cooperate appropriately.

108. In this case, the care provided by the district nursing service was suboptimal. Mrs B's foot was deteriorating. The nurses, both individually and as a team, failed to measure Mrs B's pain objectively and to respond to her deteriorating state or the accompanying pain. They also failed to escalate the matter to Mrs B's GP or to Whanganui DHB when it became necessary.

109. In addition, the systems in place at Whanganui DHB also meant that the clinicians who received the referrals were unaware of the existence of the other referrals, or of the involvement of the district nurses in Mrs B's care.

District nursing care

110. Following the referral from Mr G on 5 Month3, the district nurses began visiting Mrs B to treat her foot. In my view, the information contained in Mr G's referral, and Mrs B's description of the severity of her pain, should have alerted the district nurses that Mrs B's condition was of concern. I agree with Whanganui DHB's comment that there was a lack of sound clinical judgement and decision-making at the time of the initial assessment by the district nurses on 6 Month3.

111. The district nurses visited regularly to dress Mrs B's foot wound, and were aware of the increasing pain in her right lower leg. Mrs B was referred to RN E for review. RN E reviewed Mrs B on 10 Month3 and referred her to Whanganui DHB's vascular

service. However, Mrs B was not seen by Dr H until 26 Month4, at which stage she had critical right lower limb ischaemia.

112. The individual nurses involved in Mrs B's care between 6 Month3 and 26 Month4 identified that Mrs B was experiencing severe pain. There are numerous entries in the clinical records that Mrs B's self-reported pain was not improving. My expert nursing advisor, RN Julie Betts, advised me:

> "It would be reasonable to expect [the district nurses] to observe this as documented in the clinical file and follow up with the patient their level of pain and effectiveness of prescribed medication to manage the pain. In this situation of unmanaged pain it would be reasonable to expect [the district nurses] to report this to the GP in the first instance. In [Mrs B's] case unmanaged pain could also have been reported to the wound CNS, specialist services or [the Emergency Department]."

113. RN Betts advised that in Mrs B's first week under district nursing care, it was not a departure from standard care not to refer her to her GP for review of her pain. RN Betts explained that it would be standard practice to monitor the effect of the pain relief Mrs B was taking for a few days to establish the pattern of pain, before referring Mrs B to her GP. However, RN Betts advised that after the first week, there was a systematic shortfall in the method of assessing, monitoring, and evaluating Mrs B's pain and recording the pain relief medication being taken. RN Betts stated:

> "While patient self-reports of pain were documented at each visit, they were not documented in a way that provided objective measures of the degree of pain, the pattern of pain or the patient's response to any pain relief medication. More objective methods of documenting pain in a way that could be reviewed over time by different [district nurses] may have assisted the [district nurses] as a team to recognise the degree of worsening pain and escalate [Mrs B's] care to the GP or specialist services at an earlier time."

114. RN Betts advised that monitoring a patient's response to pain relief is an expected nursing practice. Furthermore, it would be reasonable to expect that the district nurses would monitor Mrs B's pain after her GP consultation on 9 Month4 and report back to the GP whether or not the increase in analgesia that had been prescribed had been effective. RN Betts advised that the failure to escalate Mrs B's increasing pain to her GP, and if not her GP, to RN E, Whanganui DHB specialist services, or the Emergency Department at the public hospital, was a moderate to severe departure in practice.

115. It is unacceptable that Mrs B experienced severe ongoing pain with minimal response from the district nurses. The district nurses failed to measure Mrs B's pain levels objectively and to escalate her care to her GP or to Whanganui DHB when it became clear that this was necessary. Whanganui DHB had the ultimate responsibility to ensure that Mrs B received care that was of an appropriate standard and complied with the Code. In my view, for the reasons outlined above, Whanganui DHB failed in that responsibility and breached Right 4(1) of the Code.

Triage

116. I am concerned about the system for the management of referrals at Whanganui DHB and, in particular, the information available to the clinicians triaging the referrals.

117. There were three referrals to Whanganui DHB, and three missed opportunities to escalate concerns about Mrs B's condition and to arrange for her prompt assessment.

118. The first referral by Dr F on 21 Month2 was not triaged. The referral was sent back to Dr F without further action, and the reason cited was that Dr I could not read the referral.

119. The second referral by Mr G contained detailed information and was triaged by Dr J on 15 Month3 as semi-urgent. Dr J was unaware of any previous referrals.

120. The third referral from RN E included detailed information and requested urgent assessment. It was triaged as semi-urgent by Dr H on 18 Month3. Dr H was not aware of the referral history (ie, the two previous referrals) or the detail in the second referral. None of the clinicians were aware of the extent of the district nurses' involvement in Mrs B's care.

121. In relation to the first referral, my expert, General Surgical Consultant Dr Patrick Alley, advised that in his view there was sufficient information (namely, Mrs B's age and the fact of her ulcer and diabetes) to prompt a specialist referral.

122. In relation to the second referral, Dr Alley advised that the referral provided a clear indication "that there was a potentially significant problem of vascular insufficiency which [he] believe[s] should have prompted an earlier assessment".

123. Dr Alley noted that the third referral, containing a request for an urgent review, was assessed in isolation.

124. Dr Alley advised that while there were shortcomings in the triaging process, "poor administrative communication was at the heart of the matter". He noted that the triage process appeared "uncoordinated", and that this occasioned the significant delay in the proper assessment of Mrs B.

125. I am very critical of the system at Whanganui DHB that resulted in three referrals made in three weeks being triaged in isolation. Whanganui DHB had a duty to ensure that Mrs B received services provided with reasonable care and skill. By failing to ensure that there were systems in place to allow the individual clinicians involved in triaging Mrs B's referrals access to all relevant information, including recent referral history and previous referral documentation, Whanganui DHB breached Right 4(1) of the Code.

Opinion: RN E — breach

126. RN E is an experienced clinical nurse specialist in wound care with many years' experience. She visited Mrs B at her home on 10 Month3. Mrs B told RN E that she had a stinging, burning pain in her right foot that became worse when mobilising after resting. On 12 Month3, RN E sent a referral to Dr H at the public hospital for an urgent vascular assessment.

127. Based on the information provided in RN E's referral, Dr H concluded that Mrs B's pain was not necessarily the result of ischaemia, and triaged the referral as semi-urgent B to be seen within 90 days.

128. RN E said that she was unaware that her urgent referral had been triaged as semi-urgent B and that Dr H did not discuss the decision to do so with her. She stated that the referrer is not advised of who has been allocated the referral, or the outcome of the referral. She told HDC that this precludes any ability to discuss the referral outside the referral pathway.

129. My expert nursing advisor, RN Julie Betts, advised me that one of the functions of a clinical nurse specialist is to develop relationships with specialist services in order to escalate patient care when required. She said that clinical nurse specialists provide a link between care providers in the community and specialist secondary services.

130. RN Betts advised me that it would be considered standard practice for a clinical nurse specialist to follow up her urgent referral with the vascular surgeon involved. This would involve a conversation about whether the referral needed to be escalated, or whether it required the development of a collaborative plan of care.

131. I am critical that although RN E recognised that Mrs B needed an urgent vascular assessment because of her history and wound presentation, she took no further action to follow up on the outcome of her referral. I accept that the referral system does not provide feedback to the referrer about the outcome of the referral. However, in my opinion, RN E was in the best position at this time to evaluate the seriousness of Mrs B's condition. RN E had directed the referral specifically to Dr H, and I note RN Betts' advice that it is standard practice for a clinical nurse specialist to follow up an urgent referral.

132. RN E saw Mrs B again on 9 Month4, and noted that her pain had increased. RN E told HDC that at this appointment she became aware that Mrs B had not yet attended a clinic based on her (RN E's) earlier referral. RN E was aware that Mrs B was to see her GP that afternoon to review her pain relief. RN E said that she accepts that she should have followed up with a telephone call to Mrs B's GP to discuss her findings at the visit on 9 Month4. She said that usually she contacts the GP to inform the GP of any deterioration or concerns, and documents the outcome in the patient records.

133. RN Betts advised me that a reasonable standard of care when visiting and reviewing a patient with this type of history, wound presentation, and increasing pain would be to

discuss the case with the GP, highlighting the issues of unmanaged pain and also possibly escalating the matter to the vascular team.

134. RN Betts stated that RN E's failure to follow up her referral, as well as her failure on 9 Month4 to discuss Mrs B's deterioration with Dr F, amount to a moderate departure in practice.

135. RN E was in a key position with regard to Mrs B's care. RN E was aware that Mrs B's condition was deteriorating, and yet she did not follow up the urgent referral for a vascular assessment. That fact, coupled with her knowledge of Mrs B's increased pain on 9 Month4 and her failure to contact Mrs B's GP or escalate the matter further on that date, amounts to a failure to provide services to Mrs B with reasonable care and skill. Accordingly, I find that RN E breached Right 4(1) of the Code.

Opinion: RN D — breach

136. RN D was the district nurse who visited Mrs B most frequently, seeing her approximately 12 times in Month3 and Month4. In my view, RN D was in the best position to assess Mrs B's condition and advocate on her behalf.

137. On 18 Month3, Mrs B's pain was increasing, so RN D advised her to see her GP regarding pain relief.

138. Mrs B told RN D that she was trialling a pain relief patch given to her by her family. RN D did not record any information about the patch or monitor the effect of the patch on Mrs B's pain or well-being. RN D did not measure the degree of pain objectively, the pattern of pain, or Mrs B's response to the pain relief. The failure to document Mrs B's use of the patch, and the effect of this on her pain, impacted on the ability of subsequent district nurses who visited Mrs B to undertake an adequate assessment of the effectiveness of the patch.

139. RN D visited Mrs B on 23 Month3, 25 Month3, and 27 Month3 but did not follow up whether Mrs B had seen her GP, or whether her pain had improved.

140. Mrs B saw Dr F on 9 Month4 and was commenced on a fentanyl patch and oxycodone. RN D visited Mrs B on 11 Month4 and 13 Month4. There is no reference in the clinical notes to an assessment of Mrs B's pain, although on 13 Month4 there is a note that Mrs B's fentanyl patch had been changed. RN D said that she assisted Mrs B to change the fentanyl patch, and discussed the use of fentanyl with her. RN D said she assumed that Dr F would review Mrs B to ascertain whether the fentanyl patch had been effective and if any changes were needed.

141. When RN D subsequently visited Mrs B on 18 Month4, she again did not measure the degree and pattern of pain objectively, nor did she measure Mrs B's response to the pain relief. RN Betts advised:

> "In a patient with this type of history and wound presentation non-response to prescribed pain relief can be a sign of worsening limb ischemia. While monitoring pain more closely and objectively due to [Mrs B's] comorbidities may not have altered the outcome, it may have improved her quality of life and led to early escalation of care and treatment by specialist services."

142. RN Betts advised that RN D's failure to follow up Mrs B's response to pain relief was a moderate to severe departure in practice.

143. On 18 Month4, RN D noted that Mrs B's foot was oedematous. On 23 Month4, RN D noted that the oedema was still evident, and that Mrs B's foot was pale. RN D said: "I accept and acknowledge that I should have sent her directly to [the Emergency Department] as is usual practice and I can't understand why I didn't do so on this occasion."

144. RN Betts advised me that Mrs B's symptoms should have been reported directly to the surgical specialist or GP. RN Betts stated that it would be a normal expectation of nursing practice to report changes in patient presentation or symptoms that may indicate a worsening condition. RN Betts said that RN D's failure to do so was a moderate departure in practice.

145. On 4 Month4, RN D suggested to Mrs B that she ask her family to contact the public hospital to obtain an earlier date for her specialist appointment. RN D also suggested that the family take Mrs B to the GP if they had any concerns. RN Betts advised that neither of these actions were appropriate, and that RN D should have discussed her concerns with RN E and/or the GP. However, RN D failed to take either step.

146. In my view, a number of aspects of the nursing care RN D provided to Mrs B were poor. RN D failed to document objective measures of pain adequately, which would have allowed Mrs B's response to pain relief to have been monitored effectively. Further, as Mrs B's condition deteriorated, RN D failed to refer her to either a GP or a surgical specialist. Accordingly, I find that RN D failed to provide services to Mrs B with reasonable care and skill, and breached Right 4(1) of the Code.

Opinion: Dr F — adverse comment

Record-keeping

147. Dr F keeps his patient records in hard copy handwritten cards and uses MedTech PMS for details of prescriptions, laboratory results, diabetes annual review templates, and specialist reports. Dr F told HDC that he had intended to set up a transcribing system, but it had been technically challenging.

148. My expert GP advisor, Dr David Maplesden, advised me that the use of handwritten GP notes on small pieces of card is uncommon. He stated that Dr F's notes are difficult to decipher, and there is no apparent record of a musculoskeletal or vascular

assessment in relation to Mrs B's right leg pain and foot ulcers. Dr Maplesden advised me that Mrs B's overall management is difficult to determine from the notes. He advised that the standard of Dr F's clinical documentation, particularly in respect of the consultation on 9 Month4, departed from accepted standards to a mild to moderate degree.

149. I accept Dr Maplesden's advice and remind Dr F that, as part of any medical practice, and to help to ensure good care for patients, doctors are required to keep clear and accurate patient records. In my view, the same standard of record-keeping applies to doctors in sole practice as it does to doctors in larger medical practices.

Referral

150. On 21 Month2, Dr F referred Mrs B to the Orthopaedic Department of the public hospital. The referral was returned on 4 Month3 with a handwritten notation that said: "[S]orry can't read it."

151. Dr F took no further action on this referral. However, on 4 Month3 he did refer Mrs B to Mr G for an urgent consultation. Mr G replied to Dr F on the same day, advising that he was referring Mrs B to the district nurses and to the surgical team at the public hospital. Dr F told HDC:

> "[The] nurses have a line of direct referral to [the] surgical department for their difficult management cases and I had expected this liaison to occur directly with [Mrs B]."

152. Dr Maplesden advised that he was mildly critical that Dr F did not provide additional clinical information to the DHB by way of a referral supporting the second referral from Mr G. Dr Maplesden said that the information provided to the DHB should have included a background of Mrs B's increasing lower limb pain and comorbidities. In addition, he said that Dr F could have advocated on behalf of Mrs B to expedite her specialist appointment when she presented with increased limb pain on 9 Month4.

153. I acknowledge that Dr F appropriately involved Mr G and the district nursing service in Mrs B's care. In addition, Dr Maplesden advised that Dr F may have been reassured by Mrs B's ulcer remaining stable in Month3 and Month4, and by the lack of any apparent concern expressed directly to him by the district nurses about Mrs B's progress.

154. However, in my view, given that Dr F was Mrs B's general practitioner, he could have acted more proactively to support and assist her to obtain the services she required. He did not provide any additional information to support the second referral by Mr G; and he did not advocate on Mrs B's behalf in an effort to expedite her specialist appointment when he saw her, in increased pain, on 9 Month4.

Recommendations

155. I recommend that Whanganui DHB undertake the following actions:

a) Within two months of the date of this report, provide an update on progress of the pilot of the "clinical portal" system and the roll-out of the portal more broadly, including a timetable for complete implementation.
b) Create a programme of ongoing training and assessment for district nurses on objective methods of assessing, monitoring, evaluating and reporting pain, and provide a copy of the education programme and details of the training provided, within six months of the date of this report
c) Provide to HDC, on a quarterly basis, the results of (1) the audit reviewing documentation, including pain documentation (2) the surveillance audit to ensure recent changes have been embedded, and (3) the tracer audit monitoring the district nursing service, for a period of 12 months following the date of this report.

156. I note that RN E has retired from nursing practice and resigned from Whanganui DHB. Therefore, I will not be making a recommendation that RN E review her processes for following up urgent referrals.

157. I note that RN D has undertaken further training in documentation. Therefore, I will not be making a recommendation that RN D attend further training in documentation. I also note RN D's plan to attend training in pain assessment. I recommend that RN D attend this training and report back to HDC, within four months of the date of this report, with details of attendance.

158. I recommend that the Nursing Council of New Zealand consider whether a review of RN D's competence is warranted.

159. I recommend that Whanganui DHB and RN E both provide a written apology to Mrs B's family for the failings identified in this report. The apologies are to be sent to HDC within three weeks of the date of this report, for forwarding to Mrs B's family. I note that RN D has written an apology to Mrs B's family and sent it to HDC.

Follow-up actions

160. A copy of this report with details identifying the parties removed, except Whanganui DHB and the experts who advised on this case, will be sent to the Nursing Council of New Zealand, and it will be advised of the names of RN D and RN E in covering correspondence.

161. A copy of this report with details identifying the parties removed, except Whanganui DHB and the experts who advised on this case, will be sent to the New Zealand Nurses Organisation, the New Zealand Wound Care Society Incorporated, the College of Nurses Aotearoa, the Medical Council of New Zealand, ACC, TAS, and HQSC, and placed on the Health and Disability Commissioner's website, www.hdc.org.nz, for educational purposes.

Appendix A: Independent general surgical advice

The following expert advice was obtained from a general surgical consultant, Dr Patrick Alley:

> "My name is Patrick Geoffrey Alley. I am a vocationally registered general surgeon employed by Waitemata District Health Board. Additionally I am the Director of Clinical Training for that DHB. I graduated MBChB from the University of Otago in 1967. I gained Fellowship of the Royal Australasian College of Surgeons by examination in 1973. After postgraduate work in England I was appointed as Full Time Surgeon at Green Lane Hospital in 1977. In 1978 I joined the University Department of Surgery in 1978 as Senior Lecturer in Surgery. I was appointed as Full Time Surgeon at North Shore Hospital when it opened in 1984. My present principal role in the DHB is as Director of Clinical Training. I am a clinical director for the Ormiston Surgical and Endoscopy Hospital in South Auckland.
>
> I am a Clinical Associate Professor of Surgery at the University of Auckland, have chaired the Auckland branch of the Doctors Health Advisory Service for many years and have formal qualification in Ethics. I declare no conflict of interest in this case.
>
> Thank you for the opportunity to comment on this case. You have kindly included a timeline of events running from 26 [Month2] through to 26 [Month4] are the critical times where the alleged deficiency in care is to have taken place. I have checked the clinical record and those dates to my reading are correct.
>
> RELEVANT CLINICAL BACKGROUND
>
> [Mrs B] was a 79 year old lady with long standing chronic illness characterised by the following conditions:
>
> Type 2 diabetes
>
> Hyperlipidaemia
>
> Polymyalgia rheumatica
>
> Spinal stenosis
>
> Her medication included prednisone, aspirin, codeine and paracetamol. The latter medications being additions for recent pain. She presented to her general practitioner (GP) with a painful ulcer on the dorsum of her right foot. By way of background, in [Month1], [Mrs B] sustained a fall and did injure this foot but whether or not the injury caused the ulcer is difficult to ascertain. Several blackened areas on the toes of the same foot were noticed at the time of presentation to her GP.
>
> PRINCIPAL ACTIVITIES ON [MRS B'S] TIMELINE
>
> The general practitioner referral letter was received at the Whanganui District Health Board (WDHB) on 26 [Month2]. I agree the writing was somewhat

unclear. However the following information was very clear. The age of the patient was included in a 'sticky label' that was affixed to the letter. Without much difficulty the fact that she had an ulcer and had diabetes is not unduly difficult to discern.

In contrast the podiatry referral received on 5 [Month3] is very clear in what the clinical problem was. This letter is a typed one. It sets out the clinical problem and includes a Doppler assessment of her foot pulses indicating the right foot has diminished flow.

A referral was also made by the podiatrist for the patient to be attended by the district nursing service. They assessed her ulcers and raised the possibility of arterial insufficiency as a basis for her difficulties. On 12 [Month3] a letter was written to [Dr H] stating in conclusion: 'Your assessment and treatment recommendations are urgently required for this patient please'.

On 15 [Month3] this referral was triaged by one of the general surgeons as 'semi urgent B'. The timeline for 'semi urgent B' categorisation is 3–4 months in the Whanganui DHB.

To complicate matters, 3 days later another general surgeon triaged the same referral (I presume) referral from either the podiatrist or the ulcer clinic and a surgical appointment was set up for 23 [Month5] some three months after the receipt of the initial letter.

The situation was reviewed sometime in [Month4] and the clinic appointment was brought forward to 26 [Month4]. When seen that day by the general surgeon it was clear that the patient had severely compromised arterial supply to the lower limb and she was promptly referred to the vascular service at [DHB2].

I have not been invited to comment on the events at [DHB2] but suffice to say that despite appropriate interventions the patient eventually succumbed to the effects of several vascular interventions.

ANALYSIS OF THE EVENTS LEADING TO [MRS B'S] ADMISSION ON 26 [MONTH4]

Despite the difficulty in interpreting the handwriting, I believe there was sufficient discernible information contained therein to indicate the need for prompt specialist opinion. Because she had a background of osteoarthritis and spinal stenosis the letter was initially graded by an orthopaedic surgeon. The referral should have then been reassigned within the DHB to a more appropriate specialist. To complete the commentary I do note that the GP was informed that this referral was being returned for further clarification. I stress this patient suffered from a very common and serious ailment namely occlusive arterial disease of the lower limb. Therefore recognition that there was an impending seriousness to the presentation should not have escaped any practitioner including orthopaedic specialists.

> The referral letter from the podiatrist indicated objective evidence of vascular compromise but it was not until 12 [Month3], seven days after her initial assessment that the district nurses referred [Mrs B] for a surgical opinion. The nursing notes indicate that an opinion was sought from [Dr H] the surgeon but nothing appears to have come of that other than the aforementioned appointment at surgical outpatients.
>
> Triage of this [patient] to an appropriate service has been haphazard. There were two referral letters, a referral to the district nurses and from that one, possibly two, referrals to general surgery. The process appears uncoordinated and I believe this occasioned significant delay in the proper assessment of the patient. As mentioned above it is not clear whether the surgical opinion requested by the district nurses was ever given until 26 [Month4]. It is possible that it did result in a more prompt assessment in outpatients on 26 [Month4] but there are no annotations by the surgeon to that effect so one cannot be absolutely sure.
>
> I take issue with the assertion by the Chief Executive where she states: '… referrals were triaged within acceptable timeframes'. That may be true for the assignment of a 'semi urgent B' but the point is that it was incorrectly triaged and should have had a higher priority. Many services would admit this patient as an acute rather than delay assessment for over eight weeks as was the case for [Mrs B].
>
> In conclusion I believe [Mrs B's] care fell below a standard of reasonable practice and that delays occasioned by poor coordination of clinical services at Whanganui DHB contributed to an adverse outcome.
>
> I would regard this episode as a severe departure from normal practice. Given the mortal outcome there can be no other description."

Further advice was obtained from Dr Alley:

> "I note your remarks about the magnitude of departure from normal practice balanced against outcome and I have modified my opinion in that regard.
>
> I found the responses from Whanganui DHB interesting and in many cases they have responded well to the challenges identified by this case. The Chief Executive has provided a good summary of the changes made to improve, particularly the District Nursing Service protocols.
>
> I still contend that despite the poor handwriting of the referral letter from [Mrs B's] GP there was sufficient information contained that should have prompted an earlier assessment at the DHB.
>
> I was also interested to read of the response to illegible reference letters received by the DHB. They state in a letter to [Mrs B] that 'your GP has been notified'. I am unsure whether that notification is by copy of the letter or another separate letter. As it reads it implies that further information is required from the GP. In

> fact it was lack of clarity in the GP's letter that denied [Mrs B] triage and possibly an earlier appointment. That is not made clear in the information sent to me.
>
> The second point in the referral process is the podiatrist's letter about which there has been no issue of legibility. That letter clearly implies that there was a potentially significant clinical problem of vascular insufficiency which I believe should have prompted an earlier assessment.
>
> However [Dr H] claims in his response to my report that he was unaware of both the podiatrist's letter and [Mrs B's] recent referral history to the DHB. The Chief Executive has addressed this deficiency in describing an improved process whereby such information is now brought to the attention of treating clinicians.
>
> Bearing in mind the submissions from Whanganui DHB and your recommendations concerning outcome and departure from normal practice I would opine that there has been a moderate departure from normal practice in this case. However I would also commend the DHB for the actions that they have taken to help prevent a similar occurrence.
>
> You ask how surgical peers would judge the DHB's management of such a case. While I cannot, of course speak for all, I believe they would recognise poor administrative communication to be at the heart of the matter. I am also certain they would be encouraged by the responses of the DHB to prevent a recurrence."

Dr Alley subsequently clarified that he had no concerns about the doctors who triaged [Mrs B] individually, but he was concerned about the systems at the DHB. He said that the triages were imperfect (because of the incomplete information) but there were no significant departures from accepted practice by the doctors. He said that in his view the DHB response has been robust.

Appendix B: Independent nursing advice

The following expert nursing advice was obtained from RN Julie Betts:

> "I have read and agree to follow the Commissioner's guidelines for Independent Advisors. I am currently registered as Nurse Practitioner™ with a specialty in wound care. I have a total of 35 years nursing experience. The first seventeen years of my nursing career I was employed as a registered nurse working in both hospital and community practice settings. In 1997 I was employed into a specialist nursing role with a wound care focus. In 2003 I registered as a nurse practitioner wound care and have continued in that position for the last twelve years. As a nurse practitioner, the focus of my role is providing expert clinical advice and management of patients with complex wounds across primary and secondary services, both in delivering direct patient care and service development to support best practice and improve patient outcomes.
>
> My professional qualifications include registration as a General and Obstetric Nurse and Nurse Practitioner. My academic qualifications include, Advanced Diploma of Nursing, Post Graduate Diploma in Health Science, Certificate of Proficiency (prescribing) and Master of Nursing.
>
> Advice requested:
>
> I have been asked to provide expert advice on the care provided to [Mrs B] by Whanganui DHB's District Nursing Service (DNS) between 6th [Month3] and 26th [Month4] with particular reference to:
>
> - Whether there was an indication for the DNS to perform an ankle:brachial index at any point to assist in specialist triage.
> - Whether [Mrs B's] report to the DNS of increasing leg and wound pain should have been reported directly to the surgical specialist or GP, particularly after 9 [Month4].
> - Whether the pallor and oedema recorded by DNS as being observed in [Mrs B's] right foot from 18 [Month4], should have been reported directly to the surgical specialist or GP.
>
> Information reviewed:
>
> - Letter of complaint.
> - WDHB's response.
> - WDHB's clinical records.
> - [Mr G] (podiatrist) clinical notes.
> - [Dr F] (GP) clinical notes.
> - Subsequent documents requested and received from WDHB regarding wound care guidelines and escalation pathways relating to leg ulcers
>   - Protocol for the initial management of chronic leg ulcers
>   - Criteria for referring patients with lower leg injuries to CNS — wound care for assessment

- Request for patient review by wound specialist nurse

Summary:

[Mrs B] injured her right foot following a fall out of bed [in Month1]. The foot failed to heal and she was seen by [Mr G], podiatrist in early [Month3]. [Mr G] referred [Mrs B] to [the public hospital's] Outpatients Department and the DNS who commenced visiting on 6 [Month3]. The DNS visited regularly to dress the ulcer. Increasing right lower limb pain was a prominent problem identified by [Mrs B] and the DNS referred [Mrs B] to the Wound Clinical Nurse Specialist (CNS) for review. The CNS reviewed [Mrs B] on 10th [Month3] and referred [Mrs B] to the WDHB's vascular service who saw [Mrs B] on 26th [Month4] and diagnosed critical right lower limb ischaemia. She was admitted to [the public hospital] and transferred to [DHB2] the next day. Despite several limb salvaging procedures [Mrs B] required right below knee amputation on 11th [Month5]. She subsequently died following post-operative complications on [date].

Response to questions posed:

1. *Whether there was an indication for the DNS to perform an ankle:brachial index at any point to assist in specialist triage.*

My opinion on whether there was an indication for the DNS to perform an ankle:brachial index (ABI) is that yes there was an indication for an ABI to be performed to assist in the triage of the patient to specialist services. It is accepted practice and considered standard care for patients with lower leg wounds that have failed to heal after 4–6 weeks to have an ABI and associated leg ulcer assessment.[1] An ABI is undertaken to determine the degree of arterial blood flow to the lower leg and provides a guide as to whether the ulcer is likely to be venous or arterial in nature. It appears from the clinical file that while the DNS did not perform an ABI themselves, due to the complexity of the case they referred to the wound CNS who attempted an ABI on 10th [Month3]. The CNS documented she was unable to locate any pedal arteries with the Doppler ultrasound device as they were inaudible. Inaudible pedal arteries preclude the ability to determine an ABI. The wound CNS in her referral to specialist services on 12th [Month3] documented the absence of pedal pulses on examination with Doppler ultrasound which may have assisted specialist triage. Repeating the ABI at any later stage during [Mrs B's] care by the DNS would not have been of any benefit as the pedal arteries were inaudible; therefore ABI could not be determined.

The decision by DNS to refer to the wound CNS for assessment of [Mrs B's] wound including an ABI, and the response time of the CNS to review the patient would be viewed by my peers as an acceptable standard of practice.

2. *Whether [Mrs B's] report to the DNS of increasing leg and wound pain should have been reported directly to the surgical specialist or GP, particularly after 9 [Month4].*

My opinion on whether [Mrs B's] reports of increasing pain should have been reported directly to the surgical specialist or GP is that yes they should have been.

Additionally DNS could have reported [Mrs B's] symptoms to the wound CNS to review as per the CNS criteria for referring and reviewing patients with lower leg injuries. Reporting [Mrs B's] increasing pain via any of the above pathways may have expedited specialist assessment.

In DNS the expected pathway for escalation of care for increasing pain would normally be to the GP. Monitoring patient response to pain relief is an expected nursing practice; therefore it would be reasonable to expect that DNS would monitor [Mrs B's] pain after the 9th [Month4] and report to the GP whether or not the increase in pain relief had been effective. In a patient with a history and symptoms such as [Mrs B's], apart from the GP, it would also be accepted practice to escalate increasing pain directly to the wound CNS, specialist services, or failing that the Emergency Department. In a patient with this type of history and wound presentation failure to do so would be viewed by my peers as a moderate to severe departure in practice.

I would also like to note that in reviewing the documentation provided, apart from [Mrs B's] initial nursing assessment on admission to DNS where she reported her pain as 9/10, there is little record of regular objective assessment of [Mrs B's] level of pain in her nursing notes. Nursing documentation that supported objective measurement of pain on an ongoing basis may have facilitated DNS to report [Mrs B's] increasing pain more effectively.

3. *Whether the pallor and oedema recorded by DNS as being observed in [Mrs B's] right foot from 18 [Month4], should have been reported directly to the surgical specialist or GP.*

My opinion on whether the pallor and oedema recorded by DNS as being observed in [Mrs B's] right foot should have been reported directly to the surgical specialist or GP, is that yes they should have been. Additionally DNS could have reported [Mrs B's] symptoms to the wound CNS to escalate directly to specialist surgical services as per the CNS criteria for referring and reviewing patients with lower leg injuries. My reasons for this are similar to that in my response to question two, in that it would be a normal expectation of nursing practice to report changes in patient presentation or symptoms that may indicate a worsening condition. This would normally be to the responsible clinician which in this case would be considered to be the GP. In a patient with this type of history and wound presentation failure to do so would be viewed by my peers as a moderate departure in practice."

Further advice

RN Julie Betts provided the following further advice:

"*Advice requested:*

I have been asked to provide further expert advice to the Health and Disability Commissioner regarding the care provided to [Mrs B] by Whanganui DHB in 2015 with particular reference to:

- Reviewing the new information provided and whether this causes me to add or **amend my previous advice regarding** the reasonableness **of the nursing** care provided **to [Mrs B] between** 6 [Month3] and 26th [Month4].
- The standard of care provided by [RN D] and Wound CNS [RN E]
- Any other individual nurses that I consider warrant comment.

Information reviewed:

- Documents provided since my earlier review:
  - Whanganui DHB's response dated 22 November 2016 and enclosures
  - Whanganui DHB's response dated 20 November 2015 and enclosures
  - Whanganui DHB's response dated 3 December 2015 and enclosures
- Documents previously provided:
  - Letter of complaint.
  - Whanganui DHB's response
  - Clinical records from Whanganui DHB
  - Clinical records from general practitioner, [Dr F]
  - Clinical records from podiatrist, [Mr G]

Summary:

[Mrs B] injured her right foot following a fall out of bed during [Month1]. The foot failed to heal and she was seen by [Mr G], podiatrist in early [Month3]. [Mr G] referred [Mrs B] to [the public hospital's] Outpatients Department and the DNS who commenced visiting on 6 [Month3]. The DNS visited regularly to dress the ulcer. Increasing right lower limb pain was a prominent problem identified by [Mrs B] and the DNS referred [Mrs B] to the Wound Clinical Nurse Specialist (CNS) for review. The CNS reviewed [Mrs B] on 10th [Month3] and referred [Mrs B] to the WDHB's vascular service who saw [Mrs B] on 26th [Month4] and diagnosed critical right lower limb ischaemia. She was admitted to [the public hospital] and transferred to [DHB2] the next day. Despite several limb salvaging procedures [Mrs B] required right below knee amputation on 11th [Month5]. She subsequently died following post-operative complications on [date].

Response to questions posed:

Reviewing the new information provided and whether this causes me to add or amend my previous advice regarding the reasonableness of the nursing care provided to [Mrs B] between 6 [Month3] and 26th [Month4].

Reviewing the new information provided, has not led me to alter my previous advice regarding the reasonableness of the nursing care provided to [Mrs B] between 6 [Month3] and 26th [Month4].

My reasons for this are that while individual RNs involved in [Mrs B's] care and Wanganui DHB have identified assessment and documentation of pain and

processes for escalation of care needed improving, it does not change the standard of care delivered to [Mrs B] between 6 [Month3] and 26th [Month4].

Multiple entries in the patient file identify that [Mrs B's] self-reported pain was not improving. It would be reasonable to expect DNs to observe this as documented in the clinical file and follow up with the patient their level of pain and effectiveness of prescribed medication to manage the pain. In the situation of unmanaged pain it would be reasonable to expect DNs to report this to the GP in the first instance. In [Mrs B's] case unmanaged pain could also have been reported to the wound CNS, specialist services or ED.

Having said that, I am encouraged by the changes that the DNS have implemented as a result of the complaint and review of the service, including improved patient management systems, referral and escalation processes, increased time for DNs to focus on clinical care and improved interface and case review of complex cases with specialist nurses. These changes provide me with some confidence this situation is less likely to occur in the future. The DNS should be congratulated on their review of the service and the impact the changes made will have on patient care.

The standard of care provided by [RN D]

My opinion on the standard of care provided by [RN D] is that there are departures from what would be considered standard care.

The first of these departures is the apparent failure of [RN D] to follow up [Mrs B's] response to pain relief. [RN D] advised [Mrs B] to see her GP for review of analgesia on the 18th [Month3], as [Mrs B] was experiencing increased discomfort in the foot. [RN D] visited [Mrs B] on the next four DN visits on the 20, 23, 25 and 27th [Month3]. There was no documentation in the clinical file at these visits that [RN D] followed up whether [Mrs B] had seen her GP, the outcome of that potential visit, or whether her pain had improved or not as a result. In her written response [RN D] remembered that [Mrs B] was wearing a transdermal product possibly purchased by her family to trial for pain relief at around this time. There was no reference in the clinical file or [RN D's] written response to the type of patch or monitoring its impact on [Mrs B's] pain or well-being. Neither the care described in the clinical file in regard to following up whether [Mrs B] had seen her GP and the outcome of that, or the care described in [RN D's] written response as to the type of transdermal patch and its effect on [Mrs B's] pain are appropriate.

[Mrs B] saw her GP on the 9th [Month4] for increasing pain in the foot and was commenced on a Fentanyl patch. [RN D] visited [Mrs B] on the next four DN visits on the 11, 13, 16 and 18th [Month4]. While it was documented in the clinical file that [Mrs B] was seeing her GP on the 9th [Month4] there was no documentation regarding the result of the GP visit or that [Mrs B] had been prescribed a Fentanyl patch, or a plan to monitor effectiveness of that analgesia. It is not clear whether [RN D] was aware that [Mrs B] had seen her GP but as it is

documented in the clinical file on the previous entry it would be reasonable to expect that [RN D] would have read this prior to visiting [Mrs B], and therefore be able to follow up the outcome and adjust the care plan accordingly. In a patient with this type of history and wound presentation non-response to prescribed pain relief can be a sign of worsening limb ischaemia. While monitoring pain more closely and objectively due to [Mrs B's] comorbidities may have not altered the outcome, it may have improved her quality of life and led to earlier escalation of care and treatment by specialist services. For this reason failure to follow up [Mrs B's] response to pain relief would be viewed by me and my peers as a moderate to severe departure in practice.

The second of these departures is the apparent failure of [RN D] to escalate the increased pallor and oedema noted in [Mrs B's] foot on the 18th and 23rd [Month4] to either the GP, wound CNS or ED.

[RN D] did not document any action in the patient's clinical file regarding reporting changes noted in the foot. In her written response [RN D] stated that she would normally discuss concerns with the wound CNS and/or refer the patient to the GP or ED but has not clarified whether this occurred or not. [RN D] has also stated in her written response that on the 23rd [Month4] she asked the family to contact the hospital to obtain a date for [Mrs B's] specialist service appointment and to take [Mrs B] to the GP if they had any further concerns. Neither the care described in the first instance of not documenting any action in the clinical file to observable changes in the foot, or the care described in the second instance of asking the family to follow up the outpatient appointment or take [Mrs B] to the GP if they had any concerns is appropriate.

[RN D] discussing concerns with the wound CNS and/or the GP would be appropriate and considered a reasonable standard of care but it has not been clarified whether this occurred or not. There is no apparent documentation in the files provided by the GP or wound CNS that [RN D] discussed any concerns with them about the changes noted in [Mrs B's] foot.

While escalating the increased pallor and oedema noted in [Mrs B's] foot at this time may not have made a difference to the outcome due to [Mrs B's] comorbidities, in a patient with this type of history and wound presentation failure to escalate observable changes in the foot would be viewed by myself and my peers as a moderate departure in practice.

The standard of care provided by Wound CNS [RN E]

My opinion on the standard of care specifically provided by Wound [RN E] is that there has been a departure from what could be considered standard care.

The departure relates to follow up of the outcome of the CNS referral to the vascular service and patient follow up.

[RN E] visited [Mrs B] on 10th [Month3] and referred her to the ulcer clinic on 12th [Month3]. She was sufficiently concerned about [Mrs B's] foot to request

urgent review at the ulcer clinic which is held monthly. One of the functions of a CNS is to develop relationships with specialist services in order to be able to escalate patient care when required, provide expert advice and liaise between specialist services and care providers such as DNS regarding patient care. CNSs also review patient response to treatment, recommend treatment changes and co-ordinate care of complex cases.

They provide a link between community providers of care and secondary specialist services particularly in cases of increased complexity. They usually have the ability to discuss patients who are not responding to treatment directly with specialist services to escalate care and facilitate more rapid secondary intervention when required.

It would be considered standard practice that an urgent referral is followed up with a conversation about the case with the vascular surgeon to escalate the referral if needed, or develop a collaborative plan of care whether that involved secondary care intervention or conservative treatment. It appears from the information provided that opportunities for [RN E] to discuss this case with the vascular surgeon exist outside of what would be considered normal referral pathways. [RN E] saw [Mrs B] again on the 9th [Month4]. It appears from the information provided this visit was to review excision of skin lesions on the nose and eyelid, and review the wound on the right foot. In the CNS held clinical note no mention is made of review of the foot during this visit although in the DN held clinical note [RN E] states the pain had increased in the foot and that [Mrs B] was seeing her GP in the afternoon to review pain relief.

In her written response [RN E] has stated that she visited [Mrs B] on the 18th [Month4] and completed wound care on the right foot and that [Mrs B] was seeing her GP in the afternoon to review pain relief due to increasing pain. At a CNS level a reasonable standard of care in visiting and reviewing a patient with this type of history, wound presentation and increasing pain, would be to discuss the case with the GP highlighting issues of unmanaged pain together with possible escalation to the vascular team depending on the outcome of discussion with the GP. Neither the care described in the clinical file or [RN E's] written response regarding review of the foot on the 9th nor 18th [Month4] was appropriate.

Failure to discuss the case with the vascular surgeon following the initial referral to the ulcer clinic or with the GP following review on the 9th [Month4], in a patient with this history and wound presentation would be considered by me and my peers as a moderate departure in practice. In my experience it is not uncommon for such conversations to occur informally and not always documented, particularly in situations where the conversation is remote from where patient files are located. For this reason if discussion of the case occurred in the instances described above but was not documented my opinion is that it would be a minor departure in practice.

Any other individual nurses that I consider warrant comment.

None of the other DNs who visited [Mrs B] appeared to respond to her complaints of pain in the foot. In hindsight those DNs have acknowledged they could have assessed monitored and evaluated [Mrs B's] pain against prescribed medication better and arranged review by the GP. Given that these nurses individually visited [Mrs B] on no more than two occasions between 6th [Month3] and 26th [Month4], and those visits occurred predominantly between 6th and 11th [Month3], I would not see it as a departure from standard care that referral to the GP for review of pain did not occur in the first week [Mrs B] was under district nurse care. As [Mrs B] was taking pain relief at the time it would be standard practice to monitor the effect of that pain relief for a few days to establish the pattern of pain before referring to the GP for review. Having said that, from the documentation provided there does appear to be systematic shortfalls in the method of assessing, monitoring and evaluating patient's pain and recording pain relief medication in the district nursing service. While patient self-reports of pain were documented at each visit they were not documented in a way that provided objective measures of the degree of pain, the pattern of pain or the patient's response to any pain relief medication. More objective methods of documenting pain in a way that could be reviewed over time by different DNs may have assisted the DNs as a team to recognise the degree of worsening pain and escalate [Mrs B's] care to the GP or specialist services at an earlier time.

There also appears to be systems errors with the method of recording DN referrals to the wound care service in a way that individual DNs can see whether a referral has actually been completed or not. From individual DN written responses there seemed to be confusion among DNs as to whether a referral to the wound CNS had been completed. The initial wound assessment and plan of care written on 6th [Month3] indicates referral to the wound CNS had occurred which led DNs to believe the referral had been completed. [A DN] searched [through] [Mrs B's] file on the 9th [Month3] and noted there was no copy of the referral in the file so completed and sent a referral to the wound CNS on that day. A similar situation in relation to completing referrals could also apply for review of patients by the wound CNS. Based on Wanganui DHB service criteria for referring patients with lower leg injuries to CNS wound care nurses, in the event of no wound improvement for four weeks DNS should initiate re-referral to the wound CNS for review. From the documentation provided this does not appear to have occurred in [Mrs B's] case, nor is there anywhere evident in the documentation that this could be recorded where it is easily visible to DNs.

Recommendations for improvement that may help to prevent a similar occurrence in the future

From the information provided I believe Wanganui DHB have made changes to systems and processes that provide confidence this situation is less likely to happen in the future. These changes include:

- Implementation and trial of a clinical portal system that will streamline clinical information and facilitate e-referrals allowing visibility of referrals

by the referrer and clinician triaging referrals.

- Changes to DNS patient management system and workloads enabling increased clinical care time for DNs
- Review of DN referral processes including feedback mechanism to ensure receipt of referral
- DN fortnightly clinical meetings with CNS and clinical co-ordinator for peer and case review
- Review changes in Feb 2016

In addition to the changes above other recommendations I would make for consideration are:

- DN education regarding objective methods of assessing, monitoring evaluating and reporting pain.
- Review of documentation used to record pain and pain medication to enable objective assessment, monitoring, evaluation and reporting of pain over time.
- Explore methods of supporting formal case review of urgent or complex cases between wound CNS and vascular surgeon with record of documented outcomes."

Appendix C: Independent general practitioner advice

The following expert advice was obtained from vocationally registered general practitioner Dr David Maplesden:

"1. Thank you for the request that I provide clinical advice in relation to the complaint from [Mr A] about the care provided to his late mother, [Mrs B], by Whanganui DHB (WDHB). In preparing the advice on this case to the best of my knowledge I have no personal or professional conflict of interest. I agree to follow the Commissioner's Guidelines for Independent Advisors. I have reviewed the information on file: complaint from [Mr A]; response from Whanganui DHB; [public hospital] clinical notes; response from GP [Dr F]; GP notes; response from podiatrist [Mr G] and podiatry notes; [DHB2] clinical notes.

2. [Mr A] complains about the WDHB management of his mother's peripheral vascular disease. [Mrs B] was referred to the public hospital surgical outpatients by podiatrist [Mr G] in early [Month3] because of a painful non-healing ulcer on her right forefoot which [Mr G] felt was related to arterial insufficiency. [Mrs B] was also referred to the District Nursing Service (DNS). [Mrs B's] ulcer failed to heal although evidently did not deteriorate significantly while under DNS attention. However, she had problems with increasing right lower limb pain. She was eventually seen at the public hospital vascular outpatients on 26 [Month4] where she was diagnosed with critical right lower limb ischaemia. She was admitted to [the public hospital] and transferred to [DHB2] the next day. Here various limb salvaging procedures were performed but [Mrs B] eventually required right below knee amputation on 11 [Month5]. She suffered peri-operative complications and sadly died in [DHB2] on [date].

3. Brief clinical synopsis based on available documentation

(i) [Mrs B] (aged 79 years) had pre-existing medical problems of type 2 diabetes, COPD, hyperlipidaemia, hypertension, spinal stenosis and polymyalgia rheumatica. GP notes dated 11 [Month1] refer to [Mrs B] suffering from right sciatica … *can't walk up stairs …* She was referred for lumbar spine X-ray. On 20 [Month2] [Dr F] has recorded *fell out of bed [in Month1] … pain R ant thigh … ?neuropathic foot problem.* Although not evident from the notes, [Mrs B] was referred for blood tests and foot X-ray (done 26 [Month2] — no bony injury) and a prescription for Cefaclor is recorded, presumably because the foot ulcer appeared infected. A referral was also sent by [Dr F] to [the public hospital] orthopaedic outpatients dated 21 [Month2] with content including: *she has ongoing problems R sciatica with some numbness feet and 2 small ?neuropathic sores R foot. Has pain management problem. Morphine (MEslon makes her feel sleepy) as well as Tramadol. X-ray shows facet joint arthropathy + previously diagnosed as spinal stenosis. Can you please review her ?for MRI.* The referral was returned to [Dr F] because it was deemed to be unreadable and [Mrs B] was also notified of the situation.

Comment: GP notes are handwritten on small pieces of card. Such a method of record-keeping was common perhaps 30 years ago but I have not seen it used in recent times. The notes are difficult to decipher and in those notes supplied (from 11 [Month1]) I cannot see any record of a musculoskeletal or vascular assessment in relation to [Mrs B's] complaint of right leg pain and foot ulcers. The overall management is difficult to determine from the notes. As commented on above, the handwritten referral by [Dr F] to [the public hospital] dated 21 [Month2] was deemed illegible and returned although the referral did not indicate any concern regarding the vascular status of [Mrs B's] right leg.

(ii) [Mrs B] attended [an] Accident & Medical Clinic on 27 [Month2]. Notes include: *walked on [right] foot until it became infected and sore, was purple and swollen now red with a scab laterally 5th MT area and red there, on Ceclor as Augmentin gives her diarrhoea ... needed to come in by wheelchair ... Flucloxacillin was prescribed, the wound dressed and [Mrs B] advised to return as required.* On 4 [Month3] she returned to [Dr F] who has recorded *pressure ulcer (ischaemic) off codeine, ischaemic changes ...* A referral was made to podiatrist [Mr G] and [Mrs B's] daughter evidently took her directly to [Mr G] the same day. Podiatrist notes include: *... she has a painful lesion on the dorsal lateral aspect of the right foot approx. above the 5th metatarsal head ... I think it is an arterial ulcer and I will refer her to the district nurses and also send a copy of this letter to her daughter and the surgical team at the public hospital ... comprehensive examination findings are documented including description of the ulcer and additional ischaemic changes affecting the right third toe. Skin temperature is 1–2 degrees Celsius lower on the right and a blushed darker shade is noted, check of pulses b Doppler indicates the left foot is biphasic and regular on both sites however on the right side the posterior tibial pulse is monophasic and the dorsal is barely audible ...* The report was sent to [Dr F] and the DNS and was accepted by the DNS on 5 [Month3]. A copy of the report with cover letter was received on 12 [Month3] and triaged on 15 [Month3] as semi-urgent B. The cover letter from [Mr G] included: *I suspect she has arterial insufficiency causing a foot ulcer and would benefit from further investigations. I would think a referral will come via the GP. Nevertheless it may help to have the letter brought to your attention and scanned into [the computer system]*.

Comment: It was reasonable for [Dr F] to refer [Mrs B] initially to the podiatrist for a more detailed assessment of her ulcer and the vascular status of her foot. This assessment was undertaken in a timely and professional manner by [Mr G] and he rightly concluded that [Mrs B] required further specialist assessment of the foot regarding need for vascular intervention. [Mr G] provided [the public hospital] with a reasonable referral letter outlining the results of his assessment which indicated a high likelihood of significant arterial disease. Missing from the referral was detail regarding [Mrs B's] co-morbidities (particularly her diabetes) and her pain history both of which might have influenced the triage status of the referral. However, I think it was quite reasonable for [Mr G] to assume that, based on the findings he reported to [Dr F], [Dr F] would provide the outpatient service with a further referral outlining in more detail the history of [Mrs B's]

ulcer, pain history and medications supplied for this, and information regarding her co-morbidities and usual medications. As [Mrs B's] pain became increasingly severe, particularly in the two weeks prior to her eventual review at [the public hospital], I would have expected [Dr F] to have advocated on her behalf to ensure timely review by the DHB vascular (surgical) service if he was aware of the situation, although I note she was also being cared for by the DNS over the period in question.

(iii) DNS visits commenced on 6 [Month3]. Wound pain was a very prominent feature and the Wound Clinical Nurse Specialist (CNS) was asked to review [Mrs B] on 10 [Month3]. The CNS recorded a detailed wound history and assessment findings including foot discolouration, impalpable pulses and ishaemic changes, and concluded: *needs vascular assessment by a surgeon … probable arterial disease which will delay healing … no obvious signs of infection.* The CNS sent a second referral to the DHB vascular service (received by them 13 [Month3]) and a referral for a cradle to reduce pressure on the foot from bedclothes. The referral included detailed assessment findings and concluded: *Your assessment and treatment recommendations are urgently required for this patient please.* This referral was triaged on 18 [Month3] as semi-urgent B. On 2 [Month4] an outpatient assessment was scheduled for 23 [Month5] (almost 10 weeks from the date of receipt of the referral). According to the DHB response, the DN referral was triaged by a different surgeon and the appointment brought forward to 26 [Month4]. The reason for the reassessment of the referral is not clear.

Comment: [Mrs B] was at high risk of complications from her foot ulcer given her concurrent diabetes and the suspicion the ulcer was related to arterial insufficiency. Increasing foot pain was also a worrying sign. **While the DHB response indicates confidence that the priority given to the surgical service referrals from the podiatrist and DNS was consistent with national standards, I suggest external advice be sought from a vascular surgeon to comment on this issue.**

(iv) DNS visits were recorded on alternate days during [Month3] and into [Month4] with the ulcer apparently stable (a sacral pressure area was being managed concurrently). On 9 [Month4] the CNS reviewed [Mrs B] and noted: *Returned from [DHB3] Friday* (see below) *… The pain has increased in the R foot, seeing GP pm to review pain relief …* On 18 [Month4] the right foot was noted to be oedematous and on 20 [Month4] *states wound pain has increased.* On 23 [Month4] the nurse has recorded *R lower foot oedema persists, 3rd and 4th toes on R foot appeared pale.* By this stage it was known [Mrs B] was being seen in surgical outpatients on 26 [Month4].

(v) Over the period in question, [Mrs B] had also been receiving attention for some facial skin cancers following referral to [DHB3] plastic surgical service by [Dr F]. She was reviewed by the service on 12 [Month2] and had an overnight admission to [DHB3] on 6/7 [Month4] for removal of the lesions. On the [DHB3] discharge summary dated 7 [Month4], listed under 'Other inactive problems' is: *right foot ulcer likely arterial, awaiting vascular review in Whanganui.* There is

no further reference to the ulcer or [Mrs B's] pain levels in the discharge summary.

Comment: No notes have been provided for the [DHB3] admission other than the discharge summary so it is not possible to determine whether [Mrs B's] foot was assessed during the admission. Subsequent notes indicate [Mrs B] had a marked deterioration in her pain levels (to suggest transition from sub-critical to critical ischaemia) in the two weeks prior to her eventual admission to [the public hospital] so she may have presented as having a stable non-critical vascular issue during this admission.

(vi) [Dr F's] notes refer to patient contact on 9 [Month4] at which point [Mrs B] was evidently prescribed fentanyl patch and oxycodone. While there is no documentation regarding the nature or site of her pain or any examination performed, the prescription implies [Mrs B's] pain was severe. It is possible an antibiotic (Cefaclor) was also prescribed on this occasion although I am unable to reliably decipher all the clinical notes. On file is a referral sent from [Dr F] to the DNS dated 9 [Month4] requesting visits for dressings to the surgical site on [Mrs B's] left eye in addition to her foot ulcer management. There were no subsequent GP consultations recorded.

Comment: The standard of GP clinical documentation is poor. Increasing foot pain in the context of known or suspected arterial vascular disease might be indicative of wound infection (including bony involvement) or critical ischaemia (particularly if there was claudication at rest). [Mrs B's] clinical picture might have been complicated by her known spinal stenosis which could also lead to referred lower limb pain. [Dr F] has made no comment regarding his assessment of the vascular status of [Mrs B's] right foot on 9 [Month4] although he might have been reassured by the fact the CNS had recently carried out an assessment and I assume she had not communicated any concerns directly to him or to the vascular service. It is also apparent, based on subsequent hospital notes, that [Mrs B's] pain levels increased significantly from about 9 [Month4] and it is not clear this was communicated by her to the DNS or to [Dr F]. However, I note [Dr F] did prescribe [Mrs B] strong opioid analgesia on 9 [Month4] indicating he was aware there had been at least some deterioration in her pain.

(vii) On 26 [Month4] [Mrs B] attended [the public hospital] for her scheduled surgical outpatient appointment. Notes include: *She has a localised ulcer on her 5th metatarsal head size 0.9x0.9cm* [unchanged from measurement on 10 [Month3]]. *There is black discolourisation over the first and second toes. This represents small scabs from probably ischaemia of the skin. The patient has chronic pain in her leg. She has reduced mobility. She hangs the leg down to try and relieve the pain. Her leg has become swollen and discoloured over the last couple of days. She can't walk much and she has rest pain.* Absent right femoral pulse was noted with Doppler assessment showing monophasic flow over the popliteal tibialis posterior and dorsalis pedis. *I was unable to get any indexes done.* [Mrs B] was admitted to [the public hospital] in preparation for transfer to [DHB2] for urgent revascularisation/stenting. Subsequent events are summarised

in section 2. DHB2 clinical notes: *3/12 worsening right leg pain, 2/52 unable to walk on it, Excruciating rest pain — hangs leg off side of bed to sleep.*

4. Final comments

(i) I recommend expert advice be sought from a vascular surgeon as per section 3(iii).

(ii) It is apparent in hindsight that the DNS may not have fully recognised the significance of the marked increase in [Mrs B's] lower limb pain from around 9 [Month4], and the development of oedema and pallor of her right foot from 18 [Month4]. It is not evident there was any direct communication between the DNS and [Dr F] regarding these issues although the poor standard of his clinical documentation makes it difficult to confirm this**.** I suggest a review of the DNS involvement in [Mrs B's] care be sought from a wound care CNS asking specifically:

a. whether there was an indication for the DNS to perform an ankle:brachial index at any point to assist in specialist triage

b. whether [Mrs B's] reports to the DNS of increasing leg and wound pain should have been reported directly to the surgical specialist or GP, particularly after 9 [Month4]

c. whether the pallor and oedema recorded by DNS as being observed in [Mrs B's] right foot from 18 [Month4] should have been reported directly to the surgical specialist or GP

d. any other comment on the DNS involvement in [Mrs B's] care

(iii) As discussed above I feel [Dr F's] standard of clinical documentation departed from expected standards to a moderate degree. I am mildly critical that he did not provide additional clinical information to the DHB by way of a referral supporting the podiatrist's initial referral in early [Month3] — providing background of [Mrs B's] increasing lower limb pain and her co-morbidities may or may not have influenced the triage priority. There was perhaps a missed opportunity for [Dr F] to attempt to expedite [Mrs B's] specialist appointment when she presented with increased limb pain on 9 [Month4], sufficient to require strong opioid analgesia, and there is nothing in the clinical documentation to suggest he sought to exclude critical limb ischaemia as a cause for the increased pain at this time. However, I think he appropriately involved both the podiatrist and the DNS in [Mrs B's] care and he was likely to have been somewhat reassured by the DNS observation that [Mrs B's] ulcer remained stable in [Month3] and [Month4], and the lack of any apparent concern expressed directly from the DNS regarding [Mrs B's] progress."

Further advice was obtained from Dr Maplesden:

"I have reviewed additional information provided by [Dr F] since my initial advice dated 7 July 2015: response from [Dr F] dated 4 November 2015; copy of

[Mrs B's] computerised notes (used in conjunction with the handwritten notes commented on in my initial advice).

1. The computerised notes have been used to record [Mrs B's] regular prescriptions when provided, and also diabetes 'annual review' templates. On 29 January 2014 provider DN has recorded: *Foot test sensation excellent, dorsalis pedis pulses good, posterior pulse faint both feet ...* Another diabetes review template was completed (filed by DN) on 2 October 2014 in which foot circulation is categorised as 'normal' bilaterally. These assessments were undertaken prior to [Mrs B] developing her right foot ulcer.

2. On review of the diabetes annual review documentation, HbA1c results and long-term medication list, I have no particular concerns at [Dr F's] general management of [Mrs B's] diabetes or other co-morbidities.

3. I remain of the view that [Dr F's] clinical documentation was suboptimal, although with the extra information provided on the computerised notes I think the standard represents a mild to moderate, rather than moderate, departure from expected standards. This relates particularly to the consultation of 9 [Month4]. I refer [Dr F] to Indicator 21 of the RNZCGP Foundation Standards interpretation guide (rnzcgp.org.nz) and to MPS guidance on what constitutes a good clinical record (http://www.medicalprotection.org/uk/advice-booklets/an-mps-essential-guide-to-medical-records/what-makes-good-clinical-records).

4. Additional comments on [Dr F's] care of [Mrs B], as per s4(iii) of my original advice, remain otherwise unchanged."