Registered Nurse, Ms B

A Medical Centre

# A Report by the Health and Disability Commissioner

(Case HDC04/03355)



Consumer
Complainant/Consumer's mother
Provider/Registered nurse
Provider/General Practitioner and Director, the medical centre
Paediatrician
Specialist endocrinologist
Practice Nurse

### **Parties involved**

# Complaint

On 5 February 2004 the Commissioner received a complaint from a Health and Disability Consumer Advocacy Service on behalf of Ms A about the care provided to her son, Baby A. The following issue was identified for investigation:

• The circumstances surrounding the administration of an overdose (250mg instead of 25mg) of testosterone enanthate by injection to Baby A by Ms B, registered nurse, on 20 December ...

An investigation was commenced on 3 June 2004.

# Information reviewed

- Information from:
  - Ms A
  - Ms B
  - Ms F
  - Dr C
  - Dr D
  - Dr E
- Baby A's clinical records from Dr C
- The ACC medical misadventure file relating to Baby A
- Independent expert advice obtained from Ms Rosemary Minto, registered nurse, and Dr Roland Broadbent, paediatrician

3 May 2005



# Information gathered during investigation

#### Background

On 10 July, when Baby A was a few weeks old, his mother, Ms A, took him to her general practitioner, Dr C, at the medical centre, because Baby A had lost weight, was lethargic and had been vomiting for four days.

Dr C noted that up until that time Baby A had been thriving and his weight was 3210gms (7lbs 1oz), but at the time of the visit he appeared dehydrated. Dr C was aware that Baby A's older brother was under the care of the District Health Board paediatric endocrinology clinic for the congenital condition adrenal hypoplasia. Dr C referred Baby A to the paediatric endocrinology clinic for further assessment of his symptoms. He was diagnosed as also suffering from congenital (X-linked) adrenal hypoplasia and was admitted to the public hospital paediatric unit.

The condition that affects Baby A and his brother is extremely rare. It is inherited in males from a gene carried by the mother, and involves a lack of adrenal gland development and pubertal failure. Boys with this disorder cannot produce the steroid hormones needed for survival and need lifelong treatment with these. In addition, they do not produce testosterone in sufficient quantities and require supplementation at puberty.

Baby A was discharged from the paediatric unit when his electrolytes had been normalised and he was feeding normally. He continued to progress well and Dr C consulted Dr D, the DHB paediatrician, about Baby A's need for increased corticosteroids prior to his National Immunisation Schedule vaccinations. Dr D recommended that Dr C prescribe corticosteroids if Baby A appeared unwell or showed signs of irritation in relation to the vaccines.

Baby A was seen regularly at the general practice for routine monitoring and his vaccinations. On 10 October he was seen again by Dr D at the public hospital paediatric clinic. At this time his condition appeared to be well controlled with regular medication. His genitalia and general growth were reported as normal. He was having routine blood tests and fortnightly checks by the paediatric community nurses.

#### Dr E's assessment

On 17 November Dr E, a specialist endocrinologist based in a hospital in another city, visited the public hospital and saw Baby A. Dr E stated that one of the effects of congenital adrenal hypoplasia is a very small penis, which can result in the child being teased, and may cause social problems at school. Because of this it is conventional to offer parents the option of a short course of testosterone to normalise phallus size, with further testosterone given at puberty, to mimic the puberty other boys are going through.

Dr E recommended that Baby A receive three 25mg injections of testosterone enanthate one month apart.



2

Dr E recalled:

"In [my city] GP nurses administer testosterone and I gave [Ms A] a prescription to fill in and take to the nurse. I had not realised that [Dr D] prefers to give the injections at [the public hospital] to minimise the risk of inadvertent doses being given. ...

I made no reference to prescribing testosterone as I do not usually do so in [my city]. My standard practice is to write the prescription and ask the parents to fill it and take it to the nurse. I always emphasise the need to check the dose administered as it is very easy to give [250mg] rather than [25mg]. I should have commented in the letter [of 17 November ... to [Dr C] that [Baby A] was to receive 25mg of testosterone IM monthly and if I didn't it was an oversight."

On 17 November, Dr E dictated a letter to Dr D, copied to Dr C, to confirm his assessment of Baby A and his brother, but did not comment in the letter on the need for Baby A to receive testosterone or the dosage. Because of administration delays Dr E's letter was not received before the prescription for the testosterone was filled and administered.

Dr E explained the lack of any specific instructions with the prescription:

"It has never been the practice of our endocrine service to provide instructions other than on the prescription with the dose and route of administration. This is not a difficult drug to administer and all it takes is care in drawing up the correct dose. This is surely true for all IM medications administered. The instructions I gave have been confirmed as clear and I remain to be convinced extra instructions can prevent such accidents occurring. I would have thought much more dangerous medications should have such instructions but this is not usually the case (morphine is a classic example). We prescribe testosterone at these doses every week in [my city] (and other centres) without extra instructions to GP nurses. Over the past 4 years we have not been notified of any overdoses (since [Baby A's] unfortunate event).

... I am confident my treatment was appropriate and occurred not only in the best interests of [Baby A] but after discussion with his mother ..."

Dr D sent no written instructions to Dr C. He advised ACC that Dr E had discussed with him giving testosterone and "we were planning to give Baby A three injections one month apart of 25mg of Testosterone Enanthate". Dr D said it had never been his intention that Baby A be given testosterone injections by Dr C or his staff.

#### First injection of testosterone – November

Staff at the public hospital paediatric clinic gave Ms A the prescription for testosterone written by Dr E. She took the prescription to a community pharmacy to be filled. The prescription read:

"Med: Testosterone enanthate 250mg/ml 1 ml Amps PF Sig: GIVE 0.1ml (25mg) monthly by injection as directed Repeats: 2."

Ms A took the box of testosterone to the medical centre on 21 November for it to be administered, as instructed. Baby A was administered testosterone via injection by practice nurse Ms F.

Baby A's clinical records from the medical centre for 21 November record:

"IM testosterone 25mg given L) Vaslac."

This entry is initialled, indicating that it was made by Ms F. Ms A recalls that the nurse "rang up the hospital to get instruction on how to give the injection".

Ms F informed me that to the best of her recollection, she received a written instruction from Dr C to administer a dose of testosterone to Baby A. She entered the information about the dose and the site of the injection in Baby A's notes. Ms F recalled:

"I do not believe that I discussed the administration of testosterone to [Baby A] with [Dr C]. This was because the administration of IM injections to patients in our practice was a routine part of our duties and I had a clear understanding of what was required."

Dr C's recollection is that when Baby A came for his injections he did not see him, rather his nurse "arranged everything and I was informed that he [Baby A] was going to get testosterone and that he should only be given 0.1ml of an adult dose. The first dose was given by the nurse on 21 November ... I saw him [Baby A] briefly on 6 December ..."

#### Second injection of testosterone – December

On 20 December, Baby A received a second injection of testosterone from another practice nurse at the medical centre, Ms B. Ms B incorrectly administered 250mg of testosterone enanthate instead of 25mg – ten times the dose he should have received. The events surrounding the administration of the wrong dose are set out below.

Ms A returned to the medical centre with Baby A for his second injection of testosterone. Ms B was one of the registered nurses working at the surgery that day. She had been employed by the medical centre as a part-time practice nurse for six months. She was responsible for seeing patients coming to the surgery that day.

Ms A gave Ms B the box containing the testosterone enanthate, obtained from the pharmacy. Ms B said she was not familiar with the drug.

4

Names have been removed to protect privacy. Identifying letters are assigned in alphabetical order and bear no relationship to the person's actual name.

She recalled:

"I obtained [Baby A's] written notes as our patient notes were not then computerised and looked for information relating to this injection. I did not find any information, only an entry documented by another practice nurse who had administered the first injection of testosterone enanthate one month earlier. This nurse had previously been a paediatric nurse and had been familiar with the drug.

I proceeded to ask [Ms A] about why we were giving [Baby A] these injections and she informed me that [Baby A] had a congenital condition for which his paediatricians had decided to give a course of three injections of testosterone.

As documented, [Ms A] confirmed that [Baby A] had had his first injection of this one month earlier and she informed me that there had been no problems. [Ms A] had verbally consented to [Baby A] having his second injection of testosterone, so I did a pre-vaccination check to ensure that he was well on the day, and took the pharmacy dispensed box containing the ampoule of testosterone to another registered nurse to ask her to check it with me, which she proceeded to do. (I did not ask her to check the amount of the drug in the syringe when drawn up against the instructions in the box.)

The instructions for administration of the testosterone were written on the pharmacy dispensed box. I did not have a copy of the original prescription at the time endorsed by the prescribing doctor. However, I did not realise that I needed this. In past times the prescription instructions on the pharmacy dispensed box were all that had been used by our practice nurse, and my understanding was that this was acceptable as the prescription instructions were on the box written by a registered pharmacist. As this was the second injection to be given, I did not realise I required a copy of the original prescription with repeat medications. ...

Having read the instructions of the pharmacy dispensed box and checked the Ampoule, and having ascertained that I had the right patient, drug, dose, needle size for correct route of administration, checked the drug had not expired, I proceeded to draw up the drug into the syringe, and administered the injection to [Baby A's] vastus lateralis muscle.

I advised [Ms A] to remain with [Baby A] under observation for 20 minutes post vaccination [sic] which she did.

As I had further patients waiting, I continued to see those waiting, in the cubicle next to [Ms A] and [Baby A]. After waiting 20 minutes, I checked [Baby A's] leg. A little of the testosterone had oozed from the site of the injection, but otherwise [Baby A] seemed fine, and [Ms A] was happy to take him home. I helped her to her car with [Baby A] and his baby gear and advised her to call if any concerns should arise.

I then returned inside to document the event. I read the label on the box again and it was then that I realised I had administered an overdose of the drug. I had originally misread the amount to be given.

The mistake of the overdose occurred because I misread the amount of drug to be given on the Pharmacy dispensed instructions on the box.

I was not being supervised as such, but was working alongside a more senior registered nurse, as well as having the patient's general practitioner in the building. The other registered nurse was on phone duties on the morning concerned, as it was our practice to have one nurse seeing incoming patients, and one nurse taking telephone consultations, as only two nurses were rostered on at any one time."

#### The medical centre medication policy

In response to my provisional opinion, Dr C, as Director of the medical centre, informed me that all nurses employed at the medical centre are allocated a senior nurse as their mentor and to orientate them to the practice. The senior nurses always make clear to the junior nurses that any situation they consider outside their scope of practice should be referred to one of the general practitioners. Dr C believes that this was common practice in most medical practices in New Zealand at the time of these events. The medical centre's medication policy has always been that all medications being administered are to be checked by another senior staff member, either a senior nurse or one of the doctors. However, in December, the medical centre did not have a written policy that required either a signed general practitioner's order or a copy of the prescription in the clinical records before the medication was administered. Rather, it was "reasonably expected" that the nurse would abide by "reasonable nursing practice", ie, she would ask the general practitioner if she was unsure. Dr C stated that Ms B was aware of these policies and expectations.

Dr C informed me that the usual practice when a patient arrives at the medical centre without a prescription, would be for staff to check the clinical records to verify the prescribing of the medication. It is important to identify the source of the prescription, that it had been prescribed by a registered medical practitioner, and for the person administering to understand the reason for the medication being prescribed and that there are no contraindications to it being given. The *New Ethicals Catalogue* is available in the surgery for staff guidance on drug therapy, and the patient's clinical notes should be consulted to ascertain and clarify what is required before any medication is administered. It is expected that the person administering will consider the administration from within his/her scope of practice and, if unsure, seek further information, for example from the patient's general practitioner.

#### Clinician's response to overdose

Ms B immediately informed the other practice nurse of her mistake, and Dr C was informed. Dr C contacted Dr D to inform him of the medication error and ask his advice. Dr C recalled:



6

"I immediately telephoned [Dr D] the paediatrician, and discussed this with him. The testosterone is a slow release formulation and I thought it may have been possible to remove some of this from [Baby A's] buttock had it been of great danger to him.

[Dr D] felt this was not required – while he did not feel the adult dose given was an ideal situation, he did not think it would cause great harm to [Baby A]. I immediately telephoned [Baby A's] mother, [Ms A] and notified her of the error in dosage and apologised for this. I advised her that if there were any problems to contact either myself or [Dr D]."

An 'Accident Investigation' form was completed detailing the circumstances of the medication error.

Ms B informed me:

"I phoned [Ms A] several days later to sincerely apologise for the mistake I made. Being a mother myself, I could only imagine what she was feeling, but I was and am so deeply sorry for my actions.

As a practice, the doctors and all practice nurses working at [the medical centre] at the time, met to discuss what happened. I filled out an incident form which the doctors decided to keep on file at our practice."

On 21 December Dr D wrote to Dr C and stated:

"I have discussed the problem with [Baby A] having received 250mg of testosterone enanthate instead of 25mg. [Dr E] had intended him to have 3 injections one month apart of 25mg but having received 250mg, he should have no further injections.

Subsequent to the injection, he has been irritable and quite angry and often inconsolable. This is an unfortunate but expected side effect and exacerbated by the large dose. It may also continue on for 2-3 weeks.

A rare but possible side effect is painful erection, which can be difficult to manage and may need ice packs. If he is extremely upset, his penis needs to be checked to ensure that he doesn't have a painful erection. Otherwise he needs comforting cares and possibly paracetamol until things settle."

Dr E informed me:

"[Dr D] informed me of the overdose soon after it occurred. I discussed with him the major complication (priapism or permanent painful erection) and the use of ice or cool compresses to reduce this. Treatment is otherwise symptomatic and will last until the testosterone degrades (~3 weeks).

As to the use of testosterone in infants - it is standard practice to give testosterone to boys with small phallus and the dose is usually 25mg monthly for three months."



<sup>3</sup> May 2005

#### Effects of testosterone overdose

Dr C informed ACC of his subsequent assessment of Baby A:

"I understand that [Baby A] was notably irritable for several weeks after the injection – this would be what one would expect as it is an uncomfortable injection and he was given a large dose for a baby. When I saw him on 1 February ... he did seem to be growing some pubic hair which one would not expect at his age. I hoped this would settle as the hormone surge left his body. However, I have not seen him since this date and have no further information on his progress."

Dr E advised me:

"It should be pointed out that (according to a recent communication with [Dr D]) [Baby A] did not have priapism at any time after presenting to [Dr D] following the overdose. ...

The irritability [Baby A] suffered could well be more due to the irritant and pressure effect of the injected testosterone. Testosterone is a very viscous fluid and older boys have said it is painful. Indeed we do suggest non steroidal drugs such as ibuprofen or diclofenac to be taken 6 hours prior to the injection to reduce the discomfort when full doses are given (advice given to us by our pain service). I have personally seen one sterile abscess from testosterone injection although this was in a boy receiving 4 times the usual adult dose to reduce his final height."

#### Actions taken following this case

#### Dr C

In response to my provisional opinion, Dr C advised:

"As a result of this incident [the medical centre] now require all medications, other than Vitamin B12 injections, to have either a signed General Practitioner's order or a copy of the prescription in the clinical records. We have also improved our policies and procedures in the areas of consent and in ensuring that we have more thorough checking of medication that is to be administered."

#### Ms B

Ms B informed me:

"Several months after this incident, I enrolled in a vaccinators training course, which I successfully completed and passed, qualifying me as an independent vaccinator, which I am currently, having renewed this qualification.

As well as the above training, I have written the Immunisation policy and protocol for our practice, as well as the Pre-immunisation/Vaccination check lists. I have written an immunisation/vaccination consent/declination form which we use on a daily basis. I have also written the Offsite Immunisation protocol (Service Plan) and check list which has been acknowledged by [...] (medical officer), and my local IPA [Independent Practice Association] have distributed it to other general practices as a resource tool.

I also spoke with my local IPA regarding the need to only administer a drug with a copy of the original prescription endorsed by the prescribing doctor and their immunisation co-ordinator and pharmacist formulated a proposal to [our region's district health board], to propose that any medication prescribed by a [district health board] doctor or visiting specialist, to be administered in general practice, provide a covering letter of explanation as well as a copy of the original prescription endorsed by the doctor involved. This practice has not previously been occurring and I understand this proposal has been presented to [the district health board].

Two nurses now always thoroughly check all medications to be administered within our general practice, including the 'drawn-up' drug in the syringe, if appropriate.

Since the incident, I personally do not administer any medication of any type unless I have adequate information provided, and a thorough understanding of why we are administering any particular drug. I feel that I have become a much more thorough and conscientious nurse, and practice safely at all times. I have sought further knowledge on immunisation/vaccination in order to provide an all-round better service to our patients and hopefully to prevent any such incident for ever happening again.

I deeply regret my actions. They were an unintentional mistake and I desperately wish I could undo the past. I am indeed deeply sorry for the pain and upset I caused to both [Baby A] and his Mum from this drug error."

#### Independent advice to Commissioner

The following expert advice was obtained from Ms Rosemary Minto, independent registered nurse:

"Complaint: The circumstances surrounding the administration of an overdose (250mg instead of 25mg) of testosterone enanthate by injection to [Baby A] by [Ms B], registered nurse, on 20 December ...

I, Rosemary Minto, have read and agreed to follow the Guidelines for Independent Advisors as described in the documentation I have received from the Office of the Health and Disability Commissioner.

I am a Registered General Obstetric nurse, having graduated from Tauranga Hospital School of Nursing in 1983. I received a Post-Graduate Certificate in Advanced Nursing Practice – Practice Nursing in 2002 and have been a full time practice nurse since 1997 with accreditation from New Zealand Nursing Organisation in 2000. I am certified as an Independent Non-Medical Vaccinator. My experience covers caring for families across the life span.

My instructions from the Commissioner are to comment on the questions below after examining all the written evidence provided for me. My opinions are based on the assumption that as a registered nurse, [Ms B] should be conversant with the relevant legislation and standards informing her practice.

Expert Advice Required: To advise the Commissioner whether in my opinion:

#### [Ms B] provided [Baby A] with services of an appropriate standard.

In particular:

- What standards apply in this case?
- Was it reasonable, in these particular circumstances, for [Ms B] to administer the testosterone enanthate to [Baby A] in the absence of any written documentation about the treatment?
- If not, what should she have done?
- Did [Ms B] follow accepted practice when she administered the testosterone to [Baby A] on 20 December ...?
- If not, what should she have done?
- Were [Ms B's] actions appropriate when she discovered that she had administered an incorrect dose of testosterone to [Baby A]?
- If not, what else should she have done?

In addition:

- Are there any other professional, ethical and other relevant standards that apply and, in your opinion, were they complied with?
- Any other comments you consider relevant that may be of assistance?

I have examined the following list of information:

#### **Supporting Information:**

- Letter of complaint forwarded to the Commissioner by [a Health and Disability Consumer Advocacy Service] on behalf of [Ms A] (mother of [Baby A]) on 3 February 2004, marked with an 'A' (Page 1)
- Notes taken during a telephone conversation with [Ms A] on 30 March 2004 marked with a 'B' (Pages 2 & 3)
- Copy of prescription for testosterone enanthate for [Baby A] received from [a pharmacy] on 3 May 2004, marked with a 'C' (Pages 4 & 5)
- Letter of response and supporting documentation received from [Dr C], general practitioner, on 17 May 2004, marked with a 'D' (Pages 6–18)



- Letter of response and supporting documentation received from [Ms B] on 21 June 2004, marked with an 'E' (Pages 19–48)
- Letter of response from [Dr E], specialist endocrinologist, received 28 June 2004, marked with an 'F' (Pages 49 & 50)
- Copy of ACC file relating to [Baby A], received 14 June 2004, marked with a 'G' (Pages 51–82)
- Letter of response received from [Ms F], registered nurse, on 2 July 2004, marked with an 'H' (Page 83)
- Letter of response received from [Dr C] on 7 July 2004, marked with an 'I' (pages 84 & 85)

#### Did [Ms B] provide [Baby A] with services of an appropriate standard?

From the evidence given to me it appears that [Ms B] did **not** comply with the standards and legislation that inform the safe and professional practice of a Registered Nurse and so did **not** provide a service of appropriate standard to [Baby A].

#### 1. What standards apply in this case?

The Standards that applied in this case are:

Standards of Practice for Practice Nurses (NZNO 2001):

Standard One: Practice Nurses are accountable for their actions.

- **1.1.1** Practice nurses work within their scope of practice, based on current nursing knowledge, judgement, experience and competence.
- **1.1.7** Practice nurses practice within relevant legislation.

Standard Two: Within their scope of practice, Practice Nurses are responsible for the safety and well being of their client group.

Also relevant are:

Nursing Council of New Zealand Competencies for Registering as Comprehensive Nurse:

# 4.0 Management of Nursing Care:

#### Generic Performance Criteria

**4.5** Uses professional judgement, including assessment skills, to assess the client's health status and to administer prescribed medication and/or to consult with the prescribing practitioner and/or to refer client to other health professionals.

#### 6.0 Legal Responsibility

The applicant practices nursing in accord with relevant legislation and upholds client rights derived from that legislation.

#### Generic Performance Criteria:

- 6.5 Ensures that legislation governing medicines is upheld.
- **6.6** Administers interventions, treatments and medications within legislation, codes, and scope of practice and according to authorised prescription, established policy and guidelines.

#### And

#### Nursing Council of New Zealand Code of Conduct:

#### **Principal Two**

The nurse or midwife acts ethically and maintains standards of practice:

- 2.3 is accountable for practising safely within her/his scope of practice;
- **2.8** observes rights and responsibilities in the prescription, possession, use, supply, storage and administration of controlled drugs, medicines and equipment;

The Medicines Act 1981, Part 2: 18 is also relevant to this case and advice:

Administering prescription medicines -

(1) A prescription medicine may be administered to any person only in accordance with

(a) The directions of the authorised prescriber who prescribed the medicine; or

(b) A standing order.

(2) Despite subsection (1), a prescription medicine may be administered where permitted by section 25 or by regulations made under this Act.

(3) Every person commits an offence against this Act who contravenes subsection (1).

(4) In this section, "authorised prescriber" means a practitioner, registered midwife, or designated prescriber.

# 2. Was it reasonable, in these particular circumstances, for [Ms B] to administer the testosterone enanthate to [Baby A] in the absence of any written documentation about the treatment?

In my opinion based on the information received, the Medicines Act 1981 and the Standards as described above; it was **not** reasonable for [Ms B] to give the testosterone enanthate. As a practice nurse without paediatric experience, as she has stated in her statement (see E Pages 19–48), she was practising outside her scope of

practice and contravening the Medicines Act (1a). She failed to meet the Standards of Practice Nursing and Nursing Code of Conduct.

#### What should she have done?

Under the Medicines Act, she should have contacted the authorised prescriber of the medication she was expected to administer in the absence of documentation from that prescriber in the patient's notes.

As there was no documentation available from the prescriber as evident from the supporting documentation, the next action should have been for [Ms B] to seek the advice of the general practitioner (GP) for whom she worked. The GP is an authorised prescriber who could have advised her what actions to take. In my experience that is how practice nurses verify medications that they are not familiar with prior to administering them.

# **3** Did [Ms B] follow accepted practice when she administered the testosterone to [Baby A] on 20 December ...?

[Ms B] did **not** follow accepted practice when she administered the drug.

Although she checked the drug with another Registered Nurse (RN) and in particular that the drug expiry date and needle size were correct, she did not check that the dose that she had drawn up into the syringe was the correct dose.

She could not check that the drug was the correct drug, as she did not have the original prescriber's prescription or instructions to do this against.

#### What should she have done?

[Ms B] should have ascertained that she had the correct drug for the patient by contacting the prescriber or at least spoken to an experienced prescriber in the practice i.e. the GP.

[Ms B] should also have checked with another RN that she had drawn up the correct dose and volume in the syringe prior to administering it.

[Ms B's] documentation was also lacking post injection. There was no mention of: The authorised prescriber Details around the post injection care Condition of the patient or reason for the injection Documentation of the expiry date, batch number of the drug or needle size used.

Were [Ms B's] actions appropriate when she discovered that she had administered an incorrect dose of testosterone to [Baby A]?

3 May 2005

[Ms B's] actions were appropriate after making the discovery of the mistake. Her other option would have been to notify the general practitioner for whom she works herself but according to the notes she was not capable of doing that.

She also contacted the patient and apologised in person for the error.

#### References

Medicines Act 1981. http://www.legislation.govt.nz

Nursing Council of New Zealand (NCNZ). (2001). *Code of Conduct for Nurses and Midwives*. Wellington: NCNZ

Nursing Council of New Zealand (NCNZ). (2002). *Competencies for Entry to the Register of Comprehensive Nurses*. Wellington: NCNZ

NZ College of Practice Nurses, New Zealand Nurses Organisation (NZNO) (2001). *Standards of Practice for Practice Nurses*. Wellington: NZNO"

# **Responses to Provisional Opinion**

#### Ms A

Ms A informed a member of my staff on 16 March 2005 that she wanted Ms B and the medical centre to acknowledge their mistake and to "make sure that it doesn't happen again".

#### Ms B

Ms B informed a member of my staff on 21 March 2005 that she had read the provisional report, was satisfied that it had been a thorough investigation and the facts were accurately reported, and accepted the decision.

#### The medical centre

Dr C for the medical centre informed me:

"The nurse involved in this complaint ... was not a new nurse. She had been mentored, and would have known that any question that she was unsure about should go back to the general practitioner for comment. We have always taken a proactive role with our nurses, and are available to discuss any queries that they have, with them.

If, recognising that the medication that she had been asked to give was not in accordance with the usual practice at the clinic, [Ms B] had asked a general practitioner, the over-dosing would not have occurred.



In saying that, any policy can be improved upon, and this is now why [the medical centre] has created the new policy that we have advised you of. It is also a difficulty that in this case the instructions on the box from the pharmacist were not clear, and we have now also advised the pharmacy that for every drug administration we need a copy of the prescription and not just the drug in its packaging."

#### **Code of Health and Disability Services Consumers' Rights**

The following Rights in the Code of Health and Disability Services Consumers' Rights are applicable to this complaint:

#### RIGHT 4

Right to Services of an Appropriate Standard

- 1) Every consumer has the right to have services provided with reasonable care and skill.
- 2) Every consumer has the right to have services provided that comply with legal, professional, ethical, and other relevant standards.

#### **Opinion: Breach – Ms B**

Rights 4(1) and 4(2) of the Code of Health and Disability Services Consumers' Rights (the Code) state that a patient has the right to have services provided with reasonable care and skill and that comply with professional standards.

#### Administration of testosterone enanthate – 20 December

Ms B was the practice nurse seeing patients on 20 December, when Ms A brought Baby A to the medical centre for his second testosterone injection. Ms A was following the instruction given to her by Dr E at the public hospital, and brought with her the box of testosterone enanthate dispensed by the pharmacy.

Ms B was not familiar with the medication and was unable to locate any instruction or documentation about the prescription of the drug in Baby A's clinical records. There was a notation made by Ms F, who gave Baby A his first injection on 21 November. Ms B believed that it was acceptable clinical practice to follow the prescription instructions on the pharmacy box, as they were written by a registered pharmacist. She said that she had seen this practice being followed by other staff.

Ms B read the instructions on the box containing the medication, checked the ampoule, and asked the second registered nurse on duty to double check the drug, its expiry date, and that

<sup>3</sup> May 2005

she had the correct needle size. She did not ask her to check that the dose she drew up in the syringe was correct. After administering the medication Ms B advised Ms A to wait in the cubicle with Baby A for 20 minutes to ensure that he did not react to the drug. After that time Ms B assisted Ms A to take Baby A out to her car.

Ms B then documented that she had administered the testosterone to Baby A. In doing so she checked the medication box again and, as she did so, discovered that instead of giving 0.1ml as indicated on the instructions on the outside of the box, she had given Baby A 1.0ml. This meant that she had given Baby A 250mg instead of 25mg (ten times the dose). Ms B immediately reported her error to the senior nurse and, through her, to Baby A's doctor, Dr C.

My independent nurse advisor, Ms Minto, noted that in accordance with the 'Standards of Practice for Practice Nurses' (New Zealand Nurses Organisation, 2001) and the Nursing Council of New Zealand Code of Conduct, nurses are accountable for their actions and for practising safely within their scope of practice. Ms B did not comply with Standards One and Four of the Standards of Practice for Practice Nurses (NZNO 2001) or Principle 2 of the Nursing Council of New Zealand Code of Conduct. Ms Minto stated that it was not reasonable for Ms B, in the absence of documentation from the prescriber in Baby A's notes, to administer the testosterone because she did not have the original prescription or instructions to check against. In the absence of this documentation, Ms B should have verified the prescription with the authorised prescriber and obtained clear instructions before proceeding. Failing that, she should have sought advice from Dr C. Ms Minto noted that Ms B had no paediatric experience and was not familiar with the drug. Accordingly, she advised that Ms B was working outside her scope of practice, based on her nursing and educational knowledge and experience, when she gave the drug without seeking further information.

My advisor also noted that Ms B did not follow accepted practice when she administered the drug. Although she checked the drug ampoule, expiry date and needle size with another registered nurse, she should also have checked that she had the correct dose and volume in the syringe before administering the medication.

My advisor further noted that Ms B's documentation post-injection was not of an appropriate standard because it did not mention a number of important details including the authorised prescriber, the expiry date, batch number of the drug and needle size used.

I accept my expert advice. In my view, Ms B did not take reasonable care or comply with the standards expected of a registered nurse when she administered an overdose of testosterone to Baby A on 20 December. Accordingly, she breached Rights 4(1) and 4(2) of the Code.



# **Opinion: No Breach – The Medical Centre**

#### Vicarious liability

Under section 72(2) of the Health and Disability Commissioner Act 1994, employers are responsible for ensuring that their employees comply with the Code and may be vicariously liable for an employee's failure to do so. Under section 72(5) it is a defence for an employing authority to prove that it took such steps as were reasonably practicable to prevent the conduct that breached the Code.

As an experienced registered nurse it was Ms B's responsibility to check the correct dosage of the drug and that the medication had been appropriately prescribed, and to decide whether the drug being administered was within the scope of her practice. Although the medical centre should have had in place a policy regarding administration of medication without the actual prescription, I am satisfied that the usual practice at the medical centre was for the administering nurse to check any unusual medications (such as testosterone prescribed for an infant) with the patient's general practitioner. Accordingly, the medical centre is not vicariously liable for Ms B's breaches of the Code.

# Actions taken

Ms B took appropriate actions once she realised her mistake. She immediately notified her colleagues, and soon afterwards she apologised in person to Ms A. Ms B has undertaken further training in administering medication. She has also written vaccination/immunisation policies and protocols to provide guidance for other nurses in general practice. These have been promulgated by the local Independent Practice Association, and recommended to the DHB for consideration. I commend Ms B on these actions.

As noted above, the medical centre has amended its policies and procedures to ensure more thorough checking of medication that is to be administered. It is also now a requirement that all medications have either a signed general practitioner's order or a copy of the prescription in the clinical records.

# **Follow-up actions**

- A copy of this report will be sent to the Nursing Council of New Zealand.
- A copy of this report, with details identifying the parties removed, will be sent to the Paediatric Society of New Zealand, and will be placed on the Health and Disability Commissioner website, www.hdc.org.nz, for educational purposes.