Monday, 12 November 2012

(9.00 am)

(Delay in proceedings)

(9.18 am)

DR ROBERT SCOTT-JUPP (called)

Questions from MS ANYADIKE-DANES

THE CHAIRMAN: Good morning. I understand that not everybody is here yet, but we have to get started. Dr Scott-Jupp is available to us until 4 o'clock today. After today, I understand that he is not available again until early December, so I would very much like to get through his evidence as completely as we can today.

Ms Anyadike-Danes?

MS ANYADIKE-DANES: Thank you. Dr Scott-Jupp.

Good morning, doctor.

A. Good morning.

Q. Do you have a copy of your CV there?

A. Yes.

Q. Before we turn to that, you have provided three reports for the inquiry. Just for reference, 234-002, 234-003 and 234-004, the first of which was 20 May 2011, then 12 June 2012 and then 7 September 2012.

I'm going to ask you if you adopt them, but I understand there might be an issue in relation to the second one to do with phenytoin.

A. Yes.
Q. Absent that, do you adopt those reports?
A. Yes, I do.
Q. Perhaps then we can look at the second report. It arises at 234-003-002, which is your description of the phenytoin. I think the upshot of it is about three-quarters of the way down in that first substantive paragraph. You say:

"I conclude therefore that the 110 ml recorded at 23.00 was indeed the loading dose."

It's just a little bit further down than that pointer, about five lines up from the bottom.

A. Yes.
Q. Just so that we put it in its context, the direction in relation to the stat dose of phenytoin is to be found at 090-022-054. And you can see there that the suggestion is for "IV phenytoin 18 milligrams per kilogram, stat" and is to be followed by an amount 12-hourly.

Dr Aronson's evidence says that "stat" means, effectively, forthwith; would you accept that?

A. Yes.
Q. And then Dr Stevenson's calculation for the loading dose is to be found immediately under that, which was an incorrect calculation, but in any event there it is at

632.

Then one sees the prescription for it, 090-026-075. You can see the phenytoin, the second line on the "once-only prescriptions", "635, 2.45 pm, IV". The time of administration is given at "2.45". It's signed by Dr Stevenson and his initials appear there as having given it.

If we look at the nursing notes, 090-040-141, and flip those around, you can see after "8 pm":

"Stat dose IV phenytoin at 2.45."

Do you see that there? And then finally, there is a clinical note from Dr Webb when he examines Claire at 17.00, and one sees that at 090-022-055. Under "17.00":

"Claire has had a loading dose of phenytoin."

In the light of that, would you like to reconsider your conclusion that the amount that was given at 2300 hours was in fact the first dose and the loading dose?

A. Yes. That was clearly an error on my part, for which I apologise. I was asked to look at it from the context of the fluid balance chart. There was no entry on the fluid balance chart indicating an infusion at the time when the loading dose was apparently given according to the medical notes, and the prescription chart, so that's why I overlooked it. Clearly, because a phenytoin blood

level had been taken at, I think, about 9.30 pm, and it was already 23, then there must have been a loading dose given prior to that. So that was an error, for which I apologise.

Q. No, no, you mean because of the levels of her phenytoin, it was clear she must have had some phenytoin before then.

A. Exactly. So even if all these records were incorrect, then she clearly had had phenytoin; there's objective evidence.

Q. And if we go to the fluid balance sheet, I think your point is -- we see it at 090-038-135. And there you see -- it's a bit obliterated, but that phenytoin is alongside 23.00. So although the 110 of phenytoin is identified there and earlier infusions -- the acyclovir, for example, the midazolam -- they're all noted there on that fluid balance chart, but your point is that they didn't note having infused the phenytoin.

A. That's correct. The omission wasn't that they didn't give the phenytoin; the omission was that it wasn't recorded on the fluid balance charts, although it was recorded on the prescription chart.

Q. And would you have expected it to have been there?

A. Yes.

Q. Thank you.

THE CHAIRMAN: On that, doctor, how does that affect then the conclusion at the end of that paragraph?

A. I'm sorry, at the end of which paragraph?

THE CHAIRMAN: In your report at 234-003-002, you've corrected the, five lines up:

"I conclude therefore that the 110 ml was indeed the loading dose."

And then you go on. That leads into a conclusion which you make about the total quantity of fluids which Claire was receiving.

A. Well, I was asked to comment on the total quantity of fluids given between 11 o'clock and 2 am for the purposes of this part of my report, so that still stands because it appears that she was given that 110 ml, I think, later in the evening, irrespective of whether she was the given a loading dose earlier.

THE CHAIRMAN: So the conclusion stands?

A. The conclusion stands. The conclusion about the quantity of fluid still stands.

THE CHAIRMAN: Thank you.

MS ANYADIKE-DANES: And can we just deal with another point, staying with that second report. You say:

"On 23 October 1996, after Claire's acute deterioration, the low sodium result was known and it would have been appropriate to request this and the

request was made by Dr Stewart."

I'm trying to see if I can help you with where we see that.

MR FORTUNE: 003.

MS ANYADIKE-DANES: Yes, thank you.

So that date of 23 October, that would appear to be a typographical error because, in fact, Dr Stewart's note is 22 October. That's when he notes the low sodium result. You can see that at 090-022-056. Right at the top there.

A. Yes. It was just before midnight. That is an error. It should have been the 22nd. I'm sorry about that.

Q. Thank you.

So then if we go to your curriculum vitae. The reference for that is 311-038-001 and you have a copy of it there. You confirm that your current position is that you're a consultant paediatrician at the Salisbury District Hospital and you've been a consultant since 1992. If one looks over, you were also a fellow of the Royal College of Paediatrics and Child Health in 1995. So then that means that, at the time of these events, 1996, you were both a consultant and a fellow of that Royal College.

A. Yes, although I should add that at that time all consultant paediatricians were automatically fellows of

the Royal College of Paediatrics and Child Health.

Q. If one looks at your college activities, you say that you were a National Council member for the Royal College since 2008. And this is to be found at 002. Then, in the second bullet down, you talk about service development and you say that:

"Having pioneered novel working practices, which have enable sustainable and safe 24-hour paediatric cover in [your] own unit."

Can you explain what that is?

A. Yes. There is a problem nationally providing acute paediatric services in light of the fact that doctors hours' of work have been reduced by the European working time directive and there is a need to have 24-hour skilled resident cover for both neonate and general paediatrics. This produced a lot of difficulty in small units such as the one I work in, in sustaining that, given that there are limited numbers of people available, and we just developed a method of combining both trainee, experienced trainee doctors and consultants sharing the out-of-hours work to provide that cover. I have to say, I don't think it's particularly relevant to the Royal Belfast Hospital for Sick Children, which has a much larger tertiary teaching hospital and rather different issues.

Q. Can I ask you just to slow down a little bit so the stenographer can keep up?

What are the differences that you see between your hospital and the teaching hospital here in Northern Ireland?

A. Teaching hospitals have more trainees, they have more paediatricians in training, and therefore have more people available to man the rotas. They still have problems. Even now, it's particularly acute. But the problems are slightly different to what one encounters in a small, isolated district general hospital such as where I work.

THE CHAIRMAN: When you say it's a small unit that you work in, doctor, we've heard evidence that in the mid-1990s the Royal might have had 114 or 120 children staying overnight and an accident and emergency unit. For comparison purposes, what might have been the number of children that you were looking at in the 1990s?

A. Our ward was at that time only up to, I think, about 20, 22 beds on a single children's ward. So it was much smaller, although we did cover the my neonatal unit as well, which wasn't the case with the Belfast hospital.

THE CHAIRMAN: Thank you.

MS ANYADIKE-DANES: Did you have access to a neurology department in your hospital?

A. Yes, but it was not on site; it was -- and still is -- at our local regional tertiary centre in Southampton.
Q. And how far away was that to get to if you required some expertise?
A. 25 miles.
Q. And if you needed a neurological opinion, how would that be arranged?
A. If I needed a neurological opinion, then as now, I, as a consultant, would have contacted the switchboard at Southampton General Hospital and asked them to contact the on-call consultant paediatric neurologist.
Q. And could they come or was it be something discuss over the phone?
A. No, it would be a discussion over the phone and a decision whether to transfer the child or not.
Q. I see. So it wouldn't be a matter of the neurologist coming to you, it would be a matter of do you send the child to the neurologist?
A. That is correct. For less urgent cases, the neurologist could see them in outpatients, but for urgent cases it would be a case of transferring the child there.
Q. And what about the access to EEG, for example, in 1996, how would that be organised for a child in your hospital?
A. For a child in my hospital, we didn't have

a five-day-a-week EEG service and certainly not any kind of emergency service. The technicians came over to do lists of outpatient sessions of children requiring EEGs and, in order to get an urgent EEG done, it would have meant specifically asking the EEG technicians to stop their routine work that had already been planned for that day in order to come to the ward to do an urgent test.

Q. And did that happen?

A. Occasionally, but it was quite a rare event.

MR FORTUNE: Before my learned friend moves on, can we find out whether there was, on site at Salisbury, an EEG machine to which the technicians came or did they have to bring their equipment with them, or alternatively did you have to consider sending the patient to Southampton in an emergency?

A. No, there was a machine on site that was used for outpatients, which was, as I remember, transportable on a trolley and could be taken to the ward if required.

MS ANYADIKE-DANES: In 1996?

A. Yes.

Q. What about a CT scan; did you have one of those at the hospital?

A. A CT scan had been available for some time before that.

THE CHAIRMAN: On the EEG service, you had the machine

constantly available, but not the staff to use it?

A. That's correct, yes.

MS ANYADIKE-DANES: Can I ask you about an expression that I think Dr Steen used? We don't need to pull it up, but the reference is the transcript of 15 October, page 7, line 5. It's "consultant-led service"; what does that connote to you?

A. There has been quite a lot of discussion in recent years amongst paediatricians, and also in other specialties, about the distinction between a consultant-led service and a consultant-delivered service. I think the general understanding is a consultant-led service is the more traditional role, whereby the consultant leads a team, but does not necessarily see every patient and does not get actively involved in a hands-on way with every patient.

A consultant-delivered service is taken to mean where a consultant is available in the hospital and often, in some situations, resident at night in order to be much more immediately available. It implies that there are fewer or less experienced trainee doctors around when one has a consultant-delivered service because the consultant then acts in a way in a more -- as one might put it -- junior level or more hands-on level than in a more traditional consultant-led service.

Q. And what was the service that was provided in 1996 provided from your hospital?
A. In my hospital, it was still, I think, what one would call a consultant-led service in theory, although in practice it turned out being very much a consultant-delivered service. The way consultants worked, certainly in paediatrics, has changed a lot in the last 20, 15 years.
Q. Why do you say:
"In theory, it was a consultant led service, but in practice it turned out to be more of a consultant-delivered service"?
A. Because the resident doctors that we had in place, who were supposed to be competent to manage patients without more senior resident cover, in fact very often weren't very experienced, so in practice the consultant -- although, in theory, not employed to be resident in the hospital -- would frequently have to come in and stay in on a voluntary basis -- effectively, not contracted to do that -- in order to support the inexperienced junior doctor.
Q. Was that a judgment you would make day-to-day as to what you thought the cover was, who you thought your patients were and what you thought might be appropriate and safe in all the circumstances?

A. Exactly. It would depend on how many ill patients there were, what problems were expected and, importantly, on the experience and competence of the resident junior doctor.
Q. Did that depend not just on the experience of the registrar, but the other supporting junior doctors?
A. It would be primarily the registrar, although I have to say in my own unit, on some instances, there was no registrar at all, it was only an SHO, but I don't think that would have happened in Belfast. No, it would be primarily the most senior resident paediatric doctor would be the defining factor.
Q. And if you're talking about coming in and staying over, during the night, if I can put it that way, how many beds was your registrar going to be responsible for?
A. Well, I work in a small unit, which is not comparable to Belfast, so only about 20 inpatient beds plus a neonatal unit.
Q. Without getting reference, I think it's accepted that the registrar on the night of the 22nd, and probably, for that matter, for the night of the 21st, was providing cover to at least about 115 beds --
A. Yes.
Q. -- with some support from junior SHOs. Is that the sort of thing, if you were to transport that back into your

circumstances, would have had you evaluating whether the children that you had in the wards on those nights might lead you to think you should be more in touch at least, given that level of cover?

A. I would guess the situation you're referring to was the case most nights at the Royal Belfast Hospital for Sick Children and so the consultants would have expected that situation, and that would be what was the norm. So it would be difficult for them to decide on how busy it had to be in order for them to decide to stay in whatever, as opposed to coming in specifically to see a particular patient.

Q. What's your attitude to that level of cover?

A. I think it's completely inadequate. Having only one registrar available at night for that number of inpatients, by today's standards, is completely inadequate.

Q. If we forget about today's standards and think about 1996 standards.

A. Yes, even by 1996 standards, I think other Children's Hospitals, as I remember at the time, would have had two registrars or a registrar and a senior registrar simultaneously available at night.

MR FORTUNE: Can we just assist Dr Scott-Jupp because there was no question at the Royal of a consultant staying

in the hospital overnight. It's always been --

THE CHAIRMAN: I think Dr Scott-Jupp understands that. That's why he's saying the level of cover overnight was completely inadequate.

MR FORTUNE: Whilst I'm on my feet, sir, on this related point, Dr Scott-Jupp has told us he's a full-time consultant. In his own hospital at that time, how many consultant colleagues did he have in his department and, secondly, were any of them partially based in the community by terms or by the terms of their contract?

A. Yes. In 1996, there were four of us, so I had three colleagues, two of whom were partially based in the community.

MS ANYADIKE-DANES: Thank you. Who provided cover when they were partially based in the community in your hospital in 1996?

A. We covered each other in that -- yes, I think in 1996 we had already started a system of duty consultant on a daily basis. So for example, on a particular day of the week -- for example, Thursday was always my day and I would never be out of the hospital, even if there was a community clinic or something. It would never be scheduled for my day on the ward and similarly with my colleagues.

Q. When you said you covered each other, was that

explicitly so, so you knew who was going to provide cover for any given consultant who was conducting a clinic in the community?

A. Yes, because it was specifically by day of the week. So if for any reason I was not available on what was my cover day, I would specifically ask a colleague to cover me for that duration.

Q. Thank you. If I might move on and ask you about a file that relates to other children that were on the ward, their medical notes and records, which we call file 150. It won't come up on the screen, but we have it in hard copy for you to look at. (Handed).

A. Thank you.

Q. You came and looked at a number of these records. In fact, I think all of them, really, are Dr Steen's patients, who were on Allen Ward, Musgrave Ward and Barbour Ward on 22 October, and also doctors Webb, Reid and Hill. You looked at them on 4 and 5 October of this year and looked at the notes with a view to assisting which of these notes should be retained for the purposes of trying to understand what might or might not have been occupying Dr Steen's time in the morning when she was otherwise scheduled to be on the ward carrying out a ward round.

Then I think you, later on, provided guidance on the

telephone in relation to three sets of notes.

A. Yes.

Q. And that was on 8 October. Those notes were read out to you and you provided guidance in a similar way; is that correct?

A. Yes. That's correct.

Q. One of the things that you were able to gain some appreciation of was the seriousness of Claire's condition, just from the notes, by comparison to the other children in the notes, at least from the records of the clinicians and nurses; is that correct?

A. That's correct, yes.

Q. The evidence that we've heard is that at least so far as Allen Ward is concerned, the clinicians and nurses ultimately formed the view that Claire was the sickest child on the ward. If you've looked at those notes of the other children, are you able to express a view as to how she compared with any of their recorded conditions, if I can put it that way?

A. Yes, there were some other children on the ward with serious conditions, no doubt about that. But in terms of the acuteness of the condition, the other children involved -- one or two of them had quite serious but more chronic conditions that required a long hospital admission, but weren't necessarily as ill on the day.

So on the day, I would agree with what others have said that she was probably the sickest child on the ward, yes.

Q. And if she was, is she a child, if she was available to be seeing children at all, that you would have expected her to be trying to see?

A. Dr Steen, you mean?

Q. Yes.

A. Yes, I would.

THE CHAIRMAN: Doctor, one of the issues which has emerged over the last few weeks of evidence is a concern expressed specifically by Mr Roberts about whether a lot of this evidence about how seriously ill Claire was is with the benefit of hindsight. Would it have been or should it have been apparent, say, to Dr O'Hare admitting Claire on Monday night just how seriously ill she was, or would that be too soon?

A. I think that would have been too soon. A lot of children who come in at night, who appear to be unwell, recover very rapidly. That is one of the particular features of paediatrics, children bounce back, they get better very quickly. So to overtreat and overinvestigate a child in a very short-term basis when the vast majority of children in that situation are likely to be much better in the morning is justified.

In error: should read - 'is not justified'

THE CHAIRMAN: Okay. Then at what point on Tuesday the 22nd should it have been apparent or over what period on Tuesday would it have been increasingly apparent just how seriously ill Claire was?

A. At the ward round.

THE CHAIRMAN: Thank you.

MS ANYADIKE-DANES: Thank you. I wonder if I can take you to S8. If you look in that bundle that you've just been handed, they're all tabbed, and if you go to S8 just quickly so that you look at 150-008-002. This won't come up, but you can look at it and see. That's the admission; do you see that?

A. Yes.

Q. And then I wonder if I could take you to 005 in that series. You can see there, just alongside where it has "HSS"; do you see that?

A. Yes.

Q. That's Dr Steen's initials. There is an addition there in relation to the medication. Dr Steen has said that she did that and I also think she has indicated that she would have done that in the morning. This child was admitted at 11.05 the previous day. And it is her view that that puts her, because this is where that child was, in bay 7 where Claire was. If that's the case, are you able to tell from that how serious that child's

condition was and the extent to which her condition might or could have monopolised Dr Steen's time?

A. Yes. Can you just give me a minute to look at the admission note to remind myself of this child's condition?

Q. Of course.

A. The admission note on the previous day, on the 21st, suggests that this child had asthma. From the admitting doctor's impression, it wasn't a particularly severe exacerbation of asthma in that this child was given standard asthma treatment with nebulisers and oral steroids, and there was no further entry made later on the 21st suggesting that no other doctor was asked to see this child and, therefore, presumably the child improved.

The fact that on the 22nd -- first of all, at the ward round, Dr Sands changed the treatment regime to PRN nebulisers, that is to say instead of giving them regularly, to give them as necessary, and later to inhalers. What this suggests to me is that the child was improving, that the severity was becoming less and treatment was being stepped down. So on that evidence, this child was not that unwell.

Q. And the question I had put to you is: is there anything about this -- it probably follows -- which would have

monopolised Dr Steen in a way that might have prevented her from dealing with Claire --

A. No.

Q. -- if she was in bay 7 --

MR FORTUNE: Sir, can I interrupt at this stage? Because my recollection is that Dr Steen was not saying that this boy was in the same room as Claire. If I'm wrong, I'll be corrected.

MS ANYADIKE-DANES: Sorry, I beg your pardon. That might be the earlier one. I beg your pardon. In any event, the question remains the same, which is that if she was able to see this child, what would you have expected her to want to do in relation to Claire?

A. I'm sorry, can you repeat the question?

Q. If she was able to see this child and/or at least be present to modify his treatment regime, what are your expectations of what she should have been doing in relation to Claire if she was about? That's the point.

A. I find that difficult to answer. If for whatever reason Dr Steen had chosen to see this child -- and it's possible, although I don't know whether she reported this -- and she already knew the child from previous encounter, she may have known the parents and therefore wanted to speak to this family simply because she knew them as she may have been passing through the ward. It

wouldn't have been unreasonable for her to do that.

If her attention was not drawn to Claire, it is possible that she could have seen this much less ill child, dealt with them, made some fairly minor decisions about treatment, without being made aware of the much iller child even within the same bay.

Q. Then if she was on the ward at all and had appreciated that she, for whatever reason, had not been able to attend the ward round, having got herself to the ward, should she have been asking, "While I'm here, is there anything I need to know about any of the new admissions?"

A. I would have thought that was a reasonable expectation, yes.

Q. Then let's go to, I think, the child who might have been in the same bay, and that's S7. If you flip back to the previous tab, the admission sheet is 150-007-002. This child is admitted at 13.33 on the 22nd. And if you go to 003, this is a note taken by Dr Stevenson. Under 5 pm, he lists the problems. Then the last of his writing, just above the redaction, says:

"Seen by Dr Steen. Admit for further assessment and management".

And then we can go to the nursing note, which is at 007 in this series. You see at 2 pm:

"Mum phoned Dr Steen this morning concerning reflux. Brought down to Allen Ward at 1.30 for admission."

In fact, that's it. So Dr Steen's evidence is that if she was in Cupar Street in the afternoon -- which it's believed she was -- she would have left the hospital in and around the time that this child is being recorded as actually being admitted on to the ward.

As I understand it -- and I hope Mr Fortune will correct me if I'm wrong -- earlier than that, she had seen the child, not on the ward, to admit the child and then the child had duly been admitted and was on the ward in bay 7, which is the same bay as Claire.

MR FORTUNE: Dr Scott-Jupp ought to know that in respect of this patient, Dr Steen knew mother and patient.

MS ANYADIKE-DANES: Yes.

A. Okay.

MS ANYADIKE-DANES: I think Dr Scott-Jupp might have appreciated that from the mother phoning Dr Steen directly as is recorded in the nursing note.

A. Yes.

Q. So the point is similar, which is: if Dr Steen is actually in the vicinity, if I can put it that way, of the ward and has appreciated that she's not been able to take the ward round, then should she have been making contact with the ward to find out about new admissions,

find out about the state of the children, before she goes off to do her clinic in Cupar Street?

A. Yes.

Q. She should?

A. I believe it would have been good practice for her to have spoken to either the registrar or one of the SHOs or the senior nurse to ask about any other patients of concern on the ward at the time.

Q. Dr Steen, in fairness to her, has no independent recollection at all of this period. So she's dependent upon the notes and records that emanate from that period. One of the things that she thinks is that she was around and about the ward, she was available. That's one of the things that she says. That's why I've asked you about, if she was available, what her conduct should then have been. There was another suggestion, nobody knows that, but perhaps there was a child of sufficiently serious condition that would have quite properly taken up her time, and that's what she was dealing with.

You have looked at the notes of all this children. In the course of that, did you see any evidence of her being -- apart from what I have just taken you to there -- contacted in relation to a child whose condition would have been monopolising her time or

taking up a significant part of her time?
A. Not on the evidence of the notes we've seen.
Q. Thank you. I think you indicated that you might actually have seen the evidence of quite a sick child -- if you give me a moment. Maybe I'll come back to that because I'm trying to deal with a child whose condition might identify it. Perhaps I'll come back to that.

There is evidence, though, that a Dr Nan Hill was available. It's S1, the one where she is involved. One sees that if you go to tab S1 and, just to orientate you, 002 is the admission sheet, and then you can see 21 October when she comes in. Her discharge sheet is at 011. There is a reference there to "See the review arrangement as per Dr Hill". I think your view was, when you looked at this, that the way that discharge sheet is written might suggest that this could actually have been a Dr Hill patient who happened to come in at a time when Dr Steen was on call and, therefore, the child would be written up as one under her care; is that right?
A. Yes, that's correct.
Q. Then the actual reference to Dr Hill, one sees that at 005. There is the ward round on the 22nd taken by Dr Sands. Towards the bottom, signed off by Dr Stevenson, you see "Ward round, Dr Hill". And then

if you go to 009, which is the nurse's note, you see under 12 midday, "Seen by Dr Hill. To commence physio". And so on. So Dr Hill is another paediatric consultant who actually came in at midday to see this child. If Dr Steen was of the view that she might not have been available for whatever reason, maybe she was dealing with administrative matters -- there's some suggestion that she might have been involved in a King's Fund survey or something of that sort -- but if she were to know that in advance, do you think it would have been appropriate or it could have been possible even for her to have asked for Dr Hill to have provided some cover for her to her registrar?

A. Yes. If she knew that she was on call for the ward, that there was a post take round to be done -- that's to say a ward round seeing acutely ill patients who had come in the night before -- and she knew she wasn't going to be available for whatever reason, however good that reason was, it would have been good practice to informally ask one of her colleagues if they could be available to the registrar to sort out problems if she was not going to be available at that time.

Q. Apart from whether it could have been done, in your experience in 1996, is that something that got done or would people have been a little bit precious about their

patients?

A. I think it would have been -- yes, it would have happened frequently. There may have been a reluctance of another consultant to get involved with a colleague's patient where decisions had to be made that could wait, they weren't necessarily very urgent decisions, because people didn't like to tread on each other's toes. That's rather different to an urgent situation where a decision needs to be made straightaway.

Q. Thank you. So that is something that could have been done, had she appreciated she was going to be away for any length of time that morning?

A. Yes, it could have been done.

Q. And apart from it could have been done, what's your view as to whether it ought to have been done?

A. I think under the circumstances, and not just with hindsight, I think it ought to have been done.

Q. Thank you. Then I'm going to try and see if we can move reasonably chronologically through Claire's admission if I can put it that way. If we start with her initial assessment and the treatment by Dr O'Hare.

In fairness to her, in your report at 234-002-002, you've commended her for clear and competently set out admission notes. And you say that the important points in the history are clear and a competent clinical

examination is recorded. But you have formed the view that her initial investigation was somewhat limited and that you would have expected more extensive biochemical tests.

A. Yes.

Q. Can you expand about that as to what you would have expected and why?

A. Well, she was an unwell child. There was no clear diagnosis. The extent to which one investigates a child during the night would vary somewhat from one practitioner to another. I have looked at Dr O'Hare's justification for not doing some of these specific tests and I actually agree with her reasons; they're all entirely logical.

When you're starting from scratch and you don't know what you're dealing with, the common practice is to do a variety of tests even though they may be somewhat unfocused, to do a broad range of tests which might give you a clue as to what's going on. In her case, the only blood tests I think that were done on admission were a full blood count and urea and electrolytes and a glucose, I think -- sorry, I can't remember if there was a glucose or not -- which is less than I think most practitioners would have done at that time -- even out-of-hours tests -- for a child who was that unwell.

Q. So just that I understand you: even though you say you have read her reasons and you think they are logical, do you nonetheless feel that something more extensive was required and should have been carried out?
A. Yes. I can go through the individual tests one by one if you'd like me to. But I'm just giving a general impression that even though one always doesn't always think, at the time, of a long list of specific diagnoses, one often sends off a batch of commonly done and easily available tests to help formulate one's idea as to what the problem is.
Q. In your view, even bearing in mind all that Dr O'Hare has said, what do you think were the tests that should nonetheless have been carried out?
A. Right. As I think I said in my reports -- it may be in the second report actually, there may be a reference to that -- as well as the urea and electrolytes, the liver function tests -- she didn't have any clinical evidence of liver failure, and I agree with that assertion by Dr O'Hare. Nonetheless, you can have disturbed liver function without any clinical evidence of liver disease, such as jaundice, and that could be an early indication of the nature of the problem.
There are a number of different biochemical indicators that are included in the liver function test

which can be associated with quite a wide variety of different conditions, not just specific liver failure. Reye's syndrome is an example of one that I think has already been mentioned --

Q. Yes.

A. -- which is rare, but early evidence of that could be gained from an early abnormality of the liver function test. So that's one example.

Q. If we pause there. I think, in fairness to Dr O'Hare, in her evidence, which is on 18 October at page 138, having gone through a series of things, at page 138 at line 14, I think she did concede because she was considering that Claire had a viral infection, which could have been hepatitis A, it probably would have ben reasonable to do the liver function test. So for whatever reason that prompted it, I think she's come to the view that perhaps that was a reasonable test to have done.

A. Yes.

Q. And you would agree with that from what you have just said?

A. Yes, in the event it wouldn't have made any difference, but it would have been a reasonable test to have done.

Q. One doesn't know in the event. That's the whole point at the time you're doing these.

A. Yes.
Q. Then as you have progressed through, what else do you think should have been done?
A. Calcium, it's rare, but either a high or a low calcium level can lead to seizures, and there are many causes of that, all of which are rare. Doing an ammonia, which is not quite such a routine test, but is an important one, is a good screening test for a broad range of rare metabolic conditions, including Reye's syndrome, as it happens. That is not something that is usually done as the first line blood test, but can be done urgently out of hours where one suspects there may be a metabolic problem going on.
Q. And would you have thought it was reasonable to think that there might have been a metabolic problem going on at this stage?
A. Yes, I think it would.
Q. Okay. Anything else that you think they might have reasonably done?
A. I didn't mention this in my report, but a blood gas, that is to say an analysis of the level of acidity/alkalinity of the blood -- a blood pH, in effect -- can also be a useful screening test for a metabolic problem.
MR FORTUNE: Sir, the relevant paragraph in Dr Scott-Jupp's

first report is 234-002-002 at (b).

MS ANYADIKE-DANES: Yes, that's where we were before we went into the transcript. Thank you.

Sorry, that was one you said you didn't mention, but that might have been a reasonable thing to do --

A. Yes.

Q. -- in 1996?

A. The machines available to do this test on were less commonplace in 1996, but it was still possible to do it, yes.

Q. Anything else?

A. No.

Q. Can I then just ask you about the fact that --

A. Sorry, importantly, a glucose.

Q. I think they did do a glucose.

A. Yes. Sorry.

Q. But you have said that the blood tests that they did do produced the blood count, the urea and the electrolytes. We can have a look at 090-032-108. Dr Aronson and Professor Neville have given some evidence as to whether they should have done a differential on the white cell count. Have you got a view as to whether that would have been an appropriate thing to do?

A. It would have been an appropriate thing to do, but I think my opinion may differ slightly from the other

expert witnesses in that I doubt it would have had any influence on immediate management, having a differential available at that time. I think the other experts have explained to the inquiry what is meant by a differential; do I need to repeat that?

THE CHAIRMAN: We've got that, thank you. You don't need to.

A. As a practising paediatrician, I actually don't find the differential all that useful. In theory, a viral infection should cause an increase in the relative number of lymphocytes and a bacterial infection should cause an increase in the relative number of neutrophils. In practice, that doesn't always happen. In the early stages of a viral infection, you can often get an increased neutrophil count and vice versa. So it can, in the early stages, be relatively unhelpful unless it's extreme.

MS ANYADIKE-DANES: Would you necessarily know whether you were in the early stages at this stage?

A. I think from the history Claire had only been unwell for a day, so it was still in the early stages, yes.

Q. Would it have been something that could have been noted to do later on?

A. Yes. It could have been. It would have been more useful to repeat the blood tests and repeat the

differential on a new specimen rather than going back and doing it on the one taken on admission.

THE CHAIRMAN: Sorry, doctor, just to interrupt for a moment. One of the points made last week was that this printout -- which you have on screen in front of you at the moment -- is in an unexpected form because the white cell count differential would, according to at least one of last week's witnesses, be expected to appear on that printout; is that your experience?

A. Yes, that is entirely a technical laboratory issue. It depends on, firstly, whether they had a machine that could automatically do the differential count available out of hours and, secondly, whether there was a technician who was available to interpret it.

THE CHAIRMAN: I think it was Professor Cartwright who said that he would have expected that the differential would automatically be printed on that and he was really very taken aback that it didn't appear there. He made two points. First of all, it should have been appeared there because this wasn't a new machine, this system, as he described it, had been in place for decades. Would that be your experience?

A. Yes. Going back a long way, the differential counts were done by hand, but I think by 1996 it was automated. I don't know why it wasn't done.

THE CHAIRMAN: That's one point and the second point is that when the differential didn't appear on the printout, that that's something which might have been picked up overnight, perhaps by Dr Volprecht, but which certainly is something that should have been picked up at the ward round on the Tuesday morning.

A. Well, as I say, it probably should have been picked up, but I don't think it's that helpful personally. My personal opinion is I don't think it's that helpful in deciding the nature of the infection in Claire's case.

THE CHAIRMAN: Okay, thank you.

MS ANYADIKE-DANES: I think Dr O'Hare also thought that a toxic screen would have been reasonable on 22 October if Claire didn't improve. So the next day if you like.

A. Yes.

Q. Would you have wanted to do that as part of the blood work on the 21st?

A. Yes. I think as a general rule if a child comes in with an altered conscious level with no obvious cause, it's good practice to take specimens, blood and urine, early on for possible later analysis for a toxic screen. The reason being that if you don't take it early on, the toxins, whatever they were, may have cleared out of the body if you go back and try and repeat it later, and you'll miss it. So even if the specimens are not

actually analysed, it's good practice to keep them, and I think it would have been useful to have had those specimens sitting in the lab even if they weren't analysed. It may have been that later other evidence came along that showed clearly poisoning was not the problem and that it could not have happened, but as a first-line investigation, it would have been useful.

Q. And that's because although you can't detect them any longer, because they've dissipated through the system, their effects may still be there --

A. Yes.

Q. -- and you would want to be able to identify what it was that was causing those effects?

A. Yes.

Q. The white cell count, as you see it there, is raised. Professor Cartwright thought that was markedly raised, enough for your attention to be drawn to it.

A. Yes.

Q. Is there anything that you would have done about that?

A. No, it's very non-specific. All that tells you is that there's something going on, that she's unwell. It doesn't tell you what kind of illness it is. It suggests, but does not prove, an infective cause. I should also point out -- I'm not sure if this has been mentioned before -- that seizures, convulsions, in

themselves can actually cause a rise in the white cell count in the absence of any infection.

Q. And then could that have been a reason why perhaps Dr O'Hare might have retained the differential diagnosis of encephalitis, which she had thought about?

A. Do you mean the high white count on its own?

Q. Well, the evidence that she had before her, thinking that maybe the high white cell count indicates perhaps something viral, maybe something to do with seizures, maybe the encephalitis is producing seizures. There's a train of thought that might have gone on. What I'm trying to ask you is whether it would have been better practice for her to have retained a broader range of differential diagnoses than to have simply stuck with the viral illness, which ultimately was her decision.

A. Yes. As I said in my report, viral illness and encephalitis, are not usually exclusive. Encephalitis is a form of viral illness, though obviously a very serious one. I think what you're asking was, should the high white cell count have made her more suspicious that this was a more serious viral illness rather than a trivial one, and I don't think it does. You can get a white count of 16 in a relatively minor viral illness.

Q. Thank you. Do you think that stool samples might have been taken?

A. Yes. It would not have helped immediately because it takes 24, 48 hours to get a result from a stool microscopy and culture. To do viral tests on stool, which I think was later mentioned by Dr Webb, takes much longer.

Q. If it is going to have that sort of time lag for a result, might that be a reason for starting it sooner rather than later if you are thinking that there is a viral cause?

A. Yes. Although obviously it depends on the child opening their bowels. So a stool test can only be available if that happens.

Q. Yes, assuming that that was available, would it have been an appropriate thing to have done?

A. Yes.

Q. A reasonable thing to have done?

A. Yes, it would.

Q. I think in fairness viral cultures were taken on admission. Professor Neville has also formed the view that Dr O'Hare performed a competent examination, but he felt that her differential diagnosis and investigations were not adequate. I'm going to ask you how you respond to what he said.

Firstly, he thought that Dr O'Hare should have discussed the patient with the consultant paediatrician;

is that your view?

A. I think that's a difficult question. In my initial report, I thought it was justifiable for her not to discuss on admission with a consultant paediatrician, given that, although Claire clearly had a problem, it's something that could have waited until the next morning.

I am still inclined to that view, but it would depend a lot on Dr O'Hare's personal confidence and experience with dealing with this sort of condition.

Q. Well, if we stay with the fact that she had thought it might be encephalitis and then, on reflection at some point, presumably struck that out and stayed with viral illness, do you think she might have prescribed any treatment for a viral illness at that stage?

A. If she was strongly suspecting that it was a viral encephalitis, it would have been appropriate to start acyclovir, which is an antiviral medication.

Q. Would there have been any downside to doing that if subsequently you formed the view that maybe it wasn't that?

A. No, and frequently acyclovir --

THE CHAIRMAN: Sorry, doctor, she would only do that if it was a strong suspicion?

A. Yes.

THE CHAIRMAN: And if her view is that it probably isn't,

would she do it anyway?

A. Sorry, can you repeat the question?

THE CHAIRMAN: She had "encephalitis" and then struck it out. That does not seem to indicate a strong suspicion.

A. I agree.

THE CHAIRMAN: Your answer was:

"If she was strongly suspecting that it was a viral encephalitis, it would have been appropriate to start acyclovir."

If it wasn't a strong suspicion, then it's not appropriate to start it.

A. Yes, I agree.

MS ANYADIKE-DANES: Is there anything else that you think she might have prescribed in relation to her diagnosis or presumptive diagnosis that it was a viral illness?

A. No, most viral illnesses do not require treatment.

Q. Could she have flagged it up for something to consider later on?

A. Yes.

Q. Should she have?

A. She should. This leads on to the whole issue of handover, which I think has been discussed previously. But if there was any substantial handover of Claire to the daytime Allen Ward team, mentioning encephalitis, if only to dismiss it, if only to say that, "Actually,

I don't think it is encephalitis", would have been appropriate, yes.

Q. Are the things you've dismissed also important to help others in the formulating of the differential diagnoses and the reason why you have dismissed them?

A. Sorry, can you repeat the question?

Q. There are positive differential diagnoses and there are also things that you have considered but, for one reason or another, have dismissed. Are those important to communicate as well to those coming after you to have the care of the child to tell them, "I've thought of that and I dismissed it because of whatever reason"? Is that an important piece of information?

A. Yes, it is, but it comes back to the time available and the adequacy of the handover. By today's standards, handover is now much more rigorous, is much more detailed. And also, importantly, has a teaching element, which perhaps isn't very relevant here. So when you're discussing a patient and you talk about all the things that it could be but it isn't, everybody listening to that handover learns and thinks, "Gosh, next time one of these this comes along, I have to think of that, even though it didn't apply in this particular patient".

Where handover is very rushed and brief, as it

appears to be in this case, there may not have been time to go into all the different unlikely possibilities.

Q. Was encephalitis an unlikely possibility as far as you are concerned?

A. Um ... No, I don't think it was an unlikely possibility.

THE CHAIRMAN: We're into curious language, aren't we, between unlikely possibilities and likely possibilities.

A. Yes.

THE CHAIRMAN: But we're not into probabilities? I interpreted your report as being mildly critical of Dr O'Hare, but no more than that; would that be a fair interpretation?

A. That is true. Encephalitis is a difficult diagnosis. Many children who come in with a viral illness behave abnormally for a short time and then rapidly improve by the next morning, and that slightly abnormal behaviour -- sleepiness, drowsiness, not being themselves -- is a transient thing and that's particularly associated with a gastrointestinal illness and can often happen. Most bounce back and are fine the next morning. They would not be generally described as encephalitis, although it may be in some of these children there is some causal link between the virus that's causing the gastrointestinal illness and their

behaviour.

THE CHAIRMAN: The other point that I think is probably relevant for me to note about Dr O'Hare is that, while you are mildly critical of her, there was nothing which was done overnight on the Monday/Tuesday, which could not have been improved upon or tested better or in more detail on the Tuesday morning, either before or after the ward round?

A. I don't think there was anything that should have been done before the ward round, given that it seems her condition had improved slightly, although quite what that means I'm not sure. But I think it would have been the right thing to wait for the team doing the ward round to take a more detailed second look and go over it again. I think that's reasonable.

THE CHAIRMAN: Okay.

MS ANYADIKE-DANES: Thank you.

MR FORTUNE: Sir, before my learned friend continues we seem to have jumped quickly from the examination on admission to the ward to the ward round itself. In between we've had no reference so far to the question of the lumbar puncture, nor particularly to the reassess after fluids, which of course is the opportunity later in the evening to revisit any of the earlier diagnoses.

THE CHAIRMAN: I don't think Ms Anyadike-Danes was going to

let me jump ahead. I was only jumping ahead in order to get an overall picture to the extent that there's any criticism of Dr O'Hare, but I presume we're going to back to what happened during the rest of Monday night and Tuesday morning.

MS ANYADIKE-DANES: We are. Before we do that, I was going through actually the list that Professor Neville had provided to see how you responded to that. "Discussing with a consultant paediatrician" was one in his list. The other is that he was of the view that hyponatraemia/cerebral oedema is something that should have been considered as part of the differential diagnosis and tested for because Claire had been vomiting and she had a reduced consciousness. I think his view is it wasn't just a matter that she was a bit sleepy. If one looks at that part of the examination by Dr O'Hare, it's very careful where she tests all her reflexes. So she did seem to have a neurological presentation, if I can put it that way. And I think his view is that in the light of all of that, hyponatraemia and cerebral oedema should have been considered; do you have a view?

A. I think on admission that would have been a difficult conclusion to come to. Those things are rare. Certainly, even before the original low serum sodium of

132 came back, it would have been even more difficult. Her neurological symptoms and signs could have been accounted for by things other than cerebral oedema, which is rare. If cerebral oedema had been considered, it would have been obligatory to do an urgent CT scan. No doubt about that. So if it had been considered, I would have expected Dr O'Hare to have certainly discussed with a consultant and ordered an urgent CT scan, but I don't think that would have been as high up the list of diagnostic possibilities as Professor Neville suggested.

Q. Well, in the field of the rare, some of the ones that you have suggested that Dr O'Hare might have tested for -- in fact, should have tested for -- were all rare. Reye's syndrome was there.

A. Yes.

Q. The calcium abnormality would be rare, and those are the two that come to the top of my mind, but there may have been two or three others that you indicated were also rare, but you would have done them.

A. Yes.

Q. And you would have done them because you maintain a possibility that that could be what's happening, and you want to exclude it.

A. Yes.

Q. Should you have retained the possibility that another rare, but neurological, cause was at work here?
A. Yes. And I can answer that quite easily. There is no blood test for cerebral oedema. Simple easy to do, quick and accessible blood tests can rule out all the other things. To rule out cerebral oedema, you would have to do a CT scan. A CT scan is a much greater undertaking. From the point of view of the resident doctor, it would have required discussion with consultants, it would have required transferring the child to the neighbouring institution and it would have -- not without a significant risk, I should add.

So in those days, getting a CT scan was a much bigger issue than it is at the moment. And that's the only way it could have been ruled out.

Q. Can I just ask you a little bit about that? You say "not without significant risk". Why would there have been a risk of taking Claire for a CT scan?
A. Whenever a child is transported in an ambulance, even for a very short distance, firstly, it takes a member of staff out. And, secondly, things can happen in ambulances and on trolleys in corridors. So any transfer of any patient anywhere carries a small but significant risk.
THE CHAIRMAN: Does that mean you need to have identified

that as a more likely possibility in order to justify going through that process with Claire?

A. Yes. I think one's level of suspicion of something diagnosable by a CT scan would have to be fairly high to, in those days -- and it is very different now, but in 1996, in order to justify an out-of-hours CT scan.

MS ANYADIKE-DANES: Might it have been a factor that if she has got something like that, if we don't know about it and therefore can't deal with it, that could be deteriorating over the night and we've got a reasonably slim staff on over the night? Might that have been a factor of: let's deal with it now and see what she might have?

A. As opposed to doing it in the morning, you mean?

Q. Yes.

A. Well, it would have been much easier to arrange it in the morning.

Q. Sorry, it's not the ease of it; it's the fact that if you don't do it now, but you leave it maybe until something happens later on -- midnight or whatever it is -- and you realise that that's the territory that we're in, it might have been an awful lot harder to have organised at that time in the evening. Meanwhile, the condition is developing all the while. So if there's a possibility of that, would it not be something you'd

want to think about eliminating earlier on before you face a long night not knowing if the condition is deteriorating?

A. Yes. I agree. By today's standards, that's probably what would have been done. However, I should also point out the very early stages of cerebral oedema can be impossible or difficult to detect on a CT scan. Particularly with the technical quality that was available at that time, which is not as good as now. So there is an argument that doing it too early, you might be falsely reassured and lulled into a false sense of security whereas in fact it was too early to be seen on the CT scan.

Q. If we come up to midnight or thereabouts, when it's appreciated that -- it's not entirely clear when the blood tests were taken that produced that result, but let's say it's about 9.30-ish or thereabouts. That would have put her serum sodium level at 132 at that time in the evening. Is there any response or any difference in any of the answers that you've given as to the tests that might have been carried out?

A. No.

THE CHAIRMAN: I think rather than rely on this document, let's go to the clinical record because I'm not sure when that printout actually came back to the ward.

MS ANYADIKE-DANES: 090-022-052. Sorry, Mr Chairman, it was there on its default.

THE CHAIRMAN: I understand. But the point, doctor, is that the handwritten note, you'll see on the lower half of this page, is, I think we're assuming, a note that was phoned up to the ward with the results, which were on the printout you were looking at a moment ago, but it is maybe a bit unlikely the printout was available around midnight.

A. Yes.

THE CHAIRMAN: So on the basis of these results then, the question really is: what action might or should have been taken when they came through?

A. Yes. The sodium level of 132, as has been discussed by others, although below the normal range, is not at a level where I think anybody would expect it to cause significant symptoms. It's not even at a level where it's diagnostic of inappropriate ADH secretion. Whether you call it hyponatraemia or not is a bit of a semantic point, but the ... So to answer your question, in itself a low sodium of 132 at that time, I don't think should have prompted any further investigations at that time.

MR FORTUNE: What does Dr Scott-Jupp mean by "at that time"; midnight or 1996?

A. Both.

MS ANYADIKE-DANES: Can we just look above it? We can see Dr O'Hare's really trying to work through what she thinks is going on. She's got a query about seizure activity, so although she's got rid of the encephalitis, she has a query about seizure activity because she's suggesting that maybe IV diazepam, which is her query for that, and then she says all that should be reassessed after fluids. And then this note at 12 midnight is her reassessment.

So if we go back to what you were saying before and to the advisability of a CT scan, she does have on her radar that what is going on here is seizure activity and not just perhaps a viral illness, a tummy bug, which is one thing the parents thought their daughter had. This is a little more and it's sufficient more for her to query whether IV diazepam should be administered at some point. Does any of that affect what you'd said about the reasonableness or appropriateness of conducting a CT scan earlier?

A. It's not necessary to do a CT scan to make a diagnosis, or it doesn't help at all in the diagnosis of non-convulsive status.

Q. I'm not sure she's got that point yet.

A. No, but, no, I don't think doing a CT scan would

influence the decision as to whether to give IV diazepam or not.

Q. Sorry, no, it was to do with the fact that she had considered seizure activity, seizure activity as something that can result from cerebral oedema. I was taking you back to the point that Professor Neville had, that that should have been part of their differential diagnoses. And at that time, when we were looking at the other documents, it perhaps wasn't so clear that she had retained a possibility of seizure activity, but her own note makes it clear that she did, and that's why I'm asking you now, now that you see that and realise that that's what she was thinking at 8 o'clock when she was examining Claire, does that change what you had said about the reasonableness or appropriateness of having carried out a CT scan to see if that could assist with a thought as to what might be triggering that?

A. Most children who come into hospital with seizure activity do not require a CT scan or certainly didn't in 1996, perhaps less so now. So the fact of noting seizure activity is not of itself a reason to request a CT scan. A deteriorating neurological condition in other ways may be, but not seizure activity of itself.

Q. She formed the view, when she reassessed at midnight -- firstly I assume you're going to agree that that was

a prudent note for her to make to herself that, having started her on the IV fluids, she should be reassessed.

A. Yes.

Q. So she does reassess her and she finds her slightly more responsive. You said you weren't entirely sure what that meant.

A. It's not very precise but it's the sort of note that one makes frequently and I may have done this myself many times. It is an subjective impression that she is responding a little bit more to stimulation.

Q. And she did the first examination, so she's comparing her previous view of the child with how she presents to her now.

A. Yes.

Q. Then she says:

"No meningism. Observe and reassess in the morning."

Before we get to the "observe and reassess in the morning", despite the fact that she has noted an absence of meningism, would you have thought a lumbar puncture appropriate?

A. No. I would have thought a lumbar puncture was not advisable at that time.

Q. Why is that?

A. Because where there is some uncertainty about the

possibility of there being an intracranial lesion, then a CT scan would be advisable before doing a lumbar puncture.

Q. So you wouldn't do a lumbar puncture because there might be the very sort of activity going on that a CT scan would show up, but you wouldn't do a CT scan?

A. Yes, I see where your argument's going. A lumbar puncture is done primarily to diagnose meningitis. The primary presenting symptoms of meningitis are fever, which Claire did not have, neck stiffness or meningism, the same thing, which she did not have. In some cases, a rash, and also in some cases evidence of septicaemia, which she didn't have either. So there was very little to clinically indicate the need to do an urgent lumbar puncture. A lumbar puncture is something that can be deferred if there is doubt about either its safety or its necessity out of hours.

Q. What might a lumbar puncture have disclosed that would have been helpful to know, if I can put it that way, apart from confirming a meningism?

THE CHAIRMAN: Sorry, I don't think anybody advocates a lumbar puncture should have been conducted at around midnight on Claire. Is there?

MS ANYADIKE-DANES: No.

MR FORTUNE: Professor Cartwright was very hesitant about

a lumbar puncture because of the dangers of performing the puncture and the dangers of nicking a blood vessel.

THE CHAIRMAN: I don't think we need to explore the lumbar puncture. None of the experts who are giving evidence have suggested that it would have been appropriate to conduct a lumbar puncture on Claire overnight on the Monday/Tuesday.

MS ANYADIKE-DANES: I beg your pardon, Mr Chairman. I wasn't necessarily meaning overnight. Now that we were on the lumbar puncture point, I was going to ask him what he thought that might have disclosed because that is something that happens later on, on 22 October. It's something that Dr Webb wonders, or has a query over, whether he would have done that. We can move on to deal with that later on in its proper order. Then she says, "Observe and reassess". What would you understand that to mean, what should be reassessed?

A. Well, I think everything would be reassessed: her conscious level; her seizure activity; her state of hydration; evidence of developing infection, that is to say fever, rash; symptoms of an associated viral infection; vomiting she already had, but that would need to be reassessed; diarrhoea; development of respiratory symptoms; everything.

Q. Finally, so we're clear on where the various experts

stand, Professor Neville's view is that a CT scan on the evening of the 21st should have been an urgent requirement on the basis of a child having unexplained reduced consciousness to exclude or confirm a number of causes of raised intracranial pressure. I take it that you don't accept that?

A. I don't accept that it needed to be done immediately after admission on the evidence we have here.

Q. Or at any stage on the 21st?

A. No. I think it should have been considered the next day.

Q. Thank you. What about the result of 132, do you think that should have been repeated?

A. Yes.

THE CHAIRMAN: When?

A. Well, this is perhaps one of the major questions of this entire inquiry. I think I said in my original report it should have been done some time during the day of the 22nd, and I think other experts have been more specific on that.

It would have been normal practice, I think, in the way that the ward routine happens, and I think it would have been acceptable for it to have been repeated probably late morning after the ward round, after decisions had been made on what investigations were

required on Claire.

MS ANYADIKE-DANES: I think in fairness to Dr Webb, his evidence was -- and one sees that at witness statement 138/1 at page 22 in answer to 15(c):

"It was routine for blood samples to be taken in the early morning."

That was his evidence.

A. Sorry, whose evidence is this?

Q. This is Dr Webb.

A. Yes, it may have been. It doesn't mean that it wasn't also routine to take them after ward rounds.

Q. Yes, that's exactly the point I was going to come to. If that were the practice that the routine blood tests are done in the early morning and so, for example, they're available for the ward round, do you think it would have been necessary for Dr O'Hare, or Dr Volprecht for that matter, to have indicated that repeat blood tests should be done?

A. No, I think it would have been reasonable to wait until the child had been seen on the ward round. Can I just mention the reasons for that?

Q. Yes.

A. Blood tests done in the early morning are likely to be done by the most junior member of the team, by the SHO, with little experience. SHOs know that when their

seniors see a patient on the ward round, they always think of another test to do, which the junior doctor wouldn't have thought of, and so I think a lot of SHOs would have been in the habit of delaying a blood test until a senior doctor had seen them so they didn't have to go back and do it again. Obviously, that saves them work, but more importantly, saves the child having to undergo two separate venipunctures, two separate needles. So it would have been justifiable for the on-call SHO to defer the blood tests until after the ward round had been done in case some other tests that could have been taken at the same time were added to the list of what needed to be done.

Q. No, I didn't mean the on-call registrar or SHO deferring, I meant if the practice in the Children's Hospital was that -- as Dr Webb has said -- samples are taken in the early morning in any event, if that's what was going to happen so there would be an early morning set of blood tests, would that have meant there was no need for either Dr O'Hare or Dr Volprecht to specifically request or prescribe repeat tests being done? That's the question I was putting.

A. No, I think Dr O'Hare or Dr Volprecht would have had to specify it needed doing. It wouldn't have just happened automatically.

Q. Irrespective of if they were routine?
A. Yes. I don't think any blood tests in acutely admitted children are routine. They're all requested for a specific purpose at a specific time.
Q. Okay. The blood test that she had, which produced the serum sodium level of 132, Dr O'Hare has said would have been taken from blood before she had really had any or very much of her IV fluids.
A. Yes.
Q. In other words, that dilute solution of Solution No. 18 would not have had an opportunity to have made much impression on her serum sodium level.
A. Yes.
Q. So would that be another reason for wanting to get an early morning test or a morning test so that you can compare that, effectively what she came in with, and then we'll see how she is after we've had her all night, as it were, on low-sodium fluids?
A. Yes. I think the need to repeat it was irrespective of what fluid she was getting. I think it would have needed repeating had she been getting a different fluid regime or no intravenous fluids at all.
Q. Was it all the more because she had been getting low-sodium fluids? So if her own concentration was low and she had received low-sodium fluids over the night

and into the morning, did that make it not all the more important to test what her serum sodium levels were?

A. Not really, because we're back to the whole question that's repeatedly come up in this inquiry, which is: were any of the doctors aware that low-sodium fluids could actually exacerbate hyponatraemia, and given that it seems that most of them weren't at the time, then there wouldn't have been any reason for them to do that blood test on account of her having been on Solution No. 18 any more than they would have done anyway.

Q. Obviously, that's going to be an issue, the extent to which the doctors knew that, but at least one doctor is recorded as knowing that, which is perhaps the most junior SHO of them all, which is Dr Stewart. He knew that because, at 11.30 on the 22nd, he not only queried whether that low serum sodium result was the result of hyponatraemia, but whether it was the result of hyponatraemia caused by fluid overload from low-sodium fluids. So he was able to make that connection. But anyway, it'll be --

THE CHAIRMAN: Sorry, this is becoming a discussion rather than questioning. We have to get through Dr Scott-Jupp's questioning.

I think, doctor, the point is this: it has been

suggested to me that there were at least three opportunities to do a further blood test. One was, query, should it have been done after this first result came through? You're a bit sceptical about that. Secondly, it might have been done before the ward round. But as an absolute minimum, it should have been done after the ward round.

A. Yes.

THE CHAIRMAN: And the second blood test should not have waited until much later on Tuesday when it eventually took place.

A. Yes.

THE CHAIRMAN: Thank you.

MS ANYADIKE-DANES: If we just deal with the fluid management part of it, which is where we've got into, you say that the rate was appropriate and the type of fluid was fairly standard for 1996.

A. Yes.

Q. And you didn't see it necessary, even with her neurological presentation, to engage in any kind of fluid restriction; would I be right in summarising you in that way?

A. Yes. I know some of the other expert witnesses have suggested that she should have been restricted fluids right from admission. I have to say, I don't agree with

that. Fluid restriction is really only done when a patient is known to have cerebral oedema or an acute neurological condition such as meningitis or encephalitis. It is, I think, a relatively less important part of their management than the other aspects of management of those conditions. In other words, it's good practice, but it probably doesn't make a huge difference.

If Dr O'Hare had been suggesting fluid restriction because of concerns about neurological illness, then she certainly should have got a CT scan. So by the same token that I don't think she should have got a CT scan, I don't think she should have been restricting the fluids.

Q. And just so that we have your response to it, Professor Neville's view is that at midnight some consideration -- the reference for that is 232-002-004 -- to a higher concentration being used as a precautionary measure at midnight, although he does concede, in fairness, that not everybody would have done so, but he believes that some consideration should have been given to that. And I take it from what you said that you don't agree with that.

A. No, I don't.

Q. Then at what point do you think, before 11.30 on the

evening of the 22nd, that any consideration should have been given to fluid restriction?

A. Well, as I've said, I think several things should have been considered at the same time. And they all really go together. So that would be getting an EEG, getting a CT scan, and if that showed evidence of cerebral oedema, restricting fluids at that point. Even then, I don't think many people would have restricted fluids for presumed cerebral oedema without getting a CT scan to diagnose it.

Q. Just to complete the fluid management part, do you think the nurses should have measured the urine output?

A. Yes, in an ideal world they should. However, the practice is that on children's wards urine output is not very well done because of practical reasons. In order to get an accurate measurement of urine output, you have to put a urinary catheter in. That's unpleasant and invasive for the child. If a child is continent and able to pass urine on to a bedpan or whatever, then you can measure it directly in that way. If a child is incontinent and the urine wets the bed, then that's almost impossible to measure. You can weigh nappies and I believe Claire was in nappies at the time.

Q. She was.

A. That, I think, with hindsight, is something that

probably should have been done.

Q. Well, leaving aside the hindsight, if you're in that situation in 1996, is that something that you would have wanted to have been done?

A. Yes, I think I would.

Q. Thank you.

Mr Chairman, I was going to go over and deal with handovers, but I was getting an indication perhaps about the stenographers.

THE CHAIRMAN: Okay. We'll break and we'll have to keep the breaks tight today. We'll be back at 11 o'clock.

(10.50 am)

(A short break)

(11.03 am)

MS ANYADIKE-DANES: Dr Scott-Jupp, my attention has been drawn to a view that you reached in terms of the low serum sodium level, and it's to be found in your second report, 234-002-003.

It's prompted -- it's at (iii) -- by the question about whether the blood results that came back in the evening of the 21st were abnormal and should have prompted reassessment, which is an area that you were dealing with just before the break.

Just a bit further than halfway down in that answering paragraph, you are dealing with what might

have led to that 132 result. You say:

"This can happen in a range of acute illnesses, sometimes due to a mild degree of inappropriate ADH secretion."

If you had thought that that's what was going on, what else should have been done at the time?

A. In the vast majority of children where one sees what is presumed to be a mild degree of inappropriate ADH secretion, although it's quite difficult to prove it, the assumption is made simply on the basis of the low serum sodium, nothing else. In the vast majority, it resolves spontaneously as the underlying condition that caused it improves. So in most cases, the answer is nothing.

Q. Although that's most cases, is there any precautionary measure that one takes if one thinks about inappropriate ADH secretion?

A. Fluid restriction, yes. But only to a fairly moderate degree, and as I say, most cases -- these are children who are well -- well, relatively well, not very well, but not necessarily on IV fluids, and they naturally and instinctively fluid restrict themselves. In other words, a child who, for example, might have a mild degree of ADH secretion due to pneumonia, may well be able to drink spontaneously and they will often choose

not to. It directly affects the thirst mechanism so they actually become less thirsty.

Q. But Claire couldn't restrict --

A. No, it's a different situation when a child is, for whatever reason, unable to drink and is on IV fluids.

Q. That's why I think the issue is being raised. If you had thought that, what would that have led to?

A. I think it would have been advisable to consider, after that result, a moderate degree of fluid restriction, but it wouldn't have been standard practice at the time. It would not have been seen as negligent not to fluid restrict just on the basis of a serum sodium result of 132.

Q. I'm really not dealing with issues of negligence, but you, I think, said it would be advisable to do that.

A. Yes.

THE CHAIRMAN: Sorry, doctor:

"It would have been advisable to consider doing that, not necessarily advisable to do that."

That's perhaps a slightly different thing isn't it?

A. Yes. Perhaps "advisable" is the wrong word. It would have been accepted practice to restrict fluids with that level.

MS ANYADIKE-DANES: So that would have been something that should have happened at midnight then because that's

when the result comes through?

A. Yes. I think I have to say ideally it should have happened, but I don't think that oversight was particularly unusual or major in the scheme of things.

THE CHAIRMAN: That's not quite what you say in your report, sure it isn't, because in that paragraph in your report you're not critical of the fact that this didn't happen.

A. Well, this is on reflection, and I admit, on reflection, having considered what other experts have said. And it is quite difficult to think back to what one would have done. I think, had I been presented with a child with a sodium of 132 in 1996, who was on IV fluids for whatever reason, would I have restricted fluids -- I actually don't know whether I would have done or not.

MS ANYADIKE-DANES: Thank you. If we move --

MR FORTUNE: Sir, I rise because I'm concerned about "in these circumstances". If you look at the sentence:

"In these circumstances, it would have been appropriate not to have acted on a sodium level of 132."

THE CHAIRMAN: That's why I was asking the doctor if he's not moving from that written report. And if I understand what he's saying, he's now taking account of what some of the other experts have said, but he can't say whether in 1996 he would have acted on that report himself.

MR FORTUNE: But which expert is Dr Scott-Jupp referring to specifically when he's saying, "I'm now influenced by the opinions of others"?

A. I think it was Professor Neville, who said -- I'm sorry, I'm getting a little confused as to which expert reports I've read, but I think it was Professor Neville who suggested there should have been fluid restriction there.

MS ANYADIKE-DANES: Yes. Professor Neville is, if that helps you, is the paediatric neurologist; is that the expert that you're talking about?

A. Yes.

Q. Then if we move to handovers. The handover that I'm specifically talking about is the handover that would have taken place between the outgoing, if I can put it that way, night staff and the incoming day team. And that would have been round about 9 o'clock or thereabouts.

A. Yes.

Q. What would you have expected of a handover between Dr O'Hare on the one hand, as the registrar, and Dr Volprecht as the SHO, and then, on the other, Dr Sands and Dr Stevenson, who are their opposing -- they're colleagues of the same rank, if I can put it that way. What would you have expected in that handover

at 9 o'clock or thereabouts?

A. In respect of Claire, do you mean, or generally?

Q. No, Claire.

A. I would have expected the outgoing team to have said she has been admitted, given a very brief history, both of her earlier possible epilepsy and learning difficulties and also of the events the day before. But it would have been quite brief. And also to have described the working diagnosis, which Dr O'Hare felt was a viral illness, and that bloods had been done on admission and I think those results should have been pointed out, and that she was continuing on IV fluids and being observed on the ward.

Q. Dr O'Hare describes very briefly -- because I think, as you've indicated, it's a brief handover -- what she thinks she would have been trying to convey. It's the transcript of 18 October, page 178. I think it starts at line 18. There we have it from lines 18 to 21:

"I would have said: this is a child that I wasn't 100 per cent clear about her diagnosis and I would like her reviewed on the ward round."

And I think, in fairness to her, she doesn't have a very clear recollection of that. From what you said, does that mean you would have anticipated however brief it was, it would have a little more content than that?

A. Well, if that's all that was said, that is extremely brief. It would and should have had more content than that, I believe.
Q. Would you have expected necessarily for there to have been a handover between Dr Volprecht and Dr Stevenson?
A. That's difficult to answer and would depend on the custom and tradition in the hospital at that time. It wouldn't necessarily be important for two separate handovers to occur at both registrar and SHO level. Only one needed to happen. Ideally, all four doctors would be there at the same time. And that's what happens now, very much. The practicalities may have been that there was so much to hand over that it was divided up and different patients were handed over to different people at different times.
Q. In any event, whoever is doing it, the information that you gave in answer to my earlier question is information that you think ought to have been passed on.
A. Yes.
Q. Can I ask you about whether you consider there's any difference in handovers? There's obviously a handover here in the morning when you have staff who are covering a number of children's beds, now handing over to staff who would be operating during the day, but there would be more of them. And then at the other end, those who

have looked after her during the day handing over to what may be a more skeletal cover. Do you have a view as to which is the more important handover in terms of the amount of information to convey?

A. They're both important. The morning handover, there would have been no need for the night team to hand over patients that the day team already knew about on their ward if nothing had changed overnight. So the only patients the night-time team would have needed to mention is new patients and those patients whose condition had changed during the night.

The evening handover, where the oncoming team probably or often wouldn't have known any of the patients on the ward because they may have been based on a different ward, would have needed a little bit of information about all the patients on the ward, even if it was very brief, for those that weren't particularly ill or weren't expected to change overnight.

Q. And might they have needed a better pointer as to the things to bear in mind since there will be less of them and they are covering a larger number of beds as opposed to the daytime team who may have more opportunity to have tests carried out and assess the results and so forth?

A. Yes. I think that's true. There would have been more

need to hand over in the evening because there's a greater number of patients to hand over to a smaller number of doctors, yes.

Q. Thank you. Just on that point, recognising that division, fairly basic division, between what's available to be done during the day and what's possible to be done during the evening, should the daytime team be bearing that in mind and recognising that maybe it would be advisable to have certain tests being done now so that they're being done within working hours, if I can put it that way, and that their results can be available to the night-time team rather than expecting the night team time team to institute those and perhaps have more difficulty in getting the results back?

A. Yes, absolutely, even more then now in that between 5 pm and 9 am the following morning, there were very few staff running the hospital and an awful lot of patients. So I guess it would, and should, have been the culture that the daytime team did as much as they possibly could to reduce the workload of the evening team coming on at 5.

Q. So not only for their own purposes in caring for the child during the day, but also looking to the evening and thinking that we've got a rather slimmer team and it's out of hours anyway for getting results back, they

should be sort of taking a precautionary method as to what work they could get done in terms of tests and so forth?

A. Yes, and also there are some tests that are only available during working hours anyway.

Q. Yes. I think you've conceded that the handover, certainly the one in the morning, might have been done rather informally. Would you have expected any of that to have been recorded or noted?

A. Not in 1996. Certainly today, but not then.

Q. Thank you. Then if we go move to the contact with the consultant. I think you've already answered the question, which some had, as to the extent to which Dr O'Hare and Dr Volprecht should have been in touch with Dr Steen. I think your view is that they didn't really need to do that; would that be fair enough?

A. If they felt competent to deal with this, yes.

Q. Well, is there anything that you have seen in the notes and records that indicated to you that one or other of them should have contacted Dr Steen?

A. Well, it would have been Dr O'Hare, but no.

Q. Then can I ask you whether, in your view, Dr Steen should have seen Claire on admission, if it were possible for her to do that?

A. No, not necessarily.

Q. Should she have seen Claire when she first arrived at the Children's Hospital in the morning?
A. Either then or have discussed with the registrar doing the ward round and asked him to report back to her, having seen Claire on the ward round.
Q. If she, for any reason, knew that she wouldn't be available during the ward round -- and in fact it was unpredictable the extent to which she would be unavailable to see her patients during that morning -- would it have been appropriate for her to try and get some immediate feedback ahead of the ward round before she went on to her other commitment?
A. It would have been appropriate, yes.
Q. Would you have done that?
A. Well, it depends on what information was available. If, as is quite possible, neither Dr Sands nor Dr Stevenson had actually seen Claire at the time when Dr Steen passed through the ward, if she did, and they hadn't, until they did the ward round, appreciated how unwell she was, it's possible that it may not have been brought to her attention before the ward round.
Q. Would it have been appropriate for her to have passed through the ward just to see who did come in the previous evening, if she thought she might not be available during that morning or at least not available

easily that morning?
A. Yes, it would have been appropriate.
Q. Even before the ward round?
A. Even before the ward round, yes.
Q. Because Dr Steen can't remember this, if you're in that position and you've done that and you hear that a child has been admitted, nobody's entirely sure what the problem is but she's having some sort of neurological presentation, if I can put it that way, what would you have wanted to do before you moved on to whatever was your commitment?
A. Personally, I would have wanted to see the child, probably speak to the parents, decide on a plan of investigation and management and refer to a specialist. Under the circumstances where, if the consultant had a commitment elsewhere and there was a competent registrar doing the ward round, some of those tasks could have been delegated to the registrar, which is what their job is and is also a useful learning experience for the registrar to actually take that responsibility. That's entirely reasonable.
Q. Well, if you would have wanted to do something of that sort, if that means you're there just a bit before 9 o'clock, the parents didn't actually arrive on the ward until, I think about 9.30 --

A. Yes.
Q. -- would that have meant that you would have had or would have wanted to have some discussion with your registrar on those sorts of issues before you then had to go to whatever was your commitment?
A. Yes. And I think it would have been helpful to the registrar to have some guidance of what you normally would tend to do in these sorts of cases, even though the child hadn't been fully assessed at that time.
Q. I know it's a hypothetical, but Dr Steen's view is -- and she takes some comfort from the two records that I showed you earlier this morning -- she was about and her view was that she was contactable and that could be done through her mobile, bleeper, her secretary and so forth. Assuming that she was, would you have expected her to want to -- if she had known about Claire coming in with that presentation -- keep in touch with the ward to see what had happened as a result of the ward round, even if Dr Sands hadn't independently contacted her?
A. Yes, I think it would have been reasonable for her to either phone or visit the ward at a time she knew that the ward round would have been completed in order to catch up on what decisions had been made and what was happening to the patients.
Q. And then her clinic is at Cupar Street, which I think is

about five to ten minutes away, something of that sort, not any great distance. I think her evidence is she would have been leaving there, because it starts just a bit before 2, early lunchtime, the hospital for there. If that's the case, if she hadn't already, for one or other reason, been able to make contact with the ward, would you have expected her to go to the ward just before she left?

A. Yes, I would.

Q. And would you have expected her to do that even if she hadn't known who had come in the previous evening and what their presentation was?

A. Not necessarily if ... There would have been days when there were relatively few admissions and none of them had been particularly ill and their management was entirely within the competence of the registrar. So if she had received no inkling that Claire had been admitted or the severity of her condition had been understated to her, she might have been justified in not going back, knowing that the registrar had been there and had done the ward round and that he could contact her if he was concerned.

Q. If for any reason she was alive to the fact that perhaps she had been difficult to get hold of, so any efforts maybe would not have been successful, so you can't

necessarily conclude anything about what's happening in the ward by the fact that nobody has reached her. Let's say that's the situation. Would it then have been appropriate for her to have gone to the ward just before she left for the clinic?

MR FORTUNE: Sir, we've gone into a lot of ifs, ifs, ifs, ifs. How far is this speculation --

THE CHAIRMAN: Let me put it more simply: Dr Sands took the ward round and was sufficiently concerned about Claire's condition that he went off to look for Dr Webb. In other words, to bring in a specialist.

A. Yes.

THE CHAIRMAN: It seems to me that he would have been unlikely to do that directly unless he could not contact Dr Steen. Is that the way it would appear to you?

A. I really don't know the answer to that question. I don't know whether Dr Sands would have gone to Dr Webb because he couldn't contact Dr Steen or because he felt he had already taken a decision that this child needed a neurological opinion and had rather, perhaps, overceded his remit as a registrar in reaching that conclusion.

THE CHAIRMAN: Let's suppose that he had formed a view that whatever Dr Steen thought, a neurological opinion was required, wouldn't you expect him to at least inform

Dr Steen of that decision as soon as possible?

A. Yes, I would.

THE CHAIRMAN: Because what that means is that there's a child who's under Dr Steen's care, who the registrar thinks is sufficiently unwell that a further specialist opinion is required --

A. Yes.

THE CHAIRMAN: -- and Dr Steen should know about that from Dr Sands.

A. Yes.

THE CHAIRMAN: Because it would prompt her, if she's contactable and if she's available, to visit Claire herself --

A. Yes.

THE CHAIRMAN: -- and for her to liaise with Dr Webb.

A. Yes.

THE CHAIRMAN: And the one thing that we know didn't happen over the next 24 hours is that there was no liaison between them.

A. Yes. I agree with all that.

MR GREEN: Taking that slightly further, it's Dr Sands' evidence on the transcript for, I think, 19 October, page 182. It's the official transcript. He said that he thought obviously Dr Steen was the consultant under whom Claire was admitted, that he had been to speak to

Dr Webb and so on. And then further down, line 19:

"Well, I may have talked to Dr Steen by that point."

But then he goes on to give his definite recollection that he did speak to Dr Steen at some point after he had spoken to Dr Webb, but can't time the conversation with Dr Steen exactly.

So perhaps Dr Scott-Jupp might assist the inquiry if he comments upon what he thinks about the thought processes that Dr Steen should have been having once she was alerted to the fact that a neurologist had been brought on board.

THE CHAIRMAN: Yes. If you're the consultant in this setting, which I know is slightly different to your own setting, and your registrar has brought in a neurologist and then talks to you about having brought in the neurologist, what do you expect the consultant paediatrician to do?

A. I think that would vary from one hospital to another, so it's difficult to be too definite about this. There has not been an agreement at this stage to hand over Claire's carefully to Dr Webb because it seems that at this point he might not have even seen her. So the general consultant, i.e. Dr Steen, if I had been in her situation, I would have wanted to discuss with Dr Webb, either before or after he had seen Claire, and I would

have wanted to remain involved.

Would I have felt the need to actually physically see her if I knew Dr Webb was coming? Not necessarily. If I knew that the ... If the registrar had adequately briefed me on the position that I felt it was appropriate for a neurologist to become involved, I might have been reassured that it wasn't necessarily essential to see Claire then. In my own personal practice, I think I would have done, but speaking for others, they may not have felt the same way.

MS ANYADIKE-DANES: Would it not have assisted the discussion that you think you would have wanted to have with Dr Webb if you had actually seen the child?

A. Yes.

Q. And if you realised that your opportunity, realistically, for seeing the child was that morning, if you were going to see the child before Dr Webb saw her, because you had a clinic that afternoon, does that not make it more likely or not that you might have tried to see the child before you left?

A. Yes, certainly it would have been good practice to pass through the ward before going off and doing a clinic in the afternoon --

Q. Yes.

A. -- and see the child and had the relevant discussions,

yes.

Q. The point that I was going to put to you just before Mr Green rose is that, at one point, Dr Sands' recollection was that he thought, for whatever reason -- and he didn't know what the reason was -- his view was that Dr Steen was not contactable by him during the morning. If that's the case, and if Dr Steen presumably would have appreciated that herself, the question that I was asking you is: would it have been appropriate for her to have passed through the ward before she went off to her clinic in the afternoon?

A. Yes, it would.

Q. Thank you. Does it make any difference to your answer that she may have known that her registrar was himself going to be involved in a clinic in the afternoon? So he was likely to be at a clinic and she was at a clinic. Would that make any difference as to the significance of her seeing the child first?

A. Yes. If she had known that the SHOs were going to have effectively no registrar, I think that should have prompted her to provide more advice and availability during that lunch period.

Q. In fairness, I think Dr Sands' view is that he would have told his SHOs how to reach him, so it's not quite the point that he would be himself un-contactable; it's

all just a matter of degree and accessibility. So in those circumstances, would you still have thought that it was appropriate to see the child or maybe more appropriate to see the child?

A. I think if Dr Steen had been aware of the seriousness, it would have been appropriate to see the child whatever the registrar was doing that afternoon. I don't actually think that's a major factor in whether she should or shouldn't have seen the child.

MR GREEN: If I can nail this point down and go to page 185 of the same transcript, please, sir.

THE CHAIRMAN: 19 October?

MR GREEN: Yes. Thank you. At line 19, when asked how he would have described Claire's condition to Dr Steen when he spoke to her at some point that day:

"I think I would have described it in much the way you have done [that's to Ms Anyadike-Danes], starting with how Claire had been admitted, what her presentation was, and perhaps most importantly what I felt, because I had just examined her on the ward round, and what my specific concerns were."

And then over the page on to 186, at the top:

"Question: Is there a phrase beyond that which might describe how seriously you regarded her?

"Answer: 'Neurologically very unwell' is a term

that I've used, I think, in witness statements, and I think did describe how I felt about Claire, that her problems appeared to me to be neurological and of a serious nature."

And then a critical question from Ms Anyadike-Danes:

"Question: What was your expectation that Dr Steen might do as an as a result of realising her patient was in that condition so far as you saw it at that stage?

"Answer: I'm not sure. I'm not sure at the time what I would have expected Dr Steen to do except to perhaps keep in touch, preferably to talk to Dr Webb if at all possible."

And I wonder if Dr Scott-Jupp could comment on the proposition that perhaps the bare minimum that could have been expected, once contact was made, is that Dr Steen would have kept in touch and talked to Dr Webb if at all possible.

MR FORTUNE: Before we go to that, my learned friend Mr Quinn tried to nail this point by way of reassurance. It's page 236. It's after a question from you, sir, at the top, line 2:

"I think you have said you have difficulty understanding how any such reassurance could have been given."

Dr Sands says:

"I do, sir, unless Dr Steen -- and this is all hypothetical -- believes that Dr Webb has taken everything on board and is fully in control and is content with the situation. That's the only way I could construe that Dr Steen might feel somewhat reassured, but not completely."

THE CHAIRMAN: The reassurance that's being referred to there is Dr Steen's suggestion that her normal practice would have been that she would call from Cupar Street when it finished or that the ward would ring her as she was finishing Cupar Street and she would ask what was going on and she somehow got some reassurance that Claire's condition was now okay or less serious.

MR FORTUNE: Or in safe hands.

THE CHAIRMAN: Yes. And the question then is to Dr Sands. He had suggested that he had difficulty understanding how any such reassurance could have been given in light of the fact that when Dr Webb came in at 2 o'clock, he began to prescribe more treatments, but still on the basis of an uncertain diagnosis. So I think where this comes back to is the point that was being made to you by Mr Green, from the back left, that Dr Sands' view, which perhaps chimes with your own, is that you would not necessarily have expected Dr Steen to come and see Claire before she went to Cupar Street, but you would

have expected her to become involved and to keep herself involved about what was happening; is that right?

A. Yes.

MR GREEN: Also, sir, it perhaps raises the rhetorical question: how could Dr Steen have taken comfort from what she was told by Dr Webb if it was as full as is perhaps being suggested?

THE CHAIRMAN: Or from what she has been told by the ward?

MR GREEN: Exactly.

THE CHAIRMAN: Sorry, but I'm not sure that there's evidence that Dr Steen spoke to Dr Webb.

MS ANYADIKE-DANES: No, there's no evidence [OVERSPEAKING].

THE CHAIRMAN: I thought you suggested a moment ago about how she could have taken reassurance from what was said to her by Dr Webb, but it's what was said -- the question is if she did -- this is all hypothetical -- whether there was, in fact, any contact with the ward at about 5 o'clock. And the question, which is really unclear, is how could anybody in the ward have expressed a view about Claire's condition, which would have given Dr Steen the assurance that meant that she did not need to come back to see Claire?

MR GREEN: Absolutely. But my point was a slightly different one, namely that it still leaves the question in the air, even if we park that hypothetical question

for the time being, what Dr Steen should have done following the conversation with Dr Sands --

THE CHAIRMAN: Yes.

MR GREEN: -- about the referral to Dr Webb and about Dr Sands' grave concerns about her neurological presentation.

MS ANYADIKE-DANES: Thank you very much, Mr Green. That's exactly --

MS O'ROURKE: Sir, could I just add to that if Mr Green's making that point because when he made the point a few moments ago and referred to Dr Sands' witness statement, he was referring to a passage that said:

"... if everything was under control because of the involvement of Dr Webb."

I'm not aware that there's any evidence given that anybody tells that to Dr Steen. In other words, Dr Sands repeatedly says, "I don't remember the full extent of the conversation, but I know I spoke to her". So where is it being said that Dr Steen was given the information that everything was under control with Dr Webb when again, sir, as you pointed out, there has been no conversation between Steen and Webb?

MR GREEN: Can I assist my learned friend? Page 182, the transcript of 19 October, 2012.

THE CHAIRMAN: Yes, okay.

As you'll observe, doctor, from the number of interventions from the floor, there's some degree of tension about this. What does not appear to be in dispute is that there was no direct contact between Dr Steen and Dr Webb. There does appear, on one interpretation of the evidence, Dr Sands' evidence, to have been one conversation between him and Dr Steen at some point on the Tuesday. This was after he had, at least, decided to bring in Dr Webb because of his concerns about Claire's condition.

There is effectively no evidence that Claire's condition improved substantially on Wednesday. In fact, if anything, it was deteriorating. And in these circumstances, do you agree that it's hard to understand how, if there was a conversation with Dr Steen from Cupar Street and she was given any accurate information, how that could have reassured her about Claire's condition. We have to assume the information was accurate? She may have received inaccurate information, I suppose, which could somehow have reassured her. But if somebody gave her accurate information, surely she could not have been reassured about Claire.

A. I agree, yes. The condition of Claire as described would not have been reassuring. The only thing that she might have found reassuring was that Dr Webb was already

involved.

THE CHAIRMAN: Yes. It's Dr Steen's position that Dr Webb did not take over Claire's case.

A. Yes.

THE CHAIRMAN: And if Dr Webb had not taken over Claire's case, but was assisting with it, then do I have it right in believing that Dr Steen should then have come to see Claire?

A. I believe so, yes.

THE CHAIRMAN: When say "then", I mean at the latest when she was leaving. Because she says on previous occasions she has done back into the Children's Hospital after she leaves her clinic to see a patient who's causing concern. So if she received any level of accurate information and, in any event, since she knew that Dr Webb was contributing to Claire's care, but had not taken it over, should she have come back in at that point?

A. Yes, or as a minimum have spoken to Dr Webb directly by phone.

THE CHAIRMAN: Yes. Thank you.

MS ANYADIKE-DANES: Thank you, Mr Chairman.

Just one point in terms of clearing up a point that has been bandied about in terms of whether Dr Sands did tell Dr Steen that Dr Webb was involved. One sees it

from Dr Sands' witness statement, 137/1 at page 16. It's 7(d):

"I recall that Dr Steen was informed on the afternoon of 22 October that Dr Webb had been consulted regarding Claire. This was by telephone as Dr Steen was not in the hospital. I believe it was me who spoke to Dr Steen."

I believe he may refer to it again at page 20.

THE CHAIRMAN: If you just pause there. If Dr Sands did speak to Dr Steen in the afternoon, it'd be an astonishing omission if he didn't mention to her that Dr Webb was involved in assisting with Claire's care, wouldn't it?

A. Yes, it would.

MS O'ROURKE: Sir, can I make clear my interjection, to which Mr Green responded? I wasn't saying there wasn't evidence that Dr Sands was saying there had been such a conversation, I was saying we don't know the content of it because Mr Green had referred to the fact of if somebody had told Dr Steen that Dr Webb was now in full control, which suggests Dr Webb's doing something more, in other words taking on the patient rather than giving some advice in respect of it, and therefore taking it out of Dr Steen's hands. And I'm saying -- unless I've missed it and others obviously know the evidence better

than me -- I'm not aware that Dr Sands has said any more than, "Yes, I had a conversation with her and, yes, I told her that Dr Webb was involved". In other words, he's not recalling the detail of that conversation or whether he said Dr Webb's taken over or what Dr Webb's doing or the detail. So it's not an issue about whether there was a conversation; it's about the detail of that conversation and what impression that would have given Dr Steen at that stage in time as to the degree of involvement of Dr Webb.

THE CHAIRMAN: It's hard to see how Dr Sands could have said to Dr Steen that Dr Webb had taken over Claire's care.

MS O'ROURKE: Indeed.

THE CHAIRMAN: If Claire's care is going to be taken over, it has to be, effectively, with the agreement of Dr Steen, doesn't it, because she is the named consultant?

MS O'ROURKE: Sir, that's my point. It's simply because Mr Green had referred to part of the transcript that said:

"... and if there was reassurance that all was now in control of Dr Webb."

And that might lead some people to believe, when you talk about "in control", they've taken over the patient. It's a different matter to say, "I'm giving advice as an

expert", and that's how I've read Dr Scott-Jupp's reports and, indeed, understood his evidence to date, that that's what he would accept is more normal. It's not that the patient's taken over and Dr Steen's dropped out.

MR GREEN: Perhaps the fullest account of the conversation between Dr Steen and Dr Sands is at page 185 of the transcript of 19 October. And follows on to page 186, if they could be brought up together. I'm not going to read tranches of it out, but you see there, sir, what Dr Sands' recollection, supplemented by what he thinks, reconstructing it, he would done, is about this conversation with Dr Steen and what his expectations of her would have been as a bare minimum.

THE CHAIRMAN: Thank you.

MS ANYADIKE-DANES: We're going to leave this point soon, but I'm still trying to make sure that we have your clear evidence as to what you think Dr Steen ought to have done about seeing Claire before she left for Cupar Street. You've had a number of scenarios put to you. Leaving aside whether she spoke to Dr Sands at that point and he conveyed to her at that point that he thought that Claire was neurologically very unwell, I think you have suggested it would have been at least prudent for her to have kept in touch with the ward and

seen what the position was before she left for Cupar Street; would that be fair?

A. It would have been prudent, yes.

Q. Right. I wonder if we can pull up Dr Sands' witness statement, 137/1 at page 15. If we can pull up page 16 next to it, please. The question really emanates from 7:

"However, I and the ward team felt that she was really very unwell."

And:

"Identify all the member of the ward team and specify their position."

And he goes on and says that. He says:

"My statement that I and the ward round team felt that Claire was really very unwell reflects the ward round discussion and the feeling that Claire was very unwell from a neurological viewpoint."

He says that is what prompted his action to go to Dr Webb. If you go to the top of page 16 at (c):

"Identify the members of the ward team who felt that she [Claire] was really very unwell."

He said:

"I believe it was the combined feeling of the ward round team that Claire was very unwell neurologically. I recall that this included medical and nursing staff on

the ward round."

So the question that I'm putting to you is: if she had contacted the ward, as you thought was prudent, it would seem at least from Dr Sands' evidence that anybody who spoke to her, whether it was a member of the ward round team or the nurses, would have been telling her that they all thought that Claire was neurologically very unwell and they presumably would have known that Dr Sands was off to try and get some assistance from Dr Webb, the neurologist. So if that's what she had learnt from a nurse or a doctor, whomsoever, in your view should she have come and seen Claire before she left for Cupar Street?

A. Yes. I think she should, but if she had been reassured that Dr Webb was definitely going to see Claire and there was going to be some consultant involvement at that level, that might have made it less imperative for her to see Claire straightaway.

THE CHAIRMAN: But she would want to know what the outcome of Dr Webb's --

A. Yes.

THE CHAIRMAN: -- assistance was and that would influence her in deciding whether she should then come back in because she would want to speak to Dr Webb. She'd also then presumably want to speak to Dr Sands, she'd want an

update from Cupar Street and then decide whether or not to come in at 5 o'clock.

A. Yes.

THE CHAIRMAN: And if she's getting accurate information from any of these conversations, then the only possible course of action for her would have been to go and see Claire.

A. Yes.

MS ANYADIKE-DANES: Might she have wanted to know before she left when it was anticipated that Dr Webb might be seeing Claire and might she have wanted to talk to him before she herself went off to Cupar Street?

A. Yes.

Q. That would have been reasonable?

A. That would have been reasonable, yes.

Q. In her position, what would have been your conduct?

A. I would have wanted to see the patient and speak to Dr Webb.

Q. Thank you. Because we've jumped a little bit on because we were dealing with the contact with consultant. If we deal with the ward round. From your point of view, how significant was it or not that the consultant paediatrician was not there to lead the ward round?

A. It was not unusual for ward rounds to be led by registrars, and even today often ward rounds are led by

registrars. There's nothing remarkable about that. This however was a post take round, by which I mean a ward round done on a ward which had been receiving acute admissions the night before. Most departments arrange themselves so that the consultant who would been on the night before would have been available during the day to do the post take round, which is an important ward round, obviously, because that's when you're reviewing patients like Claire who have been admitted very unwell the night before.

However, that doesn't oblige the consultant to attend the ward round; it's just that the timetables are usually arranged so it makes it easier for them to do so.

Q. And this is a teaching hospital. I think Dr Steen's evidence was that a ward round was one of those opportunities where there was teaching with not just the junior members of the medical team, but also students.

A. Yes.

Q. I don't know if your hospital is a teaching hospital.

A. No, but we do have students.

Q. So does that make it any more likely that, if it's possible, a consultant should be leading the ward round?

A. Not really. Regarding teaching, there are two ways in which that can be done. Either the students can just

tag along with the ward round, observe what's happening and just pick up information by listening and absorbing, or one member of the team can actually go off and actively teach the students on the patients that they're seeing, while another member of the team examines the patient and speaks to the parents. And that's one way that it is sometimes done.

Now, that could be either way round. It could be consultant seeing the patient and the registrar teaching the students or vice versa.

Q. In terms of Dr Sands' examination of Claire and the differential diagnoses he formulated as a result of that, the evidence was that although Claire had been thought to have improved some time earlier in the morning, at least by the time her parents came -- and maybe slightly before that for the nursing staff -- there was a view that such improvement had dissipated and she wasn't improving, and her parents definitely had that view. And Dr Sands, when he saw her, his evidence was that he could understand why the parents had the view that they did have.

In those circumstances, have you any comment as to how long you think he might have spent examining Claire and discussing with her family?

A. Sorry, are you asking how long I think he should have

spent or how long he actually did spend?
Q. How long you think he should have.
A. On the ward round?
Q. Yes.
A. I would think maybe between 10 and 20 minutes would have been a reasonable length of time.
Q. Thank you. Your first report, 234-002-004, was that Dr Sands' diagnosis was not unreasonable at the time, but that other differentials, including encephalitis and encephalopathy should have been considered.
A. Yes.
Q. Dr Sands' evidence was that he did discuss encephalitis during the ward round. If he had discussed that, would you have expected the SHO to have recorded that?
A. Yes.
Q. And if he had discussed it and formed a view that that was a differential diagnosis along with his status epilepticus, what do you think should have followed from that in terms of tests and treatment?
A. From his consideration that the encephalitis --
Q. Yes, yes.
A. There are two separate issues. There's the status epilepticus and the encephalitis, which are related but they're not synonymous.
To deal with encephalitis first, the investigations

that I think should have been considered during the day are a CT scan of the head, as we've already mentioned, possibly doing more investigations for a potential viral cause, which would including doing -- I won't list the investigations, but looking for potential viral causes. And possibly, but only after a CT scan, doing a lumbar puncture.

Q. Can I just confine you for a moment to Dr Sands having done the ward round and, in the course of the ward round, according to him, formed the view that a differential diagnosis is encephalitis.

A. Yes.

Q. I'm going to take them each in turn. He has status epilepticus, encephalitis and encephalopathy. On the encephalitis front, if he had formed that view, what should have been prescribed in terms of further tests or treatment to address that at that stage?

THE CHAIRMAN: The CT scan. That's what he said.

MS ANYADIKE-DANES: I think Dr Scott-Jupp said "at some time during the day"; I'm trying to see what should have gone in the note as prescribed.

A. That would depend on who had the authority -- sorry. Go back a bit. A CT scan should certainly have been considered. The practicalities of actually getting a CT scan would depend on the local arrangements and on

who had the authority to order one. It may be that Dr Sands did not have the authority to order a CT scan.

MR GREEN: Can I help on this? The reference is WS137/1 at page 36, where Dr Sands' evidence, as adopted when he gave his evidence on oath, was that the keys to the CT scan were in effect in the hands of the consultant neurologist.

MS ANYADIKE-DANES: Yes, I understand.

MR GREEN: And the same, whilst I'm on my feet, for an EEG.

THE CHAIRMAN: Thank you.

MS ANYADIKE-DANES: The question is: if that was something that he was considering, should he have recorded it or had it recorded by the SHO in the medical notes and records?

A. Yes, ideally. I suspect what was going through Dr Sands' head at the time, and he may have said this somewhere, was that if he'd already come to the conclusion that both a CT and an EEG were probably necessary, he would have got them done quicker by going straight to Dr Webb and bypassing Dr Sands [sic]. That might have been his line of thought at that time.

Q. This is Dr Sands.

A. Sorry, bypassing Dr Steen, I beg your pardon. And if he was aware that the procedure in the hospital at that time was that Dr Steen was not in a position to

authorise either a CT scan or an EEG, he may have felt that he could get Claire investigated more quickly by going directly to Dr Webb.

Q. I accept that. This is just the question: should it have been recorded in the medical notes and records?

A. It should have been. It may be that it was something that he felt he would come back and do later and then never did. There may be various reasons, but yes, it should have been.

THE CHAIRMAN: Sorry, what should have been recorded in the notes, the fact that he was going to ask Dr Webb?

A. That it had been considered that she should have had a CT scan or an EEG and that --

THE CHAIRMAN: Would that not be a bit unclear? Would that not be saying, "I think she might need a CT scan or an EEG, therefore I'm going to see Dr Webb because he can authorise it and it's up to him to decide whether that is the appropriate course"?

A. Yes. He may have felt he was not of sufficient experience and seniority to actually give an opinion on whether she should have a CT or an EEG, and therefore he would defer to somebody more senior before that would have been recorded. But there wouldn't have been any harm in recording it in the notes.

THE CHAIRMAN: He would not be recording a definite course

of action?

A. No. Because he wasn't able to take that action.

THE CHAIRMAN: He would be recording the fact that he was going to ask somebody else, who could authorise it?

A. Yes.

MR FORTUNE: There is, of course, the alternative. If Dr Scott-Jupp looked at 090-022-053 and saw under the heading "Plan", "rectal diazepam" and then "Dr Webb", how would he interpret that part of the plan, what would he be excepting Dr Sands to be saying in that plan?

A. The immediate treatment for non-convulsive status epilepticus is to give a rapidly acting anticonvulsant medication such as diazepam. So having considered that, to give rectal diazepam was an entirely reasonable treatment.

MR FORTUNE: I'm more concerned with the second line, "Plan, Dr Webb".

A. Yes.

MR FORTUNE: What would you interpret that to mean?

A. That she was sufficiently ill to require a paediatric neurology opinion. Neurologically ill.

MR FORTUNE: And potentially a CT or EEG?

A. Yes.

MS ANYADIKE-DANES: So just to finish off I think what Mr Fortune is getting at, but in the same way as

you have put or it was written, "Discuss with Dr Gaston re previous history", he might have put, "See Dr Webb re presentation, query CT scan, query EEG"?

A. Yes. I suspect Dr Sands felt that it didn't really need to be stated, that it was obvious to him -- and would have been to Dr Webb -- that that was a line of investigation that would have been gone down. I suspect the comment about "discuss with Dr Gaston", who was the consultant who had seen Claire much earlier, was a reminder to himself or his SHO to make a phone call, which would have needed some sort of prompt in the notes to remind people to do it.

Q. I suppose, in a way, some of this comes down to what is the purpose of the medical notes of records --

A. Yes.

Q. -- in terms of flagging up to those who weren't present when you were formulating your thoughts things that you have either intended to pursue or discounted or so forth. And that's why I think you're being pressed a little bit as to whether some of these alternative points or investigations along the way ought to be recorded.

A. Yes. Well, medical notes are often very incomplete, and this happens all the time and everywhere. There are a lot of things that should go in that don't. And

I don't think these notes are particularly worse than any other sets of notes that one could have found, then or now.

Q. If we just keep that page up --

THE CHAIRMAN: And put up the page before, which is the complete note. Could we have page 052 as well, please?

MS ANYADIKE-DANES: Thank you very much, Mr Chairman.

Starting at the bottom on the left-hand side and going up to where you were being taken to just now is Dr Stevenson's complete note of the ward round that Dr Sands undertook. In terms of what Dr O'Hare thought would happen, that there would be a complete review, I think she said, because she wasn't 100 per cent certain what was wrong with the child, is there any evidence that there has been here a complete review of Claire's condition with a view to formulating a differential diagnosis as to what was causing it?

A. It is quite a brief ward round note, but the note doesn't usually, in a ward round, always reflect the amount of time that was spent seeing the patient. It depends on the time available and the conscientiousness, if you like, of the person doing the writing.

Q. Do you see any evidence of her fluid regime having been reviewed?

A. No. There's just a note that she is on IV fluids.

Q. Yes. Do you see any evidence of there having been either a set of blood test results from that morning or a direction that there should be blood tests taken?
A. No.
Q. Do you think that should have been there?
A. Yes, as I've already said.
Q. You might have said this before, and I apologise if you've answered it, but in terms of the possibility of there being some sort of underlying viral trigger to some of her presentation, do you see any evidence as to what's being done about that?
A. Well, as I've said, unless you have made a diagnosis of encephalitis or a provisional diagnosis of encephalitis, most viral infections do not require any treatment. So I don't think that needs explicitly stating in the notes. You'll find many children who are admitted to a children's ward overnight, the diagnosis is "viral illness, no action".
Q. There is a differential diagnosis of encephalitis.
A. Yes.
Q. So him having done that, what do you think should have followed on from that?
A. I think they should have considered treating with acyclovir and that may be one of the things that Dr Sands intended to discuss with Dr Webb.

Q. I think when I asked you about acyclovir before, you said that there wasn't a particular downside to having instituted it. Is there any reason why he, as a registrar, couldn't simply have prescribed that?

A. No, except that he may not have encountered this particular situation before. It's unusual.

THE CHAIRMAN: This is really why you need a consultant, isn't it? Because as it turns out, Claire wasn't one of those patients who a registrar could easily take. Claire was a more complicated case. Unfortunately, Dr Steen wasn't there and things begin to go wrong.

A. Exactly.

MS ANYADIKE-DANES: I think Dr Sands' evidence was, not in relation to encephalitis -- he is quite clear in his evidence that encephalitis was discussed during the ward round. Claire's parents don't ever remember him using that expression, but leaving that aside, his evidence was that he spoke to Dr Webb and, as a result of speaking to Dr Webb, he formed the view that encephalopathy should be added as a differential diagnosis. So I think his evidence is that he came back, therefore, and added to her notes, added the encephalitis, which wasn't there, and added the encephalopathy, which resulted from his discussion with Dr Webb.

If he was doing that, so we're no longer in a position pre him having a discussion with Dr Webb, would it have been appropriate at that stage for him to have prescribed acyclovir or something of that sort to address the encephalitis?

A. It would have been appropriate, yes.

MR GREEN: Sir, in the interests of enabling Dr Scott-Jupp to see very shortly what was being said by Dr Sands when he gave his evidence, the transcript at page 118 for 19 October. At line 19:

"Question: And if you were going to put in train the kind of test to help you or any consultant coming after you who was going to deal with Claire's care as to what might be causing the seizures, what sort of test do you think, from 1996, you would have wanted to have carried out?

"Answer: At the time, I think I would have particularly wanted to get advice from a neurologist to advise on that because I think I would have felt unable to put down a comprehensive plan or -- maybe not unable to, but it would have been better, more efficient, more full to get that advice about those tests from a consultant neurologist."

And then again on page 120 of the same transcript, line 17, and there was a run-in to this, the various

records, as they stood at the point when Dr Sands went to Dr Webb:

"Question: If those are all things that you could have known about and therefore could have prescribed or put in the plan for the SHOs to do, why didn't you?

"Answer: I think because my impression was that I was going to speak to Dr Webb and that he, in fact, would come -- I hoped soon -- and would give us a steer, give us a direction to go down because it seemed to me quite clear that this child, Claire, had a major neurological problem that Dr Webb would be able to help us with and he would guide us in terms of investigation or lines of investigation, rather than me suggesting a number of investigations."

Pausing there, while I'm on my feet, I will give the reference. It's page 160 of the same transcript, where Dr Sands relates a specific recollection. He doesn't have a lot of direct recollection about the detail of the conversation, but he specifically recalls discussing a CT scan. And I wonder if Dr Scott-Jupp could be asked: is it reasonable, when faced with this sort of presentation, for a registrar of but four months' experience to take his lead from an experienced consultant neurologist?

THE CHAIRMAN: You mean take a lead generally in relation to

a CT scan, acyclovir, whatever?

MR GREEN: The lot, yes.

THE CHAIRMAN: Is that appropriate?

A. Absolutely appropriate, yes. If Dr Sands had been confident that he could get advice quickly and appropriately from Dr Webb, then it would have been entirely justifiable for him to not initiate any investigations or treatment himself. I think it's a question of timing.

THE CHAIRMAN: Just to finish that, when you say it would have been appropriate for Dr Sands to prescribe acyclovir then, are you also saying it was equally appropriate for him not to prescribe that but to wait for what he expected to be a relatively short time and Dr Webb would come to help and maybe give a more comprehensive and more expert analysis?

A. Yes. If there was going to be a delay, though, and for whatever reason Dr Webb couldn't come fairly soon, he should have sought advice from someone else senior.

MS ANYADIKE-DANES: On the acyclovir?

A. On everything, but on that particular issue of immediate management, yes.

MR GREEN: Just so that Dr Scott-Jupp understands the full picture, it would appear that there was nobody else more senior with this expertise in the vicinity at the time.

And also so he understands the timeline, we know that Dr Sands had administered the rectal diazepam at 12.15 from the note, and that at 1 o'clock that afternoon the central nervous system observations began and the general observations were discontinued.

THE CHAIRMAN: Thank you.

MS ANYADIKE-DANES: Can I ask it in this way: as I understand the position, Dr Sands had a discussion with Dr Webb before Dr Webb actually arrived to examine Claire, which is what happened at about 2 o'clock in the afternoon. By that time, Dr Sands, it seems, had already had to leave for his clinic, which may have happened at about 1.30.

As a result of the discussion with Dr Webb, it seems, the evidence seems to be that he was confirmed in his view that rectal diazepam was appropriate and he also was given the indication that encephalopathy is something that should have been considered. So if he has already got part of a treatment plan in terms of Claire, which actually addresses the neurological side of things, which is the rectal diazepam, would a registrar in 1996 have appreciated that acyclovir is medication that can be used for encephalitis?

A. I'm trying to recall when it first became available. I think it became available in the 1980s, from my

memory. So it would have been around for a while. It certainly had been used at that time for several years. Whether it would have been within the expected competence of a registrar of Dr Sands' grade, I would find it difficult to be certain about. It's possible that he was not aware that that was an appropriate treatment for encephalitis.

Q. Well, maybe at some stage during the break we will check the book that was -- the ready reckoner, if I can put it that way, that was available to the clinicians. It's called the paediatric prescriber. It's the third edition, July 1994, that the Royal produced. They also had some textbooks, but they may not have been readily available -- that apparently was -- and they had the BNF, of course. We'll check in there what it says about the use of acyclovir.

In any event, if it turned out to be something in that book and something that it would have been appropriate for him to have been looking at the book, is that something that would have been better to have started sooner rather than later, if I can put it that way?

A. Yes, but I rather doubt that a relatively junior registrar, as Dr Sands was at the time, would have taken that decision completely on his own. I think it's the

sort of decision that is normally taken at a slightly more senior level. Even though we now know that it's fairly harmless and one could almost say routine when encephalitis is suspected, I think it was somewhat less so in 1996.

Q. Is it something that he could have been discussing with Dr Webb as to, "What do we do about the encephalitis element of it? You have helped me with the rectal diazepam, but is there anything I should be doing in relation to the encephalitis?" Would that have been a reasonable discussion to have had?

A. It would, and my own experience is that whenever an unexplained acute neurological illness occurs in a child, one of the first things that a paediatric neurologist, when one speaks to them on the phone, normally advises is: start acyclovir early on. Because it may not be, it may be unnecessary in hindsight, but it doesn't do any harm.

Q. Thank you. As for the status epilepticus, if we go back, but before the encephalitis and encephalopathy was added, what he actually thought, his impression, to be fair to him, it wasn't so much a diagnosis as an impression of what was happening, was non-fitting status. Given that he is a junior registrar, as Mr Green pointed out, was that an appropriate diagnosis

on the available indications for him to be reaching?
A. I'm slightly surprised that a relatively inexperienced registrar came to that conclusion so readily because it's a difficult diagnosis to make, clinically, and it's not common at all. So I think that was surprising to me.
Q. If he knew enough to believe that that was what is happening, would he have been wanting to raise or should he have been perhaps raising with Dr Webb, as the only person who can help him there, as to whether there should be an EEG done?
A. Yes. Can I just point out about the EEG? We have talked a lot about it being diagnostic in non-convulsive status epilepticus. It can also be helpful in the diagnosis of encephalitis in the absence of status epilepticus. A neurologist would know more about this than me, but sometimes it can help. There are certain abnormalities in EEG pattern which you can see in encephalitis as well.
Q. So that EEG would have assisted with at least two, if I can put it that way, of those differential diagnoses?
A. Yes.
Q. Thank you. If you had been about as the consultant paediatrician and had had the opportunity to discuss with Dr Webb, just so that we're clear, what exactly

would you have been discussing with Dr Webb?
A. At that time, I would have been -- well, had I been in my own unit, I would have been discussing transfer to the tertiary centre, but given that Claire was already in a tertiary centre, that's obviously not relevant in this case.
Q. If we just we pause there: if that had happened in your hospital, you would have been discussing transferring Claire to the tertiary centre?
A. Not necessarily acutely and immediately, but I would have been discussing it as one of the options, yes.
Q. And why would that have been?
A. Well, okay, this comes back to -- going back a step -- the EEG question. As we were discussing earlier, EEG is often not available in a small district general hospital and one reason for urgent transfer or a reasonably urgent transfer would be to get an EEG if there was no technician available. It's obviously better if the technician can do it there and then, but if there's no technician available, transferring the child might be the only way of getting it.
Q. But that's not the situation we're in here?
A. No.
Q. So given that you're in the Children's Hospital in Northern Ireland, if I can put it that way, what would

you have been discussing with Dr Webb or wanted to discuss with Dr Webb?

A. Well, what we've already mentioned. What investigations need doing urgently, what urgent treatment needs doing. So getting a CT scan, getting an EEG done, doing other diagnostic investigations, including possibly further blood tests for evidence of a viral infection, and possibly, after the CT scan, doing a lumbar puncture.

Q. And why is that?

A. Because a lumbar puncture, its main purpose is to diagnose meningitis, which wasn't the picture in Claire, but it can also be helpful in diagnosing encephalitis.

Q. Thank you. I was going to move on to the EEG. The evidence from Dr Webb is that there wasn't a possibility in his view of an emergency EEG. You might be able to get an urgent EEG, but in any event, given that the EEGs were very often for outpatients -- not entirely, I think his evidence was that you could also have patients on the ward who required one and you would book one, if I can put it that way. But ultimately, his evidence came down to the fact that there would already be slots with patients allocated to them. So it's really a question of actually getting your patient a greater priority than any of those.

A. Yes.

Q. So if that's the case and you are Claire's consultant paediatrician discussing that with Dr Webb, how urgently would you have wanted to have had an EEG done?
A. I would have wanted it done as soon as possible, even if that meant delaying a routine case.
Q. Another routine case?
A. Yes. Or even, for that matter, a less urgent case on the ward that was urgent but not as urgent as Claire.
THE CHAIRMAN: There is a distinction being drawn, which I presume is difficult to define, between an emergency EEG and an urgent EEG.
A. I don't think, in terms of EEG, there's such a thing as an emergency EEG. It's not a service that provides an emergency service, unlike radiology, laboratory medicine and everything else because the vast majority -- the vast majority -- of EEGs are done on an outpatient basis on people who aren't acutely ill and the numbers that are done urgently must form a tiny percentage of their workload. So there is no service set up anywhere -- I think even in a big neurological hospital -- where there is a 24-hour emergency call-out EEG service.
THE CHAIRMAN: Okay. If we understand emergency and urgent to describe somehow the extent to which one is needed immediately or as soon as possible, how urgent was it after the ward round for Claire to get an EEG?

A. I think it was same-day urgent.

THE CHAIRMAN: Thank you.

MS ANYADIKE-DANES: Dr Webb comes to see Claire at about 2 o'clock in the afternoon. You see his note there, although it's not noted in that way, but I think it's now accepted that it was 2 o'clock. Just so that we pull it up, 090-022-053.

Maybe if we can have the other page as well to get the complete note in. In your view, should there have been a member of the paediatric team present when Dr Webb was examining Claire?

A. That's actually quite a difficult question to give a direct answer to. General practice is, when a tertiary specialist comes to see a child on a ward or a specialist from another department, it's always advisable that a junior member of the team accompanies them. There are several reasons for that. Firstly, they can provide information that might not be immediately apparent to the visiting specialist. They can introduce the specialist to the parents, so they know who they are. They can then record and do the scribing in the notes of what the specialist says, if required, and they can go and check results, check what investigations have been ordered, and finally carry out the advice given in terms of requesting further

investigations, prescribing treatment and so on.

So it obviously makes it a much more efficient process if a member of the staff can be with the visiting specialist when they see a child. However, the practicalities are that it isn't always possible. The visiting specialist may come on to the ward at a time when there is no junior doctor present or available, they're tied up with other things, and that specialist, rather than waiting for a junior doctor to become available, may choose to see the patient directly without being accompanied by a member of the team.

Q. But if it's possible, it's better?

A. It's better if they can. If there wasn't a doctor available, they would almost always speak to a nurse.

Q. Yes. And apart from any other thing, I presume since you're bringing the specialist in, it is because you're not entirely sure of what's happening, so this is a way of not only seeing what the specialist is recommending in terms of a plan, but also understanding it --

A. Yes.

Q. -- so that one can understand the significance of certain things that may happen thereafter; is that fair?

A. Exactly and whenever a specialist consultation is sought, there's a big teaching element to it and quite often a large crowd will gather and hear the words that

are being spoken if people are able to come. So it can be made into a learning experience.

Q. Given what Dr Webb has recorded there as his examination, and unfortunately not only does it appear there may not have been any junior doctors to have accompanied him, but it seems also the parents weren't there. Both sets of grandparents were there, as I understand it, but her parents weren't there. You see the history that he takes. And then he examines Claire himself. Then he gives a view:

"Impression: I don't have a clear picture."

This is perhaps because he doesn't know sufficient of her history beforehand. And then he gives his suggestions as to what should happen. There are three strands of those: one is the anticonvulsant medication; the other is hourly obs; and then the third is "a CT scan tomorrow if she doesn't wake up".

Given that that's what Dr Webb thought was happening and what his plan was, would you, as the consultant paediatrician, have expected him to have contacted you and discussed that with you?

A. I think there should have been discussion between the two consultants. The question is whose responsibility was it to contact who? And that could go either way. Had I been the general paediatrician in charge of this

case, I think I would have wanted to speak to the neurologist and I probably would have made efforts to contact him. Some specialists would make an effort to contact the supervising consultant having seen a patient, others wouldn't; some would have thought it adequate to speak to a member of the junior staff.

Q. That's the difficulty, the registrar isn't there, for the reasons which have already been explained, and it seems, for one reason for another -- it's not entirely clear why -- that neither of the SHOs were there. So he doesn't have a doctor.

THE CHAIRMAN: Wasn't it quite clear from Dr Stewart's evidence last week because Dr Stewart said he remembered being --

MS ANYADIKE-DANES: I think he said he remembered him being about and he would have wanted to have been involved.

THE CHAIRMAN: He seemed to remember -- the recollection might not be correct -- Dr Stevenson being with Dr Webb and Dr Stewart being disappointed because he was looking after somebody else and he had an interest in neurology and he would have liked to have been part of that discussion.

MS ANYADIKE-DANES: Thank you very much. Perhaps I didn't pick that up from the transcript.

If that's the case, that Dr Stevenson actually was

there, although Dr Stevenson can't remember --
Dr Stevenson has, like many, no independent recollection of these events. He doesn't actually remember that. If he was present and Dr Webb had discussed his view with him and why he had reached that view, would it then have been reasonable for Dr Webb to think he had discussed things with the paediatric team and that he didn't need to initiate the contact with Dr Steen?

A. Yes. I would have thought he would have wanted to discuss it with somebody above SHO level. I would be surprised if he didn't. We don't really know from people's recollections whether he did or didn't.
I think that's fair to say.

THE CHAIRMAN: Dr Stevenson was a particularly inexperienced SHO.

A. Yes. To make that plan of treatment would have required some co-operation from the resident medical team and he would have needed to have spoken to them. That shouldn't have gone through a nurse.

MS ANYADIKE-DANES: So the upshot of it is, I think, that even if Dr Stevenson had been present, given that he was just an SHO and, as the chairman said, a particularly junior SHO, it would still have been appropriate for Dr Webb perhaps to have discussed that with Dr Steen?

A. Yes, it would have been appropriate.

THE CHAIRMAN: Just to go back for one moment to the acyclovir and the query about whether Dr Sands might have prescribed that at the end of the ward round, even before Dr Webb became involved. What do you make of that in light of the fact that it wasn't then prescribed, sure it wasn't, by Dr Webb?

MS ANYADIKE-DANES: Thank you, Mr Chairman. That's just where I was coming to.

THE CHAIRMAN: What was being floated with you was the idea of whether Dr Sands might be criticised for not prescribing acyclovir at the end of the ward round as he went off to get Dr Webb. And you were saying, well, he might have left it to see what Dr Webb said. Do I take it then that the fact that Dr Webb didn't prescribe it at 2 o'clock means that it's pretty harsh to criticise Dr Sands for not prescribing it earlier?

A. Yes, it would. Well, I'm not a neurologist, but I found it slightly surprising that Dr Webb didn't suggest acyclovir. I don't think I put that in my report; maybe I should have done with hindsight.

THE CHAIRMAN: The general picture of what went wrong is tolerably clear already and if individuals have to be criticised, they will be criticised, but it's a question of what the level of criticism is. In light of the earlier discussion and what Dr Webb did, it might be

a bit harsh to say that Dr Sands was somehow at fault.

A. Yes, I think it would be harsh to say that Dr Sands was at fault for not prescribing acyclovir for the reasons I have said: he was relatively inexperienced, he was going to get more senior help anyway, he had already decided to do that, so I agree.

MS ANYADIKE-DANES: I think also your view was that you thought it was appropriate for there to have been a discussion between them about how you treat the encephalitis or the viral element, if I can put it that way, and I think it was in the context of that that you thought the acyclovir could have been raised and, if it had, then it could have been prescribed at that stage.

A. Yes.

Q. But to pick up the chairman's point, if you thought that that was an appropriate thing to be doing just in that conversation between Dr Sands and Dr Webb, would you have considered it appropriate for Dr Webb to himself have addressed the issue in his plan or suggestion, if I can put it that way, for how the viral element of what was thought to be her differential diagnoses was going to be addressed?

A. Yes. It would have been appropriate. He said, "I don't have a clear picture". The picture of acute encephalopathy was probably postictal in nature. So

he was clearly, on that first consultation, of the opinion that it wasn't encephalitis. That seems to be the impression. He doesn't explicitly say that, but he thought her problem was seizure activity, that her abnormal neurological signs were related to that, without an underlying encephalitic picture.

Q. So although it seems from Dr Sands' evidence that the encephalopathy and the encephalitis may have been discussed with Dr Webb at some point, at this stage, you're interpreting his note to suggest that that had been reduced, that thought, in favour of the seizure activity?

A. It would seem so from what's written here.

Q. And are you able to see what further information could have been available that could have reduced the significance of encephalitis/encephalopathy?

A. No, I think the information was available on the ward round. There was nothing new between then and when Dr Webb came at 2, I think. There were no new results and she -- all I can say is that she hadn't, over that period of time, developed a fever or any other signs that would be associated with an acute infection.

Q. So then if we deal with that suggestion of his that this is most probably postictal in nature --

A. Yes.

Q. Are you aware of a diagnosis like that, that her presentation is postictal?
A. Well, postictal refers to the state anybody is in after having a seizure, and her reduced conscious level -- one of the commonest reasons for reduced conscious level in a child is that they've had a seizure.
Q. Yes. Would you have expected that to have been the case still at 2 o'clock?
A. It does seems a very long time, I admit. So usually it's only a matter of an hour or two.
Q. I'm just going to pull up something that I pulled up in relation to -- I think it was Professor Neville's evidence. It's 097-001-001. This is a note. Dr Dewi Evans, whose report you've seen, was a consultant paediatrician retained by the PSNI, and this is a note that's made of a telephone conversation, so it's a little bit removed. But in any event, the point you'll see that's coming is that Dr Dewi Evans says that he has consulted with an intensivist consultant paediatrician -- that's Dr Dawn Edwards -- and she has confirmed three things:

"Postictal abnormalities disappear by at least three to four hours [presumably after the seizure]. That problems remained at 9 in the morning."

So she was relating her potentially coming in with

a postictal condition, and if that was the case, if you had problems at 9 in the morning then that was serious and she would have been worried after an hour. So it's a little bit removed but that's her view. I pulled it up for you because you just expressed a view as to how you would have been surprised that what was happening was an actual postictal presentation at 2 o'clock in the afternoon.

A. Yes, although there's a slight inconsistency. Because if somebody is in status epilepticus, they don't have a postictal phase, they're fitting continuously. So I'm not entirely clear what Dr Webb meant by that, whether her state was ongoing seizure activity or recovery from earlier seizure activity.

Q. Does status epilepticus mean you fit all the time?

A. No.

Q. Or you fit periodically?

A. You fit periodically. He may have intended to mean that it was difficult to distinguish when she was at reduced conscious level because she was in a non-convulsive fit or whether she was at reduced conscious level because she had just finished having a non-convulsive fit.

Q. That's what I was just going to ask you. And if it was of the non-fitting sort, you wouldn't see any of that at all, so you wouldn't be able to determine whether there

was a fit going on or whether this was the aftermath of a fit that had happened.

A. Exactly?

Q. And the only way to be sure about that is to have an EEG to see whether you're having any fits at all.

A. Exactly.

Q. Thank you.

THE CHAIRMAN: We keep coming back to that, don't we? Claire needed an EEG.

A. Yes.

MS ANYADIKE-DANES: Can I ask you about the consultant responsibility in relation to the IV fluids management. If we can pull back up the early part of that page, which is 053, so that we have the two. When I was taking you through that, you said there was no reference to -- I don't think you did say that. Maybe I didn't ask you. There's no reference there to any review of her fluid regime that you can tell.

A. From the ward round note, do you mean, or from Dr Webb --

Q. From Dr Webb --

A. No.

Q. Part of that might be that Dr Webb was under the impression that the 132 serum sodium level was one that came from what he said was the routine bloods that were

taken for ward rounds as opposed to actually coming from 9, 9.30, the previous evening.

A. Yes.

Q. So he was under that view?

THE CHAIRMAN: Just pause there. Do you see how that mistake was made?

A. Yes. I can understand the way these things happen, that a mistake could quite easily be made.

THE CHAIRMAN: What, if you read the ward round notes?

A. Yes, if somebody reads the notes and -- can we go back to that ward round note?

THE CHAIRMAN: It's top left.

A. That's the ward round note, but -- yes, it was written on the ward round and Dr Webb clearly interpreted it as having been done on or around about the time of the ward round because there is no time attached to that note.

THE CHAIRMAN: So he must have been working on the assumption that it was done on the Tuesday morning before the ward round started.

A. Yes, before or --

THE CHAIRMAN: And the result was back in time for it to be recorded in the ward round notes --

A. Yes.

THE CHAIRMAN: -- because it precedes any plan or any diagnosis?

A. Yes, from where it's written, that's presumably what he assumed.

MS ANYADIKE-DANES: The person who wrote that ward round note is, of course, Dr Stevenson, who is the SHO that it's thought was there with Dr Webb when he was carrying out the examination. Was, at that time, Claire's serum sodium level a significant thing, do you think, for Dr Webb to have wanted to know about?

A. It was significant, but in the context of her other signs and symptoms, it wasn't the most important.

Q. Why I'm asking you that is because the very person who would have known whether the serum sodium level related to a blood test that was taken that morning or to a blood test result from the previous evening but was simply being copied back into the notes was present with him.

A. Yes.

Q. So since we don't have access to Dr Webb at the moment, and Dr Stevenson can't remember, what I'm putting to you is: if Dr Webb is coming to examine this child and trying to provide an opinion as to what's happening and what ought to be done, is part of the picture her serum sodium level?

A. It's part of the picture, but from Dr Webb's perspective, probably a fairly minor part of the

picture.

Q. I haven't got to that point. If it's part of the picture, is it therefore something that he should be told accurately what it is?

A. Yes, which is, as I was saying earlier, one of the reasons it's very useful to have a junior doctor accompanying a specialist when they see --

Q. Therefore, back to the chairman's question to you: if the very junior doctor who made that ward round note and would have known when those results relate to is there, can you see how he would have made that error?

A. Sorry, are you asking how Dr Webb could have made the error if the doctor was there?

Q. Yes.

A. He still could have made the error if he hadn't asked.

THE CHAIRMAN: And he might not have asked because you say, in his eyes, the serum sodium level would be relevant, but not one of the primary issues he's looking at.

A. Not one of the primary things. He might just have glanced at that note, made the assumption, not asked the SHO and not asked any further about it.

MS ANYADIKE-DANES: I think he makes a note about the biochemistry. Can we just highlight that? It's in the line above "suggest". On the right-hand side, "I note normal". There was a bit of debate as to whether it

said "no" or "normal". Ultimately, it has been interpreted as normal.

A. Mm.

Q. Was that normal?

A. Well, there's a semantic argument to be had about the precise meaning of the word "normal". I don't know if you want me to go into that, you may have heard it from others. The laboratory normal range, which with sodium is, I think, 135 to 147 or something, is not the same as what a clinician acknowledges as being the range outside of which one starts to become concerned. And frequently, with any laboratory result, but particularly with sodium, we see results that are outside the laboratory normal range. Perhaps I should just explain what I understand by "normal range" because it's important to realise that people vary, individuals vary, and that a laboratory normal range is a statistical description between certain statistical parameters as to what, if you take, for example, a serum sodium from a large number of people -- a certain percentage will be within that normal range, but a small proportion of perfectly healthy people might be outside those normal ranges for all sorts of reasons.

So a laboratory result that is outside a normal range is not diagnostic of a specific problem or

a condition.
Q. No, but does 132 still get described as "normal"?
A. I think that depends on what you mean by "normal".
Q. Right.
A. Sorry to be a bit evasive with that answer.
Q. That's okay.
A. The word "normal" is used in different contexts to mean different things.
Q. There's no specific reference to reviewing her fluid management in this note.
A. No.
Q. Is that something that you consider the neurologist might have given some guidance about?
A. I think this comes largely to the crux of this case whose: responsibility was it to manage Claire's fluids? It would have been entirely within the remit and reasonable of the consultant neurologist to advise on it. I think, as Claire was still under the general paediatric team, the primary responsibility for doing the tests and altering treatment on the basis of those tests still rested with the general paediatric team, Dr Steen's team.
Q. What guidance would you have expected him to have provided as to carrying out further tests or being alive to the significance or importance of her fluid

management?
A. To repeat the urea and electrolytes.
Q. And you would have expected that as part of his suggestion, if I can put it that way?
A. Yes. As a suggestion, although he understandably made the assumption that the general team would have been doing that anyway.
THE CHAIRMAN: That criticism is more importantly directed at the ward round, isn't it?
A. It is, but given that it wasn't done after the ward round, then it is more the responsibility of the general team, who knew that the 132 result had been quite a long time previously, more the responsibility of them to repeat it than it was the responsibility of Dr Webb to advise them to repeat it.
THE CHAIRMAN: So his misunderstanding of when the reading of 132 was obtained, if we assume it was a misunderstanding, does that further reduce any responsibility that he has for not advising on fluid management?
A. Yes, to some extent.
MS O'ROURKE: Sir, can I just ask if while Dr Scott-Jupp is dealing with this, particularly if the ward round finished sometime around about 11.30 or 12.00, and indeed possibly even slightly after, since the rectal

diazepam was given at 12.15, and although we've talked about Dr Webb's note of whether it's 2 o'clock, the evidence of the parents was that they came back at 2.10 and there was no Dr Webb to be seen and Dr Webb's evidence is that he believed he was with Claire for 20 to 25 minutes. So it's a possibility -- and of course Dr Webb has yet to be heard from -- that Dr Webb in fact attended about 1.30, 1.40, and wrote his note up at 2 o'clock if he finished. So therefore, if he's dealing with it within less than two hours from the conclusion of the ward round, would you say the same thing in terms of the repeating the urea and electrolytes or expecting a further result to be available, bearing in mind it's less than two hours since the end of the ward round?

A. I think it would have been helpful for him to remind the general team of the ongoing importance of monitoring urea and electrolytes, not necessarily be that specific about precisely when the tests were done. Does that answer your question?

MS O'ROURKE: Yes.

Can I follow that up? When you say he would have reminded -- of course, and you'll be aware that what we consider is the reasonable average, whether somebody should have done something and fell below when they didn't or whether that would have been a good thing to

do, in other words, not quite the counsel of perfection, but it would have been a good thing to do. Are you saying --

THE CHAIRMAN: Sorry, this isn't a medical negligence case.

MS O'ROURKE: No, sir, and I'm aware of that. I'm just testing that when you say it would have been a good idea -- let me just get your exact words to remind ... "Yes, it would have been a good thing to do it, but it's not necessarily a criticism if you don't".

A. Yes; I accept that.

THE CHAIRMAN: Mr Counsell?

MR COUNSELL: I wonder if I could ask Dr Scott-Jupp to deal with this? He has given evidence that he can understand how it is that Dr Webb might have assumed that that reading was the morning's reading rather than the night's before. The evidence, I think, from Dr Sands, and insofar as he was able to deal with the practice, Dr Stevenson, was that it would not have been normal practice for a repeat blood test to have been done before the ward round on the morning and to have had the results within a time frame so that they would appear on the ward round note.

If you go to the transcript for 19 October at page 99, if that could be brought up. That is the transcript of Dr Sands' evidence. He's asked at line 13

by Ms Anyadike-Danes:

"I think the evidence that he gave [he being Dr Stevenson, I think] is that it would have been unusual to have had blood tests taken that morning and have got the result back, and therefore that been a result from the morning. And by 'morning', I don't mean the early hours ... He said that would be unusual."

And Dr Sands' evidence, I think, is that it would be unusual if that blood had been taken at 8 or 9 o'clock. I don't know whether Dr Scott-Jupp has factored that into his opinion when he indicated he could understand how Dr Webb could make that mistake.

THE CHAIRMAN: In other words, doctor, just to go back on this point again, if it wasn't a normal practice for blood tests to be taken before the ward round, would that make it more difficult to understand how Dr Webb understood that that was a result from the morning?

A. Not really. It depends on the practice at the time, on the turnaround time that the laboratory was able to achieve at that time in the morning, how results were communicated to the ward. It's very much a local, organisational issue. But say, for example, that it was common practice for the SHOs to go round and do blood tests at, say, 7 or 8 am, they could get the specimens

to the lab before 9, the lab could process them and maybe phone the result through the ward between, say, 9 and 9.30. They would have been on a little slip of paper for them to be presented to the ward round team and written in at the time they saw the patient on the ward round. That seems to be entirely feasible.

THE CHAIRMAN: But if that's not local practice? Professor Neville was perhaps on the same track as you, saying that the first missed opportunity to repeat the blood tests was overnight on Monday night/Tuesday. The second was by doing a blood test before the ward round on the Tuesday. But let's suppose this evidence is correct, this suggestion is correct, that it was not usual on this ward or in the Children's Hospital to do blood tests before the ward round and let's suppose that Dr Webb knew that that was not the normal course, then he should not have assumed that a reading of 132 was from that morning.

A. Yes, but I don't know whether Dr Webb would have known in that level of detail what the normal practice was on that ward at that time.

THE CHAIRMAN: Okay.

A. He may have done, I don't know.

MS ANYADIKE-DANES: In terms of Dr Webb looking at the medical notes and records when he came to examine

Claire, would you have thought it appropriate that he did look at the notes and records that were made since her admission?

A. Yes.

Q. Then if we look at --

THE CHAIRMAN: Sorry, so the short point is that if he'd done that, he would seen that the 132 came from around midnight or some time after midnight?

A. I see what you mean. He may have looked no further back at the notes made at the ward round. It's possible he didn't go any further back than that.

MS ANYADIKE-DANES: Sorry, if he had done that, so he had captured the beginning of the ward round, he would have seen 090-022-052. There we are. That's the ward round. So if he had looked at the ward round note, which you have just indicated he might well have done, immediately above the ward round note is the concluding part of Dr O'Hare in combination with Dr Volprecht's note.

THE CHAIRMAN: You have to be careful with that, don't you?

MS ANYADIKE-DANES: I said "in combination".

THE CHAIRMAN: Dr O'Hare is timed at midnight; Dr Volprecht isn't timed.

MS ANYADIKE-DANES: Sorry, I don't think I meant to say what time; I said he would have seen the concluding part. As

I understand Dr O'Hare's note -- that serum sodium result, I think she said that was hers. She didn't write all the others. In any event, whenever it came in, he would have seen those results.

A. Yes.

Q. So if he's looking to get the whole of the ward round note, he would have seen those results and would have seen that in terms of the serum sodium result, that's the same, the white cell count is virtually the same, the glucose is the same. I think others that have been asked that question have come to the view that the likelihood of getting a set of results like that from two different blood tests taken hours apart, exactly the same, is perhaps quite low.

A. Yes.

Q. So if you had seen those, would the view not have been that the two sets are the same thing?

A. Yes, I'm sure they were the same thing, but firstly he may not have looked that far back at the result under 12 midnight and, secondly, it is possible that that result -- he might have interpreted that result as having been written in at some point between midnight and the start of the ward round.

THE CHAIRMAN: I suppose the other factor is he might have been under terrible pressure himself --

A. Yes.
THE CHAIRMAN: -- because one presumes he had his own ward to look after and he has been called into another ward. So when we all sit down and pore over these notes and records, we can see how they self-evidently come from the night before. But I presume you sometimes miss these details --
A. Yes, you miss these details and as I said, to him, it wouldn't have been a particularly important detail at that time.
THE CHAIRMAN: Thank you.
MS ANYADIKE-DANES: Before we went into that, I think where you had concluded was you wouldn't have expected him to get into the minutiae of exactly when they should have been taking further serum sodium tests, but you would have expected him to have provided some opinion and guidance on fluid management generally and the significance of it in terms of her presentation?
A. Yes, but the general paediatric team should have been able to manage the fluids without necessarily getting advice from a paediatric neurologist because it's not really a neurologist's remit to do that.
Q. No, but I think Professor Neville's position was that ...
THE CHAIRMAN: He said that Dr Webb couldn't quite slide

away from some degree of responsibility for this.

A. Just to give a slightly more general overview, this case is particularly unusual in that the symptoms and the presentation were primarily almost exclusively neurological, but as it turned out further down the line, one of the primary causes was, in fact, biochemical. This doesn't often happen. So whereas if you have a neurological case, the neurologist is likely to cover all aspects of it -- investigation, management and so on -- but where a case is, as you might say, on the cusp between neurology and general paediatrics, it is more difficult to be specific as to whose role it is to monitor which different aspects of the care.

MS ANYADIKE-DANES: When you say "biochemical", do you mean some sort of a electrolyte imbalance?

A. Yes.

Q. But isn't that something that a neurologist perhaps ought to bear in mind, particularly as he would be aware -- or he may be aware, he may not have known exactly -- that he's the only consultant who's seen that child. Should he not be thinking in the round, if I can put it that way, about not just the possibility of seizures, but maybe there's something else going on other than the viral element that's producing those seizures?

A. Yes, he should. But whose task it is to actually manage

it in terms of taking the tests and prescribing the fluids is the issue.

Q. That's my fault. I was trying to make a distinction between the advice and guidance that could or should have been given by Dr Webb and the actual implementation of that in terms of getting the test results and so forth. I was trying to make that distinction and keep the advice and guidance perhaps to something you might have expected Dr Webb to have provided.

A. Yes.

Q. And does your "yes" mean, "Yes, I would have expected him to have provided that".

A. I would have expected him to provide broad advice and guidance, yes.

MS ANYADIKE-DANES: Mr Chairman, I'm just about to get into the neurological observations. I don't know if that's a good moment.

THE CHAIRMAN: Yes, it has been a long morning. We'll start again at 2 o'clock, doctor. Thank you.

(1.00 pm)

(The Short Adjournment)

(2.00 pm)

THE CHAIRMAN: We're sitting until 4 o'clock at the latest. Dr Scott-Jupp has to leave by then. We'll be sitting without a break until we finish this afternoon.

MS ANYADIKE-DANES: Thank you.

Dr Scott-Jupp, I have been asked to try and have you deal with the issue of the EEG. I know that you've been over it a number of times, but some people are a little concerned nonetheless -- not concerned, but wish to be clear on it in relation to what you said in your second report.

You deal with it in your second report at 234-002-004. I think in the light of the evidence that you were giving just before the luncheon break about what you consider to be the need for an EEG, I think people just want to be absolutely clear about what you're saying in paragraph (iv) and then in that asterisked paragraph. You say:

"In his 2012 witness statement, Dr Webb states that there was no urgent EEG service available at the RBHSC at the time. My criticism of the failure to obtain an EEG to confirm the clinical diagnosis of non-convulsive status may therefore be unjustified."

In the light of the views that you have been expressing today about what the EEG would have done and what you consider to be its significance, can you help us as to whether it remains your view that it's not an appropriate criticism to say that the EEG should not have been obtained to confirm the clinical diagnosis of

non-convulsive status?

A. I think the inquiry has heard since Dr Webb's witness statement that there was in fact a possibility of an EEG being available, in spite of what Dr Webb says; is that correct?

Q. I think we need to be clear about that. I don't think there has been any dispute that there was an EEG service.

A. Yes.

Q. And in fact, I think in file 150 you saw that child W1 actually had an EEG in the morning, which was a booked EEG, in the morning of 22 October. The information that we've received from the DLS was that there were outpatients or other patients booked for EEGs, if not in that morning, but certainly in that afternoon. So there was a service.

A. Yes.

Q. That's not quite the issue. The issue has become one of, in the light of the fact that the EEG slots, if I can put it that way, were already allocated to patients, it's what should have been done in those circumstances. And I think your evidence, as you were giving it this morning at least, was that it was a matter of priorities, and I think the chairman had asked you whether Claire might constitute a priority or

at least was sufficiently serious, and I think you gave your evidence on that.

So it's in the light of all of that that people are -- well, there are some who are not clear whether you consider that there is still some criticism to be made of an EEG for Claire not having taken place some time on 22 October.

A. To answer your question, yes, I think there is a criticism to be made for an EEG not having been asked for on 22 October. To just explain, my original report, when I wrote it, I had no information at all about the availability of an EEG service. I then read Dr Webb's witness statement, where he says there was not an urgent EEG service available, but there was no information on whether there was any EEG service available. We now have information that there was a routine EEG service available. My view is that the routine EEG service should have been diverted to do an urgent EEG in Claire's case, yes.

Q. Thank you. And then there is one other point of clarification, which I think should be made in relation to some comments that I made. That relates to the recording of the serum sodium and other results under the midnight entry, if I can put it that way, in Claire's notes and records.

The point is that Dr O'Hare doesn't believe that she made the entry of "132". Where one sees that is an attachment to her witness statement; it's 135/1, page 24. You just see there that she said her statement was prepared under the mistaken belief that she made the entry in those records, which listed the sodium result of 132. She has now realised that, in fact, that note was made by another doctor, and so that's her evidence, that it wasn't her that inserted that. Dr Volprecht's evidence was that she wrote down the biochemical results, but her evidence is that she also did not write down the serum sodium result, although I think she acknowledges she might have put the arrow.

So that's where it is. It's just because these are matters of obvious importance to the doctors concerned. It's appropriate to be correct about it. That's their actual evidence.

If I go back to the EEG, something else I was asked to raise with you. You have said it was important to have an EEG and I think you've now confirmed that there is some criticism to be made of an EEG not having taken place on the 22nd. There are a number of times, if I can put it that way, or periods when an EEG might have happened. And I think your views on whether you consider it would have been appropriate would be

helpful. I'm first going to give them to you so you can think about them, and if you can tell us when they are.

The first is before the rectal diazepam, and the time for that was 12.15. The second is some time before Dr Webb saw Claire and we know he saw her in or about 2 pm. Then before the phenytoin was administered, and that's recorded as having been administered at 14.45. Another is before the midazolam was administered, and that's recorded as having been administered at 15.25. Then finally, there's before the sodium valproate, the Epilim, and that's been recorded as having been administered at 17.15. So those are what some people consider might be the times when you'd be ...

If you could help us with when you think an EEG ought to have been administered or at least carried out. When?

A. Okay. I'll deal with the extremes, the earliest and the late first. Dr Sands would not have had the authority to order an EEG without discussing it with a more senior doctor, almost certainly Dr Webb, first. So the earliest case in which it could have been done would have been, I suppose, after 2 o'clock, when Dr Webb saw the patient, unless Dr Webb was so convinced by Dr Sands' description that he felt he could order it before he had even seen Claire, following a discussion,

but I think that's unlikely.

At the other end of the day, EEG, as we have already said is not an emergency service; as we have already said, it is very much a nine-to-five service, so there wouldn't have been anyone available to do it after 5 o'clock. So we're really narrowing it down to a fairly short period in the mid to late afternoon.

THE CHAIRMAN: At any point, realistically, after Dr Webb had seen Claire and before the service closed? So roughly between --

A. Yes.

THE CHAIRMAN: -- 1.30 to 2 o'clock at one end and 5 o'clock at the other end?

A. Yes.

THE CHAIRMAN: But in light of Claire's condition, she should have been given priority and should have been given an EEG?

A. Yes. The practicalities are that the EEG technicians would have had to finish the recording they were doing at that time, they would have had to contact or somehow communicate with the unfortunate person who was being displaced. They then would then have had to transport their equipment down to the ward -- I have no idea how far it is, but it would have taken time. And then setting it -- this is not a quick investigation. It

would have taken them quite some considerable time to set it up. There's a lot of technical stuff to be done. So it could have taken them, I don't know, 15 minutes, half an hour to set up, and then maybe another 15 minutes, half an hour to do the reading, so it's not a quick test.

THE CHAIRMAN: And when you do the test, do you get the reading straightaway?

A. No. EEGs are difficult to interpret. They are -- they require someone with specialist training and they can be quite subtle. The technicians themselves do not interpret the EEGs, they simply do them. In some services, they are interpreted by specific neurophysiologists, whose job is just to do that. In other services -- as I think was happening at the Royal at the time -- they are interpreted by the consultant neurologist, if they're trained to read them. However, in the particular case of non-convulsive status epilepticus, the EEG is so abnormal that I think even a relatively untrained doctor such as myself probably would have recognised it as being abnormal.

MS ANYADIKE-DANES: So that time frame is on the basis that whatever Dr Sands had communicated to Dr Webb was not sufficient for him to think that an EEG was appropriate? Just that we're clear about that.

THE CHAIRMAN: That's because Dr Scott-Jupp thinks it's unrealistic that Dr Sands could have gone to Dr Webb with such a dramatic report, really, on Claire's condition that Dr Webb would have displaced somebody in the queue without seeing Claire himself.

A. It's quite a big ask, if I might put it that way, to ask the EEG technicians to abandon their carefully planned day of activities, to considerably inconvenience a patient who had come up for an outpatient EEG, and then to move themselves down to the ward to do it. It is not something that is done very often.

THE CHAIRMAN: So if we deal in realities, that's why you're putting it at some point between 2 o'clock and 5 o'clock?

A. Yes.

MS ANYADIKE-DANES: Is it a fair assumption to make given that they had spoken some time before 12, and that's how the diazepam is being given at 12.15, but Dr Webb doesn't actually come to see the child at 2, so if the description from Dr Sands had been so compelling that he had thought that she was in that kind of category, would you have expected him perhaps to have tried to see her maybe a little earlier than that if he thought that she was of the condition that warranted somebody being displaced from the list?

A. That depends entirely on what Dr Webb's other commitments were at the time. I don't think I can answer that.

Q. Okay. Just for completeness, because some have noted it, one of Dr Webb's own patients had a booked EEG at midday, I think it was, on that day. 10.45? In any event, that would have been far too early.

THE CHAIRMAN: [Inaudible: no microphone.]

MS ANYADIKE-DANES: I'm simply getting Dr Scott-Jupp to confirm that so that people appreciate that that would not have been realistic.

THE CHAIRMAN: That's even before the ward round. That can't make sense.

A. I think from what I remember, looking at those notes, it was a booked inpatient EEG as opposed to an urgent EEG.

Q. Yes.

A. It's not quite the same thing.

Q. Yes, it was. It was a booked one, which they had originally thought might happen on the Monday, didn't happen on the Monday, so it had gone in to happen on the Tuesday, and the nursing note records that it happened at 10.45.

If I move to the neurological observations. Can I pull up 310-011-001? That's a chart made to try and record all the Glasgow Coma Scale information along with

those red lines, which indicate when the nursing shift changed. The red numbers are numbers that come from an assessment that Dr Webb made when he was examining Claire.

If we pull alongside of that 090-039-137. That's where the information comes from. But the CNS observation chart obviously has a lot more information on it. I'd like to ask you about what can be interpreted about Claire's condition from that chart and, in case it makes it any easier, the schedule showing the Glasgow Coma Scales?

A. Well, the first observation is done at 1 pm, so we don't know what it was before then.

Q. Yes.

A. But a Glasgow Coma Scale score of 9 is significantly low and worrying, even if there wasn't a demonstrable acute deterioration down to 9. If that's your starting point, I think that is significantly low.

Q. And then you see how it progresses through the time. By the time we get to 9 pm, it never rises, according to this, above 6; that's correct?

A. Yes.

Q. Then if you look at the intracranial pressure, what is the significance in the fact of the changes in her pupil size?

A. That's very difficult. The reason for doing these kinds of CNS observations is most often in the context of a head injury, and that is the reason why these charts are used most often in the children's ward. In a head injury, where there has been trauma to the head, what you're most looking for is evidence of a haemorrhage, that is a bleed on one side of the brain which then can cause an inequality of pupil size. So the reason these charts are designed this way with a right and a left like that is to see whether there's any developing inequality. One pupil becoming more dilated than the other is a very worrying sign in that context.

This is a bit different because there wasn't a head injury and there was no suggestion that it was a one-sided problem. In that context, that part of the neurological observations is probably less important than it would have been in a head-injury child. Nowhere, I think, is it recorded that the pupils were unequal. I think I am right in saying that.

Q. It appears to be "E" all the way as to equality.

A. Yes.

Q. Is there any significance at all to the fact that they seem to be recorded as "small" as many times as they are "medium". In fact, is "medium" normal?

A. Yes, it depends on the light conditions when it's being

done and -- let me think ... No, the only ... This probably is rather unsatisfactory, but there appear to have been more smalls during daylight hours and more mediums during night-time hours, but that depends on the light levels in the ward and so on and lots of other things, so that doesn't help very much. No, I'm afraid I don't really know what the significance of that is. The issue of whether the anticonvulsant drugs that she had received may have caused her pupils to constrict in size does arise, but as far as I'm aware the types of drugs that Claire was given don't normally cause that reaction in the pupils.

Q. I see there's one occasion, at 10 pm, when they're recorded as being "large". If we're outside of your area of expertise, please say. Is this something that we should refer to the neurologist?

A. Yes, I think you should. Whether he will be able to throw any light on it I don't know, but yes, I think you should.

Q. I think round about the 10 where the -- a bit later on, it's difficult to see the times at the top. There's one instance where their reaction is recorded as "sluggish". That would be the reaction time, would it, so far as you interpret that?

A. Yes, the pupils were said to be sluggish, yes.

Q. If we go to see the temperature, the record of which is on the right-hand side, you can see it there under the peaks just hitting 38; do you see that, two peaks hitting 38?
A. Yes.
Q. Can you think of anything that would be affecting her temperature in that way?
A. Well, many things. All the things we talked about this morning, about this being a viral illness, any of the possible viral or infective causes put her temperature. However, quite separate to that and much less rarely, temperature instability -- either a high or low temperature -- can be a sign of impending problems with the brainstem, the part of the brain at the base of the stem that we all have that controls our temperature. If that is starting to be adversely affected, then it can cause either a very high or a low temperature in the absence of infection. There's no way that anybody could have diagnosed that at that time.
Q. When you say "adversely affected", do you mean for example by the brain swelling?
A. Yes, one of the consequences of cerebral oedema and, later, coning, was that it can cause very rapid fluctuations in temperature.
Q. Yes. As you have the information there, who -- and it

spans from 1 o'clock until 2 o'clock in the morning -- who do you think should have had the overall responsibility for taking all this information in and seeing where it was all going in terms of the differential diagnoses for Claire and her treatment plan?

A. The on-call paediatric team. Or do you want a specific individual?

Q. Well, as it goes into --

THE CHAIRMAN: That changes as the hours go on. That team changes.

A. Yes. I thought you meant during the night-time hours.

MS ANYADIKE-DANES: No, it spans 1 o'clock, as you pointed out in the afternoon, through to 2 o'clock in the morning.

A. During the day, up until 5 o'clock, the ward team, the same team who had seen her in the ward round that morning. And in the evening, the on-call team after 5.

THE CHAIRMAN: Looking at this from your specialty, it's the Glasgow Coma Scale that you would be focusing on, is it?

A. Yes.

THE CHAIRMAN: And the fact that even at the starting point of 9, which was never reached again, that's significantly low and worrying?

A. Yes. It's significantly low. If you look at the actual

individual scores given at 1 pm, "eye-opening to verbal command only", "no verbal response", and, "obeys commands", which actually seems, looking at it now, seems a little inconsistent: there is no verbal response, but obeys commands. That's what was recorded. However -- and this is a big "however" -- one of the problems with the Glasgow Coma Scale, as applied to children, is that one has to base it on the knowledge of what that child's normal functional level is. And for some children, it may be that they never have a verbal response, they are unable to speak.

THE CHAIRMAN: But that's why you engage with the parents at the bedside, isn't it?

A. Exactly. And this is where knowing -- and what should be fairly routine practice ... In a child, particularly in a child known to have learning difficulties or a long-term neurological handicap, one has to always ask the parents what their normal functional level is and judge it. So taking a Glasgow Coma Scale in isolation can be quite unhelpful.

THE CHAIRMAN: Right.

MS ANYADIKE-DANES: It wouldn't be being taken in isolation, though, would it? It would be taken in with all the other information --

A. Yes.

Q. -- including the record of attacks, the medications given and this central nervous system observation chart, and the history that the parents have given as to what her normal presentation is?
A. Yes.
Q. All of that would be part -- that's why I was asking you: who is pulling that together with the degree of knowledge of the potential implications of that for an underlying neurological condition?
A. Well, I think that is the crux of this case, really. As I've said, the general paediatric team -- that is Dr Sands and Dr Stevenson, Dr Stewart -- were primarily responsible during the day. Then they would have handed over to the on-call team. What you're asking is: to what extent should Dr Webb have been involved in that as a neurologist as opposed to the general paediatric team; is that the thrust of the question?
Q. It is --
THE CHAIRMAN: Not "as opposed to the general paediatric team", "in conjunction with the paediatric team", surely?
A. Yes, absolutely, yes.
THE CHAIRMAN: Right. To what extent should he have been involved as the neurologist who was contributing to Claire's care, as someone who at least saw her twice in

the afternoon, if not three times, and working in conjunction with the general paediatric team?

A. To what extent? Um ... He should have given advice about specific neurological investigations, as I've already said -- EEG, CT scan -- about possible diagnoses, and management of those neurological conditions.

MS ANYADIKE-DANES: So does that mean he's helping the paediatric team to put all this together, if I can put it that way?

A. Yes. You could put it that way.

Q. Because the evidence seems to be that the registrar isn't there for much, if not all of the afternoon. He appears to be there at 5.15 because he is recorded as having administered certain medication. So he's there then, but if he's at the clinic, then it may be that he's not there for most of the afternoon.

A. Yes.

Q. It's known that the consultant isn't there at all in the afternoon because she's in a clinic off the site. So you have two very junior SHOs and, if Dr Webb is aware of that, he's the only person with consultant expertise to assist in understanding what is happening with Claire, to determine further tests, to formulate differential diagnoses and to recommend further

treatment at a consultant level. It's him and, presumably, he would appreciate that.

A. Yes.

Q. That's why I've asked you what his role becomes when he's in that situation.

A. Well, I think that is part of the problem, that it is rather poorly defined. I don't think you can answer that question in black and white terms as to exactly what the consulting [sic] neurologist's role is and what the general paediatric team's role is. There would be some patients where the neurologist would perhaps make the running primarily and others where the general paediatricians would manage when the neurologist had just given a one-off opinion. I think that part of the problem with this case is that was not clear.

MS ANYADIKE-DANES: Yes. Professor --

MR GREEN: Sir, if I understand this evidence correctly, if we could possibly pull up 234-002-007. The bottom answer on that page, page 7 of Dr Scott-Jupp's first report:

"Dr Webb should have communicated his concerns to a senior on-call general colleague, either a consultant or experienced general registrar, or alternatively made it quite clear that the neurology team were taking over her care fully. He should then have ensured that all of

the neurology team on call that evening were aware of the details of the case."

It would help me just in crystallising where we stand with this evidence in my own mind so that I'm better placed to assist the inquiry when I make written submissions down the line, whether first of all I'm correct in understanding Dr Scott-Jupp's position to be that Dr Webb should either have communicated his concerns to another appropriately senior person in the general paediatric team or have taken over the care along with the neurology team. First, whether that's a correct understanding and, second, whether Dr Scott-Jupp sticks by that.

A. Can I answer that, Mr Chairman?

THE CHAIRMAN: Of course.

A. At the time I wrote my first report, I did not know whether there was a separate 24-hour paediatric neurology rota at the Royal. I've since found out that there wasn't; there was simply two consultants with no, at that time, no junior staff, and therefore in practice in terms of junior staff responsibility, it wouldn't have made any difference because the on-call team who were on call for the paediatric neurology patients after hours were also on call for all the general patients. So it would have been the same people at junior doctor

level.

I would now, with that knowledge, have phrased that differently.

THE CHAIRMAN: Then could you say what would be the effect of the rephrasing? Because as that stands, that paragraph is somewhat critical of Dr Webb.

A. Yes.

THE CHAIRMAN: Right. So in light of what you now know, are you more or less critical of Dr Webb and in what way?

A. I think, as I said earlier, he should have discussed his concerns with Dr Steen or with an experienced general registrar, and it's a matter of debate whether that would include Dr Sands or not, but anyway. And I would have deleted the bit that says, "Alternatively, made it clear that neurology team -- Dr Webb and his own juniors", because the neurology team was just him as far as I can see. And then, "ensured that neurology team on call that evening were aware of the details of the case". That was just Dr Webb, so there wasn't any other team. So I would have deleted all part.

THE CHAIRMAN: Thank you.

MR GREEN: I promise to sit down after my next point: it would really help if we could flush out whether Dr Scott-Jupp would really characterise a four-month in registrar as an experienced general registrar.

A. No.
THE CHAIRMAN: But if he's the best registrar who's available --
A. Yes.
THE CHAIRMAN: -- then that's all that can be done.
A. If that's --
THE CHAIRMAN: We can go round in circles a lot, but it emphasises all the more, surely, the need for Dr Webb and Dr Steen to make contact with each other?
A. Exactly, yes.
THE CHAIRMAN: Maybe more particularly, if Dr Steen isn't aware of what's going on, for Dr Webb to definitively make contact with her to alert her to the problems?
A. Yes. As I said earlier, it's a debatable point which of those two consultants should make the effort to contact the other, but there should have been some communication between the two of them.
THE CHAIRMAN: But if you have two consultants and one, namely Dr Webb, does know what's going wrong and the other, Dr Steen, doesn't know what's going wrong, then in that scenario surely the onus falls on Dr Webb to make contact with Dr Steen?
A. Yes.
THE CHAIRMAN: Thank you.
MS ANYADIKE-DANES: If we go back to the Glasgow Coma Scale

chart that we had put up, which is the 310-011-001. Professor Neville's view was that any drop in the Glasgow Coma Scale should have prompted contact with the registrar by an SHO, or the consultant if, for some reason, the registrar is not available.

Assuming that Dr Sands is at his clinic and he's at his clinic sometime between 1 and 2, and he's there until 5, there is a fall in the Glasgow Coma Scale. In fact, it steadily falls point by point until 4 and 5 are the same, which is the 6 and the 7, depending on how you classify it.

At any point then would you agree with Professor Neville and think that any of the SHOs who were there and able to see that this is what was being recorded should have either tried to get hold of Dr Sands at his clinic or, if they couldn't reach him, should have tried to get hold of Dr Steen?

A. Yes, although I have to express a reservation in that the Glasgow Coma Scale is not as objective as it appears to be and the real change in her condition between 1 pm and, let's say, 3 pm, when it appears to drop from 9 to 7, may not have been all that great because of inter-observer variation in the Glasgow Coma Scale score, which is not as robust as it appears to be.

Q. I understand that, and I think to some extent

Professor Young has produced a report that addresses that. He will give evidence in due course, I'm sure, on that. But leaving that point by point approach, if one started at 1 o'clock, as the chairman took you to, she never gets back to 9 again. You already said that 9 was quite low in your view. She's on a downward trajectory, if I can put it that way, and what I'm really trying to ask you is whether you accept what Professor Neville says and are of the view that at some point in time on that downward trajectory one or other of those SHOs should either have tried to get hold of Dr Sands and said what they are seeing here or, if they couldn't reach him, should have tried to get hold of Dr Steen?

A. Yes, I think it's fair to say that.

THE CHAIRMAN: Accepting that the score which one gives every hour in the scale is not absolute, if it is already significantly low and worrying, as you described it, when it's 9, at best the same interpretation applies throughout the afternoon and, on most views, it deteriorates a little.

A. Yes.

THE CHAIRMAN: So you go from significantly low and worrying to something worse than that.

A. Yes.

THE CHAIRMAN: And that's why contact needs to be made with

them between the consultants.

A. Yes. I suspect that had the Glasgow Coma Scale been done a couple of hours earlier, just after the ward round, it probably wouldn't have been much higher. So the SHOs on the ward might have said, "We have put a number to it now, but in fact she isn't any different to how she was a few hours ago", and therefore they didn't really see that as a deterioration.

THE CHAIRMAN: Of course, that might very well be correct, but if in the meantime she has started to receive drugs prescribed by Dr Sands and by Dr Webb and has not responded positively, has not improved, then even if her condition hasn't deteriorated, the fact that she isn't improving adds to the worry, doesn't it?

A. Yes, it does, and it is that lack of improvement that is one of the most worrying aspects of this case.

THE CHAIRMAN: Yes, it's the lack of improvement after treatment.

A. After treatment, yes.

MS ANYADIKE-DANES: Yes. And if one was looking at the record of attacks -- I hadn't brought that in as a third piece of information. We had had this and the CNS chart, but if you added in the record of attacks, which is another document for them to consider what the results were, 090-042-144. There we are. As the

chairman says, if you're trying to correlate all this information, which is back to my original question about who should have been trying to do that, you see that at 3.25, there's a seizure. That's the first recorded for her. So if she was having non-fitting status epilepticus, that looks like something different, if I can put it that way, at 3.25.

Then at 4.30, she's got another episode that's being recorded, and that's why I was asking you: who was there with the seniority and expertise to be able to interpret all of this in terms of what should be happening with Claire and I think you were saying that really Dr Webb ought to have been helping the junior staff, but also it provided an added reason for him contacting Dr Steen and speaking consultant to consultant.

A. Yes, I would agree with that.

Q. Can I then ask you, which sort of moves on a little bit from this -- I am going to deal with Dr Webb's specific interventions in his examinations, but for now that we're speaking in general terms about what this information may indicate, a possible admission to paediatric intensive care, PICU. She wasn't actually admitted to PICU until sometime around 3 o'clock in the morning of Wednesday and Professor Neville felt she should have been admitted very much earlier. I think

his view was if the cerebral oedema had been identified, then elective ventilation is something that could have been used to reduce what would have been a raised intracranial pressure, as he saw it, and the only place where that properly could have been done was in PICU. He thought that that might be something that couldn't be considered early on 22 October. I'm not sure we have got an exact time for when he thought that.

From your point of view, when do you think they should have at least been seriously considering transferring Claire to paediatric intensive care?

A. I actually think in the early afternoon, possibly after Dr Webb's initial examination because it was clear that her conscious level was abnormal, it wasn't responding. She needed probably closer observation in terms of nursing observations than is easy to do on a general ward. So had cerebral oedema been strongly suspected or diagnosed, then that would have been an absolute reason to admit to intensive care. But even before that, even without that awareness, I think she should have done.

Of course, this depends very much on local policy at the time, which has changed since then, and it would depend on availability of beds on the intensive care unit and we have no information on that.

Q. I think your view is that the threshold for admission to

paediatric intensive care is rather lower now --

A. Yes.

Q. -- than it would have been in 1996?

A. Yes. Paediatric intensive care was a relatively new specialty, in fact very new in the mid 1990s, and there was still an uncertainty about how one decided who to admit. Before paediatric intensive care units came along, the choice was either the children's ward or an adult intensive care unit, which might have been even more inappropriate, and certainly before PICUs became available, much sicker children were nursed on general paediatric wards than they are now.

In 1996, it was in a state of transition and probably before that, children would only have been transferred to a paediatric intensive care unit if they definitely required intubation and ventilation. After that, I think children with worrying neurological signs requiring close observation would have been transferred. This was sort of in that transition period.

Q. You have dealt with that in your second report at 234-002-009, with a degree of hindsight really, and it carries on over the next page. You say:

"By today's standards [and that's the point you were making], she would certainly have been admitted with a Glasgow Coma Scale score as low as 6."

But you say those standards didn't apply in 1996. Then you refer to high dependency units, which are sort of halfway houses these days, and then you go on to say:

"In 1996, the need for artificial ventilation probably would have been a prerequisite for admission to PICU. However, it would have been appropriate to discuss her earlier with a PICU consultant who could then have assessed her on the general ward and possibly given some advice about management while being pre-warned about a possible later admission."

A. Yes. And this is something we do frequently now and I think could and should have happened at that time. There are some children that one is a bit concerned might be heading the way of intensive care, but haven't quite got there yet, and it's extremely helpful both to the ward staff and to the PICU staff to know about that possibility in advance so that the PICU staff have already learnt the background, they could come back and review the child later. I think in some hospitals they even have what's called a critical care outreach team. It's more of an adult phenomenon, but I believe it sometimes can happen in children's hospitals where there is a senior doctor and nurse who go out and look at children that might be potential intensive care candidates before they get to that stage.

Q. Yes, but in 1996, I think your evidence is that that would have been something, following Dr Webb's examination at 2 o'clock or thereabouts, whenever it was that he concluded that, that could have been being discussed?

A. Yes.

Q. Are you able to express a view as to when you think it would have been best for it to have happened?

A. Yes. I don't think necessarily she would have, by 1996 standards, required admission to intensive care at that time. The problem is it was a very gradual deterioration and so at what point it should have been considered is a little uncertain. But I guess with the series of overt seizures as opposed to non-fitting status, that could have been a prompt. The falling Glasgow Coma Scale, given its limited validity, would also have been a prompt. But it's difficult to put a specific time on that.

Q. Yes, I suppose, as the chairman says, that all things point to the EEG and the CT scans. If those tests are being carried out and they identified a cerebral oedema, then, from your point of view, would that have been more than a prompt, would that have actually warranted her transfer?

A. The EEG wouldn't have helped, but the CT scan would have

done, yes.

Q. The EEG will have told you about the level of seizure activity.

A. Yes, it would, but an abnormal EEG and status would not of itself require an admission to intensive care; the cerebral oedema most certainly would.

Q. So if the CT scan had been carried out, as you think one ought to have been carried out, if that had happened and indicated cerebral oedema, that in itself, so far as you're concerned, would have indicated that she ought to have been transferred to paediatric intensive care?

A. Yes, undoubtedly.

THE CHAIRMAN: Doctor, is it wrong to look at what happened to Claire and think that her condition just drifted on that day and nobody really seized control of the situation and acted decisively?

A. I think that's a fair comment, yes.

THE CHAIRMAN: There were any number of opportunities for somebody to do that.

A. Yes.

THE CHAIRMAN: And it might be a bit invidious to identify one individual rather than another should have done it, but it certainly should have been done?

A. Yes, I agree. As I said, it was a gradual deterioration, so there was no one point. But if, say

for example, a general consultant had been back to review her in the early evening, between 5 and 7, that might have been the point at which a reassessment was made, more investigations were asked for and possible consideration given to intensive care.

MS ANYADIKE-DANES: If we then go and look at the actual examinations that took place and go to 090-022-053 and pull it up with 054. Professor Neville's view -- and I put it to you for your comment -- was that he thought that Dr Webb had performed a competent examination on that afternoon, but he made some criticisms. I'm not going to pull it up, but the reference for it is 232-002-008 and on to 009. Essentially, they were that he felt that Dr Webb had failed to include the possibility of a rising intracranial pressure to explain Claire's reduced conscious level and her motor signs; would you accept that?

A. Yes. It's not really my place to comment on the comments made by one paediatric neurologist on another paediatric neurologist, but I don't see any reason to disagree with that.

Q. Let me put it this way: if you had come back to the ward at some point, is that something that you might have thought or would you have simply got a neurologist in?

A. I might have thought it, but if a neurologist had seen

the child and reassured me that that wasn't the case, I would have accepted that reassurance.

Q. Yes.

THE CHAIRMAN: Would that then have led you on to a longer conversation: if that's not what is wrong with Claire, then what is wrong with Claire?

A. Yes, it may well have done.

THE CHAIRMAN: And what are we doing to find out what's wrong with Claire, what tests are we carrying out and what should we be doing, because we just can't let this drift on?

A. Yes. I think I might have asked the consultant paediatric neurologist why a CT scan now was not a good idea and turned it round that way.

MS ANYADIKE-DANES: Because in a way, you as a consultant can maybe push things with Dr Webb to get an explanation from him in a way that I think you've accepted -- Dr Sands was not a particularly experienced -- or experienced at all -- registrar, he was quite junior. That might have been difficult for him to have not exactly challenged him, but asked him for an explanation of why he was doing certain things and not doing other things --

A. Yes.

Q. -- whereas you may not have had that reticence as

a consultant?

A. Exactly, yes.

Q. And the other point he mentioned was that Dr Webb had failed to require an urgent sodium level as part of his assessment. You've, I think, already dealt with that in terms of what he may or may not have thought was the case.

Then Professor Neville thinks that Dr Webb should have been aware that there is a possibility of inappropriate secretion of ADH and acute brain illness and that Claire's sodium levels or conscious level and fluid balance should be monitored and he should have directed that that ought to be done. I think in your report you already thought as early as 21 October, the previous evening, that SIADH might be something that was happening alongside a number of other things. But now at 2 o'clock in the afternoon, would you accept Professor Neville's view that that should have been in Dr Webb's mind?

A. Yes. Again, I feel cautious about commenting on one specialist paediatric neurologist's comment made about another. But I wouldn't have been surprised if it had been mentioned in that context.

Q. Let me put it in a fairer way to you then: given that you had thought that that was a possibility on

21 October, the previous evening, if you had the opportunity to discuss Claire's condition and presentation with Dr Webb on the afternoon of the 22nd, is that something you might have been raising with him?

A. Um ... I might have considered that it was ... If I was the general paediatric consultant possibly, I might have considered that it was first my responsibility to ensure that the serum sodium was checked before I raised it as an issue. Because if, as in most cases, it would have returned to normal, then it ceases to be an issue.

Q. Yes.

A. And in the vast majority of cases, of a child coming in with a sodium of 132, repeated 12 hours later, it's completely within the normal range. Therefore, why raise it if you haven't checked it? So the critical things is the blood should have been checked first.

Q. So in other words, if you were having that discussion with him, you might at the very least suggested: have we got recent serum sodium tests?

A. Yes.

Q. You would want to know therefore whether this was something worth discussing further?

A. Yes, because if you can discount that, which in most cases you could, then why mention it?

Q. Yes. Then if we go into the CT scan, that's something that, just in answer to the chairman just then, you thought that if you'd had the opportunity to discuss with Dr Webb, you might have been raising with him a CT scan?
A. Yes.
Q. Can you express a view as to whether you think that should have happened before the administration of any further anticonvulsant medication other than the rectal diazepam? She would have had the rectal diazepam at 12.15. At this stage, she wouldn't have had the phenytoin. That was one of the things that Dr Webb actually prescribed. If you'd had an opportunity to express your views about it, would you have wanted the CT scan before the phenytoin?
A. If anticonvulsants had been decided to be given, they should have been given whether or not a decision to have a CT scan was made. The CT scan could have revealed an unexpected problem which might have then taken you down a different track of treatment, but to some extent, the timing of the CT scan as against the giving of the anticonvulsants is not critical.
Q. Might the CT scan have revealed cerebral oedema?
A. It might have done.
Q. And if it had revealed cerebral oedema, then that might

have provided an explanation for why she had the presentation that she did.

A. Yes.

Q. And you would then have been treating the cerebral oedema as opposed to treating the non-fitting or the seizures?

A. Yes, certainly. If a CT scan had revealed cerebral oedema, then that would have taken priority. That requires very urgent treatment, more so than the anticonvulsants. However, the two can co-exist. If encephalitis is causing brain swelling, cerebral oedema, whether or not there's hyponatraemia present, then that can be associated with fits. So treating fits is an important part of the treatment of cerebral oedema.

Q. Maybe I can put it this way: given that the cerebral oedema could have provided the explanation for the seizures, is that not all the more reason to get on and have such a test done so at least you know what you're dealing with?

A. Yes, I would agree with that.

Q. Thank you. Then if we go to what happens at 5 o'clock. The note for that can be seen if we pull up -- I think it's only on one page you need to pull up, which is 090-022-055. That's a complete note of that examination. Before then, so before Dr Webb comes, or

rather when he comes, would you have expected him to look at Claire's medical notes and records at that stage?

A. Sorry, what time are you talking about?

Q. 17.00 hours, 5 pm.

A. Yes, there wasn't much written since he was last there, but yes.

Q. Sorry?

A. Do you mean the little bit that was in between Dr Webb's previous consultation?

Q. No, his consultation previously was at 2 o'clock and the end part of it can be seen where he signs off "Dr Webb" on the left-hand side.

A. Yes.

Q. Then you've got an entry by Dr Stevenson when he is calculating the phenytoin that Dr Webb has suggested. And then over the page, you see he is calculating the midazolam in relation to a suggestion from Dr Webb. Then Dr Webb comes at 17.00. It is not clear, as the chairman had indicated, whether Dr Webb actually saw Claire in between the 2 o'clock and the 5 o'clock. But in any event, the 5 o'clock is his next note, if I can put it that way.

A. Yes.

Q. And what I was asking you is: would you expected him to

look at Claire's charts, if I can put it that way, as part and parcel of his examination of her at 1700 hours?

A. Yes. Do you mean the nurse's observation charts?

THE CHAIRMAN: And this record.

A. And this record? Yes. There wasn't very much to look at in that record. It's just the calculation of the dose.

MS ANYADIKE-DANES: Well, there's the CNS chart to look at.

A. Yes, there's the neurological observations chart. Yes, I would have expected him to look at that or at least to ask the nurse who had been doing them if there had been any change.

Q. In addition to that, there's the record of attacks.

A. And the record of attacks, similarly.

Q. Would you expect him to look at what had been actually prescribed or administered, sorry, by way of medication?

A. On the drug chart, you mean?

Q. Yes.

A. No. I would have expected him to trust in the fact that it had been done competently. I don't think it's the consultant's job to check all the fine detail of the prescription chart.

THE CHAIRMAN: Without checking the fine detail, doctor, if you look at the top of page 55 on the right-hand side, Dr Webb has indicated that he wasn't sure about the

amount of midazolam which should be prescribed --

A. Yes.

THE CHAIRMAN: -- so he had to check it --

A. Yes.

THE CHAIRMAN: -- and then ring it down, as now appears to be his position, and there was to be 0.15, which turned into 0.5.

A. Yes.

THE CHAIRMAN: If you look at the records at all, does that not jump out at you, particularly if you have been cautious and had to check what the prescription was just a couple of hours before?

A. Well, I think to be fair, as a consultant you can't check every single calculation made or potential error made by junior staff. You have to have some sort of confidence that they're going to do it correctly, unless there's a very specific reason to, unless there has been an abnormal response and you suspect an error has been made.

THE CHAIRMAN: Okay.

A. But I don't think it's fair to expect the consultant to check all that.

MR COUNSELL: I wonder if Dr Scott-Jupp could be referred to the first line of Dr Webb's entry at 5 o'clock where he specifically refers to the bolus dose.

THE CHAIRMAN: Claire's had a loading dose of phenytoin and a bolus of midazolam.

A. Yes.

THE CHAIRMAN: So I think Mr Counsell's point is that in order to make that entry, he must have checked back over what Claire had received during the previous couple of hours.

A. He may have checked she received it; he wouldn't have necessarily have checked the dose calculation was correct.

MS ANYADIKE-DANES: What I was going to ask you is: when that prescription was given to the junior doctor, it was given to the junior doctor over the telephone.

A. Yes.

Q. That's Dr Webb's evidence. I think it seems to be common case that this was medication, midazolam that is, which the junior doctors, and for that matter the nursing staff, weren't familiar with. So the point is, if you are doing that, if you are giving something that you know they wouldn't necessarily recognise whether they'd written it down and got the order of magnitude wrong, if I can put it that way, and you've communicated it over the telephone, would it be appropriate to check that things were in order when you had the opportunity to do that?

A. Well, yes, it would be appropriate, but as I say, you're starting from the supposition that junior doctors get things wrong all the time and I don't think most consultants do start from that position. We assume competence.

THE CHAIRMAN: Doctor, I understand that, and for instance, I can understand in light of what you're saying that if you look at the bottom of the previous page that he might not have noticed the multiplication mistake when 18 by 24 turned into 632.

A. Yes.

THE CHAIRMAN: Okay. And at the top of the next page, the right-hand page, I can understand you saying that you wouldn't expect him to follow down the calculation on the right-hand side, which ends up at 69 milligrams over 24 hours because that is, in a sense, checking somebody's homework.

A. Mm, yes. The actual dose itself, you mean? Yes.

THE CHAIRMAN: Is that not more likely to strike you?

A. Yes.

THE CHAIRMAN: I think we have to assume that it didn't strike Dr Webb because, if it had struck him that Claire had got more than triple the prescribed dose of midazolam, we would expect that he would have noted that on his examination at 5 o'clock.

A. Yes, I think he would, and presumably he didn't observe that.

THE CHAIRMAN: Which is why there's no reference to it.

A. Mm.

THE CHAIRMAN: Sorry, that's, not just with the benefit of hindsight, an easier mistake to check.

A. Yes.

THE CHAIRMAN: Because as Ms Anyadike-Danes said, she said a moment ago that junior doctors were not familiar with it, the nurses weren't familiar with it, but in fact Dr Webb wasn't that familiar with it, which is why he had to go and check the dose.

A. Midazolam was a new drug then, I remember it coming in, and people weren't familiar with it. I accept that, yes.

THE CHAIRMAN: Okay.

MS ANYADIKE-DANES: Thank you. When Dr Webb had written his note after his examination at round about 2 o'clock, he'd said he didn't really have a clear picture, and prior to that Dr Sands had said that he wanted to get a history from Dr Gaston. In fact, that information is faxed through too late, obviously, for Dr Webb's 2 o'clock examination, but in time for this. It comes at 15.15, 3.15, and one sees it at 090-013-015. Sorry, perhaps the most significant one to pull up is

090-013-017, with me just making a note that this is a letter written by Dr Gaston, who's the consultant community paediatrician, to Claire's GP, and it's a letter dated 2 August that results from a clinic visit on 1 August.

These are the subsequent notes. They're all phone calls recorded, and you see there's a phone call in September:

"Well. More focused on Ritalin."

And the plan in relation to Ritalin. There's another phone call later on. This is September now, the 20th:

"Doing well on Ritalin."

Then you see there's a phone call on 2 October:

"Dry mouth 30 minutes after Ritalin. Hold meds."

Then the other piece of information that was sent through related to an earlier letter from Dr Gaston to the GP, dated 30 May, which referred to attentional difficulties.

So this is the information. It's not entirely clear whether there was any other communication, but this is the only one that we have seen recorded. So this would have come through and assuming that this was on the notes that Dr Webb would have had access to, is this something that should have been considered as part and

parcel of his examination of Claire at 5 o'clock and, if it is, what should he have made of it all in your view?

A. I don't think this letter helps at all actually. I can understand why he asked for more information from Dr Gaston. I suspect his reasons for asking for that is what the actual physical examination findings were last time Claire had been examined as an outpatient. In other words, what her baseline neurological status was when she was well. It doesn't give any information about that at all.

The other aspects of Claire's abilities could be gained from the parents, by whether she was able to talk, whether she was able to walk, care for herself and so on. Things like the level of muscle tone in her limbs, the reflexes and that sort of thing, could only be gained from the doctor examining her, not from speaking to the family, so I suspect that was the sort of information he was looking for.

Q. There was a thought that Claire's earlier, as they considered them to be, epileptic seizures -- at least, on admission, they were querying whether they were epileptic seizures -- that she had had when she was a baby, there was some thought that maybe what is being seen here is somehow some of that presentation coming back. She was examined in the Children's Hospital when

she was a few months old, up to about 8 months old, I think she was, and she came under the care of Dr Hicks, who was an experienced consultant paediatric neurologist, and they were unable at that time, as it seems, to resolve the cause of Claire's presentation. But leaving that aside, if it had been known, and I presume it is known from her medical notes and records, that she'd been in when she was a baby with the suspected epilepsy, would it have been appropriate as they're trying to find out what is happening and why for anybody to have tried to contact Dr Hicks to see if she could shed any light on anything?

A. I don't think in this circumstance it would have helped that much. The important information could be got from the parents directly as to how long ago she had had fits, what treatment she'd had and when she'd come off. If she had been given a very specific and unusual diagnosis of what was causing the fits, for example some congenital brain abnormality that had been diagnosed at the time, the parents undoubtedly would have known and would have given that information to the admitting doctors. I think there's relatively little information that would have been gained from the previous consultations that wouldn't have been known to the parents.

THE CHAIRMAN: And Dr Hicks' involvement had ceased about eight years earlier, so the parents can give a much more complete, up-to-date picture.

A. Exactly, yes. The very fact that she had had fits -- whether or not you call it epilepsy -- when she was younger, doesn't really affect greatly the management in this case because it wasn't active, it was a long time ago, and the same issues would arise whether or not she had had that history.

MS ANYADIKE-DANES: I just want to ask you about that. Would it have made any difference at all to how you would have treated her if you were the consultant paediatrician there to know that she did have this history or would you simply have treated her on the basis of how she presented as she came in on the 21st?

A. It might have made you slightly more likely to consider seizures as part of the diagnosis, but not really because a child who's never had a seizure before can present for the first time in this way and it doesn't really prove anything, that history from some years before.

Q. Then if we go back to the medical notes and records, 090-022-055, at this stage now Dr Webb has the benefit of quite a bit more information than he had when he saw her at 2 o'clock, although no further tests; would that

be fair?

A. Yes.

Q. So he has more observational information, if I can put it that way, but nothing in the terms of actual testing. There's still no serum sodium tests, there's obviously no CT, no EEG, he's just got more observations.

A. Yes.

Q. And what he does know, though, is he knows the medication because he's prescribed it. So he knows that Claire's already had rectal diazepam and she's also had phenytoin and, for that matter, she's had midazolam.

A. Yes.

Q. What would you have been wanting to discuss with him if you'd been Dr Steen and had remained concerned about her and had come back from Cupar Street? So you are there at 5 o'clock in the afternoon. What would you be wanting to discuss with him as the way forward?

A. Well, as we've already said, getting more information about the reasons for her depressed conscious level, getting some explanation of whether or not she is actually having seizures and the reasons why.

Q. For example, if you see above, before he saw her at 5, she's already been prescribed the midazolam after the phenytoin.

A. Yes.

Q. Would you have wanted to know why that had happened, given that there is no more information in terms of actually what's happening in her brain?
A. It's fairly obvious that you wouldn't give those medications unless you thought that the child was having seizures.
Q. I appreciate that, but would you have wanted to know from Dr Webb why he thought it was appropriate to give midazolam after both the rectal diazepam and the phenytoin haven't made an appreciable -- there might have been some fluctuation in improvement -- difference to her condition?
A. Yes, I think I would have discussed and questioned whether seizures or non-convulsive status was in fact the right diagnosis.
Q. And then if one sees through his notes, one of the things that he wants to do at item 3 is to administer more anticonvulsants, which is the sodium valproate.
A. Yes.
Q. Do you see that on 3? What would have been your response to that?
A. Well, the same. I would have asked whether the lack of response to three anticonvulsants should have led to questioning whether that actually was the problem, particularly in the absence of any EEG evidence.

Q. And if you see the first two: (i) is the cefotaxime and the acyclovir; and then (ii) is to check the viral cultures and stool and urine and bloods and so forth. In relation to (i), would you have been surprised that that was the first time that that was being done at 5 o'clock?

A. Well, I think Dr Webb, in his previous consultation at 2 o'clock said, gave the impression that he didn't think it was an encephalitic illness. Then he has presumably changed his view due to the lack of response and decided to be more cautious and cover that eventuality with those drugs. So I'm not surprised that he chose to give it then.

Q. And then the check the viral cultures?

A. Yes, the viral cultures are somewhat academic because that wouldn't change your immediate management at all; that might give you a diagnosis several days down the line.

Q. Would you have wanted to discuss with him generally the actual medication? I mean, the inquiry has had the benefit of expert views on it and what its likely effects are and so forth. But from your position as a consultant paediatrician would you have wanted to understand more about why he had devised the drug regime he had?

A. I think I would for my own education, yes. I think I would have been curious as to why that particular sequence of drugs had been decided upon.

Q. And if we just go back to something that the chairman had asked you and others earlier. If you had phoned through from Cupar Street and were being told actually what had happened -- so these were the medications which would have taken you up to the midazolam and the Glasgow Coma Scale, if you had asked about it -- you would have known that she was on hourly obs, I assume. If you'd had that kind of information, could you have gained the comfort that would have prevented you from coming to see her simply by knowing that Dr Webb was there or seeing her?

A. I certainly would have gained comfort from the knowledge that a consultant was there, given that the registrar was fairly junior, yes. My own personal practice would have been to either speak to Dr Webb on the phone there and then or to visit the ward and speak to him face-to-face, I think.

Q. Would you have wanted to come and see Claire for yourself and perhaps speak to her parents?

A. Personally, I think I would, yes.

THE CHAIRMAN: But to a degree, that would depend on a conversation which you would like to have with

Dr Webb?

A. Yes.

THE CHAIRMAN: It might be that you get sufficient reassurance from that not to come and see Claire, but actually looking at the records for that day, it's a bit hard to see how you would have got that reassurance.

A. One might got the reassurance that there was nothing more that I, in Dr Steen's role, could have done that Dr Webb wasn't doing already. I think what I would have asked if I had spoken to Dr Webb is, "Have you spoken to the parents?", because sometimes in this situation, the division of roles is that the specialist might be the one who does the treatment and makes the plan, whereas the generalist might be the one who speaks to the parents. It quite often happens, for example, when a child is admitted critically ill to an intensive care unit where the intensivists get on and do the hands-on stuff and the generalist's role is to speak to the parents and counsel them.

MS ANYADIKE-DANES: If you'd been able to have the conversation with Dr Webb at all -- which may have been the case here, we don't know -- if you hadn't been, but you'd been given the kind of information that was recorded about Claire, if I can put it that way, would you have wanted to come to see her at 5 o'clock or

whenever your clinic finished?
A. Yes, personally, I would.
Q. There is one drug that we haven't heard of in particular, which is the Hepsal. 090-026-075. We can see it at the bottom there, the regular prescriptions --
A. Yes.
Q. -- at E.
A. Yes.
Q. And that's being prescribed to be given at those particular times and it's signed off by Dr Stevenson. Is that something to do with the fact that she was receiving so much by IV?
A. Yes. I can answer that quite easily. That is simply a flush. It's simply a solution of heparin, which prevents blood clotting, with a small amount of saline. You can see it's a tiny quantity, it's only 5 milligrams --actually, that should probably be 5 millilitres -- which is used very routinely to flush the line and prevent clots forming in the line. That is to say, the intravenous cannula.
Q. When you say it should have been 5 millilitres and not 5 milligrams?
A. It's usually ... I'm sorry, I can't remember the ... It's actually not terribly important, but usually it's written up as millilitres. Hepsal has a small

concentration of heparin in a small amount of saline.

Q. If we then go on to one element in relation to the seizures. If we pull the record of attacks back up, 090-042-144. I think the evidence in your second report was that the further seizure at 9 o'clock, in spite of having received a considerable amount of anticonvulsant medication, should have prompted reassessment, including electrolyte testing. And that was done because there was going to be a test to check for her phenytoin levels. So they were going to take the bloods at either at 9 o'clock or at 9.30 and they did indeed take the bloods at that time. It seems it was these bloods which produced the result of 121, which you see recorded at 11.30 in the notes. Then you say:

"And a repeat neurological examination ..."

That's at your reference 234-002-008.

What would that have involved so far as you're concerned?

A. Do you mean the neurological examination?

Q. Yes.

A. It would have involved assessing the conscious level in rather the same way one does when doing a Glasgow Coma Scale. Assessing her level of response to voice, to being spoken to, her level of response to physical stimulation, her level of response to pain, if there's

no response to the first two. It would have involved checking her vital signs, pulse, blood pressure, temperature, all that sort of thing. It would have involved furthermore looking at her eyes to look at the pupils in more detail than is done just in the standard CNS observations, looking at the eye movements. It would have involved, if possible, examining the backs of the eyes, examining the retina with an ophthalmoscope to look at the fundi, which is a rather important part of the examination, to see if there was evidence of papilloedema, which can indicate raised intracranial pressure. It would have involved looking at the muscle tone and the posture in her arms and legs to look for evidence of abnormality there and it would have involved doing tendon reflexes in the arms and legs to see whether there was any asymmetry or any exaggeration of the tendon reflexes. All those things give information about neurological status.

Q. In the record of attacks --

THE CHAIRMAN: Sorry, before you go on, you're on question 7(a); is that right?

MS ANYADIKE-DANES: Yes.

THE CHAIRMAN: Am I right that the reference to Dr Stewart in that question is wrong? It should be Dr Hughes, shouldn't it?

MS ANYADIKE-DANES: It should be Dr Hughes, exactly, sir.
THE CHAIRMAN: Thank you.
MS ANYADIKE-DANES: In the record of attacks, that episode of screaming and drawing up of arms which is recorded at 9 pm -- well, let's pull it up alongside of this, 090-042-144.

There's her pulse rate, her pupils are large but reacting to light, and a doctor is informed. So a doctor's told about this. In terms of the neurological assessment or neurological examination, which you think should have been carried out in response to this, how soon after it do you think that should have happened?

A. As soon as possible. It's difficult to do a neurological examination actually during a seizure for fairly obvious reasons. But as soon as the child has settled down, that's a good time to do a neurological reassessment.

Q. And so far as you're concerned, how important was it that that happen?

A. It depends a bit how recently a neurological assessment had been done. It looks as if probably it hadn't been done since Dr Webb saw her at 2 o'clock that afternoon; am I right? From what's recorded in the notes, she had been seen, but she hadn't actually had a neurological

examination done. So certainly by that time, which is some 7 or 8 hours later ...

Q. Sorry, it's not actually clear if he didn't do that. I'll stand to be corrected if he said something else in a witness statement. At 090-022-055, if we pull it alongside, he says --

THE CHAIRMAN: It depends how you interpret the 5 o'clock note, does it?

MS ANYADIKE-DANES: Yes, thank you very much, Mr Chairman.

THE CHAIRMAN: Do you interpret the 5 o'clock note as being a fresh neurological examination?

A. I doubt it. I think ... What does he say ... "She continues to be largely unresponsive. She responds ..." Can you help me with reading it?

Q. Perhaps we could enlarge that part.

A. "... by flexing her left arm to deep supraorbital pain and does her facial grimace, but no vocalisation."

So that's a partial neurological examination, which I think, under the circumstances, was acceptable.

THE CHAIRMAN: But you're saying that the attack which is noted at about 9 o'clock should have led to a full reassessment in light of the fact that this came after she had received quite a lot of drugs?

A. Yes, and she was having overt seizures, which she wasn't at 5 o'clock.

MS ANYADIKE-DANES: Who do you think should have been carrying out that kind of examination in those circumstances?

A. At 9 o'clock?

Q. Yes.

A. I think it should have been the on-call paediatric registrar.

Q. If for any reason the on-call paediatric registrar can't because she's caught up with any number of things that she might have been, given the thinness of the cover, if I can put it that way, what do you think should have happened then?

A. The SHO should have done as best he could and reported his finding to the registrar and, if his findings were of concern or if the history given of recent events had been of concern, the registrar should probably have either phoned the on-call consultant herself or asked the SHO to do so.

Q. Are there circumstances in which the SHO might have contacted the consultant directly?

A. Yes.

Q. Could these be one of them?

A. Yes, although nearly always the SHO would have discussed it with the registrar first.

Q. Yes. But the position I'm suggesting is that for some

reason the registrar can't come and do it herself or maybe can't even be reached given what she was doing. If that's the case, so there's not a registrar available, if I can put it that way, to the SHO at that time, and I think your evidence is that that ought to have been done as soon as possible.

A. Yes.

Q. Would that provide a justification for contacting the consultant?

A. Yes.

Q. And leaving aside justification, would it have been an appropriate thing for the SHO to have done that?

A. Yes. It isn't the conventional hierarchy, but I think all consultant paediatricians would accept that there are circumstances where the conventional hierarchy has to be bypassed and a more junior member of staff -- and it could be a nurse as well as a doctor -- goes straight to the top under unusual circumstances.

Q. Which top would they be going to, Dr Webb or Dr Steen?

A. Well, that's the point. That, I think, is the crux of this case. Under normal circumstances, I would have said Dr Steen as she remained the consultant in charge of the case, and I think she explained in her witness statement that even though she wasn't on call that night, she made it known that she still expected to be

called about her patients.
Q. She did, and indeed she was --
A. Yes. Later, yes.
Q. -- when there was the respiratory collapse.
A. Under the circumstances, if the on-call doctor had known that Dr Steen had not seen the patients, but knew that Dr Webb had relatively recently, and also knew that Dr Webb was on call and therefore likely to be available, it would have been quite understandable for that doctor to have gone straight to Dr Webb.
THE CHAIRMAN: There's two things. First of all, Dr Hughes, who is this doctor we're talking about, she effectively conceded last week -- it rather looks as if she didn't appreciate the seriousness of Claire's condition.
A. Yes.
THE CHAIRMAN: And was reasonably clear about that, so that's an acknowledgment on her part that, despite what now seems to be obvious, she did not pick that up at the time. But on another note, if she did jump the hierarchy and go to a consultant, would she not have been more likely to go to, in a sense, her own consultant, namely Dr Steen than she would have been to go to Dr Webb?
A. Yes, I think she probably would have been more likely. It would have depended a little on what Dr Hughes

perceived to be the accepted practice in the hospital at that time.

THE CHAIRMAN: Yes, thank you.

MS ANYADIKE-DANES: I wonder if I can move now to discussions with the family. I think in your report. At 234-003-007, which we can pull up, you have said that:

"... the parents ought to be told of any changes in diagnosis, the possible reasons for any deterioration, the management plan, any significant neurological deterioration."

Is that fair? Is that your view that that's what they should have been told about?

A. Yes.

Q. What would you have expected them to have been told about the involvement of Dr Webb and the consultant who was going to be responsible or who was responsible for Claire's treatment?

A. I would think with any child where a general paediatrician is involving a specialist colleague for an opinion, the parents should normally be told because that is a significant step. It may also be that the parents end up meeting this doctor, either then or at some later date, and they need to know who they are and what the reasons for their involvement are.

Q. Given that it was Dr Sands' wish to at least consult with Dr Webb and possibly have Dr Webb involved if that was appropriate, and that was something that came out of his ward round and the parents were there at the ward round, how do you think that should have been communicated and the significance of doing it at that stage?
A. I think Dr Sands should have told the parents he was going to ask for a neurological opinion, yes.
Q. I meant the significance of doing it. What should they have been led to understand as to what that meant about the seriousness of their child's condition?
A. If I can sort of paraphrase what I might have said in that situation. I would have said to the parents, "It looks like it's more than just a virus, as we thought it was when she came in last night. It looks like she might have a neurological problem, that is to say a problem involving the brain. We don't know yet whether it's serious or not. I'm not entirely certain what's causing it, so I'm going to seek some help from a colleague who specialises in these areas and I will contact him straightaway and hopefully he will see your child as soon as possible".
Q. Thank you. That leads on to a related question, which is: what do you think they should have been told about

the likely cause of her problems, what they were treating her for and how they were proposing to go about that?

A. It's quite difficult to explain uncertainty to parents -- or to patients, not just parents. I think, as doctors, we are, as a breed, perhaps guilty of pretending there is more certainty when there isn't. We don't like to appear to be hesitant and uncertain when talking to people, so we are a little bit inclined to imply that the diagnosis is more certain than it actually is, to try and keep things simple.

In this case, as in many others, we may have entertained all sorts of possible likely differential diagnoses, but to list all of them, some of which are extremely rare and extremely unlikely to be the cause, I don't think is helpful and it would not be normal practice. You just mention one or two of the most likely that you think is there and the reasons for it and what you're going to do to manage it.

THE CHAIRMAN: Professor Neville had about five.

A. Yes.

THE CHAIRMAN: You really wouldn't give five to parents, would you?

A. In this situation, I would not go through all these things, particularly if you start talking about brain

tumours when that's incredibly unlikely. That would cause huge and unjustified anxiety.

MS ANYADIKE-DANES: If we take it at either during or at the conclusion of the ward round, what stage do you think the parents ought to have been told, leaving aside the question of going to go and see Dr Webb, but in other respects?

A. Well, if I'd been Dr Sands, I think I probably would have admitted that I was only a trainee doctor and therefore would have needed some consultant back-up and confirmation, and I probably would have not said that much if I knew that there was going to be a consultant speaking to the family fairly soon. But I would have said, "I'm concerned it might be more than just a viral infection, there may be some problem with the brain", and I think I probably would have left it fairly vague at that point. I doubt I would have used the word "encephalitis".

Q. Okay. So enough for them to understand that there's a bit of investigation that has to go on, there's a consultant that has to be brought on in a specialist field because you're a trainee and it's not your area, but you going to go and set about doing that?

A. Yes.

Q. In your view, at the upshot of it all, would you have

wanted to communicate that their daughter was actually quite ill, but you were going to put in place a plan to address it?

A. Yes, I think I would.

Q. Would you have said anything about the thought that you had that she had some sort of fitting, even if that might not be apparent to them?

A. It depends how certain I was.

THE CHAIRMAN: It's a difficult question when you thought fitting was a rather unlikely identified problem.

A. Yes. If Dr Sands was not confident of his diagnosis that this was non-convulsive status which, as we've said, is a rare diagnosis, then I probably wouldn't have said anything to the parents until I had at least discussed it with a senior colleague.

MS ANYADIKE-DANES: I think they were left with an impression that there was some sort of internal fitting going on.

A. Yes. I don't know. It might have been appropriate to mention that, particularly if a decision at that stage had been made to give rectal diazepam, although I think that was a bit later, wasn't it?

Q. The rectal diazepam was a query and I think he then got confirmation from Dr Webb that that was appropriate. That happened therefore at about 12.15. Would you have

told them anything after the initial contact with Dr Webb when you had, from him, confirmed your view of encephalitis -- I'm not saying that you necessarily would have used these terms -- added encephalopathy and we're going to administer rectal diazepam? What, if anything, would you have told them at that stage when you came back from your conversation with Dr Webb?

A. This is before Dr Webb has actually seen the patient?

Q. Yes, exactly.

A. If I knew Dr Webb was coming fairly soon, I think my conversation would have been fairly limited. It would have been necessary to explain the reasons for giving rectal diazepam, and therefore a mention would need to have been made of fitting activity of some sort.

Q. So if you hadn't already mentioned it before because that's what you thought it was, you might be mentioning it now, otherwise they'll wonder why she's being administered it?

A. Exactly. One would have to explain the reasons for administering it.

Q. Then Dr Sands -- it's not clear entirely when he would have left the ward, but it may have been some time between 1, 1.30, something of that sort to go and get ready for the clinic in the afternoon. At that stage, Dr Webb had not come, although I think it's fair to say

to Dr Sands that he had rather hoped that he would and, in fact, thought that he might by the time he left. But it hasn't happened. You know that you're going off and you're perhaps not going to be there for the entire afternoon. Is there a conversation you have with the parents if they're there about that?

A. Yes. I think so. If they're there, it would be good practice to speak to them.

THE CHAIRMAN: The grandparents were there at that time.

A. The grandparents is a much more difficult -- this often comes up, actually. If the grandparents are sitting with the child and giving the parents a break, how much one should say to the grandparents. That's actually quite difficult. One doesn't want to appear to be evasive, but one doesn't know how much the parents would want the grandparents to know.

MS ANYADIKE-DANES: Of course.

A. And there may be good reasons why the grandparents shouldn't be given all the information.

Q. I see that. Given that, what do you feel it is important that he does to communicate his views and what's happening to the SHOs and the nursing staff?

A. Dr Sands, you mean?

Q. Yes.

A. Well, one would expect that he would have been in

communication with the SHOs and the nursing staff all the time. That's what a registrar should do and he should have made his concerns known to them.

Q. So if he felt that Claire was neurologically very unwell, is that something that the junior doctors and the nurses should understand?

A. Yes.

Q. And that if they hadn't for some reason -- perhaps because of the lack of experience in it -- formed that view of their own, it's something that he should been communicating with them?

A. Yes. It is possible for less experienced staff to underestimate how unwell a child is or, for that matter, overestimate how unwell a child is and more experienced doctors should rectify that.

Q. And although he might have been rather guarded in what he said to the parents because, to some extent, he's still waiting to see what Dr Webb will say when he comes, what is the information you think he should have been explaining to the junior doctors and the nursing staff, who may be the people who are left to discuss things with the parents when they come back and when he's away at clinic?

A. Well, if he thought she was in non-convulsive status, he should have made that clear, that this is an uncommon

condition, that most of them may not have seen before, and that anticonvulsants are an important part of the treatment and that the effect of anticonvulsants may actually make the child become more awake and alert rather than becoming sedated because that's the whole reason for giving them.

Q. If that's sort of coming out of the ward round and taking you up, in term of Dr Sands anyway, to when he goes off to the clinic, and then Dr Webb comes at 2 pm and the parents are not there at that stage, but the grandparents are there. Given that the parents aren't there and he records that in his note, that they're not there, and given what you just said about not sure how much you necessarily convey to the grandparents, what do you think he should have been explaining to the grandparents?

A. Well, as I say, with grandparents it's particularly difficult. I would personally give a very limited explanation to the grandparents, but would have established from them when the parents were likely to be arriving back in the hospital and I would have told the grandparents that I'll tell the parents everything about it when they get here and just give a very brief bulletin, if you like, about her current status.

Q. Yes. It was in that context that I was going to ask you

because he, of course, has his own patients that he is dealing with and I presume he's not an entire master of his time, so he wouldn't necessarily know when he'd be able to come back to have that kind of discussion with the parents. If that's the case and he's loath to embark on that kind of detail with the grandparents, is there anything that he might be saying or you would think was appropriate that he would say to the nursing staff and to the junior staff for when the parents come back?

A. What I would have done is ask the nursing staff to phone me as soon as the parents came back so I could speak to them.

Q. And by "speak to them", do you mean you would have spoken to them on the phone or would you have wanted to actually go there and see them face-to-face?

A. If at all possible see them face-to-face, but second best would be speaking on the phone.

Q. Thank you. If you were doing that, what would have been an appropriate amount of information to have told them some time after 2, but before 5, if I can put it that way?

A. To have told the parents?

Q. Yes.

A. More than I think I would have expected Dr Sands to have

said in the morning. There was evidence of a neurological illness, that I think the ... Dr Webb felt that there was ongoing seizure activity and that we didn't entire know the cause for it, that some investigations were going to be done to see if we could find out what was causing it, but it was likely to be due to a virus of some sort, and that we would continue with giving treatment, anticonvulsant treatment, to try and bring it under control.

Q. And then if we come to 5 o'clock, the parents are there, at least the mother is there at 5 o'clock. What would you have been expecting Dr Webb to have told the mother at that stage?

A. Well, actually, more or less the same, except that by this time he was considering starting specific treatment for infective causes, antibiotics and acyclovir.

Q. Yes.

A. So that probably should have been mentioned as well.

Q. At that time, she's had more anticonvulsants and he's about to suggest she start on her fourth round.
I appreciate that you don't think that that was a pattern of medication that you would have subscribed to, but leaving that aside, that is what Dr Webb is doing, and in those circumstances what do you think should have been conveyed to the mother?

A. That she was responding poorly to treatment and that we were concerned.

Q. That's what I was coming to. How much should he have communicated to the mother about his concerns about Claire?

A. It's very difficult to quantify that. Can I just go off on a slight tangent talking about communicating to parents generally in any situation? One has to establish what level they're at, where they're coming from. For example, if a child comes in with a relatively minor problem, they seem to be extremely anxious, then one would emphasise to them that there's nothing to worry about, the child is going to be absolutely fine. This happens very frequently. If on the other hand the child really is quite ill and the parents seem to be somewhat unbothered and blase about it, you might use different language in exactly the same situation to what you would with a parent who was appropriately worried.

So one assesses their level of anxiety and concern and tries to bring them to what one considers to be appropriate for that situation, either bringing them up or bringing them down, if you see what I mean.

Q. Yes. How seriously ill, if you were doing it, would you have conveyed that Claire was at that stage?

A. If they were not already significantly worried, I would have used terms that conveyed that she was significantly ill. If they were so concerned at the time that they thought things were actually worse than they were, then I would have perhaps made slightly more reassuring noises.

Q. And if we go then to 9 or 9.30, the parents left at about that time, some time between 9.15 and 9.30, in any event after she'd had that episode of screaming at 9 o'clock. The mother's evidence is that they left, really not understanding that Claire was seriously ill.

A. Yes.

Q. She went to the nursing station, said that Claire was settled, seemed to be sleeping and that they were off, and very much in that frame of mind, if I can put it that way. What do you think was an appropriate conversation to have had with the parents before they were proposing to leave?

A. Well, one never wants to put pressure on parents and tell them, "You absolutely have to stay", because parents have their own very good reason sometimes for wanting to leave even when they don't want to. But I would have attempted to give the impression that Claire wasn't really any better, the situation wasn't improving, she was still quite ill. I might have

mentioned, in order to give an illustration of how serious it was, that an admission to intensive care during the night was a possibility. My own practice is actually to mention that fairly early on, even if it may not happen, just to give a sort of measure to the parents of how unwell they are.

Q. In a way, what you're trying to convey, without necessarily being prescriptive about it, that if they have a choice, then staying may be an appropriate thing?

A. Yes. That is probably the hint I would have dropped without necessarily demanding it.

Q. Thank you. I'd referred earlier to a book or a text called the paediatric prescriber, which was put together for the Royal Belfast Hospital for Sick Children. There's a bit in it about parents and, as it happens, status epilepticus. One finds that at 311-023-010. That last bullet -- you can see the flow of it, dealing with status and dealing with the seizures and the medication you might be using and so on. That final bullet is:

"Once seizure controlled, institute maintenance therapy."

And this is the point I'm bringing you to:

"Keep parents informed and supported."

It's a very, very brief entry, I appreciate that,

but if any of the junior doctors were looking at this because she did have or was thought to be experiencing seizures -- are you of the view that in all the circumstances, with the information that you had, that the parents were being kept informed and supported?

A. I don't think they were sufficiently informed of the seriousness of Claire's condition, no. I think putting that in the formulary is just so obvious, it's so self-evident that it's almost surprising that somebody perceived the need to put that in, but clearly there is a need to put it in.

THE CHAIRMAN: Mr Roberts' concern, as he expressed it in the witness box, I think a week and a half ago, was that he's not sure that the seriousness of Claire's condition was actually appreciated and he wonders why -- that's part of the reason why he and his wife and his sons were allowed to leave.

A. I don't know, I can't comment on to what extent it was the doctors not appreciating the seriousness of her condition or them failing to communicate it to the family. Either way, it clearly didn't go well, and I don't know which of those is the major contribution.

THE CHAIRMAN: It's now fairly clear to me from the evidence that Dr Hughes did not appreciate it.

A. Yes.

THE CHAIRMAN: She might have come along a little bit after they left and got the check done and the phenytoin level and the blood test, which later came back at 121. If she didn't know it, then that, to a degree, might be a failing on her part, but it might also reflect back on what she was told if there was any handover at 5 o'clock?

A. Yes, that's true. How unwell Claire was quite possibly was not communicated adequately at the 5 o'clock handover.

THE CHAIRMAN: And if it wasn't being adequately communicated between doctors, it might also very well be that the nurses weren't aware of it either?

A. Yes, possibly.

THE CHAIRMAN: Which all fits into the unhappy picture of Claire slipping away and nobody grasping or identifying the problem and stepping in decisively to treat her.

A. Yes, I would agree with that.

MS ANYADIKE-DANES: If we go to 5 o'clock, as the chairman had you, Dr Hughes comes on duty at 5 o'clock. Dr Sands has come back at that point because, as I understand it, he administered the sodium valproate or signs as having done that, so he is there. When I was asking you earlier today about the significance of the handovers, you said that the handover from the day team, if I can

put it that way, to the night team was perhaps more significant because the night team was a more skeletal service.

A. Yes.

Q. Leaving aside Dr Webb discussing with the parents, what should the day team have been discussing as part of the handover with the incoming night team?

A. They should have been discussing that Claire was still on ascending levels of anticonvulsants, that the diagnosis still was not entirely clear, that -- well, they obviously didn't appreciate it, but they should have mentioned that her electrolytes had not been checked recently and that she was on IV fluids and not eating or drinking anything. I think I've already said they should have mentioned that Dr Webb had already seen and examined her and made a plan for treatment.

I think they should also have established between them, the registrars and the SHOs, what the consultant line of responsibility was. Now, I can't say it's really their fault that that remained unclear, but it is the sort of thing that should be and often is discussed at handover. In other words, who do we phone during the night if we have a problem.

Q. Let's stay with that point and I'll come back to something else you said. For various reasons, Dr Steen

did not come at 5 o'clock, she also does not appear to have phoned in to have been able to have a conversation with Dr Webb at 5 o'clock. How should the consultants amongst themselves have resolved the issue as to who is going to be the person primarily responsible should things develop over the evening, if I can put it that way?

A. Well, they should have spoken to each other. It would have been, I think, with a simple conversation, quite easy to agree between them, but that clearly didn't happen.

Q. And if they hadn't spoken to each other, as you thought would have been helpful, through the afternoon, was there not at least an important thing to resolve at 5 o'clock between each other as to who people should have been contacting?

A. Yes, I think there was. Even if they hadn't spoken to each other, one or other could have communicated to one member of the on-call team, whether it be SHO or registrar, saying, "I'm the one to call if you have problems", but it appears that didn't happen.

Q. Yes. Then if we go back to 5 o'clock and the handover between the teams, if I can put it that way. Dr Sands is back, he regarded her as neurologically very unwell at the ward round in the morning. He would have known

that there were no new blood tests taken when he was carrying out the ward round. If he's looking at her notes at all, which he may not have been if he was literally coming in to do something and then depart, but if he was looking at them at all, he would have known that there weren't any new serum sodium tests done during the day. She's had quite a bit of anticonvulsant, four different types, or just about to have her fourth different type, if I can put it that way, without any significant improvement in her condition. What should he have conveyed to his incoming number, which is Dr Bartholome, if Dr Bartholome was there to hear it?

A. Well, really, what I've just said, that she remained unwell, she had a neurological illness for which there was no definitive cause, that she was on ascending levels of anticonvulsant medication, and she hadn't improved.

Q. Can I just ask you, "remained unwell", is that a medical term of art or does anyone know what that actually means?

A. These words are bandied around all the time and they mean different things to different people. I appreciate that's difficult. "The sick child", "the unwell child" has such a broad range of meaning. But I think when one

paediatrician is speaking to another, I think we have an understanding of what we mean by that, which would be very difficult to what a layperson might say.

Q. What does that mean, "remained unwell"?

A. It means more unwell than the other children on the ward, I suppose would be one way of describing it relatively. But it means a child who might require intensive care and who might have a serious potentially fatal or permanently handicapping condition.

Q. So "remained unwell" is actually quite a serious thing to say about a child?

A. In that context, yes. If you were to speak to a GP, you'd probably get a very different answer.

Q. So that's what Dr Sands might have been communicating to Dr Bartholome if she was there. Would it have been appropriate to express his view, which I believe was that she was the sickest child on the ward?

A. Yes. I think that's a useful thing to hand over because it's all about prioritisation. When you're handing over a whole ward full of patients, the people coming on need to know which are the ones to worry about most, to devote their priorities to.

THE CHAIRMAN: And doctor, even though handovers were less structured and more informal in 1996, if there was ever a case to be handed over or ever a patient to be handed

over from one shift on another, it was Claire, wasn't it?

A. Yes, and there may have been others equally, but yes.

THE CHAIRMAN: Yes, okay. I think we'll have to stop now, doctor, to let you away.

The doctor's agreed to make himself available on Tuesday 4 December at 2 pm by video link, and we're going to be sitting that week anyway. Thank you very much indeed for today. If you want to leave now, you can be taken to your taxi and I hope you're on time.

(The witness withdrew)

Ladies and gentlemen, I just want to say that tomorrow we'll have Dr MacFaul, who is likely to be all day and possibly into Wednesday. That will be the only other witness this week. I think it's likely we'll go into Wednesday with Dr MacFaul, but after he finishes, whether it's tomorrow evening or Wednesday, there are no other witnesses who we can take this week.

Between tonight and tomorrow, we'll try to finalise a way forward for the rest of November and into December. I told you last week, we're not sitting next week. I think there's an issue that Mr Fortune raised about when we start in the week of Monday the 26th, but we're working on that. We will be sitting that week, it's just a question of which days that week.

It might be that we'll start later in the week than the Monday but sit through on the Friday, but we'll let you know that tomorrow. Anything more this evening?

MS ANYADIKE-DANES: No. Just briefly to ask, in terms of the evidence that has been heard so far, just to ease things along when Dr Scott-Jupp next appears, if there's anything that anybody wants me to pick up, please let me know, e-mail me or let me know, and then I can try and get it all together so it happens more smoothly than just taking things in an ad hoc way.

THE CHAIRMAN: I should say generally that it seems to me to be essential that we finish Claire's case before Christmas. I don't want this dragging on. Mr and Mrs Roberts are listening to this, it must be exceptionally difficult, and we want to bring an end to Claire's case by Christmas and then we'll resume after Christmas with the next case. There are still bits and pieces about the Kirkham issue, there are still bits and pieces about the availability of Dr Carson and Mr McKee; I take those as important enough, but secondary to getting through the other 95 per cent of the evidence in Claire's case. Thank you.

(4.00 pm)

(The hearing adjourned until 10.00 am the following day)

I N D E X