Friday, 7 September 2012

(10.00 am)

(Delay in proceedings)

(10.10 am)

THE CHAIRMAN: Good morning. I think, Mr Millar, we have a way forward in relation to Mr Keane's evidence.

MR MILLAR: It's entirely satisfactory, sir.

THE CHAIRMAN: We will get the part which revolves around that consultation note done today and, if there's any governance questioning, it'll be done on Monday. When we looked again at the evidence which he gave in the clinical hearing, quite a lot of that actually strayed into governance, so we will still ask questions which have to be asked, but they might not be as much as maybe with other witnesses.

Mr Stewart?

MR STEWART: Thank you, sir. Might I ask that Mr Brown be recalled, please?

MR STEPHEN BROWN (called)

Questions from MR STEWART

MR STEWART: Mr Brown, good morning.

A. Good morning.

Q. May I ask you, in relation to the consultation note that we're today considering, have you discussed this or had the opportunity to consult with any of your colleagues

about the content of this note?
A. Yes, I have. I've spoken briefly to Mr Keane on the telephone.
Q. Yes. And why did you think it necessary to do that?
A. Well, in fact he phoned me, but we both found one particular aspect of it outrageous and therefore we felt we needed to exchange that piece of information.
Q. And perhaps you could tell us what you found outrageous.
A. Well, it was the bit in the paragraph about putting a needle in the renal artery or --
Q. Perhaps we can go to that.
THE CHAIRMAN: We'll call that "the page 5 paragraph" because it's the one we're focusing a lot of attention on.
MR STEWART: That's 122-001-005.
In fact, it's the sixth paragraph down:
"A query was also raised about whether the new kidney had been properly perfused."
Can you tell us, first of all, is there anything in there which you think is accurate?
A. Well, I'm not sure what you mean by accurate. If somebody raised the issue of the perfusion of the kidney then they did. I wasn't there, so I can't comment on the accuracy of the --
Q. In relation to the question about whether or not the

kidney was properly perfused, you have given evidence in the past about your recollection to the best of your ability.

A. Yes.

Q. Is your evidence that at all times the kidney was properly perfused or that you cannot recall?

A. My evidence is that, as far as I can recall, the kidney was properly perfused.

Q. But that allows in it the implication that there may be times when it might not have been properly perfused, but that you cannot recall.

A. It allows a lot of things, but my recollection is that the kidney was properly perfused. I'm sure I would have remembered if the perfusion had been significantly poor and I would have certainly remembered if the kidney had become unviable.

Q. First of all, in relation to the perfusion, other people have given evidence to the effect that their recollection is that there were times when the kidney was not properly perfused.

A. Other people have given evidence?

Q. Yes.

A. Can I perhaps ...

Q. Well, Dr Taylor described the kidney as being "dusky" and that it had perfused quite well initially, but then

it seemed to fail and become dusky.
A. It's not a description I would recognise.
Q. That would suggest, would you agree, that it did not perfuse at all times well?
A. It would suggest that Dr Taylor felt that.
Q. Yes.
THE CHAIRMAN: You say it's not a description you would recognise --
A. I don't recognise it from --
THE CHAIRMAN: -- from this operation?
A. Yes.
THE CHAIRMAN: But it's a description which you understand to mean that a kidney was not perfusing well. If it wasn't perfusing well and then it might be described as dusky and not perfusing well?
A. Yes, okay. I accept that.
THE CHAIRMAN: So I understand. You can understand how in an operation, not Adam's operation, if the kidney was not perfusing well, somebody might describe it as being dusky and not perfusing well. Although that is what Dr Taylor said about this operation, that does not tally with your recollection of this operation.
A. No.
THE CHAIRMAN: Okay.
A. Could I make the point -- perhaps it hasn't been quite

made before -- that this is not a single moment in time. There's an opportunity to observe the kidney for some 20 minutes or so after the anastomosis and after the clamps are off while the ureter's being inserted. Any evident failure in the blood supply would become very evident at that stage.

MR STEWART: And you, as a surgeon, beside the action as it were, would be very well placed to observe that?

A. Yes.

Q. Nurse Popplestone has also given evidence and I would ask for page 093-012-040. This is her statement. In fact, somebody has underlined the section:

"I also recall the surgeons discussing possible discolouration of the kidney at the time of transplant. This concern appeared to subside as the operation progressed."

Here's another person who was there who seems to recall a discolouration.

A. She recalls a discussion. And that would have taken place of course. We would have discussed the nature of the perfusion of the kidney. That would have happened.

Q. Yes. It would suggest that --

THE CHAIRMAN: That's going a bit further, Mr Brown. On the face of it, her description is going further and suggesting that what they were discussing was that in

fact this kidney may be discoloured --

A. But she also points out that --

THE CHAIRMAN: -- and that concern subsided. So this may go back to your point that it depends at what exact moment in time this issue is being considered because Dr Taylor would have no conceivable reason to say that it didn't seem to him to be perfusing well and was dusky if that didn't happen and Nurse Popplestone would have no conceivable reason to say, "I remember a discussion about possible discolouration, but then that concern faded as time went on". And of course, that would be a good thing if it faded and perhaps not that unusual.

A. Quite.

THE CHAIRMAN: The point is that there are at least two people who were there who are saying that this wasn't seamless, if I put it that way. The reason why Mr Stewart asked you about that is because that gives some weight to the paragraph on page 5 about whether the kidney had been properly perfused:

"The kidney was not performing well. It was felt that more fluids were required."

It also perhaps ties in with the fact that Dr Taylor gave a bolus at 9.32 am.

A. It does, but --

THE CHAIRMAN: Not all of this fits together perfectly and

you know that that's exactly the problem we're trying to sort out.

A. I understand. I struggle with the two different concepts: one of perfusion and the other of function. There's only one comment about perfusion in this. The rest is about function.

MR STEWART: Let's deal with perfusion at the moment.

A. Okay.

Q. In fact, Dr Taylor in his deposition evidence to the coroner at 011-014-097 says about a third down:

"This process was complicated by the fact that the donor kidney did not appear well perfused after an initial period of apparently good kidney perfusion."

There's no confusion there, he's discussing perfusion and perfusion alone. Do you recall any period where the perfusion did not appear to be good?

A. I don't.

Q. You were present yesterday afternoon for Dr O'Connor's evidence.

A. I was indeed, yes.

Q. You heard her describe how she made an entry in the operation record and she wasn't sure exactly where the information came from, but it was from theatre, as to the kidney looking blueish, blueish at the end of theatre. Would you interpret "blueish" as indicating

a want of good perfusion?

A. Yes, certainly.

Q. So there we have Dr Taylor and Nurse Popplestone and somebody else in the theatre. And indeed your fellow surgeon Mr Keane has also said that he didn't think there was a continuation of good perfusion at 011-003-010.

MS WOODS: Mr Chairman, I hesitate to rise because I understand entirely why this questioning is important. The point that I'd like to make though is that we've gone through a number of these other witnesses and the evidence has been put to Mr Brown. I'm just looking back at the transcript from 1 May. This is virtually identical to the questioning that was done on that day, where each of those witnesses was gone through and their evidence. So really, what we're doing, and the answers we're getting from Mr Brown, is exactly what we were doing on 1 May. I understand that there may be questions that flow from the issue of perfusion, but I just don't see the point of going through all these witnesses' evidence again.

THE CHAIRMAN: I share your reluctance to go through evidence unnecessarily. The last thing I need is for the hearings to become more protracted than they are. But this paragraph on page 5 jumps out at anybody who

reads it as being potentially significant and entirely different from what we've heard before. In fact, your own client has said it jumped out at him and both he and Mr Keane talked about it because they found at least one part of the note, which is in this paragraph, to be outrageous. I think it is therefore necessary to set the scene again for that because ... What Mr Stewart, I think, is really doing is seeing which parts of the paragraph are supported by existing evidence. Because on one interpretation or one analysis of a document, the more a piece of writing is supported by evidence, the more curious it becomes that there is a rogue sentence in that paragraph, describing something which everybody says didn't happen or couldn't have happened.

This passage which Mr Stewart is going through is, in my view, necessary in order to test the accuracy of the note as a starting point. But secondly and more importantly -- that's the accuracy of the note in the sense of Mrs Neill recording what was said rather than importing something which wasn't said. But more importantly, then testing the information which is contained in that note. So I will allow Mr Stewart some leeway to do this, but I accept your point that this is, to a degree, going over what has been done before, but we need to set the scene again.

MS WOODS: Mr Chairman, I of course understand the concern that you have and the fact that you wanted to go through this. I simply repeat the point that the first sentence:

"A query was raised about whether the new kidney had been properly perfused."

That concern was raised during the clinical hearings and it was explored very thoroughly with this witness and with a number of other witnesses.

THE CHAIRMAN: Okay, thank you.

MR STEWART: Halfway down the main paragraph of this letter:

"At the end of the procedure, it was obvious that the kidney was not perfusing as well as it had initially done, but this is by no means unusual in renal transplantation. The whole operation procedure took about three hours."

This is another individual who's present in theatre who's of the view that there was some problem with the perfusion of the kidney.

A. Is that what he's saying?

MR MILLAR: Sir, it's very important to be [inaudible: no microphone] Mr Keane does not indicate a problem. He gives a description of something that was looking one way, then looking another way. The word "problem" does not appear there. Quite the contrary, he says, "This is

by no means unusual". He's trying to convey the exact opposite of it being a problem to the reader.

MR STEWART: Perhaps I should rephrase that, delete the word "problem", and say "sub-optimal perfusion". Perhaps that might be a better way.

THE CHAIRMAN: I don't think that if it says the kidney was not perfusing as well as it had initially done, I'm not sure what the difference is between that and sub-optimal. It may be that maybe Mr Brown and Mr Keane may want to comment on that. The basic point is that this confirms that there's more evidence about how well the kidney was perfusing.

MR STEWART: Okay.

A. My further comment of course is that in the final sentence he said:

"The operation was difficult but a successful result was achieved."

I'm not sure what I can comment on.

Q. The comment I'm really seeking is whether you can be confident to rely on your recollection that perfusion was good throughout in the light of this evidence from other people who were present in theatre.

A. I can only say that, as far as I can recall, the perfusion of the kidney was satisfactory.

Q. I see.

THE CHAIRMAN: The term you used a few minutes ago, which I have a note of, is that so far as you can recall is it was "properly perfused". Does that fit with what is being described by Mr Keane and Dr Taylor in particular, but also Dr O'Connor and Nurse Popplestone?

A. It fits with what Mr Keane is saying. I'm not sure whether --

THE CHAIRMAN: When you say "properly perfused", does that mean the perfusion was acceptable even if at different points it was perfusing better than at other points?

A. I think that's fair, yes.

THE CHAIRMAN: Okay. I understand then that that's what you mean by "proper perfusion". It doesn't mean flawless or perfect, but good enough?

A. Yes.

MR STEWART: So were there variations in the perfusion?

A. Again, you're asking me a question I can't really recall. All I can say is my recollection is that the perfusion was adequate throughout.

Q. Was it pink and unfailingly pink throughout?

A. Again, I can't put that precisely.

THE CHAIRMAN: Sorry, I think your basic point, maybe to bring this to a head, is that you say if the perfusion had been significantly poor, you believe that that is something you would remember?

A. Oh yes.
THE CHAIRMAN: So the fact that you don't remember it being significantly poor, I should take that as evidence that, however it was, it was good enough?
A. Yes. I think if the perfusion had been significantly poor, by the point we go to the point of anastomosing the ureter to the bladder, that would be very evident.
MR STEWART: Can I ask if page 106 of your transcript from 1 May 2012 might be shown on the screen? Line 15. It's a discussion about the level of perfusion:

"Answer: I'm sure that's correct, but all I can recall is that the level of perfusion was satisfactory in his kidney.

"Question: So at all times prior to wound closure, you recall the kidney being pink and well perfused?

"Answer: That's as I recall it, yes."

It goes on to discuss the view available to you of the abdomen.

So it would appear that you were giving evidence that, in fact, it was pink at all times and well perfused at all times, as far as you could recall.
A. That would appear to be what I said. Yes, I think we're pulling me up over the word pink, which I didn't confirm on this particular occasion. All I can repeat is that, in my view, the kidney was adequately perfused

throughout the operation.

Q. Yes, you used this word "adequate", which is perhaps comparative. It's certainly not an absolute. I want to know what you mean by "adequate".

A. Sufficient to keep the kidney alive and well.

Q. But might it also give rise to concern such as might prompt a discussion between surgeons as to the perfusion?

A. I think that would always happen in a transplant operation, my understanding would be.

Q. Do you recall any discussions?

A. Not specifically, no. But I'm quite sure they did occur.

Q. You're quite sure there were discussions about perfusion?

A. Yes, because I think that's routine in an operation of this sort.

Q. Can we go perhaps to the next sentence of the consultation note:

"The kidney was not performing well and it was felt that more fluids were required."

Perhaps we can break that down into two parts. First of all, "The kidney was not performing well". May I ask what you understand that to mean?

A. By performance, I mean production of urine.

Q. It is correct that your recollection was, on this point at least, quite firm that no urine was produced?
A. No, my recollection was that I didn't see any urine produced.
Q. I see.
THE CHAIRMAN: If a kidney's not performing well in the sense of producing urine, would that lead to more fluids being given?
A. It could possibly do, yes.
THE CHAIRMAN: Right. Do you think that that sentence is accurate or inaccurate?
A. I think it's probably accurate.
THE CHAIRMAN: Right.
MR STEWART: I'm sorry, I missed that.
A. Probably accurate.
Q. And it wasn't performing well because it wasn't, as far as you could see, producing urine?
A. Yes.
Q. Can I ask, as a sort of sideline, why that wasn't recorded in the operation note?
A. I can't tell you. Mr Keane wrote the note. I simply checked that a note had been written, but I didn't ...
Q. But you were the surgeon there at the end of the procedure as far as I understand --
A. Yes.

Q. -- and you had not seen urine produced and the note did not contain any reference to the performance of the kidney, so why didn't you make a note that the performance was not seen to be present?
A. I deferred to my senior, in inverted commas, colleague. He did the operation, he did the note.
Q. I make the point again that you were the last man there and thus the senior man there at the end of the procedure --
A. Yes.
Q. -- when the operation should be noted up; do you accept that?
A. Yes.
Q. Moving on:

"It was pointed out that one can get a situation where the new kidney just simply does not work and perhaps 5 to 10 per cent of transplanted kidneys will not work."

Do you take exception to that observation?
A. No, not at all. I'm not an expert, but I'd think that's perfectly reasonable.
THE CHAIRMAN: Pausing there, so far the note is accurate?
A. Well, insofar as --
THE CHAIRMAN: Insofar as you can comment.
A. Yes.

THE CHAIRMAN: So the first four lines of the note are, on your evidence, accurate and reliable?
A. Well, I mean, a query was raised about whether the new kidney had been properly perfused. I can't say whether that's accurate or not. We've discussed the perfusion of the kidney in this hearing.
THE CHAIRMAN: Yes.
A. But --
THE CHAIRMAN: There is evidence that others thought there was an issue about perfusion, which we've gone through and there does appear to have been some degree of issue. How significant the concern about perfusion was is a matter of degree.
A. Okay.
THE CHAIRMAN: But there's certainly evidence whether an issue was raised. The next sentence is accurate and the third sentence is accurate. So in terms of the paragraph being outrageous in the view of yourself and Mr Keane, we're coming now to the sentence which you think is outrageous; is that right?
A. Yes.
THE CHAIRMAN: Okay.
MR STEWART: "During the surgery, when this kidney was failing to operate, a needle was put into the artery and no blood came out. Clearly the kidney was not working

when the site was closed. However, the performance of the kidney was no longer relevant at that stage."

Can we break this down and parse it? "During the surgery" is what period?

A. It was when the abdominal wall was still open, so presumably at any point --

Q. Any point prior to wound closure?

A. Yes.

Q. "This kidney was failing to operate." Does that mean failing to perform in the sense of producing urine?

A. Well, that's how I'd interpret those words, but I'm not sure how well that could be assessed.

Q. It could also mean not being well perfused, could it?

A. It's not what it says.

Q. But in terms of a broad interpretation?

A. I'm not sure I would ever put that interpretation on it.

Q. Okay:

"A needle was put into the artery and no blood came out."

Do you have any recollection --

A. None whatever.

Q. Could it have happened?

A. I don't believe so.

Q. Why do you not believe so?

A. Because it's not something anybody would do. It's an

extremely unusual thing to do and if it was done, I would certainly have remembered.

Q. Can I ask you to look at the comments of Messrs Forsythe and Rigg which appear at 203-011-004. There, towards the bottom of the page, at (b)(i), the purpose of putting the needle into the artery is explained by them. Secondly, they give their view as to whether this is commonly done in transplant surgeries and they say:

"In our experience this, this is very uncommon and is only done when there is concern about whether there is a blood flow in the artery when no pulse in the artery can be felt."

So it is their view that this is something which is done, uncommonly, but is done.

A. If that's what they are saying. I don't agree.

Q. You don't agree?

A. No, I've never, ever seen anybody do it.

Q. Your experience --

A. Far from transplant surgery, I've been a surgeon for 35 years and I've never seen anybody do anything like that and I've never done it myself.

THE CHAIRMAN: Can I ask you, what's wrong with doing it?

A. Well, it doesn't serve any purpose. Sticking a needle in an artery, particularly a largish needle -- if you wanted to take blood from the artery or measure blood

flow or watch pulsation, you'd need a fairly large needle. You couldn't do it with a tiny, tiny needle, which is the only needle you'd ever dare to put into an artery because you'd end up with an aneurysm. It's just not something a surgeon would do.

MR STEWART: Messrs Forsythe and Rigg also said that there is a purpose for doing it. It is to see whether there's blood getting into the kidney and therefore whether there's a kidney that is working in any sense.

A. Yes, if I could come to what Messrs Forsythe and Rigg saying, they answered a question, which is:

"What was the purpose of putting a needle in the artery?"

They didn't answer the question, "Would they put a needle in the artery or would it serve any useful purpose?" They simply were given the assumption that a needle is put in the artery and asked, "Why would you do that?" And they've clearly come up with a reason. But I don't think, in my surgical experience, that that would ever happen.

Q. Your evidence is that whilst you can't remember it and you cannot therefore say it didn't happen, as far as you're concerned it wouldn't have happened?

A. No.

MS WOODS: Mr Chairman, that wasn't Mr Brown's evidence.

I wonder if Mr Stewart might look back at the transcript on that.

MR STEWART: I asked him to agree with the proposition.

MS WOODS: Well, I'm afraid my learned friend put to Mr Brown, "Your evidence is ...", and I'm just correcting, by reference to the transcript, that that, in fact, was not Mr Brown's evidence.

MR STEWART: First of all, you have no recollection of this happening; is that correct?

A. None.

Q. You do not believe it would have happened?

A. No.

Q. Because it's not something that you could envisage ever having happened?

A. Quite.

Q. But you can't say for certain it didn't happen?

A. I'm not sure how certain anybody can be of anything, but in my personal experience and in my personal knowledge, it would never happen.

THE CHAIRMAN: Let me ask you it directly. Do you think this could have happened at this surgery on Adam without you knowing about it?

A. No. Quite definitely not.

THE CHAIRMAN: Right.

A. It's one thing not to spot the drop of urine coming from

the end of the ureter but another not to spot somebody putting a needle in a artery.

THE CHAIRMAN: I understand you saying that, but what seems to me to be very strange indeed is that Mrs Neill's note seems generally to be reliable in the sense that she hasn't appeared to have made many mistakes. Once or twice she has said hypernatraemia instead of hyponatraemia, but there doesn't seem to be any suggestion on the evidence to date that she has included things which were simply not said. Do you understand the point I'm making?

A. I do. I'm not sure -- I have a number of issues with this note in other ways because there were a few issues that I thought were wrong.

THE CHAIRMAN: Sorry, wrong in the sense of?

A. Things that people wouldn't have said, inaccurate.

THE CHAIRMAN: Maybe this would be the point to look at those --

MR STEWART: Yes, of course.

THE CHAIRMAN: -- if that feeds into your interpretation.

A. I can quickly go through them.

THE CHAIRMAN: Please do.

A. Page 1, the towards the bottom:

"To replace blood loss, one must provide 2.5 times the volume of blood lost."

I just don't understand that. It doesn't make sense to me.

Page 2, the top paragraph --

THE CHAIRMAN: Just give me one moment. So you're saying that that comment about blood loss providing 2.5 times the volume of blood lost, that's incoherent, is it?

A. It is.

THE CHAIRMAN: Right.

A. There's the business about Dr Taylor and the colander. Okay, it may have been said, but it doesn't make much sense.

THE CHAIRMAN: You see, this is the point. This is exactly the point. It may have been said, but it doesn't make much sense. Dr Taylor has been through this note.

A. Okay.

THE CHAIRMAN: Dr Taylor has been asked to point out any significant error in it. Dr Taylor has not suggested that he did not mention the analogy of a colander; right? So therefore Mrs Neill's note is accurate in recording what he said. You might think it makes no sense, but it is an accurate recording of what he said. So what I'm looking for from you is something which appears to you likely not to have been said but which is somehow included in the note.

A. Okay, yes, fine. Second page on the -- number 2.

MR UBEROI: Sir, before we go further, just for completeness and the record, it's not a problem for me at all, but as I say, for the record, on the point of:

"To replace blood loss, one must provide 2.5 times the volume of blood lost."

As I understand Dr Haynes' most recent report, he has said that that's a perfectly understandable rule of thumb. I only state that for the record as it's being discussed now.

THE CHAIRMAN: Mr Brown says it is incoherent; Mr Haynes says that's it.

MR STEWART: That's at 204-016-008.

THE CHAIRMAN: Okay. I think you were going to take me to somewhere else on page 2, Mr Brown.

A. Number 2 on that page.

THE CHAIRMAN: Still on --

A. Two-thirds of the way down. There are some numbers which --

THE CHAIRMAN: I think you're on page 3 then.

A. Sorry, 003, yes, I beg your pardon. That says:

"He had not been given large volumes of food during the procedure."

THE CHAIRMAN: Right.

A. Well, I mean, how would he -- where's food going to come into it?

THE CHAIRMAN: So that doesn't seem to you to make sense?
A. No. And I had some difficulty with the next paragraph, with the haematocrit, but it's just a ... It's a difficult one.
THE CHAIRMAN: Right.
A. But it's not -- I mean, it probably was a difficult thing to keep a note of. Then of course, page 4, the top line about the bladder being opened. The bladder wasn't opened, the bladder wouldn't be opened.
THE CHAIRMAN: Yes, but I understand your point that the bladder wasn't opened. But that doesn't mean that for some reason this wasn't discussed. You wouldn't suggest that Mrs Neill has somehow included a paragraph about the bladder being opened and a discussion about the bladder being opened in the absence of some talk about that at the meeting?
A. I have --
THE CHAIRMAN: That wouldn't make any sense.
A. I have no idea. I can't say that obviously. It's merely making the point.
MR STEWART: May I interrupt to ask, for the record, to your recollection, was the bladder opened?
A. The bladder wasn't opened until the time for anastomosis of the ureter.
Q. And you have a clear recall of this?

A. No, but it's what one does.
Q. Thank you.
A. In the third paragraph, "Dr Alexander concludes", but Dr Alexander wasn't there.
THE CHAIRMAN: No, but his report was available.
A. Okay, there are reports available for this. We don't have any information about or it's not noted that reports were being used.
THE CHAIRMAN: No, but that's a reference to the fact that this is a few days before the inquest and, by that time, the coroner will have made available reports and one of those reports was from Dr Alexander. So inevitably, a medical report will be discussed at a consultation a few days before an inquest.
A. Right. So there might be other reports as well that are being alluded to --
THE CHAIRMAN: Well --
A. -- without our knowledge, shall we say?
THE CHAIRMAN: I'd be very interested if there were more reports being alluded to without our knowledge if I haven't seen them because I'm supposed to have seen everything that the Royal had and I know that I've seen everything that the coroner had.
A. Okay.
THE CHAIRMAN: I'm not sure you want to open that door,

Mr Brown.

A. No, I don't, I don't think I wish to. Again, some typographical errors of no importance. We mentioned the bladder disadvantage, but that's Mr Brangam's records, I guess. We don't need to understand what that means.

On the next page, page 5, the third little paragraph about:

"... 10 per cent [and so on] then you provide a drip of platelets and fluid."

I don't think that's what one would use. I don't know why anybody would say platelets as being a replacement fluid for blood loss. That certainly doesn't make any sense to me.

THE CHAIRMAN: Maybe you'd finish that sentence for me then. If one has lost 10 per cent of blood volume, then you would provide a what?

A. At that stage, clear fluid. Certainly fluid. But platelets, that's a very specific thing. I'm not sure why anyone would have said platelets.

THE CHAIRMAN: Right.

A. I think that's the only --

THE CHAIRMAN: And then we go to the sixth paragraph.

A. Yes.

THE CHAIRMAN: Okay. Sorry, let me put it this way. It'd be very curious indeed, to take that as another example,

if Mrs Neill, who at this stage had a degree in jurisprudence from Oxford University, had worked for the Central Services Agency, which was the forerunner to DLS, and had worked in Brangam Bagnall. It'd be very curious indeed if she was somehow inserting her own words such as a "drip of fluid and platelets" if somebody hadn't said that. So really, the question seems to me, Mr Brown, if you can follow my line on this, that when she is recording this note, it seems to me to be overwhelmingly that she is recording what is being said at the consultation. There are a number of people at that consultation who have had previous meetings and who have had previous discussions with various people who were not at the meeting.

For instance, Professor Savage and others, including Dr Taylor, may have spoken to yourself or Mr Keane or may have spoken to the lawyers or to Dr Murnaghan or Dr Gaston before this meeting took place. So there's some information coming into this meeting from outside. Also, there may be contributions off their own bat from people like Dr Gaston; right?

A. Yes.

THE CHAIRMAN: We then come to the reference to the needle being put into the artery. You say you have never seen that in 35 years, it doesn't make sense, that's not what

you would do, but I'm taking it, in the absence of compelling evidence to the contrary, that this is what somebody said in the consultation and Mrs Neill's note that that is what somebody had said is probably reliable. And the question is then: why did somebody say it? If it didn't happen, where on earth did that piece of information come from?

A. Well, you'd have to ask the person who said it. Of course, we don't know who said it.

THE CHAIRMAN: We don't know who said it, but we know that there was a lawyer, a paralegal, Mrs Neill, and the other four people there were doctors.

A. Yes. I think my other question is, if that was said at a meeting like that, why was there no follow-up of any sort taken on that? Not another word is said about it. It's just said and abandoned. I don't understand that.

THE CHAIRMAN: Okay. Mr Stewart?

MR STEWART: Just for the sake of completeness, can we go back two pages to 122-001-003, to the paragraph at the top of the page:

"In this case, the kidney was in at around 9.30 am. The vein was in, the arteries were being finished. At this stage, Dr Taylor did a blood gas assessment and, based on the results of this, he then started to give blood. Once the blood was being put through, the clamps

were released. Further blood was given at a later stage. The kidney was not working and it was felt that more fluids were required."

You didn't single that out for criticism. Do I take it that you agree with that?

A. Well, I can't argue one way or the other. The "9.30 am" clearly doesn't make sense, but that's for this tribunal to work out. I find it unusual and strange.

Q. Very well, thank you. Back to page 5 and paragraph 6. "Clearly, the kidney was not working." I take it you'd agree that if no blood came out and that procedure was properly executed, then the kidney would not be working?

A. Sorry, if what procedure?

Q. If a needle was inserted into the artery and it was properly done and no blood were to come out, then that would mean indeed it was clear the kidney was not working; would that follow?

A. We're back to perfusion, not function.

Q. No, I'm asking really about the process of putting the needle in to see if there was blood going through.

A. I can't comment because I would never, ever do it and I don't understand why it would be done.

THE CHAIRMAN: Sorry, I'm not sure it's quite that simple. I understand you saying that you have never done it in 35 years and you don't believe it was done that day.

A. Yes.
THE CHAIRMAN: But go with me hypothetically for a moment. If a needle was put into an artery and no blood comes out, what does that indicate?
A. It presumably indicates there's no blood going through the artery.
THE CHAIRMAN: Yes.
A. As long as -- assuming the needle is large enough.
THE CHAIRMAN: Yes, and if no blood is going through the artery in this transplanted kidney, what does that indicate?
A. If no blood is going through either artery? Because there are two arteries in this transplanted kidney. Clearly that indicates that the kidney will become non-perfused and become unviable.
THE CHAIRMAN: Yes. So it's an entirely irregular, and, you think, unthinkable way of testing whether the kidney is working, but if that was done and if that was the result, no blood came out, it would indicate the kidney was not working?
A. Yes, I suppose -- well, not indicate the kidney wasn't working, it would indicate the kidney was not being perfused.
THE CHAIRMAN: And if it is not perfused, it can't be viable.

A. Therefore, it can't work.
THE CHAIRMAN: It will fail.
A. It's a more important decision about whether it's viable or not.
THE CHAIRMAN: Right. Okay. You described that sentence, that part of this note, as being outrageous. And I understand in your evidence why you say that. But do I take it then that you can't help at all on, if this is a somehow distorted version or interpretation of something that might have been said, what the accurate version would be?
A. I can't help. And the other thing that struck me when I read that, the sentence beginning "during the surgery", it's a very compound sentence. It sounds like a sentence made up of a number of other little bits all added together. It's difficult to know where the commas belong in that one. It's lots of verbs and nouns, so it needs to be dissected out a bit.
MR STEWART: It looks as though it says clearly that when the operation site was closed, the kidney wasn't working; would you agree with that interpretation of it?
A. That's what it says.
Q. Do you have any recollection, clear recollection, of whether the kidney was or was not working when the operation site was closed?

A. Well, there's no way to determine whether the kidney is working or not when --
Q. Immediately before closure then.
A. Once the ureter is anastomosed to the bladder, there's no way of determining because you cannot see urine.
Q. Well, let us suppose that it was poorly perfused and no blood was coming out on the needle test -- shall we call it that? That would indicate that it wasn't working, wouldn't it?
A. It would indicate if that was done, and if that was found that there was no perfusion, yes.
Q. And you have no recollection, as I understand it, from your evidence of the end of the operation, of Mr Keane leaving --
A. No, not clearly, no.
Q. So you can't say for sure one way or the other that that didn't happen and it wasn't the case?
A. Sorry, what didn't happen?
Q. The kidney was not working at the time the operation site was closed.
A. I come back to the point that you can't tell whether the kidney is working or not. We must be clear about this perfusion and function. Are you asking me did I close a wound over a kidney that was not being properly perfused? Is that the question you're asking me?

THE CHAIRMAN: Let's take it that that is a question. What would be your response to that?

A. No, I did not.

THE CHAIRMAN: Right.

MR STEWART: And on what basis do you say --

A. Because I wouldn't.

Q. Not because you can remember, but because you say, "That's not my practice"?

A. Because it's just unthinkable.

THE CHAIRMAN: Because it would be completely irresponsible to close, to start closing up the wound if the kidney was not working because --

A. If the kidney was not perfused. Forgive me, sir.

THE CHAIRMAN: If a kidney doesn't perfuse, then it's going to fail, isn't it?

A. It is, but a kidney can fail while it's still being perfused.

THE CHAIRMAN: But if it is not perfused, you don't close up the wound because you want to work more with it to get it to perfuse?

A. Yes.

THE CHAIRMAN: So to close up the wound would be just unthinkable?

A. It would.

THE CHAIRMAN: Right. I really have to tease that out

because this is an interpretation of this paragraph, and you'll understand, I'm only putting to you a suggested interpretation, which is -- it's really the gist of this note: unless that didn't matter because it was known already that Adam was brain-dead or heading towards brain death.

A. Well --

THE CHAIRMAN: And sorry, that's really the concern, Mr Brown, about this part of the note. This part of the note, on an interpretation, and this doesn't make any medical sense to you and it would be outside your experience of 35 years, but it seems really to be saying: look, the kidney was failing to operate or wasn't working, in the perhaps rather crude terms of this note, but Adam's wound was closed up anyway because it didn't matter whether it worked or not because Adam was effectively dead.

A. That certainly is not true.

THE CHAIRMAN: Okay.

MR STEWART: I ask again how you can give evidence with certainty today, when in the past you have been unable to recall so much of the end of the operation.

A. My position hasn't changed. My recollection is still poor. I'm really saying that what I'm saying today is what I would, in my normal practice, have done.

Q. What you would have done?
A. Yes.
Q. Yes. Thank you.
A. I can give you examples of when a wound might be closed when one was uncertain about the viability of an organ if it's of any help to you.
THE CHAIRMAN: Maybe you'd outline that to me, please.
A. There's a couple of conditions in fact. One called neonatal intestinal volvulus where a newborn baby has a twisted intestine and, if left to its own devices, the intestine will become black and slough, and there will be no intestine left. So it's a fairly major problem. At a laparotomy, one can untwist the volvulus, but you can never be quite certain that the blood supply to this damaged piece of the bowel is working. So you simply close the wound and then go back the following day. You put the bowel back in the warm and then give 24 hours to see if it works.

And the second example I suppose is one I may have given before of a child I had with bilateral renal tumours and I was able to salvage half a kidney with a slightly precarious blood supply. There was a debate about whether I should take it out and put the child on dialysis. We left it in and measured urine and urine came out and therefore it worked.

There are times when you have to make a judgment like that. But this, an unviable kidney, is certainly not one of them.

THE CHAIRMAN: Just to spell it out, in order to be fair to you and to others, so it's clearly understood what an interpretation of this document would mean. It would mean that you were so unprofessional that you closed a wound at the end of a transplant operation, even though you knew the kidney was not perfusing, and you say absolutely not?

A. Absolutely not. Absolutely not.

THE CHAIRMAN: And you know my main problem with that is that I don't understand how this note could possibly have come to be written in this way.

A. Nor do I.

THE CHAIRMAN: And I don't understand how -- we have the notetaker and, at a number of points, she points out what Mr Brangam is saying, "Mr Brangam pointed out this", and we have already had a few references to Mr Brangam's lawyer-like inelegant medical language. But the majority of people, four of the people who were at that meeting, were doctors.

A. Yes.

THE CHAIRMAN: And do you agree that it would be bizarre if there was such a conversation going on in the presence

of four doctors without one of them saying, "Hold on a minute, you can't be serious about that"?

A. It sounds logical, but then of course nothing is documented beyond the sentence being used.

THE CHAIRMAN: Thank you.

MR STEWART: Tell me, how was Adam when you left the theatre that day?

A. As far as I was aware, he was fine.

Q. As far as you were aware?

A. Yes. I have no evidence -- nothing said to me to the contrary.

Q. Nothing said to you to the contrary?

A. Yes.

Q. Do you have any first-hand knowledge of Adam's condition?

A. In what sense?

Q. Just before you left theatre.

A. As far as I was aware, the operation was complete, the dressings were on. That was my job. I was not aware of anything happening anywhere else that was adverse.

THE CHAIRMAN: When you leave, that's because you've closed the wound; is that right? You have done the final layer and the wound is closed.

A. Yes.

THE CHAIRMAN: Right. At that point, you leave because, in

essence, that is your job done and you have other work to go on to?

A. Yes.

THE CHAIRMAN: What do you understand then happens after you leave in terms of what does the anaesthetist do?

A. Well, I'd be very amateur about this, but certainly the anaesthetist goes through the process of waking the child up, reversing whatever noxious drugs he's used and waking the child up. In this particular instance, then the child would be going through into intensive care.

THE CHAIRMAN: But the process of waking the child up, which is really easing him off the anaesthetics, that doesn't start until the wound has been finally closed?

A. Certainly it doesn't reach any critical stage until the wound's finally closed, yes. Sorry, "critical" is a bad word to use. It doesn't reach a stage where it would be noticeable to me --

THE CHAIRMAN: So it doesn't reach an advanced stage then?

A. Yes.

THE CHAIRMAN: The weaning of a patient off the anaesthetic might start before you finally close the wound, but it's only starting because, by definition, if it's advanced too far then the child or the patient is going to feel the pain of some surgeon stitching him when the anaesthetic is wearing off?

A. Yes. And I need relaxation to close muscle layers.
THE CHAIRMAN: Right. So if it has started at all, it's only beginning to start?
A. Yes.
THE CHAIRMAN: Which means you leave as you have no reason to think anything has gone wrong?
A. None.
THE CHAIRMAN: And you move on to your next business?
A. Yes.
THE CHAIRMAN: Okay.
MR STEWART: In relation to this business of weaning the patient off the anaesthetic, in terms of the dressings, you close the wound and then the next stage is the dressings are put on the --
A. On the wound, yes.
Q. And how long would that process of putting the dressings on take?
A. Oh, minutes.
Q. Five minutes?
A. Probably less.
Q. The process of reviving the patient goes on throughout the period when the dressings are applied?
A. I presume so, yes.
Q. Would you stay for the dressings to be put on or would you go on to your next surgery?

A. It would vary. I don't recall whether I did this time or not, but I might.

Q. It seems you did recall on 1 May 2012 at page 118 of your transcript, at line 8. You said:

"I don't recall it. I mean, I was obviously present in theatre until the operation was completely finished."

A. Yes.

Q. "Is the an operation completely finished when the wound is closed?

"Answer: When the wound is closed and the dressings are put on and everything's tidied up, yes."

So it looks on the that occasion that you were trying to extend the period when you were in theatre.

A. I've also said right at the beginning that I don't recall.

Q. Are you telling the inquiry this morning that perhaps the reason why you weren't there when they were trying to wake Adam up and he was not responding was because you had gone on, you'd moved on to your next theatre?

A. Yes, I think that's probably right.

Q. Whereas if you had actually been there for the dressings and the tidying-up and everything, you might have been present in theatre when the moment came when they realised he wasn't responding?

A. Might I? I don't know.

Q. You don't know?
A. Well, I don't know.
MS WOODS: I wonder if Mr Brown's complete evidence on that could be put to him? Same day, of course, on the transcript, it's page 119. I'm not sure what it is in the corrected transcript. In any event, he --
THE CHAIRMAN: Let's see if we can put up 119.
MS WOODS: Thank you. Mr Chairman, I'm not sure --
THE CHAIRMAN: Not to worry, we'll find it. Take your time. Can you please give us 118 and 119?
MS WOODS: It's page 123. Mr Brown is asked at line 14:
"Question: After you closed the wound, then you've said that the drapes are removed and the dressing put on. Do you do that or is that nurses who do it?
"Answer: It varies. It could be one of the surgeons, it could be the nurse. It probably would have been one of the nurses."
And then he's asked:
"Question: Would you assist?
"Answer: Yes, I might well do."
But the point is he doesn't remember who did it. It could well have been one of the nurses.
MR STEWART: [inaudible] Mr Brown had attended to the dressings and the tidying-up and everything, but really he had said that obviously he was there for that process

and I was asking him how long that process lasted.

Go back to page 119 again. I saw there at the bottom you were asked in relation to Mr Keane's departure from theatre, "Do you remember him leaving the operating theatre?", and you say you don't.

I wanted to ask you about Mr Keane's disappearance. Because when you were giving your statement to the police, you started off by saying obviously Mr Keane and I were there all the time, then it was suggested Mr Keane had left, and you say that might be right, but you don't remember it. Do you have any recollection at all of that?

A. Of Mr Keane leaving?

Q. Yes.

A. No, I don't.

Q. Any recollection of discussion about it?

A. No. The trouble is now that I've heard so much talked that one can almost imagine and envisage it, him walking out of the theatre, but I don't.

Q. If as the sort of number 2, the assistant surgeon -- would you have had to, as it were, if he had gone, take his place at the table, move round the operating --

A. Yes, probably if that happened.

Q. Would that have required an adjustment to the table?

A. Perhaps the height. I don't think so. We're both about

the same height.
Q. Would that not be something that you would remember, moving?
A. I don't, I'm sorry.
Q. Okay. It was just that the way the police have recorded your evidence would suggest that you were quite willing to tell the police one thing until the contrary was suggested. I wonder if your memory is given to that sort of suggestibility.
MS WOODS: Mr Chairman, with respect, what on earth does that question mean? I think I can say no more than that.
THE CHAIRMAN: Well, I think what the question means is that Mr Brown was telling the police that he and Mr Keane did the surgery and then the police said, actually, Mr Keane wasn't there for the end of the surgery, he'd gone on, and Mr Brown said, "Oh right, then I finished it".
I will put it as neutrally as I can: it's a curiosity that Mr Brown, who knew Adam from before because he had treated him before, and knew the outcome of this operation, which was Adam's death, has so little recollection, even from the time of what his role was towards the end of the surgery.
I entirely understand how Mr Brown does a number of operations, many days of the week, and how these

operations all perhaps, in many cases, blur one into the other. But when you know a child, you have treated that child, and the child dies and other witnesses have said that Adam's death was the talk of the hospital, other witnesses who weren't involved in the hospital have said that Adam's death was the talk of the hospital. I find it curious that Mr Brown's memory of what happened is so thin.

That's a point that you might deal with when we come to submissions, Ms Woods, but it is curious, and that's what I think Mr Stewart was effectively asking, whether Mr Brown, in a sense, for a good reason or bad, isn't quite sure what to say because his position is "I just don't remember".

There we are. We'll leave it at that.

MR STEWART: Perhaps we can bring up the page of 093-011-032. It's towards the bottom where that conversation goes on after the reference to Mr Keane:

"I noticed that my recollection was that urine was not produced and Mr Keane has stated that urine was produced. I cannot explain this small discrepancy."

Again it seems that this is another surprise to you. But in relation to describing the performance of the kidney as "a small discrepancy", is that the way you would normally describe such a relevant surgical

observation?

A. I think the "small discrepancy" meant the difference between what Mr Keane felt he saw and what I didn't see was a drop or two of urine, which even Mr Keane has admitted may or may not have been urine. So I think the discrepancy was small. Again, in context, my understanding -- and I'm not an expert in renal transplant, but my understanding is if you get good function quickly in a kidney, you get lots of urine. So the difference between what he saw and what I saw is relatively small in my view.

MR STEWART: Thank you very much indeed.

THE CHAIRMAN: Okay. Does anybody have any particular questions for Mr Brown? Mr Hunter? (Pause).

MR STEWART: While we're waiting for Mr Hunter to return, I wonder if I might ask a further question which I have been prompted to ask?

Mr Brown, were you involved in any of the previous consultations or meetings prior to 14 June 1996, discussing Adam Strain's case?

MS WOODS: Mr Brown's already been asked this question and it would, in fact, have been Mr Stewart who asked that question.

THE CHAIRMAN: You didn't give evidence at the inquest; is that right?

A. No.
THE CHAIRMAN: Did you not, as one of the surgeons who was involved in the operation, meet Mr Brangam before the inquest?
A. Not as far as I can recall, no.
THE CHAIRMAN: I would have thought that this -- well, let me put it neutrally -- was going to be a rather difficult inquest for the Royal Trust.
A. I think that goes without saying, yes.
THE CHAIRMAN: It goes without saying it's a very difficult inquest for Adam's mother. But from the Royal Trust's perspective, a child had died unexpectedly during a transplant operation.
A. Yes.
THE CHAIRMAN: And it was quite obvious that the Royal was going to have to answer questions and specifically, then, individual doctors were going to have to answer questions. And it would seem, in the normal preparation, legal preparation for such an inquest, the legal team would want to consult with the people who were in the operating theatre --
A. That would seem reasonable.
THE CHAIRMAN: -- and Professor Savage, who was in and out of the operating theatre. Professor Savage, Dr Taylor, Mr Keane and yourself. I just want to get this clear.

You're not saying that you weren't consulted with, but you don't recall a consultation?

A. I have no recollection. I was asked to write a report for the coroner.

THE CHAIRMAN: Yes, okay.

Mr Hunter, is there anything?

MR HUNTER: No.

THE CHAIRMAN: Thank you very much. No questions from Mr Hunter. Anybody else before I come to Ms Woods?

Ms Woods?

MS WOODS: No, sir.

THE CHAIRMAN: Mr Brown, thank you again for coming. We're going to break until 11.30 now and then we will start with Mr Keane. Thank you.

(11.13 am)

(A short break)

(11.30 am)

(Delay in proceedings)

(11.40 am)

THE CHAIRMAN: I'm sorry, Mr Brown, we're bringing you back one more time, I'm afraid.

MR STEWART: I do apologise for this. I wonder, can page 060-022-041 be displayed? This is a letter, Mr Brown, from Dr Murnaghan in relation to the clinicians involved in this case. It's dated 9 May 1996

and follows on from the receipt of the letter of claim initiating the medical negligence litigation process. This essentially asks you, amongst the others, to provide Dr Murnaghan -- you'll see the third paragraph -- with some information:

"In particular, it would be helpful if you would clearly identify and give as much detail as possible, supported by references (with copies) of the strengths and weaknesses (if any) of the care provided for Adam."

First of all, can I ask you whether you received a copy of this memorandum?

A. It would suggest I did. I don't recall.

Q. Did you respond to Dr Murnaghan in any way?

A. I would imagine I did. I have no recollection of doing so, but I'm sure I did.

Q. Would you, if you had responded to him, have provided him with a critique of the case and with details of the strengths and weaknesses?

A. Again, yes. I presume so.

Q. The inquiry hasn't seen any such response from you.

A. Well, I don't have an copy and I honestly have no recollection of doing it.

Q. You have no recollection of doing it. Mr Keane was also asked to provide his comments and he did so. At that time, would you have made contact with Mr Keane to ask

him, to liaise, to discuss the case and what comments you might make?

A. It's possible, but I have no recollection of doing so.

Q. I see.

THE CHAIRMAN: If you had replied, assuming you did reply, what would you have said were the weaknesses of the care provided to Adam?

A. As far as I was concerned, as the assistant to the transplant surgeon, I wouldn't have recognised any particular weaknesses.

THE CHAIRMAN: There seems to have been a fairly early awareness on the part of Professor Savage that unfortunately Adam's death largely came down to the fluid administration by Dr Taylor.

A. Okay.

THE CHAIRMAN: Were you aware of that?

A. At this point in time, I couldn't say whether I was or not. I would imagine perhaps I was, but --

THE CHAIRMAN: It'd be hard to think you wouldn't have been.

A. I would think so, yes, but I don't recall.

THE CHAIRMAN: Okay.

MR STEWART: Thank you.

THE CHAIRMAN: Thank you, Mr Brown, that's helpful. I hope you're now finally free to go.

(The witness withdrew)

MR STEWART: Sir, Ms Anyadike-Danes will --

THE CHAIRMAN: If she could join us then, we'll call Mr Keane.

MS ANYADIKE-DANES: I wonder if, just before we start with Mr Keane, I can refer to something that was said yesterday.

THE CHAIRMAN: He is about to be sworn. Sorry, Mr Keane, just have a seat for a moment.

MS ANYADIKE-DANES: It doesn't relate to his evidence.

Yesterday, there was an issue to do with the CVP chart, which is at various places, but one of the clearest versions of it is 094-037-211.

This arose yesterday, Mr Chairman, during evidence, the evidence of Dr O'Connor. The question was actually a simple one, which is whether the -- if you look at the chart on the bottom, which is CVP, whether the maximum on that axis for CVP was 60 or whether it was 40. And that is an issue, Mr Chairman. You may recall is something that Mr Millar made an intervention about and, ultimately, I think he conceded that it was 40. Then there was an issue as to what were his qualifications for doing that.

That monitor and printout and the figures on it were the subject of a report by Dr Simon Haynes, and one finds that at 204-004-155. If you see under 10(i), the

monitor printout. That reference to 058-008-023 is the same monitor printout, it just appears in different places in the paperwork.

He is an experienced paediatric consultant anaesthetist. He has attributed the axis maximum for the CVP in exactly the same way as Mr Millar ultimately conceded, which is 40, and one sees that because he says references to its figures and somewhere in the middle he says:

"Until 0900 hours, when it increased to 22."

And then he talks about what the figures are elsewhere. That marries entirely with the maximum being 40 as opposed to 60. So it wasn't that I was putting that forward, my own view as to how to interpret that, that was on the basis of our expert's own interpretation of the printout.

THE CHAIRMAN: Okay.

MS ANYADIKE-DANES: Thank you.

THE CHAIRMAN: Mr Keane.

MR PATRICK KEANE (called)

Questions from MS ANYADIKE-DANES

MS ANYADIKE-DANES: Good morning, Mr Keane. I wonder if I can take you immediately to the consultation note, which is at 122-001-001? Mr Keane, had you seen this consultation note before?

A. No.
Q. I mean before it was actually produced in the inquiry.
A. No.
Q. When you did have it, have you discussed it with anyone?
A. Yes, I have discussed it by telephone with Mr Brown, as we heard, and I bumped into Professor Savage at a social event, and again made a comment about was he aware of any -- where this had come from. It was about a five second, I think --
Q. From your point of view, what was the content of your discussion with Mr Brown?
A. Just this, as he said, was an outrageous -- appears to me to be a very outrageous document from my perspective and had he any idea -- it had come in from left field and I asked him had he any -- where did this come from.
Q. We're going to go to the detail of it, but just trying to get the context of it. Is it correct that you contacted him about it?
A. Yes.
Q. Thank you. Before this particular meeting, which is a note of the meeting of 14 June, had you attended any meetings in relation to Adam after his death?
A. My recollection is of attending one. One meeting before this.
Q. Do you know when that was?

A. No, I don't, but I know that I wrote a letter about issues that were raised at that meeting.

Q. Let me try and help you a little bit with a chronology. First, in relation to attending one in the transcript of your evidence on 23 April 2012 at page 37. It starts really at line 5, your answer. What is at issue here is whether you were really participating in any kind of investigation into what happened into Adam's death and so on.

Here you say that you didn't feel that you had a very major part in the investigation but there were issues. I will come back to that issue that there were issues. And then ultimately, at line 15 and 16, you say that you were really waiting for the system to respond to you and you do say it was your expectation that you would be involved in some form of investigation; is that correct?

A. That's correct.

Q. Firstly, what were the issues that you thought and that you would be contributing, if I can put it that way?

A. That I would contribute was the volume issue.

Q. I beg your pardon, sorry?

A. I was concerned about the volume of fluid that had been given to Adam, particularly in relation to blood loss.

Q. Yes.

A. That was my specific area. And also I had concern about the volume of Solution No. 18 that was given.
Q. Yes. I think in fairness to you, in your evidence, although I don't have its precise reference, you were concerned about the volume from the outset when you first discussed it with Dr Savage.
A. That's correct.
Q. And the issue in relation to blood loss has been the subject of correspondence.
A. That's right.
Q. If you can now help me with the meeting that you think you attended. I'm going to try and take you through a chronology of the knowledge that we have of meetings that you may have been involved in, culminating in a reference you make in correspondence to a regional meeting, and maybe you can help locate the meeting that you think you attended in that timeline.

Just so that we have the context of it, you provide your letter to the coroner or the letter that's going to be giving the coroner information in December. And that comes to Dr Murnaghan in January, at least to the Royal in January, and we see that in 059-056-131. That reference to your report, that is actually your letter, isn't it? There's no --
A. That's right.

Q. -- separate report that you provided?
A. No.
Q. And it's the letter that we saw during the clinical hearings that ultimately ends up in your deposition to the coroner; that's correct, isn't it?
A. That's correct.
Q. So this is the Royal receiving that. Then you receive some information from the Royal, I think on 27 March 1996. If we pull up the 059-042-093. It's a bit difficult to make out, but it's all in the manuscript at the bottom. This is the coroner sending, to Dr Murnaghan, Professor Leckey's [sic] report. And then he says under (i):

"Copy this report."

And then there's a series of people. Mr Brown is one and you are another:

"For information and possible comment."

And then under (ii) there's a note to arrange a meeting, which was thought might be 1.5 hours, with all those to be called as witnesses. There's a list of those: Dr Taylor and so on, and you are in there and Mr Brown is there.

Do you actually recall receiving this report from Professor Berry?
A. No.

Q. Could you have received it and you simply don't remember now?

A. When you say "could", obviously, but highly unlikely. I'd remember a report from Professor Berry.

Q. Thank you. The next thing that we have knowledge of is dated 15 April 1996, and the reference for that is 059-043-098. This is confirming a meeting. If you recall, item number (ii) at the bottom was to arrange a meeting. And here it is.

"Confirm that a meeting has been arranged for 17 April."

Then if you see those circulated, you are there and Mr Brown's there and a number of others. So that looks as if it has been confirmed with all of you that there was going to be a meeting on 17 April.

I needn't take you to it, but in the papers that we have there's an awful lot of communication backwards and forwards and different grids as to different people's availability and, ultimately, it seems that 17 April was one that was suitable to everybody. So that looks like when there was a meeting.

And then we have on 17 April, which is the date that's referred to there, a letter from Mr Brangam to Dr Murnaghan, and that's 059-036-069. He refers in his first paragraph, or at least Dr Murnaghan to Mr Brangam

refers:

"You attended a conference with the clinicians involved on Wednesday, 17 April."

At that time, they hadn't received the post-mortem report and now he's copying the post-mortem report. He says he has received comments from two of the clinicians and:

"... you may feel it necessary to meet again with Dr Taylor [and so on]."

So that looks like there was a meeting on 17 April.

Then we have the autopsy report being sent out. That's 059-039-082. The report:

"Grateful if you would read it carefully and respond to me on its contents, particularly if anything therein raises with you a concern which may lead to a development at the inquest for which we would need to be prepared in advance."

And that note is, with that request, going to a number of people, and Mr Brown is there and you are there as well. Do you remember receiving that?

A. I don't have a specific recall, but I assume I got it because ...

Q. Yes. And then we have a letter from you to Dr Murnaghan on 1 May. The reference for that is 059-028-059. I beg your pardon, sorry, that's the wrong one. If we pull

that up and we'll see why that was called up and I'll see if I can help you with the letter that you wrote. That's simply looking for further meetings.

If we can move --

THE CHAIRMAN: That confirms that comments have been received from the two clinicians.

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

Then if we can go to a letter of 9 May. 059-036-070 perhaps is where I need to go to. I'm very grateful, thank you.

That's the 1 May letter from you to Dr Murnaghan:

"Thank you for enclosing the autopsy report."

So it sounds like you've got it. You make one comment, so this is in response to, "Is there anything I should be alerted to?" The comment that you're making relates to the quantity of fluid loss that's attributed to blood, if I can put it that way.

A. That's right.

Q. Your view is that -- and this was your view in the evidence in the clinical phase -- that it wasn't 1,500 cc; that was effectively fluid loss and not all of that was blood.

A. Correct.

Q. That's essentially your point, isn't it?

A. Mm-hm.

Q. And in fact your point is if all of that had been blood, that would have been virtually his entire blood volume and that would have been a massive loss and that would have been an issue.

A. Yes.

Q. So you've responded to that and that's the comment that you make. Then there is another letter at 060-022-041. This letter is coming out from Dr Murnaghan and it's saying that he's received sufficient information to ensure that a witness statement could be prepared by all of you. But it is copying correspondence from the solicitors, so at this stage there are solicitors involved for Adam's family. And in the light of that, he wants more detailed information, particularly to discharge his function as the case manager for the Trust and he wants to be able to give proper instructions to legal advisers, and in particular he says:

"It would be helpful if you could clearly identify and give as much detail as possible, supported by references, of the strengths and weaknesses, if any, of the care provided for Adam."

Then there's a list of you that that's sent out to. You see Mr Brown is there and you're there as well. You remember receiving that because you respond to it and you respond to it by a letter dated 13 May 1996. The

reference for that is 059-034-067.

There you say:

"I don't think I have anything in particular to contribute to your recent letter looking for strengths and weaknesses."

So that correlates with the one I have just put to you:

"As far as I was concerned, the anaesthetic on a difficult patient went ahead without any particular problems. The surgery, whilst difficult, was finally completed in a satisfactory manner. I don't think, from a surgical point of view, I have anything further to add."

I will come to the content of that in a minute, but this is just to give you the span of what's going on. Because it seemed to me -- and maybe I wasn't in a position to put all the detail to you -- when you were giving your evidence before, the impression given was that effectively there wasn't an awful lot of communication and you were there waiting and ready to be involved and there really wasn't very much communication. But there is some communication and there is some seeking of your input and you're providing it; that's correct, isn't it?

A. Yes.

Q. I am going to come to the content of this, Mr Keane.
A. Yes, there's communication, but it's all on a medico-legal basis rather than a clinical issue.
Q. Yes. Can I take you to 059-036-070? Because I hope by giving you this chronology that that might help you answer this question. You have seen this before, but what I would like your help on is:

"This is a point in relation to the blood loss, which I already made at our regional meeting."

A. Mm.
Q. Can you help us as to what that regional meeting was?
A. Well, I'm not quite certain. If you see we always regarded ourselves as the Regional Urology Service. I may have been trying to get across the point that this wasn't an internal Royal meeting, but a meeting of the Regional Department of Urology and the Royal. But I don't attach a huge specific significance to saying "regional" other than that we were constantly calling ourselves the "Regional Urology Service".
Q. Well, who would have been at that meeting?
A. This is dated -- I would assume I was referring to the meeting of April.
Q. Actually, that was one of the things I wanted to ask you. If this is a regional urology meeting, the meeting of 17 April wasn't a regional urology meeting. That was

a very specific meeting dealing with issues relating to Adam's forthcoming inquest --

A. Yes.

Q. -- with solicitors involved and the like, and called for very specific purposes.

THE CHAIRMAN: Sorry, I don't think when Mr Keane said that was the April meeting, I don't think he meant it was the legal consultation meeting on 17 April. I think you meant, surely Mr Keane, that you were referring to the regional meeting in April or were you referring to a legal meeting in April?

A. The only recall I have is of the legal one. I think we constantly used "Regional Urology Service", and I'm not sure if that's just simply a phrase.

THE CHAIRMAN: Yes, but in this letter when you talked about the regional meeting, that would not be a natural way of describing a meeting which you'd had with lawyers on 17 April, sure it wouldn't.

A. No, no.

THE CHAIRMAN: I think that's really the question, just to pin it down. When you say, "This is a comment which you already made at our regional meeting" -- you tell me, I'm not giving evidence, tell me if this is right -- that is not a reference to the legal consultation on 17 April, rather it's a reference to the urology service

meeting in April?
A. No, I don't think so, I think it's just a dictation issue.
THE CHAIRMAN: Okay, you do think that is a reference back to --
A. To the 17th. That's the only meeting I recall.
MS ANYADIKE-DANES: Can I ask you this then? You have just mentioned meetings of the urology service. Were there regular meetings, not just of the kind that you now say that you were referring to in relation to the 17 April meeting, but were there regular meetings of the Regional Urology Service?
A. Oh yes.
Q. Was Adam's case ever discussed at one of those?
A. Not to my knowledge.
Q. Why not?
A. Because the Regional Urology Service was more correctly a Regional Adult Urology Service. We would not have had -- the urology adult service would not have had a specific interest in a paediatric case.
Q. Well, were there regional urology meetings involving paediatric cases, or at least dealing with paediatric issues, if I can put it that way?
A. No. It was all -- all the regional urology were concerned with adult urology.

Q. So there wasn't a forum where, if there were issues that arose in paediatric cases -- and I understand from your evidence that there weren't that many paediatric transplants --

A. No.

Q. -- but in any event, were there those sorts of issues, there wasn't a forum where those issues might naturally be discussed amongst the clinicians?

A. Amongst the adult urologists? No.

Q. Or any?

A. Well, as I said to you in evidence before, I was expecting to go to a meeting in Sick Children's about it, not over --

THE CHAIRMAN: Because Sick Children's is the regional centre for Northern Ireland?

A. Correct.

MS ANYADIKE-DANES: In other words, the meeting that you recall happened on 17 April?

A. That's correct.

Q. And what happened at that meeting?

A. Well --

Q. Sorry, before that, maybe I should in fairness ask you, who was present at that meeting?

A. Again, I have ... This is a 17-year recall. I remember George Murnaghan very clearly, I remember George Brangam

very clearly. I think Professor Savage was at it. I actually have no recall of Dr Taylor being -- no specific recall of Dr Taylor being there. And I think there was a secretary at it. I think, but that's ... The specific issues are Brangam, Murnaghan, Savage.

Q. I understand. When you say there was a secretary there, are you able to help with whether it was your impression or whether you knew whether a note was being taken of that meeting?

A. My recall was that it was minuted, yes.

Q. Thank you. Okay, sorry. You were then going to tell me what you remember as having actually been discussed or taking place at that meeting.

A. Again, obviously, we discussed the issue. To my recall of it, the issues about hyponatraemia were discussed. To my recall of it, there was this difference of opinion on blood loss and the issue about the upcoming or post-mortem was discussed. And then we were given legal advice by George Brangam as to how we would proceed in terms of communication with anybody else outside this particular case, not to speculate, and also that we would need to -- if the family wished to contact us, that one of the legal or whatever you -- risk management department would be informed and be with us.

Q. Can I ask about blood loss? I think your expression was

a difference about the blood loss or something of that sort. Who in that meeting did you have a difference with about the blood loss, if at all?

A. Well, I don't ... I assume it's Dr Taylor.

Q. Yes. So although you don't specifically remember him being there, do I understand you to say you were either having that difference with him at that meeting or you were raising a difference you had with him about his views on blood loss?

A. Correct.

Q. When you say hyponatraemia was discussed, you'll know by now there's quite an issue as to who was accepting that Adam's condition was hyponatraemia or dilutional hyponatraemia, which is a different way of the hyponatraemia developing, if I can put it that way. Professor Savage has been quite clear right from the outset. In his view, it's dilutional hyponatraemia: too much fluid, wrong sort given. You also say that you discussed Adam's circumstances with him.

A. Yes.

Q. And you had a certain view about the amount of fluid and the type of fluid that was given him. And when you first started your evidence this morning, you talked about how the amount of fluid and Solution No. 18 were issues, as far as you were concerned.

A. Yes.
Q. When you say that hyponatraemia was discussed at that meeting, can you recall how it was discussed, the issues that were discussed in relation to it?
A. No. I mean, I don't ... I couldn't -- I have no specific issues of the conversation.
Q. I understand.
A. I know coming out of it that I had a feeling that there was a division of opinion amongst the, if you like, the anaesthetic/surgical issue on blood loss. A significant issue.
Q. Can you develop that for us?
A. Well, yes. I mean, Dr Taylor has said varying amounts of 1,200 to 1,400 cc of blood loss and I would have to say I was astounded by that. I would have calculated it as much less.
Q. If we go to the hyponatraemic point, although you say that after this length of time you can't really remember how that discussion would have proceeded, were you of the view that you and Professor Savage had any difference between you as to your views on the hyponatraemia?
A. No, I don't think so. I mean, I obviously would defer to Professor Savage in terms of paediatric fluid issues. I wasn't going to go -- he would have -- his opinion

would have been -- I may not have said anything myself personally, I would just accept Professor Savage's opinion.

Q. Did it square with yours?

A. It does, yes.

Q. Did you independently have a view that too much of the wrong sort of fluid had been administered?

A. Yes, I thought that 1,500 cc of Solution No. 18 is too much. It's a blood volume of Solution No. 18.

Q. Thank you. Do you know what happened as a result of that meeting, if I can put it that way?

A. Well, I don't really. I wrote back that letter, subsequent to that, stating about my disagreement about the blood volume issue, the blood loss issue, and I didn't hear any more. The next thing was the inquest.

THE CHAIRMAN: You say, I think, that you and Professor Savage were pretty much agreed on the fluid issue.

A. Mm-hm.

THE CHAIRMAN: To what extent did he agree with on you the blood loss issue or can't you recall?

A. I don't think that Professor Savage was involved in calculating blood loss, as I would have done. That wouldn't be his -- it's a surgical and anaesthetic issue.

THE CHAIRMAN: Okay.
MS ANYADIKE-DANES: Did you expect that, having had that meeting, there might be other meetings?
A. I did. As I said to you in evidence, what I had expected was that there would be a clinical meeting with no lawyers, but with senior physicians, if you like, senior anaesthetists, senior surgeons asking us individually what had happened. Yes, I would have expected another meeting. It was quite obvious -- and it's in the correspondence, I think, that the clinicians are divided. Now, I suppose they are divided and you just leave it at that.
Q. Can I put it this way: now that you have seen the note of the 14 June meeting, assuming that that is a faithful record of the sorts of things that were being said at that meeting, is that a meeting that you would have expected to have been invited to?
A. Absolutely. If you're going to discuss serious surgical issues, I need to be there.
Q. Is that a meeting that you'd have expected Mr Brown to be invited to?
A. Maybe not necessarily him, but definitely me. Yes, but obviously, yes, but maybe not necessarily. But I would have to be there.
Q. Can you think of any reason why you wouldn't be invited

to a meeting like that?

A. No.

THE CHAIRMAN: [Inaudible: no microphone] different question, which is that there is a reason why you would be invited to a meeting like that, but not quite be able to make it because you're not working from the same hospital. And I think we had some earlier evidence about how difficult it was even to arrange for consultants and clinicians within the Royal to meet at times which were mutually convenient, never mind bringing in somebody else's separate routine.

A. That's true, although my reading of what happened was that this was a specification issue to discuss further with Dr Taylor alone, as I understood the correspondence.

THE CHAIRMAN: This --

A. The meeting which has caused all this ... As I understood it. Maybe I'm wrong on that, but if there were to be any discussions on surgery, the surgeon has got to be there.

MS ANYADIKE-DANES: Perhaps we could go to the correspondence that sets it up. I think it's 059-002-003. Sorry, there'll be one prior to that which will explain what its purpose is. Just bear with me one moment. (Pause).

059-009-027. This is not something that was passed to you, but in answering your point as to whether you'd have been invited to something like that, this is a cover note for a fax that was received from Mr Brangam, so you can see this is now 7 June, the inquest was due to start on 18 June so we're getting quite close. It raises several queries and requirements which are urgent and need attention and a response as soon as possible and then he is asking for arrangements to be made and for an inspection. I just want to take you to the fax so that you can see what that is.

The reference is 059-014-038. The purpose of calling it up is so you can see the sort of thing it was dealing with. For example, the first paragraph tells you that there has been a discussion with Dr Taylor and Dr Gaston in relation to the forthcoming inquest, which is going to be listed on 18 June, they think:

"The issues in this case are extremely complex as indeed they are sensitive and, at this stage, I would not be entirely satisfied that the inquest would in fact be completed in the course of one day's hearing."

Then it goes on to talk about:

"The substantial number of issues contained in the experts' reports which will require to be carefully and exhaustively examined and investigated and, in that

regard, [he has] had the benefit of detailed instructions from Dr Taylor, which have been reinforced by Dr Gaston."

He talks about:

"[It] being vital that we are in a position to deal with points in a scientific, reasonable and objective manner, and that in relation to Dr Sumner's report, and that also applies to Dr Alexander's report."

And he wants to get a further statement from Dr Taylor, which will deal with potential criticisms or actual criticisms from the medical experts.

Then over the page, so that's 039, he refers to, up at the top, what Dr Armour has classified as the cause of death. And then he goes through, in these numbered paragraphs, dealing with matters as they arise in Dr Sumner's report. And 1:

"A suggestion that Dr Taylor overestimated the fluid deficit."

Then he goes through that. Then, point number 2, dealing with issues, difficulties in obtaining blood and the taking of electrolytes and so on. 3, CVP readings. And it specifically deals with the level of those readings. And then at the bottom of the page, two issues that Dr Gaston has indicated:

"During the course of the procedure, Dr Taylor did

not have an opportunity of accurately measuring urinary output due to the fact that the bladder had been opened early on in surgery. This point will have to be made in very trenchant terms to Dr Sumner and he will be asked what other opportunities the anaesthetist had to measure urinary output."

And then over the page, at 040, an additional point that Dr Gaston has raised, which is the potential for Adam, for whatever reason, to absorb fluid into the brain and he wants to see literature about that and see whether that theory can be progressed. Then he refers to other information he's received in relation to barbiturates and so on. And then of course he wants to see the equipment and that opportunity is afforded him.

So if you had been aware of the fact that those issues were going to be discussed amongst clinicians in relation to Adam's case, would you have thought it was appropriate that you should have been there?

A. Yes.

Q. And which particular of those issues would you have thought you should be there to assist with?

A. Well, I think if you go back to -- the particular issue, obviously, is the statement by Dr Gaston.

Q. Sorry, 059-014-039.

A. About the bladder, yes.

Q. Right at the bottom.
A. Now, Dr Gaston wasn't at the operation. How he could come up with a statement like that on his own --
Q. In fairness to Dr Gaston, what is recorded there is that during the course of the procedure, Dr Taylor did not have that opportunity, so we know that Dr Gaston and Dr Taylor discussed matters. It's not necessarily that Dr Gaston is volunteering that as his own independent information.
A. My understanding of Dr Taylor's evidence yesterday was that it didn't happen. That's what he said yesterday.
THE CHAIRMAN: So the question is: how on earth was Dr Gaston indicating to Mr Brangam that it had happened unless --
A. That's the question.
THE CHAIRMAN: -- there was some complete misunderstanding between him and Dr Taylor.

You know the problem here, Mr Keane. These complications which we are trying to work out come from within the Royal, from the various people who are making contributions. Instead of clarifying issues, they cloud them.

A. Well, if you were sitting at the City reading what they were saying in the Royal, you'd be equally perplexed.
THE CHAIRMAN: Yes.

MS ANYADIKE-DANES: If you knew they were going to discuss that, whether it arose by way of misunderstanding or whether it was actually somebody's belief that that had happened, that's something that you would be able to contribute to and would want to presumably?

A. Absolutely, yes.

Q. Is there anything else there? I'm sorry, it's very difficult to relate to three pages on a screen that come up separately. Maybe if we can put the first two pages -- because what happens in the latter part is perhaps not so relevant. If we can pull up 038 with 039 and deal with those first and then we'll come to what happens on 040.

So that's a clear issue. If you'd known that was going to be discussed, you say you would think it's appropriate that you're there?

A. Mm-hm.

Q. Quite apart from appropriate, would you actually have wanted to be there?

A. Yes.

Q. Okay. So is there anything else now that you look at those two pages?

A. We go back to the CVP readings in that paragraph. You see the initial reading is 17, but was likely to be true of 12, which is what I recalled of it, given you

subtract 5 for ventilation. All of the CVP evidence is quite confusing as to what was thought to be the true CVP, et cetera. So I'd like to have had a discussion about the CVP issue.

Q. Well, you gave quite extensive evidence and I'm going to take you to Dr Taylor's response to some of that. But you gave quite detailed evidence about your exchanges, if I can put it that way, with Dr Taylor about the CVP. So if you had seen this written down, how would you have wished to respond to that at a meeting?

A. Well, I think this is my recall of the operation, that he actually had a CVP of 12. And as I described in detail, if you're at 12, that's it, keep it there. You're fully loaded up for a transplant. But that is my -- I don't -- as I said in my evidence, I can't sit 17 years later and say I know numbers, but as they're written there, that's exactly as I recall it, that the CVP was up and stable throughout that operation, that there was no need for, as far as a transplant surgeon, for any just maintenance fluid to keep going. His CVP was 12, it was at the target range.

Q. Yes.

A. That would confirm what I thought.

Q. I understand that. I'm not going to go into all the evidence that you gave on CVP, but you certainly gave

evidence on CVP as to where you thought the initial reading should be and where it should get to just before the release of the clamps, and there seemed to be quite -- the initial reading was lower than where you had expected it should be just prior to the initial release of clamps.

A. Mm-hm.

Q. This paragraph is referring to the initial reading being 17, which has, by applying a gradient figure, been reduced to a suggested true reading of 12.

A. Mm-hm.

Q. I can pull that evidence up. My understanding is that your evidence is that 12 is not where you wanted it to be at the initial reading.

A. Well, normally, you would expect it to be in the physiological range, which is between 3 and 7 with a gradual expansion of volume to 12. But if you started at 12, I'd be happy just to keep going.

Q. That wasn't quite my point, Mr Keane, although I understand why you might have thought it was that. Because you would had a view as to what you thought you were being told as to what the initial CVP reading was, had you seen a letter which set out figures, which departed from your evidence as to what you had recollected being told about it, would that have formed

another reason why you now would want to open up the whole question of what the CVP readings were?

A. Yes.

Q. Thank you. So that's why you would have wanted to be there and the sorts of things that you could have commented on.

Can I take you now to a letter that I said I was going to deal with the substance of, but wasn't at that time. That's your letter to Dr Murnaghan dated 13 May 1996. The reference is 059-034-067.

The relevant point that I want to take you to is, as far as you are concerned -- that's your caveat:

"The anaesthetic on a very difficult patient went ahead without any particular problems."

Can I pause there and ask you what you mean by that?

A. Well, as far as I was concerned, the induction of anaesthesia and the anaesthesia throughout the period that I was there -- Adam was quite difficult, in fairness to Dr Taylor, to get access on. He had various things to do. And as far as I was concerned, which is the truth, leaving the Royal, that operation had gone -- I was never told that there was any problem.

Q. Yes. Maybe we need to -- I need to ask something a little more specifically. When you say the anaesthetic went ahead without any particular problems,

what do you mean by "anaesthetic"?

A. I mean the epidural, the insertion of central lines, the paralysis/muscle relaxation.

Q. I see. You don't mean the entire management of Adam by the anaesthetist?

A. No. Just the anaesthetic part.

Q. I understand.

THE CHAIRMAN: You couldn't possibly have meant the entire management --

A. No.

THE CHAIRMAN: -- because your view by May 1996 already was that Dr Taylor's entire management was hugely questionable?

A. Yes. But the actual anaesthesia was --

MS ANYADIKE-DANES: But this is a letter where you're responding to a specific request from Dr Murnaghan as to strengths and weaknesses. Essentially, one way of interpreting his request is wanting to know: is there anything out there that's a problem that I ought to be aware of? Or, "Are there any problems that you foresee?", is one way of interpreting what he was actually seeking from all the undernoted, all those clinicians he listed. This is your contribution. But at the time you say this, although, from what you said, you didn't seem to see that there was any difficulty

with the actual anaesthetic or the administration of anaesthesia. You did, at this stage, have concerns about the care given by Adam's anaesthetist, if I can put it that way, during the surgery.

So if you are responding to a request for information pointing out strengths and weaknesses, is that not something you considered you might share?

A. Well, no. If you look at the context of the letter, we had the post-mortem report in, dilutional hyponatraemia. I had raised the issue of blood loss and my dispute about it, and there were only two issues that I had concerns about and they were both upfront, fully out there. There was certainly no strength to the management of Adam Strain I could think of and the weaknesses were in the public domain, if you like. Well, you know --

Q. This is Dr Murnaghan asking you and he's asking you because he has seen the post-mortem report and so forth. Let me take you to the transcript. This is the transcript for 23 April. This is your evidence in the clinical part of the hearing. If we go to page 29, line 20:

"If somebody had told you the volume and rate of administration of fluids that Adam actually got, what would have been your view in terms of the likely outcome

for him?"

And you say:

"No chance."

I am not sure I've heard you and you repeat that. That's quite a serious thing to say. And here you're being asked -- not you alone, all the clinicians are being asked about strengths and weaknesses and potential problems and so forth. And in the letter that you write back, you don't in any way indicate that you yourself had a concern about the type and rate and volume of fluid that was administered to Adam during his surgery.

A. Well, I mean, I thought that it was a given. If you look at the post-mortem report, it's a given, is it not?

Q. It clearly wasn't a given because that's not being accepted, and you were aware of the fact it wasn't being accepted by Dr Taylor.

THE CHAIRMAN: In essence, the point is you don't say in that letter to Dr Murnaghan, "Look, for Mr Brangam's benefit, I think Dr Taylor got the fluid administration wrong. He got some things right, but crucially he got the fluid administration wrong and that's what went wrong".

A. I can see what you're saying, but it has been said by a forensic pathologist.

THE CHAIRMAN: Yes. And that's correct, but when you're

responding to a letter in which you're being asked to identify the strengths and weaknesses, you refer to some positives, but you don't refer to the weaknesses. It just seems a bit curious.

A. Well, that's the letter. To my mind, it's open. The post-mortem result and the cause of death was dilutional hyponatraemia. Sumner's report was in, it's a matter of record.

THE CHAIRMAN: Okay.

MS ANYADIKE-DANES: Well, if I can just ask you this. Why do you mention the anaesthesia at all without mentioning the other elements of his anaesthetic care, if I can put it that way?

A. Because --

Q. Sorry, if I give you the context of why I ask you that. Because in the very documents you've just cited, nobody's said anything untoward about the anaesthesia.

A. I was trying to make the point that the operation, as far as I was there, until I left at whatever time -- we will debate that later, I suppose -- the anaesthetic had proceeded.

Q. Yes, but that too is --

THE CHAIRMAN: I'm not sure we're going to get much further on this. But one interpretation for me, Mr Keane, is what you're doing is, in a sense, you're being gentle to

Dr Taylor by saying he did some things right, and the unspoken or unwritten part of the letter is: there are reports out there that shows he got serious things wrong.

A. I wouldn't say that -- no, I don't think I was being gentle, I was saying that -- what I was trying to convey was, up to the time I left that operation, everything had proceeded absolutely normally.

THE CHAIRMAN: Okay.

MR MILLAR: Sir, lest it be thought that there's some strange take on the letter, is that not the obvious reading of that letter?

THE CHAIRMAN: What?

MR MILLAR: Exactly what the witness has just said. It's been put to him that there's something strange about the letter.

THE CHAIRMAN: What's strange about the letter is when the Royal is in preparation for the inquest, it is asking the clinicians who were involved in Adam's care to describe the strengths and weaknesses of his care and treatment. Mr Keane responds without being in any way critical of Dr Taylor, despite the fact that he has formed a view that Dr Taylor's fluid management left Adam with no chance of surviving.

MR MILLAR: He has been to a meeting a couple of weeks

before that letter with Dr Murnaghan. They have discussed hyponatraemia according to the evidence. Everybody knows what his views are about the fluid management. The letter is clearly, in my submission, sir, directed towards his perception of things as he left the theatre and, on that basis, it makes perfectly good sense.

THE CHAIRMAN: I think that's a submission point, Mr Millar, but anyway we will move on.

MS ANYADIKE-DANES: In fairness, if we go to another section of your transcript of 23 April. Just to tie that up, I should have run on to another page. I beg your pardon. Can we go to page 30?

A. Could I go back to one thing?

Q. Yes, of course.

A. Just to point out to you as well that the first time I saw the anaesthetic record, where you actually see in time what was done, was October 2010. At the time I wrote that letter, I had not had sight of the anaesthetic record, and without that, all you get is that he had three litres of fluid. You don't see the when.

Q. Unfortunately, you sort of pre-empted where I was going to take you. If we go to page 30, starting from line 24. It's going to go over the page:

"When I looked at the notes on the Tuesday morning."

Adam's surgery is on the Monday:

"Question: And from those notes, you appreciated the volume and rate of infusion of fluids and the nature of flutes; is that right?

"Answer: I did.

"Question: What was your view then as soon as you saw that?

"Answer: Alarm bells.

"Question: Did you communicate that to anybody?

"Answer: Yes, I went --

"Question: What was the result of that communication?

"Answer: Well, I don't know. I don't even know whether Professor Savage can remember because I met him, I was in a state of absolute shock. I communicated my view ..."

And so on. So what I think you just said now isn't entirely right because it seems from your evidence earlier that you had seen sufficient of Adam's notes and records to form a view, which in your mind led to alarm bells ringing about the care that he had received --

A. Mm-hm.

Q. -- and prompted you to communicate that to somebody and at least one person you thought you communicated that to

was Professor Savage.

A. Yes. But that's purely in terms of volume. You don't actually see when the Solution No. 18 is being given.

Q. No:

"And from those notes, you appreciated the volume and rate of infusion of fluids and the nature of fluids; is that right?"

A. That's right.

Q. "I did."

So you had appreciated all of that. And if that's the Tuesday, you appreciated all of that the day after Adam's surgery. So as early as that.

A. Well, you don't appreciate the detail of it. One of the problems, as you have heard from the experts, is the amount of Solution No. 18 that was given to replace the deficit in the first hour. That's not available to you when you see 3 litres or 3 and a bit.

THE CHAIRMAN: Sorry, but is that not part of the question on line 1 and 2:

"You appreciated the volume and rate of infusion of fluids and the nature of fluids."

A. Yes.

THE CHAIRMAN: What's missing? If you have the volume, you have the rate and you have the nature, what is the piece of information which you don't have?

A. The piece of information is how the solution was given throughout the procedure. Was it given at a constant rate over 4 hours? In other words, 300 an hour. Or did he get 800 or 700 in in one hour? You don't see that until you see the anaesthetic record.

MS ANYADIKE-DANES: Whatever you saw was alarm bells --

A. Yes.

Q. What I was trying to ask you is: if you had formed that view so early on, when now you are being asked for strengths and weaknesses, would it not be only natural to include that in your letter? That was really why I was asking you.

A. My answer is the same.

Q. Would it have been natural to have included that in your letter?

A. Not in the knowledge of what was already out there.

THE CHAIRMAN: He's already answered this. We can move on.

MS ANYADIKE-DANES: It was your evidence that you didn't actually see the anaesthetic record until October 2010.

A. About that time. That's the first time.

Q. Would you need to see the anaesthetic record to be able to say firmly to Dr Murnaghan, for Mr Brangam's benefit, that the anaesthesia went ahead without any problems?

A. Yes, you'd have to have a complete look at the notes and that's what missing, a clinical review.

Q. Then why were you writing that letter, saying that?
A. Saying what, sorry?
Q. Why were you writing a letter there saying that the anaesthesia went ahead without any problems if you hadn't actually seen the anaesthetic record at that stage?
MR MILLAR: With respect, sir, he has given an answer: that was his perception as he left the operating theatre, that the anaesthetic had gone ahead without any problems. That is his answer.
A. The child was put to sleep and I operated on him. I didn't -- it's in that context I said the anaesthetic proceeded.
MS ANYADIKE-DANES: Thank you.
If we pull back up the consultation note at 122-001-001. Is there anything in the consultation note that you disagree with?
A. A lot.
Q. Can you take us to that?
A. Okay. Paragraph 3, I think. Yes. I don't think we need to go into it in detail. I wouldn't agree with that.
THE CHAIRMAN: Just for my note, we're on page 001.
A. Paragraph 3.
MS ANYADIKE-DANES: "He would accept the word hyponatraemia

but was concerned about describing this as dilutional as he feels one cannot explain how the hyponatraemia occurred. There is no evidence in other organs of oedema."

Are you saying that, had you been there, you would have disagreed with that?

A. I would have disagreed with that, yes.

THE CHAIRMAN: I'm sorry, let's just be careful because I don't want you to go through the note saying where you disagree with Dr Taylor. The question which we're getting at -- for instance, Dr O'Connor gave her evidence yesterday that there are some things in this note which are simply medically wrong. For instance, the idea that the kidney was in at 9.30.

A. Yes.

THE CHAIRMAN: The third paragraph records what Dr Taylor said. He has had a chance to consider this note. He accepts that he said that.

A. I don't know -- you asked me. I can go through all of the things that I've noted or not.

THE CHAIRMAN: I know we're going to get to page 5 and the paragraph about the -- okay. But before that, in order to give me your impression of the note, is there anything -- whether you agree with whatever Dr Taylor says or not -- which you believe is fundamentally wrong

in the note?

A. There are huge medical errors in it.

THE CHAIRMAN: Okay. If you give me those, please.

A. Okay. I would agree with paragraph 4, 5, 6.

Dr Taylor's issues on isotonic solutions and Hartmann's being isotonic. I disagree with that in that dextrose/saline is hypotonic once administered.

MS ANYADIKE-DANES: Just so that we're clear on this, because it is actually very easy to flow into saying things "I just don't agree with that".

A. I don't agree with it.

Q. I understand you don't agree with that. In a way, the chairman is looking for something slightly different. Is there anything here which would lead one to suppose that this must be inaccurate, nobody could have said that? I think that is the issue. And this is a similar question that has been asked to all those, whether they were actually noted as being there or whether they thought they might have been there, if I can put it that way.

I will just give you an example of that. Because that issue as to whether it's hypotonic or isotonic is something that, in fact, Dr Taylor has said elsewhere and is noted by the same notetaker at the inquest as referring -- so it's not a question of whether ... He

may have said something you disagree with, if I can put it that way.

A. Sure. I thought there was criticism coming if you didn't say you had objected.

THE CHAIRMAN: No.

A. This does appear to me to be a record that somebody has said these things, yes.

THE CHAIRMAN: Let me give you an example because it's not really helpful for me if you go through the note saying what Dr Taylor said at paragraph 3, I disagree with paragraph 4, because I know that you disagree with a lot of what Dr Taylor says. But that doesn't mean that the note is wrong.

A. I agree. Yes.

THE CHAIRMAN: What I'm looking for is if you have any examples or points where you say the note cannot be right. And in a slightly different way, Dr O'Connor dealt with this when she said yesterday that, for instance, at the top of page 3 she said where it states on the third line:

"In this case, the kidney was in at around 9.30."

She said absolutely not, that's not right. So that's what I'm looking for, not whether you disagree with what, say, Dr Taylor says.

A. Okay. I disagree with the timing --

MS ANYADIKE-DANES: Sorry, I think Ms Woods has a point.
MS WOODS: I know this is not my witness, but it's obviously a theme that's running through all of the witnesses, and including Mr Brown. It is, I would submit, rather difficult for the witnesses to do that because, whilst there may be some things the witnesses can identify, saying that that's not medical language, that doesn't sound like it could be correct, there are other things, and the example you've given Dr O'Connor used. We simply don't know whether that is an incorrect note of 9.30 rather than 10.30 or whether it's Dr Taylor has said something that is factually incorrect. And there are numerous examples of that throughout the note.

So whilst Mr Keane may say, "I don't agree with this", it's really very difficult for Mr Keane or Mr Brown to know whether that's because the note is incorrect or because Dr Taylor has been saying things that are factually incorrect.

THE CHAIRMAN: There are others who were at the meeting, not just Dr Taylor.
MS WOODS: You're correct, sir.
THE CHAIRMAN: Well, okay. This is a slightly difficult exercise, Mr Keane. But what I'm not particularly interested in -- not just you, but any other witness -- going through the note, picking out point by point,

"I don't agree with this, I don't agree with that". What I'm looking for is things that really make your hair stand on end and say," Look, that can't possibly be right" --

A. Okay.

THE CHAIRMAN: -- if that means anything.

A. If you quicken it up then, the issue about the bladder being opened and the famous paragraph, "A query has also been raised". And I reserve the right to come back if --

THE CHAIRMAN: That's okay. So the bladder being opened, and you say that's absolutely not the case?

A. It's not the case.

MS ANYADIKE-DANES: Yes, that's a factual issue. So we will come to that of course. I wondered if you might want to address -- perhaps I might help with this. It's on this page where it says --

THE CHAIRMAN: Which page?

MS ANYADIKE-DANES: 122-001-001:

"Dr Taylor was concerned that the child may have been dehydrated, his concern for the transplant operation was if the kidney was in place quickly, there must be enough fluid to properly perfuse it. Normally, the kidney would be in place in around an hour."

Maybe you can help us with that because you're the

surgeon. Normally, the kidney will be in place in about an hour?

A. If you were -- you know, you might, in a primary transplant, but not in a child like Adam, be looking ... You wouldn't get it in in an hour. About an hour and a half would be a very speedy operation. In a child like Adam, at least three.

Q. And just while we're referring to that sort of thing, Dr Taylor deals with that in his evidence at the inquest, of which we have a note. If we go to 122--- there is a reference to -- maybe it's in this document -- you being able to get the kidney in in 45 minutes. If it's not in this document, I think it's in the inquest note. If you give me just a moment. (Pause).

I think we've got the wrong page reference there.

MR FORTUNE: Sir, although this is not my witness, Mr Keane ought to be given the opportunity to have quoted to him what Rigg and Forsythe say in their latest report as to the meaning of "in place".

MS ANYADIKE-DANES: Yes, I am going to deal with that. Thank you very much, Mr Fortune, I have that in my note to deal with. I'm simply trying to do an timing one at the moment and then we'll get to what that actually means.

122-044-044:

"Although the operation can take 2 to 3 hours, it can take less".

THE CHAIRMAN: Let's just explain. This is a handwritten note of the evidence given by Dr Taylor at the inquest.

A. Right. And I assume you're not taking this as a -- is this a true record?

THE CHAIRMAN: This is a record of what he said. This is a note of what he said at the inquest.

MS ANYADIKE-DANES: Yes. This is by the same notetaker, Mr Keane, and one can look on the one hand with what was said here and then we can see the bits that compared with the bits that the coroner then put back to the witness to be included in that handwritten part, if I can put it that way, at the end of the witness's deposition. So there is a way of trying to compare the faithful record of these things. But in any event, what I'm putting to you is, just below that where it says:

"Although the operation can take 2 to 3 hours, it can take less."

And it's recorded as saying:

"At the time, expecting the kidney to be in in an hour. With Mr Keane it can be 45 minutes to an hour. So expecting the kidney to be in."

And Mr Fortune's quite right, I'm going to take you

and ask you for your views about what being "in" means. Do you recognise the ability to get a kidney in or place a kidney in 45 minutes to an hour as being attributed to you, your ability?

A. No, I don't recognise that.

Q. If it's correct, do you know where Dr Taylor could have got that from as to your own record, if I can put it that way?

A. No, I don't know. I don't recognise it. If you had all favourable circumstances, excluding preparation of the kidney, everything done and you started to finish ...

THE CHAIRMAN: Is that knife to skin to closure of the wound?

A. No, everything done. The kidney is prepped, ready to go, and you have a seriously good assistant with you, who has done as many transplants as I would have done, you might do it in an hour and a bit. But that's a land speed record. It would be an hour and a half.

THE CHAIRMAN: Okay.

MS ANYADIKE-DANES: Can we go back to the consultation note at 122-001-001. Can you help us with this? What does "the kidney would be in place in an hour" -- in other words, what does the "in place" mean to you?

A. My reading of that would be that I had the vascular anastomoses done in an hour. That is how I interpret

it. I don't know what it actually means though.

Q. If we can go to the report of the inquiry's expert surgeons. This is a report that's dated September of this year. They were asked specifically to address some of the surgical issues arising out of this note, assuming the note to be a faithful record of what was said. If we go to page 203-011-003. Firstly, have you seen their report?

A. Yes.

Q. The question that I was putting to you is all part of me trying to provide to the chairman with the information as best we can as to the actual chronology, if I can put it that way, of the surgical procedure. Because the timings don't always fit and they're not all recorded in any event. Part of where we're getting this from is -- for example, there is a reference in this note to:

"In this case, the kidney was in at around 9.30."

And then you see the other reference to the kidney and it being possible that a kidney could be in in an hour.

So the experts were asked what a kidney "being in" meant, and in this page they're specifically dealing with the passage where it says:

"In this case, the kidney was in at around 9.30."

To understand what "in" was. The note goes on to

record:

"Vein was in and the arteries were being finished."

So under (i), it says:

"Our understanding of the kidney 'being in' would be when the venous and arterial anastomoses were completed and the kidney being re-perfused with blood. The description from the document describes the kidney being in when the venous anastomosis was complete, but whilst the arterial anastomosis was not yet finished."

Are you able to comment on what they have said there?

A. Yes. I agree with the first sentence. That's what it would mean if it was in; it wasn't half in, it was in.

Q. Yes. So the only issue with this note is that they have said that, but the note has gone on to actually describe what the position was in relation to the anastomosis. So in a sense, it would appear that that has qualified it. And just so that I take you to the specific part in the note, it's 122-001-003. There you see it right up at the top.

So what does this mean to you? It starts with "in this case the kidney was in" and then immediately afterwards you have this other sentence.

A. Well, it's written by somebody who doesn't understand

transplantation. "The kidney was in" means both anastomoses are done and then he goes to directly to contradict himself, or the note contradicts itself. I don't know at what level you're accepting -- is this an absolute record or ...

THE CHAIRMAN: That's what I'm probing.

A. It's contradictory.

THE CHAIRMAN: Were you here when Mrs Neill gave evidence yesterday?

A. Yes.

THE CHAIRMAN: So it may be that while she's very well educated, it might be that there was some failure on her part to understand some of the medical language. It also may be that there was some failure on the part of those who were there to describe accurately what had happened.

A. Sure. Taking it as read, "the kidney was in at 9.30" means both anastomoses were done and then the next sentence contradicts itself. So whoever said it wasn't a transplant surgeon.

MS ANYADIKE-DANES: Yes, or, I suppose, it could be rather loose language.

A. Or loose language, yes.

Q. But bearing in mind that not everybody there was a clinician, if we go back to the report, it goes on to

say it's possible that it might be being described -- that is the kidney -- as being in situ, so "in" in that sense. And then what happens afterwards is actually a description of the nature of it being in. So it was in situ with the vein being in and the arteries being finished as a process. Is that one way of interpreting what is being described there for you?

A. Not to me. If it's in, to a surgeon it's in. It's not in to be fiddled around with: it's in, it's sown in.

Q. Thank you. So that was one point that I wanted to take you to. We'll just keep that up there because the other thing I wanted your help with in interpreting is it says that the kidney was in, in that way, at 9.30. Leaving aside that you don't understand that to be a proper description of what "kidney being in" means, so if we just take the description that at around 9.30 the vein was in and the arteries were being finished. What would you understand "the vein was in" to mean?

A. That I had completed the venous anastomosis.

Q. So the venous anastomosis has been complete and the arteries were being finished?

A. Well, that is quite obviously incorrect because the arteries were on a patch.

Q. Sorry?

A. The arteries were on a patch. There was a single patch.

Q. Yes.
A. So I wasn't doing two arteries separately; I was doing a single patch.
Q. Yes, but "being finished", could that mean that the arterial anastomosis was in place? Sorry, was in process?
A. Was in process, yes.
Q. Is that one way of interpreting that?
A. That's one way of interpreting that way.
Q. And if you were interpreting it in that way, so far as you are concerned, could that be the state of play, if I can put it that way, in and around 9.30?
A. No.
Q. And why is that?
A. Well, when you get a look at the anaesthetic records and the notes, you know the operation didn't start definitively until after 8 o'clock. The first CVP ... You cannot have an anaesthetist and a surgeon ... You can't have an anaesthetist putting in a CVP line during an operation; there just isn't room in a child to do that. So the operation starts at 8 and I have everything done at 9.30. No chance in Adam. Not ...
Q. That's an hour and a half. Everything isn't quite done, is it? The arterial anastomosis isn't complete.
A. Well, they're about to be done. The arteries are being

finished according to this. So I'm within a minute or two of finishing, 9.32 I'd be finished. No chance.

Q. I think Professor Forsythe and Mr Rigg have thought that at that stage, for the arterial anastomoses to be complete, that might be about 10 to 15 minutes. That might be the further time to achieve that position.

A. Well, if I'm halfway -- the implication of this is that I've done the vein and I'm halfway through or I'm some way through the arterial anastomosis. I'd be finished in a matter of minutes at that stage. There is absolutely no chance, if I started at 8 in a child like Adam, with what we were faced with in terms of adhesions and trying to get these vessels prepared for transplantation -- there is no chance that any surgeon, in my opinion, would be able to do it.

THE CHAIRMAN: And you're saying that that is not the position that you had reached with Adam or anywhere near it by 9.30 on that day?

A. No, I was dissecting adhesions for a long time. You have to remember that this is trying to dig out of concrete a vessel which is essentially like tissue paper. One slip and he is dead because he will bleed out.

MR FORTUNE: My learned friend referred to the time of 10 to 15 minutes. If we look at the Rigg and Forsythe report,

203-011-003, at the top, they talk about the time for the venous and arterial anastomoses and re-perfusion of the kidney, 20 to 40 minutes. And at the bottom of the page, four lines up:

"As described above, the time for the venous and arterial anastomoses to be completed would normally be in the order of 20 to 40 minutes."

So I am not sure where 10 to 15 comes from.

MS ANYADIKE-DANES: It goes on to say:

"As each [that is the venous and arterial] normally takes approximately the same period of time, the time between completion of the venous anastomoses and the completion of the arterial anastomoses [or the time taken to complete the arterial anastomoses] would be in the order of 10 to 20 minutes ..."

MR FORTUNE: Yes. That's not quite 10 to 15.

MS ANYADIKE-DANES: I beg your pardon.

THE CHAIRMAN: That wasn't the point of your objection.

MR FORTUNE: The experts go on to say that this wasn't a straightforward transplant.

THE CHAIRMAN: That's the point. The point of your objection really is that this was not a straightforward transplant. That's what Rigg and Forsythe say and that is what Mr Keane says.

MS ANYADIKE-DANES: Yes.

THE CHAIRMAN: And they end up, following that down under (c):

"A straightforward transplant operation can be completed in 75 to 90 minutes, but in a complex patient such as Adam, this would be over-optimistic and an operative duration of 120 to 180 minutes would be more realistic."

So if this started at about 8 am, the likelihood, according to Rigg and Forsythe, is it would be over between 10 and 11; do you think that's right?

A. That is what happened.

THE CHAIRMAN: Yes.

MS ANYADIKE-DANES: Can we then go to the open bladder point, which is at --

MR MILLAR: Sorry, it is 1 o'clock. It might be a good time to pause.

THE CHAIRMAN: Okay. Mr Keane, can we break and resume at 2 o'clock? Thank you very much.

(1.03 pm)

(The Short Adjournment)

(2.00 pm)

MS ANYADIKE-DANES: Good afternoon, Mr Keane. Could we please have up 122-001-004? Could you look at the first paragraph of that page, starting with "It was pointed out" and down to "high urine output".

Mr Keane, you'll recall that this issue about the open bladder is something that I took you to in a letter that passed between Mr Brangam and Dr Murnaghan. So this is it now, the issue being recorded as having been discussed at this consultation. If we start with the first bit:

"It was pointed out it was of vital importance that one was not able to measure the urine output during the procedure as the bladder was open."

Can you help us with that? If the bladder was open, does that mean that you can't measure urine output?

A. You could measure it indirectly. It's not of vital importance because Adam's -- under physiological conditions, Adam's output was known so it's not vital. As I said in evidence, if they wanted a catheter, they could have had it. Indirectly, unless you were letting this urine, which is a corrosive substance with bacteria in it, all over the wound, which you wouldn't do, you could measure it indirectly by suction and by weighing the swabs. So you wouldn't have an accurate measure of it, but you would have a measure of it.

Q. Then it goes on to say:

"Normally, one would be able to measure urine output during operation [sic] every 5 mins except for a short period when the bladder was open."

You will recall from the evidence during the clinical phase that there was a slight difference as between the anaesthetists and the surgeons as to why -- whether you would want to measure urine output and, if you did, why you were doing it. You may recall from the reports from Professor Forsythe and Mr Rigg, their view was that it was actually to control the distension of the bladder. If you had a catheter, you could do that. Dr Haynes' view was, from an anaesthetist's point of view, it would be helpful for the anaesthetist to be able to more accurately record urine output as part of the calculation of his fluid measurements. Two different disciplines, two different reasons.

Leaving that aside, this statement about:

"Normally, one would be able to measure urinary output during the operation every five minutes except for a short period when the bladder was open."

Do you accept that as being accurate?

A. Not really, no. Every five minutes is -- you don't measure urine output in five-minute aliquots of time in an operation. It is just not done that way.

Q. Okay.

A. You might measure half-hourly. The standard is hourly. Hourly urine output is the standard. You probably would, if you were really -- half-hourly, but you

wouldn't be measuring it every five minutes.
Q. Leaving aside the periodic time intervals of measurement, in order to get an accurate measure of the urinary output from the bladder, is it affected by the bladder being open?
A. Oh, it would, yes. You would have a catheter in to measure it if you wanted to measure it.
Q. Exactly. Where it goes on to say:
"However, during this procedure the bladder was opened immediately and was opened for some two hours so it was not possible to measure the urinary output and this child was known to have high urine output."
If you leave aside your position as to whether that actually happened, if the bladder was opened immediately and remained opened for essentially the duration of the procedure, is that statement correct, that if that happened it wouldn't have been possible to measure the urinary output?
A. No, that's not correct. As I said --
Q. Sorry, accurately measure the urine output.
A. No, you couldn't accurately measure the urine output.
THE CHAIRMAN: I think you couldn't measure it precisely, but you could have a measurement of it.
A. You would have a measurement.
MS ANYADIKE-DANES: If you were measuring it in that way, by

suction from the cavity or weighing the swabs, in your view how close to accurate is that?

A. Well, the swabs are of a known weight. And if it was just simply urine and you collected it all, you would actually have quite an accurate -- but obviously during a procedure you'd some blood in there as well. I think you'd probably get to within 15 to 20 per cent of what was the figure.

Q. In fact, your own evidence, turning it the other way when you're talking about the blood loss which you say was inflated because they had actually measured in there not just the blood loss, but the melted ice and all sorts of other things that were in the cavity at that time. The same would apply for any accuracy in relation to the urine measurement.

A. Yes.

Q. Did that happen?

A. No.

Q. If I can just take you to the note from the inquest, which is 122-044-048. This is the same note, Mr Keane, that we were looking at before lunch. This is the handwritten note of Mrs Neill and of the evidence that she hears being given at the inquest. It's not intended to be verbatim, but it's her note. If you look at the top of that -- I should say, sorry, that this is

in relation to Dr Taylor's evidence.

"Question: at the start of procedure bladder open. Created difficulty. It did affect my calculations."

That is the point that was being referred to in the exchange between George Brangam and Dr Murnaghan. That's referred to also in this note of the consultation and there we see it as a note taken of the evidence that was given. But it didn't happen?

A. That was retracted yesterday, as I understand it. Dr Taylor said the bladder was not open at the beginning. It was retracted yesterday.

Q. Well, we will check that for you, Mr Keane. I simply put to you that this is --

A. I understand he said it at the inquest but I understood yesterday quite clearly that he said the bladder was not open at the beginning. That was Dr Taylor's evidence yesterday.

Q. But in any event, if this is something that was said at the inquest, that's incorrect; is that your evidence?

A. That is incorrect.

Q. You had, I think, when you were giving evidence during the clinical phase, you had given us some guidance as to where people were relative to the operation site, if you like, and this was part of whether you could see the CVP monitor and you could see what in relation to what was

going on.

A. Mm-hm.

Q. Given where you recall or understood Dr Taylor was, could somebody in that position have seen whether you had in fact opened the bladder?

A. I think he could have looked into the operation site at any time, but would have had to make a -- he probably would have had to make a manoeuvre to do so.

Q. A move to do that?

A. Yes.

Q. And if he had made that move and if the bladder had been opened, would that be obvious to somebody doing that?

A. Well, it would depend on the size of the incision they're saying, but yes, if there was a sizeable incision in the bladder and it was open, it would be obvious.

THE CHAIRMAN: Just for the record, what Dr Taylor said yesterday was -- you're quite right. He was asked about this top paragraph on page 4 about the bladder being open. He said:

"I was only aware of Adam's bladder being opened at the end of the operation, not the start. I have never seen this procedure before. I do not know why the paragraph is there."

MS ANYADIKE-DANES: There we are.

THE CHAIRMAN: But I do know why the paragraph is there because that's what Dr Taylor said at the inquest, therefore it's very likely that he said it at the consultation before the inquest.

MS ANYADIKE-DANES: Can you think of any clinical reason why you would want to open the bladder like that? I know your evidence is that you didn't do it. But can you think of any clinical reason why it might be done?

A. There's no reason why it might be done. Well, there's no reason why you would want to do it, but there is a reason it might happen, which is slightly different.

Q. It is.

A. Yes. The trouble here with all this is urine is a corrosive substance and it contains bacteria and you're about to transplant somebody, immunosuppress them and allow urine to ... You would just stitch it up if it happened. You'd just stitch it up again.

Q. But that's not what's being said here. What's being said here is not only was it opened like that, but it was left open and that was the whole problem about being able to accurately calculate fluid output.

Professor Forsythe and Mr Rigg have discussed this particular part of the note in a report they prepared for the inquiry. I have taken you to it on another matter, but on this issue, it is dealt with at

203-011-007. He says:

"It is likely that this was done inadvertently and not deliberately."

Then he talks about what would happen, which was precisely the point that you had made if you'd done that. So his view is that it's not something that -- their view, it's not something that you would seek to achieve, but it's something that might happen by accident, you might nick it or something of that sort.

A. Yes.

THE CHAIRMAN: Their highlighted bit of the answer is predicated on the basis that it was open:

"It is likely that this was done inadvertently and not deliberately."

MS ANYADIKE-DANES: Yes, if it was open, it would be inadvertent and not deliberate.

THE CHAIRMAN: But they're assuming it was open because that's what the consultation note says. And Mr Keane's evidence and Dr Taylor's evidence is that it wasn't open.

MS ANYADIKE-DANES: Exactly. What they were asked is their understanding of that statement. So if you've got a statement that refers to it being open in that way, what does that mean? And how would that happen? And that's what they're addressing.

A. If I could pass a comment: when I read their report it seemed to me that Forsythe and Rigg were accepting this as the truth, this document.

THE CHAIRMAN: Yes. Because it wasn't for them to know about the quality of the notetaker and so on. In effect, what they're being asked about is: what does it mean that the bladder is open and so on?

A. If it's true, yes.

MS ANYADIKE-DANES: In fact, we asked them for a very short note of a follow-up, which I haven't had an opportunity to circulate, and I apologise for that. 203-012-001, which is just for the avoidance of any doubt, if I can put it that way. They said it is likely that this was done inadvertently and not deliberately and we just wanted to absolutely nail that point. They were asked whether there was any reason for doing that deliberately, and if so, what it was. And whether they see any reference to that happening in the operative note, and whether they would have expected it to be recorded if that has happened and their response you see is that:

"I cannot think of any reason why the bladder should be opened deliberately at the beginning of the procedure."

And:

"There is no reference [to it]."

And, if that had happened:

"It would be usual to record [it]."

So that, I think, has clarified -- in case it needed it -- that, if that had happened, then in their view, then it would have happened entirely inadvertently --

A. Yes.

Q. -- and would be something that should be recorded.

And do you accept that, if that had happened for some reason, that is something that you would record?

A. Yes.

Q. Can we then go to the actual paragraph 5, the fifth paragraph, which is 122-001-005? The first point to ask you is:

"A query was also raised about whether the new kidney had been properly perfused. The kidney was not performing well and it was felt that more fluids were required."

So just stopping there for the minute, what do you understand that sentence to mean? Those two sentences, I should say.

A. Well, I'm not sure about the word "properly". I would imagine that the correct terminology was "adequately perfused". "Properly perfused" implies that a mistake had been made in some way with the artery or vein.

I don't know what the sentence actually means. "The kidney was not performing well", I don't have an issue with that in that what I saw was a drop or two of fluid, which looks to a urologist like urine. Now, perfusate, which is the other thing it could be, is crystal clear and I have to say that I do know what urine looks like, but I didn't examine this drop or two. "It was felt that more fluids were required", I -- that is a personal -- has to be a personal statement from Dr Taylor because at no time during this procedure did I ask for more fluids to be given and there is no record at 9.30 or 10.30 that a bolus was given that I can see in the anaesthetic chart.

Q. Well, can we stay with the "properly perfused"?

A. Yes.

Q. Is an interpretation of that that it wasn't looking just as pink as perhaps it might look or as one would like it to look?

A. That's an interpretation, but I gave evidence about the re-perfusion injury and what -- and as I said in my correspondence, this is absolutely normal in transplantation. You get a reactive hyperaemia where the thing looks as if it's going at a thousand miles an hour and then it settles.

Q. I didn't mean it from that point of view. I just meant:

from your point of view, looking at that, is that not an interpretation that could be put on that?

A. It's an interpretation.

Q. And you know that there has been differing evidence as to the colour of the kidney, if I can put it that way. I'm not going to go through all that again as I think we went through it at some length in your clinical phase and people have different views as to what the colour of the kidney was and different views as to when it had that colour, if I can put it that way.

A. Could I make two points on that? One is that Dr Taylor in the inquest says initially the -- it's in the note you have -- that the kidney pinked up initially --

Q. Yes.

A. -- and then paled. And we know from yesterday that the blueish appearance is pure hearsay. Dr O'Connor says she didn't say that, she heard somebody say it. We can't identify who that is, and this blueish thing is hearsay.

Q. Yes, but leaving that point aside.

A. I just wanted to make those points.

Q. I'm sure the chairman has those points. What I was putting to you is: that is an interpretation of that sentence --

A. Yes.

Q. -- that what they were really drawing attention to was that the kidney at some point or other may not have looked as pink either as it once had or as people would like it to look.

A. That is an interpretation.

Q. Yes. And your evidence to the coroner on that -- just give me one moment -- was ... I think it's initially ... 011-013-093:

"It perfused quite well initially and started to produce urine."

Then I think there is in your operative note -- perhaps we can pull that out and see how you record it. I think it's "reasonably well at the end", I think, is how you put it, but we'll find the reference for it.

A. Yes. That would be consistent with the re-perfusion injury.

Q. 058-035-135, "reasonably at end". And we have heard all the evidence about it that it perhaps wasn't quite as pink or well perfused at that stage as it had looked initially.

A. We'll take out the "pink" and "it wasn't perfused".

Q. Yes. If we can go back to the place where we were in the consultation note. So that's a way of interpreting that sentence. Whether you agree with it or not, it is a way of interpreting it.

A. Obviously I disagree with all [inaudible] that is a way of interpreting it.

Q. Yes. If we look at:

"The kidney was not performing well and it was felt that more fluids were required."

Can I ask you this? If there was any concern about whether the kidney was pinking up just as quickly as you would have anticipated, if I can put it that way, then is a reasonable response to that to administer more fluids?

A. If you accept the pinking up bit, that is true. But it's quite clear from Dr Taylor's note at the inquest that it pinked initially. When you say "Is it reasonable to give fluid because it wasn't performing well?", it depends on if you go into this urine output business, it's not reasonable to give more fluids.

Q. Yes, but if performing were being used as not literally producing urine, but the look of the thing and whether it was looking as adequately perfused as you would like it to look at any given stage, if that is how "performing" was used -- and I'm not saying that that's how you interpreted it -- but if that's what was meant, is a reasonable response to that sort of concern to administer more fluids, in your view?

A. If it's a perfusion issue, it's reasonable to give more

fluids, but not of performance.

Q. I understand.

A. And we're talking performing here.

Q. I understand that.

If we can go to 011-013-093. I think I didn't take you to where it says:

"... perfused quite well initially. At the end of the procedure, it was obvious kidney was not perfusing as well as it had done initially."

I beg your pardon, that's the bit I wanted to take you to when I took you last to your statement.

But in any event, your view, as I understand it, is that perfusion is different from performance.

A. Yes.

Q. But if there is any error or, how can I say -- sloppiness is a pejorative, I don't mean it in that way -- but if there is any loose expression and performance is not being used in a technical sense, that might cover this concern over perfusion; is that possible?

A. I can see where you might overlap the performance relating to perfusion. I mean, they are ... As I understood it, to date, the performance is the production of urine.

Q. I understand. Then if we then could go back to the page

in the consultation note where we were. If we go to the sentence that starts "during the surgery":

"When this kidney was failing to operate, a needle was put into the artery."

Let's just pause there for a minute. Firstly, assuming that "failing to operate" could be interpreted as part of that interpretation that it wasn't perfusing as adequately as one had hoped, if that was a situation that you were in, is the perfusion not linked to the adequacy of the blood supply to the kidney?

A. Perfusion defines adequacy of blood supply to the kidney.

Q. So if that's a concern and you believe you are detecting that by the look of the kidney, then is a thing to check whether the blood supply to the kidney is adequate?

A. Absolutely, yes.

Q. And if you were doing that, whether it would be a regular way of doing it, could you achieve that by inserting a needle to see if you could withdraw any blood at that site?

A. When you say "could" --

Q. Yes?

A. -- I do not -- yes, you could.

Q. You could. And if you had done that, assuming you got the needle inserted in the right place, if you had done

that and you were unable to withdraw any blood, would that indicate that there was an inadequate or perhaps even no blood flow going into the kidney?

A. It would be a strong indicator --

Q. It would be a strong indicator?

A. Yes. I obviously deny that.

THE CHAIRMAN: We're going to come on to that.

MS ANYADIKE-DANES: We're just trying to work through the logic of it. Have you ever known that happen?

A. I have never seen it. Obviously, you -- I know that it's been described, but I have never seen it. It's an absolutely idiotic way to check it.

THE CHAIRMAN: Why?

A. Well, as I told you in evidence, if you have blood flow going into an organ and you have one way out and a vein, all you have to do it compress the vein, the kidney swells, the vein swells, the kidney's perfused. Why anybody would stick a needle into a 16-year-old artery which is a half artery -- these would obviously be smaller than a single big one -- would be beyond me.

MS ANYADIKE-DANES: If we go to the expert report of Professor Forsythe and Mr Rigg at 203-011-004, what you said before is correct. They have not been asked as to whether this is an accurate record of anything that was said. Obviously, they're not in a position to express

a view on that. But they have been asked certain questions about the statements themselves. So in relation to this particular statement they were asked, "What would be the purpose of putting a needle into an artery?", effectively, in those circumstances and the way described there. And the answer is --

THE CHAIRMAN: We've read the answers. We know what the answer is.

MS ANYADIKE-DANES: There we are. That would mean that there would be no inflow of blood to the kidney, which is essentially what you have said. If you did it and did it properly, that would be the result of it. Then we go to the question, "Is that commonly done in transplant surgeries?" And their answer to that is:

"In our experience, this is very uncommon."

And would you share that view?

A. Yes.

Q. "It is only done when there is concern about whether there is a blood flow in the artery when no pulse in the artery can be felt."

So what they're indicating there is, it's not that it's never done, or necessarily that they've never heard of it being done, but it's pretty rare and those are the circumstances in which you would do it.

THE CHAIRMAN: Aren't they also assuming that it was done?

That's the point of their answer. They're assuming this was done and the questions are being asked, "What was the purpose of doing it?", and, "Is it commonly done?"

MS ANYADIKE-DANES: Yes, I accept that. I have put that. What I'm trying to ask or seek from Mr Keane is whether he accepts that it might be done in those circumstances.

A. No, I would disagree with 7(ii). They're completely wrong. If you had no pulse in an artery, you'd better get the artery down and re-explore. You might do it if you felt transmitted pulsation and you were unsure as to whether the actual artery was pulsating because you can transmit from the vessels into it. But I wouldn't do it if you felt the artery and there was no pulse in it. What you'd go sticking a needle into that for I don't know. You just clamp and take down the anastomosis.

THE CHAIRMAN: I understand why you lean back, but if you lean forward, the microphone picks you up and the stenographer hears you.

A. My apologies.

I wouldn't agree with that at all. I think that that would not be the case. If you were doing a transplant and you couldn't feel a pulsation in the artery, it's an immediate take down. Why would you go sticking a needle in it?

MS ANYADIKE-DANES: Is it possible that you were concerned

as to whether there might be a small amount of blood passing through, even if you actually, in those circumstances, can't feel an artery?

A. No, I felt the pulse and I checked for perfusion, the kidney swelled, released, swelled, released --

Q. I understand, Mr Keane, that you actually felt a pulse. This is slightly different. It may be that you can't feel one, it doesn't necessarily mean perhaps -- and this is what I'm asking you -- that it's not there and that this procedure might be used just in extremis to check.

A. All right, I --

Q. Is that possible?

A. That's possible.

Q. Because the alternative, which they actually deal with, what would be a more regular thing to do if you really felt you were in that situation, is at 203-011-005. It's in answer to a slightly different question at (iv) above, but if you go to the second sentence of their answer:

"In normal situations where a kidney had no blood supply to it and it couldn't be rectified, then the kidney would be removed, but if time was of the essence for the patient's overall clinical condition, then the kidney might be left in situ."

And then they go on to say what the circumstances were. But if one looks just at what they're effectively saying one would do if you had that concern, in normal situations where a kidney had no blood supply, then you would remove it and effectively redo the anastomoses if that was the problem, if you thought there was a reason why the blood supply entering the kidney. Would you accept that that is the normal thing that you would do?

A. That would be the normal thing to do.

Q. And what do you do if you don't have time? If you're concerned about the condition of the patient, what do you do?

A. You know, that's all hypothetical, but let's say I understood that Adam was coning. I would nephrectomise him straightaway and close him up and get him out to ICU.

Q. Sorry?

A. Nephrectomise him straightaway and get him out to ICU -- close him and get him out to ICU.

Q. So if you felt a patient's condition was deteriorating or very serious at that stage, then you wouldn't be redoing the anastomoses or anything of that sort? You would be closing the wound and getting that patient to paediatric intensive care as soon as you could; is that it?

A. Yes.
MR FORTUNE: [Inaudible: no microphone].
A. Yes. If I understood that that clinical situation in Adam existed at that time, I would take the kidney out, close him.
THE CHAIRMAN: Because he can survive that, but he can't survive coning unless it's brought to --
A. Unless we can get immediate action.
MS ANYADIKE-DANES: Yes. I think it was Dr Taylor who gave evidence that you wouldn't actually know what was going on in Adam's brain without the benefit of a CT scan. But if, from other observable features or for some reason you had a true concern about his condition, that's what you would do; is that what you're saying?
A. That's what I would do. Absolutely, yes.
Q. Thank you. But in fairness to you, your evidence is that that's not what happened.
A. That is definitely not what happened.
Q. That's not what happened all the time you were in the operating theatre?
A. When I left the operating theatre, the transplant procedure as distinct from the surgery, if you -- the transplant procedure was over. So ... If you want to define it in that way, I left what I thought was a normal situation.

Q. Is it at all possible, medically, that anything could happen to be concerned about the transplant procedure itself after you had left?
A. Well, the main issue would be an immediate haemorrhage once you had closed. It's possible that one of the sutures would go.
Q. How would you detect that if that had happened?
A. Pulse and blood pressure. His CVP would start to drop, his pulse would go up and his blood pressure would drop. Those are the basic signs of surgical bleeding. So if you had an immediate crisis like that and you blew the artery, say, he would obviously be in haemorrhagic shock and the other thing is an immediate thrombosis of the graft, which is not that easy to detect.
Q. But how do you, if you suspect --
A. If you suspected it, there are two ways. First of all, we had a situation -- I had put in a slightly more sophisticated way of draining him with the suprapubic in his bladder and a catheter in the transplant kidney. So we could measure minute by minute what was coming out of the transplant and out of his native kidneys. So if you started to see bloodstained fluid coming out of the transplant kidney, that would indicate a renal vein thrombosis. You would obviously, within 24 hours or maybe within 12 hours, look for a Doppler ultrasound to

be carried out on the vessels to see where the --

Q. Yes. I'm rather speaking about something that might have happened or be detectable in the operating theatre.

A. In the operating theatre, basically haemorrhage, you wouldn't really detect thrombosis of the graft in the operating theatre. But haemorrhage would be the thing.

Q. Yes. And if you thought any of that sort of thing had happened, what do you do as a surgeon?

A. Well, if it's haemorrhage you have to open up and re-explore and suture whatever is bleeding.

Q. And is it at all possible that anything untoward of that sort could have happened after you left?

A. No. All you have to do is look at the anaesthetic chart. The child's pulse fell throughout the procedure and his blood pressure kept going up. There's absolutely no way that Adam was bleeding. It simply has never happened in a human being that your blood pressure goes up and your pulse falls when you're bleeding. It just simply does not happen.

Q. If we go back briefly to the consultation note itself again. If you look at the totality of that sentence, including the last part of it:

"The performance of the kidney was no longer relevant at this stage".

How do you actually interpret that? What does that

connote to you?
A. To me personally?
Q. Yes.
A. I think I would have interpreted it in the way the inquiry interpreted it. It seems to imply:
"Clearly, the kidney was not working when the operation site was closed. However, the performance of the kidney was ..."
Somehow or other we ... Something disastrous had happened to Adam and that we knew about it. Although it is, in fairness, open to interpretation, as we heard yesterday. It isn't absolutely clear.
THE CHAIRMAN: I have to correct you, Mr Keane. That is not how the inquiry interpreted it. What I said in June and what I said yesterday is that we're exploring what the interpretation of that is. But an interpretation of that document is sinister.
A. If I read it straight up, I would say --
THE CHAIRMAN: That's why we're here.
MS ANYADIKE-DANES: That's what it would connote to you?
A. If I read it straight up, yes. As I read it straight up, I should say.
THE CHAIRMAN: Your point is it comes at the end of a sentence, which is just completely wrong about what happened during Adam's surgery?

A. Absolutely completely, utterly wrong.
THE CHAIRMAN: And if the rest of the sentence is wrong, then the concern that immediately struck us about the last section or the last part of the sentence, that should fade away?
A. Sorry, could you say that again?
THE CHAIRMAN: If the rest of the sentence is wrong, then I should not be so worried about the sinister interpretation of the last portion of the sentence?
A. I think this -- as we described, this seems to me to be an outrageous paragraph to put in anywhere as a note. If this is a record of somebody actually saying this ...
THE CHAIRMAN: There are other bits and pieces in the note which I understand Mrs Neill may have misunderstood or her non-medical summary of it may not be entirely accurate. For instance, if there's hyper- and hyponatraemia, or if there's a bit of confusion about what is meant by a performing kidney and a perfusing kidney. But you'll understand, Mr Keane, looking at this, that what seems remarkable about this is that it's hard to understand what was said at the consultation, which she somehow translated or garbled into a needle being put into an artery.
A. Absolutely.
THE CHAIRMAN: This just doesn't make any sense. And if

that's right, then the worrying thing about it is that somehow this was the subject of conversation at that consultation. And if it was, you're completely baffled?

A. Absolutely. Absolutely, yes.

MS ANYADIKE-DANES: Can I ask you a couple more points about that? I understand entirely that you say you didn't, but if you were inserting a needle like that, given where the proximity of where people were -- you have your scrub nurse, Nurse Popplestone in one place, Mr Brown opposite to you, you have Dr Taylor at the head, unless he was coming down to look at the cavity -- to whom do you think it would be visible that you were putting in a needle like that?

A. Well, if you were to do it, you couldn't do it single-handedly, you'd have to order the needle to be given to you, you don't have one. So you'd have to order probably, for an artery this size to check that, you ... There are sizes of needle. You'd probably be a blue needle, you'd certainly be very concerned about putting a bigger green needle. So a blue needle. You'd have to ask somebody to do that and you'd have to get your assistant to, if you like, tauten the artery so you could do it. The arteries tend to be floppy so unless you actually stretch them at the correct tension to do it, it actually would be quite a performance to do it.

Q. Does that mean the scrub nurse has to hand you the needle, Mr Brown makes the artery a little more taut so you have access to it, then you insert it, if that's what was happening?
A. Absolutely.
Q. So that's not something that could be done without people being aware of it; is that actually what you're saying?
A. You couldn't possibly do it.
Q. There might be different views as to how appropriate it was or not, but as far as you're concerned, how would you regard conduct involving putting a needle in like that?
A. Well, I would think that in this particular circumstance it would be almost bordering on a ... If you had a pulse in the artery, it would be almost bordering on the reckless because you could do -- the big worry about an arterial anastomosis is that the inner lining, what they call the intima, will strip. It's, if you like, the way a drain from a sink can be stopped by an onion skin. If this thing strips up, the artery will clot. To put a needle into the lumen of an artery that size, I think, would be a very bad thing to do.
Q. So you seem to be suggesting that you'd be critical of somebody doing that in those circumstances?

A. Yes, I would. I would personally, yes. Mm-hm. The big danger is that you'd damage the intima or the inner lining of the artery and cause it to thrombose by actually checking to see if there was a thrombosis in it.

Q. So unless there was some absolute extremis reason for doing so perhaps of the sort that Professor Forsythe or Mr Rigg could see, leaving aside a situation like that from your point of view, this would be a criticism, would it, of surgical care?

A. Yes.

Q. And if it had had to be done for any reason, is it something that should have been recorded?

A. Yes.

Q. And if it had had to be done for any reason, could you have described the surgery as uneventful?

A. No.

THE CHAIRMAN: Because if that had to be done, that would be the first time in your career that you'd done it?

A. Surgery wouldn't be uneventful if you were checking for an arterial thrombosis.

MS ANYADIKE-DANES: If for example you'd been asked, as you were asked, about the surgery, either in your statement to the coroner or, for that matter, on the strengths and weaknesses in your letter to Dr Murnaghan, this is

something that ought to be been included?
A. This would be a major issue in a transplant, were you thinking that there was an intimal tear or thrombosis of the artery. That would be quite a huge issue.
Q. Then finally, just to be clear about it, have you ever had it described to you that somebody thought this procedure had been employed in Adam's case?
A. This is the first time that I saw this, in June or whenever I got sight of this. I'd never heard of this. I don't think it was ever presented anywhere else.
THE CHAIRMAN: It wasn't. Let's spell out why it wasn't presented. It was not presented to the inquest despite this meeting takes place the week before the inquest. It wasn't described to the police and it wasn't described to the inquiry. There is no other suggestion in any record that this happened.
A. No, because it didn't happen.
THE CHAIRMAN: Thank you.
MS ANYADIKE-DANES: Thank you very much.
THE CHAIRMAN: Okay.
For particular reasons, which I'm not going to go into, that brings to an end this part of Mr Keane's evidence on the consultation note.
As agreed with Mr Millar this morning, I think you've been given some lines of questioning. They will

be reduced because some of those lines at least have been covered, as far as I needed them covered, in Mr Keane's clinical evidence, which spilled over a bit into governance. So what I intend to do now is to leave Mr Keane's evidence and ask him to come back on Monday morning. It will not take very long on Monday morning, Mr Keane.

We will then move on to Professor Savage. I think we have doctors Gaston and Murnaghan on Tuesday. And then there's an issue, I think, with the DLS. We have indicated an intention to recall, I think in particular, some nursing witnesses. There's an issue about whether they will be required. There was an objection from DLS about the nurses being required to the effect that it was unnecessary.

I indicated to DLS at the start of the summer that it was certainly premature to say it was unnecessary, but I will make a final decision on that and we can debate it further if needs be on Monday or Tuesday after we hear the rest of the doctors. Is that okay? Unless anybody has any other business, I will close now and we'll resume at 10 o'clock on Monday morning.

(2.53 pm)

(The hearing adjourned until 10.00 am on Monday, 10 September)

I N D E X