

Witness Statement Ref. No. 119/1

NAME OF CHILD: ADAM STRAIN

Name: S Bhanumurthy

Title: Consultant Anaesthetist

**Present position and institution: Consultant Anaesthetist, Nevill Hall Hospital
Surgeon Commander, Royal Naval Reserves, HMS Cambria**

**Previous position and institution: Consultant Anaesthetist, Royal Belfast Hospital for Sick Children &
Royal Victoria Hospital
*[As at the time of the child's death]***

**Membership of Advisory Panels and Committees: -----
[Identify by date and title all of those between January 1995-December 2010]
Chairman for the Gwent Division of BMA since 2009 onwards**

Chairman of Audit Committee of Anaesthetic Dept Nevill Hall Hospital, 1998-2003 & 2005-2009

Executive committee member of Research and Development committee of Aneurin Bevan Trust 2003 onwards

**Previous Statements, Depositions and Reports: None
*[Identify by date and title all those made in relation to the child's death]***

**OFFICIAL USE:
List of previous statements, depositions and reports attached:**

Ref:	Date:	

IMPORTANT INSTRUCTIONS FOR ANSWERING:

Please attach additional sheets if more space is required. Please identify clearly any document to which you refer or rely upon for your answer. If the document has an Inquiry reference number, e.g. Ref: 049-001-001 which is 'Chart No.1 Old Notes', then please provide that number. If the document does not have such a number then please provide a copy of the document.

- (1) State the date on which you first become involved in the medical care of Adam.
28th November 1995
- (2) Describe your role in the care and treatment of Adam from when you first became involved in the medical care of Adam up to his admission for renal transplant on 26th November 1995, with particular reference to the following periods:
 - (a) 26th November 1991 to 17th April 1991: None (I was not working in RBHSC)
 - (b) 8th February 1993: None (I was not working in RBHSC)
 - (c) 23rd August 1994 to 26th August 1994: None (I was not working in RBHSC)
 - (d) 18th October 1995: None.
and describe any lessons that were learned about Adam's fluid management over those periods: I moved from Northern Ireland to South Wales in 1996. Over the next decade risk of hyponatremia in paediatric patients was recognised. So in our practice, intravenous fluid regime for children has changed to more salt containing fluids like Hartmans Solution. I did not realise Adam was one of the patients involved in these hyponatremia related events.
- (3) Describe your work commitments to the Royal Belfast Hospital for Sick Children (RBHSC) from the start of your employment there and particularly over the period 26th November to 28th November 1995
As consultant Anaesthetist doing sessions and in Operating theatres and paediatric intensive care unit and also doing on calls as dictated by the admin.
- (4) State the times at which you were on duty between 26th and 28th November 1995 and in particular:- Can't remember
 - (a) Whether you were present in the RBHSC: Present on 28th November 1995
 - (b) Whether you were on call: Can't remember
- (5) Describe what you considered to be your role in relation to and responsibilities towards Adam and his family between 26th November 1995 and 28th November 1995 when ventilatory support for him was withdrawn, and in particular: As Consultant anaesthetist managing the patient, informing/discussing the patient status and the management plan with the patient parents including obtaining their consent where appropriate.
 - (a) from Adam's admission to RBHSC until his arrival in theatre: None, as I was not the anaesthetist pre-assessing and anaesthetising Adam.

(b) while Adam was in theatre until his admission to PICU: None

(c) from admission to PICU until his death: To be part of the medical team assessing, managing Adam, with informing and discussing Adam's status and management options.

(6) Describe and explain any discussions you had with any medical personnel in relation to Adam whilst you were on duty. Likely about the documentation in the notes including neurology referral notes and present patient status including the clinical and vital data, discussions with the mother about doing brain death tests and repeating them for final confirmation and finally with drawl of the ventilator support.: On review of the records, it appears I was involved in Adam's management only on 28th Nov. 1995 morning. I was most likely involved in the discussion in final hours of Adam's life as I have documented that since repeated tests confirmed brain stem death, ventilatory support was with drawn with the consent of the mother and Mr Savage. This discussion would have involved pre-conditions to achieve (Established aetiology, Irreversible coma and apnoea with no reversible circulatory, metabolic endocrine disturbances causing coma, no effects of muscle relaxant or sedative drugs, etc.) prior to testing and re-testing the brain stem death criteria, its results and implications, the futility of continued ventilation along with Coroners advice of not for any organ donation.

(7) Identify any protocol or guidelines which governed your actions in respect of Adam and his family over the period 26th November to 28th November 1995

I can not recall whether I was one of the two doctors actually performed the tests for brain stem death. However there were accepted brain death criteria exists at that time which are being followed. These are likely based on 1983 code of practice. A report of a working party of the British Paediatric Association of 1991 supported by the Council of the Royal College of Physicians suggested that, in children over the age of 2 months, the brain stem death criteria should be the same as those in adults.

(8) State what contact you had with Adam between his admission on 26th November 1995 and the withdrawal of ventilatory support from him on 28th November 1995, including where that contact took place, its nature and purpose: My only contact with Adam was on 28th Nov 1995, in Paediatric intensive Care in connection with, withdrawal of the ventilatory support following fulfilling of brain death criteria.

(9) Describe any contact you had with Adam's family including when, where and what occurred during that contact: I can not remember. However from the notes it appears that after informing the mother on 28th Nov 1995, about the futility of ventilation as Adam fulfilled the repeated tests of brain stem death criteria, we have agreed to with draw the ventilatory support.

(10) "28.11.95...Anaesthetic notes

Coroner advised against organ donation in view of medico-legal issues." (Ref: 058-035-142)

(a) Please confirm that you recorded and signed the entry made in medical notes commencing "*Anaesthetic notes*" referred to above and shown at Ref: 058-035-142. Yes

(b) State the time at which you made that note.: Exact time can not remember but probably around 9.30am

(c) Describe and explain the "*medico-legal issues*" referred to above.: I can not confirm that I, myself talked with coroner. The likely medico-legal issues involves the unexpected complications following the surgery.

(11) Describe in detail the education and training you received in fluid management (in particular

hyponatraemia) and record keeping through the following, providing dates and names of the institutions/bodies:

(a) Pre-registration education: As part of the fluid management at Andhra Medical College (AMC) & King George Hospital, Visakhapatnam AP, India 1975-1981

(b) Post-registration education and training: As part of the fluid management for trainee Anaesthetists at AMC & King George Hospital, SCTIMST, Trivandrum, NIMS, Hyderabad India 1982-1991

(c) Hospital induction programmes: As dictated by the policies at that time in Royal Victoria Hospital, Craigavon Area Hospital, Mater Infirmorum, RBHSC 1991-1996

(d) Continuous professional development: Done 1982- to date: but Can not remember the dates. It involves part of the preparation for the anaesthetic exams, attending the college and other association conducted national and international meetings and also teaching the trainees

(12) Prior to 26th November 1995, describe in detail your experience of children with hyponatraemia, including the:

(a) estimated total number of such cases, together with the dates and where they took place: not sure but mild hyponatremia with Na⁺ between 130-135 mmol/litre was not unusual.

(b) number of the children who were aged less than 6 years old: Can not estimate

(c) number of children who were polyuric: Can not estimate

(d) nature of your involvement: Consultant Anaesthetist

(e) outcome for the children: Can not answer as it was not audited.

(13) Describe in detail your experience, since 27th November 1995, in the care and management of children with hyponatraemia: Can not remember

(14) Identify precisely on Adam's medical notes and records the entries that you made or which were made on your direction and state below:

(a) when each of the identified entries was made: Only one entry has been made by me on 28th Nov 1995 morning.

(b) the source of the information recorded in the entry: I can not remember but likely my patient observations and discussion with the patients mother, medical team.

(15) Provide any further points and comments that you wish to make, together with any documents, in relation to:

(a) the care and treatment of Adam from his admission for the renal transplant surgery on 26th November 1995 to his death on 28th November 1995

(b) Record keeping

(c) Communications with Adam's family about his care and treatment in respect of the renal transplant surgery

(d) Lessons learned from Adam's death and how that has affected your practice

(e) Current 'protocols' and procedures

(f) Any other relevant matter

In view of more than 15 years interval and the number of patients dealt over this period I can not recall the events and discussions we had in connection with Adam Strain. My statement is purely based on patient's notes.

To prevent hypoglycaemia 20years ago paediatric patients were receiving dextrose containing Intravenous fluids e.g. Dextrose Saline. However this practice has changed initially to 4% dextrose in half strength saline and then to present practice of giving Hartman solution as hyponatraemia now been a well recognised problem in children.

THIS STATEMENT IS TRUE TO THE BEST OF MY KNOWLEDGE AND BELIEF

Signed: *S. Bhanumathy*

Dated: *17/01/2012*