This is a factual account of the wrongful death and medical malpractice events that lead to the death of Henry O. Clark, Jr.

On June 27, 2001, Mr. Clark was admitted to Harper University Hospital for a cholecystectomy. At the time Mr. Clark's medical history included dilated cardiomyopathy, recurring attacks (2) of acute pancrea6titis secondary to cholelithiasis, atrial fibrillation and previous stroke (1997) for which he was treated with coumadin.

Three days prior to his admission coumadin was stopped. This was done to allow surgery to be performed in the absence of excessive anticoagulation.

On June 29, 2001, Mr. Clark's INR came down to 1.0. This allowed the cholecystectomy to be performed the morning of June 29, 2001. At about 3:30 PM, the patient started coughing, causing him to bleed profusely from the surgical site and causing the formation of a large hematoma in the upper right quadrant of the surgical site. At approximately 5:00 PM, Harper Pharmacy Department Anticoagulation Service entered an order to restart Heparin at 10:30 PM at 800 units per hour and with an instruction for the next PTT to be drawn in the morning at 5:00 AM or 6:00 AM.

The PTT was not drawn as advised by Pharmacy. However, the Pharmacy Anticoagulation Service did apparently see the patient at approximately 10:00 AM noting that Mr. Clark was receiving 800 units of Heparin per hour and that Warfarin was on hold. The assessment for the Heparin was to obtain a target PTT between 48 and 71 seconds. And, the Warfarin to obtain a target INR between 2.00 and 3.00. The pharmacist's plan for the next PTT to be drawn was 2:00 PM and wait for a decision from the cardiologist as to when to restart the patient on Warfarin.

At 2:00 PM, Mr. Clark's hemoglobin dropped to 11.8 that is considered low. Several hours later at 4:45 PM, the patient's PTT was 42.9 and INR 1.29.

Throughout the day of June 30, 2001, Mr. Clark's blood pressure primarily ranged from 120 to the 140's systolic. Around 7:00 PM the Pharmacy Anticoagulation Service provided Mr. and Mrs. Clark a Coumadin teaching booklet and reinforced the importance of notifying the health care physician of any signs or symptoms of bleeding. Pharmacist noted a plan to increase Heparin to 900 units per hours and to draw the next PTT with labs the following morning.

July 1, 2001, about 2:24 AM the nurse noted that Mr. Clark was without complaints of chest pain and shortness of breath. His Heparin was increased to 900 units per hour. At 5:30 AM Mr. Clark's hemoglobin further dropped to 11.0. The Pharmacy Anticoagulation Service acknowledged patient's PTT further increased to 106 noting value being deemed a "panic value" which was called to a person three hours and fifteen minutes later at 8:54 PM.

At 9:00 AM the Pharmacy Anticoagulation Service reinforced its Heparin target PTT to be between 48 and 71. The plan was to hold the Heparin for one hour; then, decrease Heparin to 700 units per hour and followed by a draw at 4:00 PM. The order entered by the on-call pharmacist at 9:00 AM specifically requested that Mr. Clark's PTT be drawn and measured at 4:00 PM with the results to be conveyed to Pharmacy STAT thereafter. At 10:48 AM, the cardiologist signed rhythm strip indicating that Mr. Clark was having frequent VPB's.

Around 11:45 AM the nurse saw Mr. Clark and noted that he was diaphoretic after moving around. The heart monitor showed a sinus rhythm with occasional PVC's and a heart rate in the 60's. At 12:20 PM the cardiologist gave a verbal order to the nurse to hold the patient's Lasix for 24 hours; which was signed off by the nurse at 6:05 PM.

At 1:40 PM physicians tended to Mr. Clark to evaluate the findings of diaphoresis, dizziness and hypotension. Mr. Clark's blood pressure had dropped to 98 systolic. A diagnosis of hypotensive episode was noted though no cause was determined. The plan was simply to continue the patient's Heparin; hold the Lasix and to keep the APTT in the therapeutic range.

At 2:10 PM Mr. Clark was hypotensive again with a blood pressure of 98/70 (possibly even 78/70 since it appears the vital values for this date were altered). The vitals were taken by a student nurse assistant. Mr. Clark's hypotension continued and he had a blood pressure of 92/70 (maybe as low as 72/70 at 4:20 PM. Other than the vital signs noted in the Trending Record; there is no charting whatsoever of Mr. Clark's condition between 1:40 PM and 6:50 PM.

Notwithstanding the earlier Pharmacy Anticoagulation Service order for a PTT to be drawn at 4:00 PM and the results to be conveyed to Pharmacy STAT, <u>THIS WAS NEVER DONE</u>.

At 6:50 PM the nurse noted Mr. Clark was still having episodes of dizziness while up at bedside and that his blood pressure dropped to 98/60 to 88/60. The nurse notified surgeon and/or on call medical staff of the hospital. Nurse indicated physicians responded (saw the patient twice); however, no record for either visits can be found within the chart. The patient's heart rate remained in the 60's. In addition, the nurse noted the cardiologist coming in to see the patient in response to her call for help. Again, no such record from the cardiologist regarding this visit can be found in the chart. The nurse inserted a foley catheter and noted a patent IV infusing dextrose and normal saline solution.

At about 5:00 PM the (I will call this nurse from this point on 1<sup>st</sup> nurse.) nurse administers Lasix through Mr. Clark's IV line which is witnessed by his daughter who calls to advise Mrs. Clark. Mrs. Clark called the nurse station and conversed with the 1<sup>st</sup> nurse and the cardiologist.

Between 6:00 PM - 6:30 PM Mrs. Clark arrived at the hospital. Mr. Clark informs his wife that his right arm is very cold (IV was in the right arm). The 1<sup>st</sup> nurse enters the room and stated that Mr. Clark had been cold and hot all day and right now he was hot. She removed the top sheet from Mr. Clark. Then she left the room.

Shortly thereafter a technician arrived to remove Mr. Clark's IV. After removing the line, the technician attempted unsuccessfully for 45 - 50 minutes to place the IV; but, he not locate a vein. Mr. Clark looked weak. The records noted that at 7:15 PM the nurse assistant was unable to restart IV times 2 attempts.

After the unsuccessful IV line placement, the 1<sup>st</sup> nurse re-enters the room and tells Mr. Clark that he is "just tense and go to sleep". When the 1<sup>st</sup> nurse leaves the room, Mr. Clark complains that he is unable to breath. Mrs. Clark immediately goes to the nurse's station to request help. The PCA informs Mrs. Clark to check to see if Mr. Clark's bed is elevated. Mrs. Clark does so—bed is elevated. As Mrs. Clark returns to the nurse station, Mr. Clark yells out of the room "I am dying in here". Mrs. Clark runs back to the room.

A 2<sup>nd</sup> nurse enters the room. Mr. Clark asks for an oxygen mask. Mr. Clark states that he can not breathe. The 2<sup>nd</sup> nurse tells Mr. Clark that she can not give him an oxygen mask until she obtains a pulse. The nurse checks one finger on each hand plus a toe but is unable to get a pulse. The 2<sup>nd</sup> nurse leaves and never returns.

Shortly thereafter the PCA enters. She is able to obtain a pulse from Mr. Clark's earlobe. The PCA performs an EKG as an unknown doctor walks into the room. The PCA hands the unknown doctor the EKG strip. The doctor leaves and never returns. The PCA takes a second EKG and before leaving the room, Mr. Clark begged her not to "let him die".

Within a few minutes, the surgeon enters the room. Mrs. Clark is asked to leave the room. While waiting by the nurse station, Mrs. Clark hears the surgeon yell "can I get a nurse in here". Mrs. Clark went to the waiting room.

The PCA arrived in the waiting room. The PCA told Mrs. Clark that earlier that day she had told the nurse to check on Mr. Clark because "he did not look good". The 1<sup>st</sup> or 2<sup>nd</sup> nurse replied, "how does he look"?

At 8:10 PM anesthesia had to be called for stat intubation because of the patient's cardiac respiratory arrest. A CBC was done at approximately 8:18 PM which noted an elevated white blood count of 12.7, significantly reduced hemoglobin of 7.6 reduced RBC of 2.47 and a low HTC of 23.6. At 8:30 PM Mr. Clark was witnessed going into respiratory arrest after which CPR was stated. At 8:54 PM the patient's PTT was 138 again another panic value and INR at 1.85.

Mr. Clark was transferred to the 5 ICU on July 1, 2001. Further resuscitation efforts were conducted. At 10:15 PM the cardiologist instructed the medical staff to "hold" all anticoagulation at this time. The differential diagnosis was an acute hemorrhage, dilated cardiomyopathy and/or bradycardia.

At 11:05 PM the Pharmacy Anticoagulation Service noted in the progress notes that the PTT which was scheduled for 4:00 PM was "not drawn" but was rescheduled for 8:00 PM. However, "Mr. Clark coded in the interim".

It was not until 11:05 PM on July 2, 2001, when the Heparin antidote, Protamine was finally given to Mr. Clark.

On July 3, 2001 Mr. Clark was pronounced dead. The autopsy report identified the cause of death being secondary to "intraperitoneal hemorrhage secondary to cholecystectomy". The bleed was caused by the patient being over anticoagulated.

## THE APPLICABLE STANDARD OF PRACTICE OR CARE ALLEGED

The standard of care required by all persons and/or institutions listed:

- 1. Order and/or arrange for "H&H" (hemoglobin and hematocrit) studies to be carried out at least every 6 to 8 hours post operatively.
- 2. Take and/or arrange for the taking of vital signs after patient complained of significant complaints, including complaints of diaphoresis and dizziness.
- 3. Timely notify a physician, including patient's attending cardiologist of the patient's low blood pressure readings on July 1, 2001, so that appropriate care and treatment could have been rendered.
- 4. Timely report the patient's PTT panic values to the appropriate medical staff so that the patient could be properly attended to.
- 5. Timely order a "STAT" H&H study at 11:45 AM on July 1, 2001, after it was known patient was diaphoretic and had a PTT of 106.
- 6. Recognize and diagnose the patient's internal hemorrhage, the first clinical sign of which occurred at 11:45AM when the patient was noted to be diaphoretic after moving around, having occasional PVC's, a heart rate in the 60's, a PTT of 106, as well as the physical findings and complaints noted thereafter.
- 7. Order a stat CBC after the patient presented with signs and symptoms consistent with a suspected hemorrhage which would have revealed a drop in the patient's hemoglobin and hemotocrit which would have prompted treatment including discontinuation of Heparin and the administration of blood products which would have prevented patient from suffering from a fatal bleed.
- 8. Recognize and diagnose the patient's internal hemorrhage when his systolic blood pressure was decreased and when having symptoms of lightheadness at 1:40 PM which would have warranted a stat CBC which would have revealed a drop in the hemoglobin and hemtocrit which would have prompted treatment included discontinuation of the Heparin and the administration of appropriate blood products such that the patient would not have suffered from a fatal anticoagulation bleed.

- 9. Carry out the 4:00 PM coagulation studies as requested by the Pharmacy Anticoagulation Service which would have noted an increasing PTT which would have prompted the discontinuation of the Heparin and most likely would have warranted the administration of the Heparin antidote Protamine which would have stopped the patient's fatal bleeding.
- 10. Recognize and diagnose the patient's internal hemorrhage when he had persistent complaints of episodes of dizziness and reduction in blood pressure throughout the day and evening of July 1, 2001, which would have warranted a stat CBC which would have revealed and required those items as mentioned above.
- 11. Order a STAT CBC and/or H&H at 6:50 PM on July 1, 2001, after it was known the patient's blood pressure was consistently low which would have revealed a significantly low hemoglobin which would have prompted the discontinuation of Heparin , the administration of the Heparin antidote Protamine and the administration of appropriate blood transfusions/products all of which would have prevented Mr. Clark's fatal bleeding.
- 12. Refrain from ordering/administering anticoagulant agents in excessive doses which caused patient to suffer his fatal bleed.
- 13. Refrain from starting patient's anticoagulation therapy too soon after surgery.
- 14. Timely respond to the patient's respiratory emergency.

The above mentioned hospital, physicians, medical personnel and other staff members failed to do all of the steps outlined. Had the above medical staff followed the standard of care, Mr. Clark would not have suffered his fatal hemorrhage caused by being over anticoagulant and thus would not have suffered a premature death.