

MR. CORRIGAN: No objection on the part of the State.

THE COURT: Let's proceed, gentlemen. The request is granted.

(Thereupon the following proceedings were had in the presence of the Jury, as follows:)

Thereupon the witness, MARY COWAN, resumed the witness stand and was further examined and testified as follows:

CROSS EXAMINATION (continued)

By Mr. Bailey:

MR. BAILEY: Your Honor, I have a series of photographs here that I would like to have marked as Defense Exhibits.

(Defendant's Exhibits A through M, inclusive, were marked for identification by the reporter.)

THE COURT: Please proceed, counselor.

Q Miss Cowan, in addition to the things that you already described, when you examined these trousers did you find anything else unusual about them?

A A tear below the right side pocket, which is outside of the pocket lining itself, and just beyond the seam --

MR. SPELLACY: Keep your voice up.

A I am sorry. It does not involve the pocket, the lining, but the material fabric itself here, I think as I remember it, it ran down three and a half inches.

Q That was there when you first looked at the trousers?

A Yes.

Q Do you know whether any information was obtained from the Defendant in the course of the investigation as to whether or not that tear had been in existence prior to the incident resulting in Marilyn Sheppard's death?

A No, that is not in my realm of knowledge.

Q In other words, you were given no information in this regard?

A No.

Q And did you have any information as to what or which of the exhibits that you examined in the course of your examination were on the Defendant's person prior to the incident which resulted in Marilyn's death?

A Only that they were given to Dr. Gerber and his representative.

Q Miss Cowan, if a fabric absorbs blood and that blood is later hemolized by immersion in water, would you or would

you not expect to find an outline of the stain even though it had been hemolized?

A This depends upon the stain, the character of the stain, and I believe how dry it is. I have seen it both ways.

Q So that you may or may not get this?

A That is correct.

Q But if the water goes under the fabric before the blood you will in no case get an outline, isn't that true, that is to say, the blood will diffuse immediately?

A You will not get a dark outline.

Q In your examination of the trousers, did you look for such an outline on the knee stain?

A Yes.

Q And what did you find?

A I did not find a definite outline.

Q Did you find any outline, any dark outline?

A Not a dark outline, no.

Q Did you find any outline, however vague?

A Yes, there was -- I could distinguish this dark center with diffused edges.

Q Are you able to see that today in these trousers?

A I would require good lighting to see it.

Q Then I take it it was rather faint?

A Yes, and also, at the time, I could feel a definite

difference in the stiffness between the center of the stain and the edge.

THE COURT: I am sorry, your voice is trailing off, Miss Cowan.

A I am sorry. I could feel a definite stiffness in the center as contrasted with the outer edges of the stain.

THE COURT: Now please keep your voice up, Miss Cowan. I know it is an effort for you, but the Jury must hear you.

Please continue, counselor.

Q Miss Cowan, you testified that the fabric is composed of rayon and nylon, is that true?

A It is mostly rayon. Very little nylon.

Q Would that be acetate rayon or viscose rayon?

A Some of it is acetate, and some of the fibers are coated and some are uncoated.

Q The uncoated fibers then would be more absorbent than the others?

A That is correct.

Q Is any of the material that you found in those trousers viscose rayon?

A I don't recall.

Q Viscose rayon would be much more absorbent than the acetate type of rayon, would it not?

A Yes.

Q Now, did you find something in the pockets of these trousers?

A Yes.

Q What?

A Sand.

Q In how many pockets did you find that?

A In all but the left side pocket, it was one of the left pockets, the left side pocket I think.

Q Did you find sand anywhere else in the trousers?

A In the cuffs.

Q Did you make any comparison between the sand you found and any other sand?

A No.

Q Then had you been given some information as to the possible source of this sand?

A That it was lake sand in all probability, lake sand.

Q And you assumed it to be, is that correct?

A Yes.

Q Now, if upon a fabric such as cotton for instance, a cotton sheet, there is a spot of blood, dried or drying, and a wet cloth is placed against it, the wet cloth with some hard object behind it, consistent with the knee on a pair of wet pants, what would happen to that spot of blood?

A I don't believe I would like to make a categorical statement, because there are so many factors involved there as to how dry the stain was, as to how much water was on the material, how much pressure. I wouldn't want to make a categorical statement.

Q Do you have any opinion as to what differences might occur as to the spot of blood with reference to the appearance that it had had before the application of the wet knee?

A It would be altered.

Q Now, it would be thereafter a diffusion of that blood?

A This depends on how much water and again how dry the stain was.

Q Assume this pair of trousers with the material that you have already examined and discerned with the amount of water likely to be carried from Lake Erie up to Marilyn Sheppard's bedroom, say 50 or 100 yards, the amount of water that would remain after walking or trotting that distance, and assume the pressure you might expect from a 170 or 180 pound man leaning his knee against the side of the bed; now, bringing those factors into consideration, and assuming a blood spot already on the sheet of that bed with the mattress and mattress cover behind it, what would happen the the blood spot, if you know?

MR. SPELLACY: Objection.

THE COURT: Sustained.

Speculative.

Q I will ask you to examine State's Exhibit 28, with particular reference to the stain on the side of the sheet, that is to say, on the edge nearest to what was the east wall of that room.

Now, having examined that can you tell us whether or not you examined it when it got to the laboratory or whether you saw such a stain?

A Not definite conclusion except all of the stains were examined for the general pattern.

Q Did you make some effort at some time to discover where the blood on the Defendant's knee might have come from?

A No.

Q You never did. Did you at any time notice, either pictorially, on direct examination the stain at which I am now pointing my finger, and I am holding up Exhibit 28, the only large stain on the side of the mattress?

A I have no definite recollection.

Q Can you tell us whether or not that is a hemolized blood stain?

A Not from the photograph.

Q From looking on the photograph and assuming that it may

be, can you tell us whether or not the application of a wet knee in the center of that would cause the darkest section of the blood stain to be left around the perimeter rather than the center?

A It would not appear to me possible.

Q You say that is not possible?

A It would not seem possible.

Q All right. Tell the Jury why.

A Because you can see on the outer edges of this stain, you can see --

THE COURT: Keep your voice up,

Miss Cowan, please.

A I am sorry. On the outer edges of this stain on the photograph you can see dark areas.

Q These would appear to be definite staining. There is no indication of absence -- there is indication of absence here as though these were pattern stains, but this is merely from looking at the photograph. I have no definite recollection.

Q You have no recollection of looking at that sheet and visualizing a stain such as you see here?

A I have --

MR. SPELLACY: Objection. There are three or four questions before the witness.

A I have recollection of looking at the sheet. I have no recollection at this time of that particular stain.

Q Did you examine any hemolized blood spots on that sheet on which there was no urine content?

A Not to my recollection, no.

Q Did you do any experiments with blood on a sheet and the application of a wet fabric, in order to see what would happen to the blood stain?

A No.

Q Do you have the sheet?

A I -- if it is not in evidence, I do not have it under my control.

Q Do you know where it is?

A No.

MR. BAILEY: I think that it is not in evidence. Am I correct? I know of no sheet that has been offered in evidence.

Q And you don't know where it is?

A Not at this moment.

Q Then I take it that in none of your investigations did you make any comparisons between the Defendant's knee and the spot you see on this sheet here?

A No direct comparison, no.

Q Miss Cowan, you examined a sliver of something that you

were satisfied was fingernail polish, is that true?

A Yes.

Q Did you do any chemical tests to determine its components, that is to say, its make-up chemically?

A Only from a tiny flake that had broken off of it, I determined that it soluble in ethylacetate.

Q What does that tell us?

A This is a common solvent for nail polish.

Q Wouldn't it also dissolve in any commercial lacquer?

A Not any commercial lacquer, but some commercial lacquers, yes.

Q You say it was consistent with, as you heard from Dr. Adelson, the toe nail polish of the decedent?

A Yes.

Q Did you ever examine any of the bottles of nail polish which were available in the house on the morning of the murder?

A Yes -- well -- the common, the polish, the two polishes that were reputed to be used by Marilyn Sheppard were Cherry in the Snow and Bachelor Carnation, I believe.

Q You say reputed to be; I asked you whether or not you examined any actual nail polish which was found in the home?

A Not to my recollection.

Q Do you know whether or not there were bottles of nail

polish in that home on the 4th day of July, 1954?

A I have no direct knowledge.

Q Did anyone ever bring you any for your examination?

A I have a recollection that they did.

Q Do you have any recollection as to what you did with the bottles that were brought to you?

A No.

Q Did you ever observe the feet of Marilyn Sheppard?

A No.

Q Had her body been interred prior to the discovery of the flake of what you believe to be nail polish?

A The body had left by the time I received it, I believe.

I --

Q Excuse me, go ahead.

A I am not sure of this. I did check with Dr. Adelson, and this was the extent of my checking the comparison.

Q Was an effort made to match the chip you found with the toe nails of the body in order to determine whether or not it could have come from those toe nails?

A No.

Q So you have no knowledge as to whether or not any of the toe nail polish was even chipped or flaked, is that true?

A Not direct knowledge.

Q Well, your only comparison reference, I take it, was that the color was consistent?

A Yes.

Q Was there anything about the striations that you viewed on the back of this flake that indicated whether it came from a fingernail or from a toe nail?

A There were definite ridges that is more consistent with a toe nail.

Q Why do you say that?

A This is true because you usually have larger ridges --

THE COURT: I can't hear you.

A I am sorry. It is usual that there are deeper ridges on a toe nail.

Q Do you have the flake available for microscopic examination now?

A No, it was introduced into the evidence.

Q Then we have it in the courtroom?

A When it was shown, the packet was shown to me on the witness stand, it was not present, but it was present when it was brought down.

Q Well, have you seen it marked as an exhibit since you have got here, unless I have overlooked it?

A No, no one has asked me to look at it here.

Q As far as you know, it is available somewhere, though?

MR. SPELLACY: Objection.

MR. BAILEY: Well, if it has been introduced, your Honor, I am not aware of it, a flake of nail polish. Perhaps it has been.

THE COURT: May I see counselors, please?

(Thereupon Court and counsel conferred at the bench out of the hearing of the Jury.)

Q Miss Cowan, when you said it was brought into Court, you had reference to the trial in 1954?

A Yes, sir.

Q You haven't seen it recently?

A No.

Q Outside of the one little chip that came off of this flake, no other chemical tests were performed?

A That's correct.

Q Were any samples of fingernail polish, that is to say, fingernail polish that had dried on fingers, or fingernail polish from bottles coming from a source other than the Sheppard home, ever submitted to you for examination?

A Submitted?

Q Submitted to you for examination?

A Would you restate the question?

Q Yes, certainly. Were any items of fingernail polish,

in bottles or in dried form, which did not come from the Sheppard home or from the body of the decedent, ever submitted to you for comparison examination?

A You said that did not come from the Sheppard home?

Q Yes.

A And submitted to me?

Q Yes.

A No.

Q Did you ever take a blood sample of the Defendant to see what kind of blood he had?

A No.

Q Was one taken to your knowledge by anyone connected with the State or the investigation?

A No.

Q At the time of the first trial did you in fact know what kind of blood the Defendant had?

A No.

Q Have you found out since?

A Not directly.

Q In other words, no representative of your office has ever made such an examination?

A No.

Q Now, you did test Marilyn Sheppard's blood; did you test the blood of anyone else for type or group?

A In connection with this case?

Q Yes.

A Not that I have any recollection.

Q How many times did you go to the so-called murder room to make investigations of the physical evidence remaining?

A Three.

Q Tell us what you did by way of examination of that room?

A Examination of the room?

Q Yes.

A Merely visual inspection in the room itself.

Q What portions of the room did you visually inspect?

A The walls and -- the walls on all sides, and that was -- the other bed.

Q What did you find on the other bed?

A There was spatter type staining, small spraying stain on the other bed.

Q Were there any pollywog drops indicating a direction of travel?

A Yes.

Q How about on the walls, did you find any such drops on the walls?

A There were in the -- on the west wall, there were some streak type stains. This was not in my realm, sir, of

describing the stains.

Q When you say this isn't in your realm, would you tell us what you mean?

A This was in the realm of the police investigating the scene.

Q You mean Mr. Dombrowski?

A And before that the Bay Village Police.

Q Were there any other blood experts on the scene that you know of?

A Dombrowski and -- Dombrowski.

Q Did you and Mr. Dombrowski or any of his assistants ever have any arrangement or agreement as to who would undertake the phase of examination and photographing of the blood spatter about the room?

A It is generally understood we work together. We do not sit down and say who is going to do what. But they have the experience in the -- they have more experience in the investigation of scenes.

Q You say it is generally understood; was there any specific understanding in this case that this would be Dombrowski's task?

A No.

Q Did you ever cause the blood spatter on the walls and the beds to be photographed?

A Those were done at the direction of Dombrowski and Poelking.

Q Did Dombrowski and Poelking to your knowledge have all of the walls and the bed photographed of the blood spatter?

A Yes.

Q Do you know that he testified he did not?

MR. SPELLACY: Objection.

THE COURT: Sustained.

Q I show you defense Exhibit M and ask you if you recognize the doors depicted therein?

A I do.

THE COURT: Counselor, I didn't hear your question. Is it defense exhibit what?

MR. BAILEY: Defendant's Exhibit M, your Honor.

THE COURT: Thank you.

Q And does that picture fairly represent the bedroom door and wardrobe door on the east wall of Marilyn Sheppard's bedroom?

A Yes.

Q Is the blood spatter or pattern that you observe in that photograph fairly representative of what you saw when you examined the room?

A Yes.

Q Miss Cowan, did you ever take any of these blood spots and analyze them for blood grouping or other information?

A No.

Q Why was that?

A Because they are representative of a pattern of throw-off of a weapon, throw-off from the weapon, and the general pattern is the important factor here, and it was rather obvious that that was what this was.

Q In other words, you could tell by looking at that blood that all of it was Marilyn Sheppard's?

A No.

Q But you made no examination to determine whether or not that was in fact the case, true?

A True.

Q Now, I ask you to look at this photograph which is Defense Exhibit J, depicting a pillow, and ask you if that fairly represents the pillow on the bed next to Marilyn Sheppard's bed when you saw it after the murder had been committed, and the blood spatter indicated thereon?

A It could be.

Q Well, does that compare with your recollection of what you saw?

A That there were blood spatters of this type there.

Q And those spatters include some that are generally round and some that are elongated, indicating an angle, and/or a velocity?

A Yes.

Q This photograph of this same bed showing the top sheet folded back with blood spatter on both the top and bottom sheets --

THE COURT: Exhibit what, counselor?

MR. BAILEY: I am sorry, your Honor.

It is Defense Exhibit I.

THE COURT: Will you put the question, counselor.

MR. BAILEY: Yes.

THE COURT: Thank you.

Q Does that fairly represent the upper portion of the bed next to Marilyn showing the top sheet folded back and blood spatter on both the top and bottom?

A As I recall, the pattern was similar to this. There is no identification.

THE COURT: You are letting your voice trail off, Miss Cowan. The Jury cannot hear you.

Q Miss Cowan, did you examine the area on the east wall that you just looked at in the photograph where the several

blood spots were indicated for the shape and size of the spots?

A The general pattern, yes.

Q I am talking now about the individual spots. Did you examine any of the spots of blood in order to determine if possible the direction of travel and the velocity of travel as they struck the door?

A Experience has shown us that in this type of staining --

Q Miss Cowan, my question was did you make such an examination? Will you please answer that?

A No.

Q You did not, all right. Now, it is possible, is it not, in some cases when examining blood spots to make a determination by the pollywog, as you indicated on the watch, and by other indications can determine the velocity and/or the angle at which the spot strikes the surface?

A Not with any exactness.

Q Is it possible to make some determination?

A Of a general pattern, yes.

Q Did you give us an opinion this morning with reference to the watch of Dr. Sam Sheppard which is marked as Exhibit 24, and with reference to a small spot with a tail on it appearing on the rim of the watch just above the figure 11 or where the figure 11 should be, that you could show us the

direction of travel of that spot as it struck the watch, based on the tail that you saw?

A I meant to infer that this is typical of this reaction, but the general pattern of staining was more important.

Q This was the only spot you found with the tail?

A No. This is the only one that shows in the photograph.

Q Are there others that you did not cause to be photographed?

A Yes.

Q Where were they?

A In the lateral part of the band there is one that I believe still shows in the black and white photograph.

Q Do you know where that photograph is?

A It would be an exhibit.

Q All right. Are these the only two blood spots on the watch that had the little tail on them indicating a direction?

A No.

Q Are there more that you didn't photograph or that you did photograph?

A Not every blood spatter was photographed.

Q If a blood spatter is round and has a smooth circumference to it, that is an indication of low velocity at the time it strikes, is it not, generally?

A Generally.

Q If a blood spot is round and has jagged edges around it, that is an indication of greater velocity at the time of incidence or striking, true?

A Yes.

Q And the more jagged the edge, generally the greater the velocity, true?

A Yes.

Q If the velocity is sufficient, the blood spot is likely to break up into smaller globules of spots, true?

A True.

Q Where a large spot of blood, and by large I have in mind something between a quarter and a half inch in diameter, where a large spot of blood hits a vertical surface such as the wardrobe door, and does not run down but runs off at an angle, there is an indication there as to the angle at which it hit the surface, true?

A This depends, too, on the weight of the drop itself, the size of the drop and the weight of the drop.

Q Understood, but in order for the trail to go off at an angle, other than the vertical, it must have struck at an angle other than vertical, isn't that true?

A Exactly 90 degrees, yes --

Q In order to get a direction of trail-off from a blood

spot on a vertical flat surface, that is other than straight down, it is necessary for that blood spot to hit the surface at something other than a straight down angle, that is my question.

A Unless something disturbed it.

Q All right, assuming that nothing disturbed it, that would be true?

A Yes.

Q Did you find any blood spots on the wardrobe door that had such characteristics, that is to say, a flow, or a tail trailing off but not straight down?

A Not a tail, no.

Q Any indication of flow from the original spot?

A There was one that didn't follow the rest of the general pattern.

Q Miss Cowan, I show you a close-up of the door depicted in defense Exhibit M, showing a large spot of blood and a somewhat smaller spot underneath it, this being a panel of the wardrobe door, and I now refer you to Defense Exhibit D, and ask you whether or not you recognize that spot?

A Yes.

Q Now, I show you a greater enlargement, Defense Exhibit B, showing you also at the same time Defense Exhibits M and D, and ask you whether or not that is not the same spot?

A Yes.

THE COURT: Counselor, is Exhibit B an enlargement of Exhibit D?

MR. BAILEY: Yes, your Honor. Exhibit D is a close-up of Exhibit M, and B is a close-up of M or D as you will have it.

I now show the witness Defense Exhibit A and ask her whether or not that is also an enlargement of the spot shown in Exhibit M and again in Exhibit D, being the lower of the two large spots.

THE WITNESS: Yes.

Q Now, did you examine those spots, Miss Cowan?

A Visually only.

Q And were you able to make a determination as to whether those spots were deposited on that door by weapon throw-off, or in some other manner?

A They were consistent with weapon throw-off, and might have been a composite or clotting blood.

Q How large a drop can a weapon, any metallic weapon, carry before it will break up into smaller drops as it is thrown off, is there a limit?

A This is in the realm of conjecture.

Q Have you ever made experiments to determine whether or

not a drop that large could possibly be thrown off by a swinging weapon?

A Not myself, no.

Q Have you made studies of literature where other people have made such tests?

A The only result of --

Q Have you made studies?

A -- of experience.

Q Have you made studies of literature where other people have made such tests?

A No.

Q Miss Cowan, you said you gave these trousers a luminol test and some small spots gave a reaction?

A This is correct.

Q What compounds, chemicals or other items other than blood will cause a luminol reaction, if any?

A Copper salts. This principally, copper salts. Some people say rust.

Q Any other metals?

A I don't recall any other metals right now. Copper salts is the principal one.

Q Ordinarily I believe you said that when you test for blood with benzidine, you will get a reaction if blood is present?

A Ordinarily, yes.

Q If the quantity of blood present is too small or slight, may benzidine not produce a reaction?

A Yes.

Q How small a quantity of blood will react with benzidine?

A This depends on the technique used.

Q Well, according to your techniques, Miss Cowan?

A According to our technique, again, this depends upon how fresh the blood is and the condition of it.

Q Blood that is less than 48 hours old?

A A tiny fleck would be expected under ordinary conditions to give a reaction.

Q As I understand it, these trousers do not react to benzidine anyplace but on the knee, is that true?

A Yes.

Q Did you examine the leather belt that the Defendant was wearing at the time he was found?

A Yes.

Q What did you find?

A I found no evidence of staining or of mutilation.

Q Did you examine the left rear pocket with the button on it where the brown stain is seen? I am talking about the pocket itself, from the inside?

A It is peach colored, I call it, peach colored stain.

Q Peach colored, if you will. Did you examine that?

A No, I did examine it under ultra-violet light.

Q You did not?

A I examined it under ultra-violet light.

Q You did?

A Yes.

Q Did you examine this wallet, Exhibit 32?

A Only visually.

Q Did you find the peach color stain to be consistent with the dye that is in the leather of the wallet?

A Yes.

Q Is this wallet made of leather?

A Yes, I believe so.

Q Did you examine it?

A Only visually.

Q And did you examine the contents of the wallet and the money?

A Visually.

Q What was the condition when you first saw it?

A They were dry when I received them.

Q In examining these card contents, did you form an opinion as to whether or not they had at some time been soaked in water?

A Yes, apparently they had.

Q Now, the wallet was not in the pants when you first saw them?

A No.

Q Was the wallet examined chemically?

A No.

Q You made an examination of this jacket of course?

A Visually.

Q Chemically?

A No.

Q You never looked for blood on this jacket?

A No.

Q Was there some reason for that, Miss Cowan?

A It was not submitted to me for testing.

Q That is a good reason. You examined this watch and you noted of course that the band was broken?

A Yes.

Q And that was broke when you first saw it, wasn't it?

A It was.

Q Now, did you examine the break in the band to determine whether or not blood was present where it could only have gotten after the break was accomplished?

A The band was examined generally, in general staining.

Q Let me rephrase the question to make it clear. As we examine the watch, there is a portion of the bracelet where

the under link is broken away from the upper link or over link, and a hole appears where there was some sort of rivet or fastener, true?

A Yes.

Q Was a specific examination made in that hole to determine whether or not blood was placed in the watch after the watch was broken or the band was broken?

A No.

Q You examined the watch for fingerprints?

A Yes, or any pattern print.

Q Did you ever submit it to someone who was qualified to examine for fingerprints, that is to say, a fingerprint expert?

A It is general procedure -- no.

Q You did not. In 1954 did you consider yourself to be a qualified fingerprint expert?

A Not in identifying fingerprints, but in recognized pattern imprints, yes.

Q Did you use any dusting powder to try and get a print off this watch?

A No.

Q Off the ring?

A No.

Q Off the key chain or the attendant keys?

A No.

Q Would you say that dusting powder would be the best method to lift or discover a latent print on those surfaces?

A Any latent print would show up under the indirect lighting under the stereomicroscope, and this would be an indication --

Q Would you agree that dusting powder would have been a better method to make this test for fingerprints?

A No.

Q To your knowledge was this watch ever examined to determine the cause of stoppage?

A It was taken to a watch repairman.

Q Beatty's by chance?

A Yes.

Q Did you get a report from Beatty's as to their findings as to the interior of this watch, its mechanical condition, any impact that may be shown?

A The report I believe went to Dr. Gerber.

Q Well, do you have any idea where that report is?

A I would assume that it was with the case.

Q Then you have no personal knowledge of where it might be today, I take it, if your assumption proves incorrect?

A I recollect the last time I looked at the case there was a communication, but I do not know the contents of it.

Q Was the watch running again by the time you got it, or was it stopped at 4:15, or was it stopped at some other time?

A I do not recollect. I know --

Q Would it help you if you glanced at the photograph you took of it to see whether it's still set for 4:15?

A No, I know it does not say 4:15.

Q Then it was running some --

A As I recall, the watch would run a short time and stop, but I can't tell you how long.

Q The watch of Marilyn Sheppard was discovered, so the evidence has indicated, with a time I believe 10 after three, and you photographed that watch?

A It was photographed by Mr. Johnson.

Q Do you know whether or not that watch ever started running again?

A Yes, it did.

Q Was it examined in order to determine whether or not it stopped at 10 past three for some reason?

A It was examined at the same time as the other.

Q And I take it the report of Marilyn's watch is somewhere with the report of Sam's watch?

A Yes.

Q You last saw them together?

A I saw a single communication.

Q A single report on both watches?

A A single communication. I cannot tell you the contents.

Q I show you a ring, Exhibit 25, and ask you whether or not you made an examination of this ring under the microscope?

A It was examined under the stereomicroscope.

Q By you?

A Yes.

Q I point to a white substance which is caught beyond the onyx setting and the gold emblem of the ring and ask you if you noticed that in 1954?

A Yes.

Q Did you determine the nature of the substance?

A No.

Q Did you ever make an effort to?

A No.

Q Did you know or had you heard that the Defendant claimed he had this ring on at the time he was assaulted by the intruder?

A Rephrase the question, restate the question, please.

Q Did you know or had you heard at the time you examined this ring that the Defendant claimed to have been wearing it

at the time he was assaulted?

A At the time I examined it, I am not certain that I had heard the story.

Q You heard it since?

A The white material was very apparent that it had been there for some time.

Q Why do you say that?

A Because it was -- because it had surface dirt on top of it.

Q From examination of that material now can you tell visually whether that is consistent with the kind of plaster used in casts?

A I could at the time. I certainly can't tell by looking at it visually here.

Q What about the break in the onyx setting, did you notice that or make some record of it?

A Yes.

Q Did you bring it to anyone's attention after you noticed it by way of any report, orally or written?

A Yes.

Q Did you seek any information as to whether or not it was broken before the murder occurred?

A Did I make -- wait a minute, I am sorry?

Q Did you seek information as to whether or not the onyx

setting in which the gold emblem is set, on Exhibit 25, was fractured prior to the murder?

A It is not in my province to determine this. The proper authorities were told.

Q I take it your answer is no, you did not determine that?

A I did not personally.

Q And you examined this also for prints?

A Yes.

Q At the time it was given to you, these things were all wrapped up in tissue paper of some kind?

A In cleansing tissue.

Q Were you informed --

A Individually.

Q Were you informed by anyone that the watch and the ring had already been handled by two young boys before they were ever given to the detectives?

MR. SPELLACY: Objection.

THE COURT: Sustained. Oh, she may answer. Overruled. She may answer the question.

Do you understand the question, please?

A Yes. When Dr. Gerber showed me this, these, he said "I don't know, they have not been examined by fingerprint people, but they were handled before they were given to me."

Q Thank you. Were all these keys examined for fingerprints?

A Yes.

Q On all of the items that you examined, you found nothing?

A That's right.

Q No indication of any prints?

A No.

Q And no smudging?

A Generalized dirt and -- smudging, what do you mean by smudging?

Q I mean this, for the record I just took my thumb and wiped it across the key.

A Bruised, and, shall we say--

Q Well, strike the question and let me put it this way, Miss Cowan.

What I am seeking to determine is there any indication from your examination from any of these flat smooth surfaces whether or not it appeared they had been deliberately wiped to remove fingerprints?

A Oh, no, sir.

Q Were you from your examination of the murder room able to place the probable position of the assailant who was swinging a weapon at Marilyn Sheppard's head?

A This was in the matter of general discussion --

Q I would prefer not to get into general discussion.

I want to know whether or not you as a scientist were able to come to any conclusion in that regard from what you saw?

A Yes.

Q Where in your opinion was the murderer standing swinging the weapon?

A (No response.)

Q Let me see if I can help you. Without reference to that, can you just tell us with oral description?

A It would be at the northeast, I believe, and of the -- not and, but part in angle with this corner of the room, as it is shown here.

Q Is what you are saying consistent with placing the assailant at or near the foot of the bed on the side nearest the door?

A Not as far down as the foot, I think.

Q Well, closer to the foot than the center?

A Yes.

Q Did you arrive at this conclusion because of an absence of blood spatter in an area presumably behind the body of the murderer?

A Yes, this corner of the room, the northeast corner.

Q So you were able to satisfy yourself from what you saw

that assuming this is the bed, and I am standing in the area of the foot, and the decedent's head is up there, that the murderer stood approximately in this relation to the body as the weapon was swung?

A Agreed.

Q Did you make an effort to determine from your examinations and evaluations whether or not the assailant was right or lefthanded?

A This is only conjectural.

Q Did you make an effort, did you make an effort?

A This is a dubious --

Q Did you make an effort, just yes or no?

A No.

Q You never made an effort.

MR. BAILEY: May I have projected --

THE COURT: Counselor, are you now going to examine from what has been previously referred to as Court's Exhibit 1?

MR. BAILEY: Court's Exhibit 1, your Honor, yes.

THE COURT: Then this exhibit, if you are going to examine from it, will now be referred to as Defense Exhibit, counselor.

MR. BAILEY: All right. May it be

marked as Defense Exhibit N?

(Court's Exhibit 1 was remarked for
identification as Defendant's Exhibit N.)

Q Miss Cowan, I ask you to examine Defense Exhibit N and
tell us whether or not that is a photograph of a line drawing
representing Marilyn Sheppard's bedroom which was made by
the Coroner's office, do you recognize that?

A It was made for the Coroner's office, I believe.

Q Okay; you have seen it before?

A Yes.

Q Are you familiar with it?

A Not too -- yes, I am familiar with it, but since I did
not make it --

Q From your experience with it and from looking at it
now, does it fairly represent the layout of Marilyn
Sheppard's bedroom?

A It does.

Q Would you be kind enough to project it for us, so I
don't ruin your machine?

MR. SPELLACY: Are you offering it in
evidence?

MR. BAILEY: I thought it was
agreed it could be used to illustrate the testimony.
I don't care whether it is received as an exhibit or

not, since we don't have the original.

THE COURT: Please proceed,
gentlemen.

(Thereupon the exhibit referred to was
projected on the projection screen.)

Q Now, Miss Cowan, would you step to the screen, please.
First, would you point out to the Jury the closet door
that we examined in Defense Exhibit M, showing the blood
spots.

THE COURT: Keep your voice up,
counselor.

MR. BAILEY: Yes, your Honor.

Q And also the main door of the bedroom which is folded
back in the photograph and also contains blood spatter.
You are now pointing to that.

Did you say in your opinion this was throw-off from
the weapon on the back swing?

A Yes.

Q Now, would you point out the area in which no blood
spatter was found and which you earlier described as the
northeast corner of the room?

A (Witness indicates.)

Q Now would you point out the approximate place on the
bed where the head of Marilyn Sheppard was found, according

to what you have seen in the picture, just for reference.

A I would have to do this -- it would be merely from the photograph, because I was not present and I have no firsthand knowledge of this.

Q Using this Exhibit 28 as a reference.

A (Witness indicates.)

Q Just slightly south of the center of the bed?

A Yes.

Q Now, would you point to the place that you just told me in your opinion the murderer was standing swinging the weapon?

A (Indicating).

Q And you have designated a spot --

A This is --

Q Approximately.

A You understand this is only approximate, and this is -- I am not an expert on this.

MR. SPELLACY: I am sorry, I cannot hear you.

A I said I am not an expert on this type of thing.

Q But this opinion was predicated upon the absence of blood spatter in this area, correct?

A Correct.

Q So if Marilyn Sheppard's head was here, the murderer

was standing between Marilyn's head and the northeast corner of the room, thus blanking out the spatter, and the weapon throw-off was over here on the door to the south of the blanked out area?

A No, sir.

Q The bulk of it?

A Yes.

Q And there was no considerable amount of blood thrown up in this area (indicating)?

A That's right.

Q Wouldn't you say that that would have to be a left-handed person?

A No.

Q Why not, tell us?

A Because there is no difference between a backhand on the right, or this kind of motion with the left.

Q Then would you say that the blows were struck by either someone swinging with a lefthand forehand, or the righthand backhand, because of the location of the throw-off?

A It would seem so.

MR. BAILEY:

That is all. Thank you.

THE COURT:

May I see counselors,

please?

(Thereupon counsel and Court conferred at

the Court's bench out of the hearing of the Jury.)

THE COURT: Ladies and gentlemen of the Jury, I have been apprised by counselors that further examination of Miss Cowan is anticipated, and we will have our recess at this time.

While you are away on your recess, you will bear in mind the instructions given on each occasion when you depart from this room. You shall not discuss this case or what you have heard of it amongst yourselves, nor permit anyone else to discuss it with you, not permit yourselves to overhear anything that relates to this case by any means or communication.

We will have our afternoon recess.

(Thereupon a recess was had.)

THE COURT: Counselor, please proceed.

By Mr. Bailey:

Q Miss Cowan, earlier we were examining some photographs of the two doors that blanketed the south part of the east wall, that is, the folded back entrance door, and the closet door.

A Yes.

Q You examined those as part of your investigations after the murder was committed, did you not?

A Yes, visually.

Q I think you said some of these photographs do reflect some of the blood spatter that was apparent?

A Yes.

Q Were you able to tell by examining these drops of blood that were on the wardrobe door whether they were high velocity or low velocity as they struck?

A I did not make such a study.

Q Would it be possible by examination to render an opinion on that point whether or not at the time they struck they were traveling fast or not traveling too fast?

A You take the general pattern, but this is not in my realm of investigation.

Q In other words, this is not something which your experience would permit you to have an opinion on?

A No.

Q Okay. Do you know what copper sulfate is, Miss Cowan?

A Yes.

Q Do you know whether or not copper sulfate is a chemical commonly found in medical laboratories and hospitals and clinics?

A Yes, sir.

Q If copper sulfate is spattered upon or stained on a piece of fabric such as the trousers here, is it apt to remain despite laundry?

THE COURT: Counselor, I am having a difficult time hearing you.

MR. BAILEY: I am sorry, your Honor.

THE COURT: And the Jury is having a difficult time hearing both of you.

MR. BAILEY: Okay.

Q Is copper sulfate such a chemical as is likely to remain in a fabric despite one or more launderings, or is it easily washed out?

A This again, as with the blood, depends upon the fabric.

Q Would copper sulfate give a reaction to a luminol spray?

A Yes.

MR. BAILEY: That is all. Thank you very much.

THE COURT: Counselor Spellacy?

REDIRECT EXAMINATION

By Mr. Spellacy:

Q Miss Cowan, this morning on cross examination you mentioned in answer to a question by Mr. Bailey that there were