

1 a moment. No further questions of this witness.

2 MR. MYERS: Thank you, Major Seboe. Come down.

3 We call John Barron to the stand, please.

4 JOHN BARRON, being duly sworn, testified as fol-
5 lows:

6 DIRECT EXAMINATION BY MR. MYERS.

7 Q Mr. Barron, by whom are you employed?

8 A South Carolina Law Enforcement Division.

9 Q How long have you been with SLED?

10 A Just over 9 years.

11 Q In what capacity are you employed with SLED?

12 A I'm employed in the chemistry laboratory at SLED and my
13 specific duty or job is to receive evidence from law enforce-
14 ment agencies throughout The State of South Carolina, to ex-
15 amine such evidence for the identification and comparison of
16 it if possible by logical evidence such as blood, semen and
17 hair.

18 Q And what is your background in that area?

19 A I have a Bachelor of Science Degree in Microbiology
20 from Clemson University. My first year at SLED was spent un-
21 der direct training of Lt. Earl Wells who is also an expert
22 in this area. After a while I was able to attend a few vari-
23 ous training seminars---

24 MR. ROGERSON: May it please The Court. In the
25 interest of economy, we'll stipulate to this witness's quali-

1 fications as a forensic chemist.

2 MR. MYERS: We move to have him declared an expert
3 witness in this field based on the experience, training and
4 background.

5 THE COURT: All right, sir. Go ahead.

6 Q Now, Major Barron, how many times have you testified in
7 court relating to your tests in criminal cases?

8 A I would have to guess. I'd say around a hundred or a
9 hundred and fifty times.

10 Q All right, sir. Now I'd like to ask you, were you de-
11 livered some evidence from the Lexington County Sheriff's De-
12 partment in regard to a rape examination, the subject being
13 Sheryl Clark?

14 A Yes, sir.

15 Q I'd like to ask you, please, sir, first of all, I'd
16 like to show you what's been marked as State's Exhibit No. 4
17 which is a pair of panties. Would you examine those, please,
18 sir.

19 A Yes, sir, I received these.

20 Q All right, sir, did you run any kind of test on those
21 underwear?

22 A Yes, sir.

23 Q And what was the purpose of your test?

24 A To determine if there was any stains on here that could
25 be blood or semen or if there was any hair on there. If so,

1 did it belong to the victim or to the subject.

2 Q And what, if anything, were you able to find in regard
3 to your test?

4 A I found on this pair of panties there were two stains
5 which identified as semen. And also from that point I de-
6 termined -- I attempted to determine what blood group the
7 semen donor had.

8 Q Could you make any determination?

9 A Yes, sir.

10 Q Tell the jury other than finding semen, what else you
11 were able to determine as to blood.

12 A I was able to determine that the person who donated
13 the semen, put the semen on those pair of panties, was group
14 O.

15 Q Group O?

16 A Yes, sir.

17 Q And what else, if anything, could you tell about this
18 person who donated that semen, put the semen on those panties,
19 what else could you tell about his blood other than group O.

20 A That's all.

21 Q All right, sir. Now I'd like to ask you, please, too,
22 were you given a vile of the victim's blood?

23 A Yes, sir.

24 Q And did you try to group or find out what type of blood
25 she had?

1 A Yes, sir, I did. She was group A.

2 Q Group A: And also I'd like to ask you if you would ex-
3 plain to the jury what do you mean by group O and group A
4 blood and could you tell anything else other than just the
5 group, any particular characteristics about the particular
6 blood?

7 A Well, first of all, when we're talking about group A
8 and group O blood, we're referring to the most common blood
9 grouping system which is the fact that everybody falls into
10 one of four categories. It's either group A, group O, group
11 AB or group B. When we're dealing with semen identification,
12 we can also test the semen to determine if there's any blood
13 groups in the semen. This can be done because about 80% of
14 the population are what we call secretors and they will se-
15 crete their blood factor and other body fluids besides their
16 blood and because of that fact, we are able to run tests and
17 determine what blood group another body stain could be. And
18 this is very easily done with semen. In this case the seminal
19 stains contain the blood factors which are consistent with
20 blood group O. So therefore we could say that this semen
21 came from an individual who had blood group O, and of course,
22 he had to be a secretor or else it would not have shown up.

23 Q All right, sir. Now on January 20 of 1983 would you
24 tell us whether or not you took certain samples from the body
25 of Perry Renard Mitchell?

1 A Yes, sir, I did.

2 Q And---

3 A I took a blood sample and saliva sample and a hair sam-
4 ple.

5 Q Now what did you determine as to his blood sample that
6 you took from him?

7 A I determined that he was a group O.

8 Q Group O?

9 A Yes, sir.

10 Q And why did you take a saliva sample from him?

11 A Well, a saliva sample is another body fluid which if a
12 person is a secretor will also be found there. It's much
13 easier to collect than a semen sample. That is what we used
14 to determine whether or not he is a secretor, and after run-
15 ning his saliva, I found that he is a secretor and therefore
16 I would expect to find his blood type in his semen also.

17 Q All right, sir. Now by taking his blood and saliva and
18 running your test on it how did those samples from his body
19 compare with the semen samples that you took off the panties?

20 A They were the same.

21 Q And you said you took some hair from him. What, if any-
22 thing did you do with the hair? Was it of any value to you?

23 A In this particular case it was of no value because we
24 found no foreign hair among the victim's clothes or among the
25 victim's public combings or anything like that.

1 Q Now would you tell us what you mean when you have your
2 report a blood factor H being found. What was that?

3 A Blood factor H is consistent with blood type O. I did
4 not name the blood factors. If I had, I believe I would've
5 done it differently because it is somewhat confusing.

6 Q Right.

7 A But when we say we find blood factor H in the absence
8 of any other blood factors, this means it's consistent with
9 blood group O.

10 Q OK. Now The Defendant's was O and consistent with the
11 semen you found in Ms. Clark's panties.

12 A That's correct.

13 MR. MYERS: Please answer any questions The Defense
14 might have.

15 MR. ROGERSON: May it please The Court.

16 CROSS-EXAMINATION BY MR. ROGERSON.

17 Q John, how should I refer to you? Mr. Barron? Agent
18 Barron? How would you like to be referred to?

19 A It doesn't matter.

20 Q Would John be OK?

21 A That would be fine.

22 Q John, you made a report of all your findings, did you
23 not?

24 A Yes, sir.

25 Q OK. I show you a document and ask you if that is that

1 report?

2 A It's a copy of it, yes, sir.

3 Q OK.

4 MR. ROGERSON: I ask that it be marked into evi-
5 dence, Your Honor.

6 MR. MYERS: No objection.

7 (DEFENDANT'S EXHIBIT NO. 1 ADMITTED INTO EVIDENCE.)

8 Q Mr. Barron, you testified as to some tests and conclu-
9 sions which you performed and reached using what I think is
10 known as the ABO blood grouping system.

11 A Yes, sir, I performed these tests to determine which
12 blood group would fall in that system, yes, sir.

13 Q OK. Now the ABO blood grouping system I think you in-
14 dicated as the most common of many blood systems that are
15 sometimes used in forensic analysis.

16 A Yes, sir.

17 Q There are, of course, other blood systems which allow
18 you to define things more specifically, aren't there?

19 A Yes, sir, there are others that can be run but are not
20 run at this time by our laboratory.

21 Q OK. Your laboratory is not prepared to do that.

22 A That's correct.

23 Q OK. Now you testified that approximately 80% of the
24 population are what we call secretors. Isn't that right?

25 A Yes, sir, I did.

1 Q Now a secretor, again, is a person who secretes those
2 blood substances into his other body fluids.

3 A That's right. Yes.

4 Q That would include bodily fluids such as saliva, semen,
5 bile and so on?

6 A Yes, sir.

7 Q Does it include urine? Do you know?

8 A To a degree, yes.

9 Q Now you also testified that there are four different
10 blood types that a person can be.

11 A Yes, sir.

12 Q And you put them in the order of A, O, AB and B. Is
13 that in terms of decreasing frequency or roughly that way?

14 A No, that's just a random repetition of them. The order
15 of frequency would be A and O would be about the same and B
16 would be the next and AB would be the rarest.

17 Q OK. So A is the most frequent?

18 A A and O are most frequent depending on which reference
19 you use. Some reports show that A is most frequent. Some
20 show that O is most frequent.

21 Q OK. Both of those blood groups, I believe, include 40
22 or 45 percent of the population?

23 A Yes, sir.

24 Q Now the AB grouping includes -- excuse me, the straight
25 B -- the B group includes what percent of the population?

1 A Approximately 10%

2 Q Approximately 10%. And AB includes about what percent?

3 A About four or five percent.

4 Q About -- OK. Let's just use round numbers. Five per-

5 cent. OK. So when we say that a person is a type O, has

6 type O blood on this ABO system, we're saying that he is one

7 of a group of 40 to 45 percent of the population. Is that

8 right?

9 A That's correct.

10 Q And I believe you said -- well, going back to that fig-

11 ure of 80%, that 80% figure is the percentage of the popula-

12 tion which are secretors.

13 A Right.

14 Q Does that percentage cut relatively evenly across the

15 various different blood groups?

16 A Yes, sir.

17 Q OK. So that you would expect that 80% of the O type

18 individuals would also be secretors.

19 A That's correct.

20 Q Now if my math is right, wouldn't that mean that some-

21 thing like between 32 and possibly 35 -- somewhere in the mid

22 30% of the population are O type secretors?

23 A That's right.

24 Q OK. Roughly 35% of the whole population in this coun-

25 try has the same type blood as was found in those panties.

1 Excuse me, the same bodily fluid characteristics as was
2 found in those panties.

3 A Right. You would probably have to also cut that by
4 another 50% because we're dealing with males.

5 Q Right.

6 A Right.

7 Q In other words, 80% -- excuse me, something around 35%
8 of the male population are O type secretors?

9 A That's correct.

10 Q There's no difference between men and women in that re-
11 gard.

12 A In that regard but there is a difference in regard to
13 semen.

14 Q Yes, sir. We're aware of that. Now a person's --
15 wouldn't you say then from a forensic standpoint, a person's
16 characteristic on the ABO grouping system is not an individu-
17 al characteristic such as a fingerprint or maybe even a voice
18 print or other sort of forensic evidence like that?

19 A That is true.

20 Q OK. It is a characteristic, is it not, which places a
21 person in a group from which he is either excluded or includ-
22 ed?

23 A Right.

24 Q We're dealing with exclusion or inclusion rather than
25 pointing to a specific individual.

1 A That's true.

2 Q OK. Isn't it the case that if a person is included
3 then, that is not really a decisive factor as to identifying
4 that particular individual?

5 A That's correct.

6 Q However, if a person is excluded by evidence under the
7 ABO grouping system, that is a pretty decisive indication
8 that that person is decisively excluded?

9 A Yes, sir.

10 Q Agent Barron, in the same group of evidence which you
11 received, the panties in this case, that same batch of evi-
12 dence, you received some other evidence, did you not?

13 A Yes, sir, I did.

14 Q OK. You received a dressing cloth, did you not?

15 A Yes, sir.

16 Q OK. Did you make an examination of what was on that
17 dressing cloth or undressing cloth?

18 A Yes, sir, I did.

19 Q Did you find any evidence of Negroid hair, either head
20 or pubic hair on that undressing cloth?

21 A No, I did not.

22 Q OK. Is the presence or absence of hair characteristic
23 of The Defendant a piece of forensic evidence which is often
24 used in cases such as this?

25 A Yes, sir, it is.

1 Q You were, also, according to your report, I believe,
2 presented with an item called wet prep slides.

3 A Yes, sir.

4 Q OK. And the notation in your report, I believe, is
5 sample improperly submitted for examination.

6 A Yes, sir.

7 Q Tell The Court -- tell the jury what that means.

8 A Well, by implication here, the word wet means it has to
9 be examined immediately and when we received the evidence, it
10 was all dried up. Therefore, it could not be examined in the
11 proper way. Wet prep is designed for immediate examination
12 by a doctor or a technician at the hospital to determine
13 whether or not there are motile sperm present.

14 Q OK. In that regard, you did your examination of the
15 evidence submitted to you from the victim in this case. That
16 evidence was submitted when? Do you know?

17 A January 3.

18 Q Do you know when you -- do you know when you did your
19 examination of that evidence?

20 A February 2.

21 Q February 2. OK. And what is the general custom of
22 SLED as to the storage of that evidence in the interim?

23 A Anything that's -- that could break down such as blood
24 would be stored in the refrigerator. The rest of it may be
25 stored at room temperature.

1 Q OK. So that the -- all the liquid or wet components of
2 this you would certainly expect to be stored in the refrigera-
3 tor?

4 A Yes, sir.

5 Q And that's for purposes of preservation of that evidence.

6 A Yes, sir, it is.

7 Q And the wet prep slide a month later when you looked at
8 it, you couldn't tell anything of any significance.

9 A Well, we never examine wet prep slides in the laboratory.

10 Q You know from your experience that you can't by that
11 time tell anything of significance.

12 A That's right. I would suspect within an hour after it
13 is taken, it would be dried out.

14 Q OK. It's for examination at the hospital?

15 A That's correct. We examine vaginal smears which is a
16 dried smear on a slide which was not submitted in this case.

17 Q OK. Now in addition to a blood tube and wet prep slides
18 you received, did you not, what has been characterized on
19 your report as a vaginal washing?

20 A Yes, sir.

21 Q And tell the jury -- you did a test on that for the
22 presence of acid phosphatase, did you not?

23 A Right.

24 Q OK. Acid phosphatase is one of the indicators of the
25 presence of semen, is it not?

1 A That's true.

2 Q There is acid phosphatase also in vaginal secretions
3 but not in the quantity it is present in seminal secretions.

4 A That's right.

5 Q And the test you did for semen on that vaginal washing
6 which had been brought to you, that test was specific for
7 prostatic acid phosphatase, was it not?

8 A Yes. The substrata is supposed to be specific, however,
9 we will get some cross reactivity from vaginal acid phospho-
10 tase.

11 Q OK. Is that test what is known as a quantitative test
12 or a qualitative test or a semi-quantitative test?

13 A Semi-quantitative test.

14 Q And I know this is getting real complicated. Let's try
15 to take it little by little. The test that you did on the
16 vaginal washing was a test which was specific for prostatic
17 acid phosphatase.

18 A Yes, sir.

19 Q All right. And you, in fact, found prostatic acid phos-
20 photase.

21 A Yes, sir.

22 Q Prostatic acid phosphatase indicates, does it not, the
23 presence of semen as opposed to other fluids?

24 A Yes, sir.

25 Q And you used a semi-quantitative test on that.

1 A Yes, sir.

2 Q The semi-quantitative test, again, won't tell you speci-
3 fic number but it will tell you in general ranges of how
4 strong the reaction is.

5 A Right.

6 Q And isn't it the case, Agent Barron, -- John, isn't it
7 the case that you found what you characterized as a strong
8 acid phosphotase reaction?

9 A Yes, sir.

10 Q OK. Unpacking all that for the jury and those of us
11 that are laymen, doesn't that mean that in the vaginal wash-
12 ing, there was a strong amount of semen present?

13 A It indicates a strong amount of acid phosphotase which
14 means that there was semen present.

15 Q That there was semen in good strong quantities, too.
16 It was a semi-quantitative test, was it not?

17 A Right. Various components of seminal fluid will give
18 you a strong test as opposed to a weak test in some other
19 fluids. It all depends on what you're testing for will de-
20 termine your interpretation.

21 Q Isn't it fair to say, however, though, that a strong
22 acid phosphotase reaction in that vaginal washing indicates
23 the presence of semen in good quantities?

24 A Well, our test is qualitative in the sense that it
25 identifies the presence or the absence of it and is semi-

1 quantitative in the sense that if the reaction is strong then
2 we would say to a greater degree whether it's present or not.
3 Not in the sense of how much is present.

4 Q But it indicates that it was certainly a sufficient
5 quantity to give you a real good reading.

6 A Yes, sir.

7 Q Now with respect to your test on the panties in this
8 case, by the time that you got the panties and made any exam-
9 ination of them, it was about a month after the evidence had
10 come to SLED.

11 A Yes, sir.

12 Q And the stains to which you referred, by the way, you
13 said two stains I believe.

14 A Yes, sir.

15 Q Would you explain those two stains? Did you test both
16 of them or just one of them?

17 A Both of them.

18 Q And were the results the same?

19 A Yes, sir.

20 Q The stains that you were examining were by that time
21 dried. Is that correct?

22 A Yes, sir.

23 Q OK. When -- by the time something becomes dried, can
24 you tell whether or not there is any sperm in it?

25 A Yes, sir.

1 Q OK. I mean -- I didn't ask that question correctly.
2 By the time something is dried, would you normally expect to
3 find sperm in it?

4 A That's a good question. We sometimes find it; some-
5 times don't. As to what we expect, we really don't expect
6 anything. We just identify what we see.

7 Q OK. Certainly when something dries under field con-
8 ditions as opposed to laboratory conditions where something
9 is being dried under control situations to preserve something
10 such as a slide stain. Certainly under field conditions, you
11 don't know whether you would find any sperm or not.

12 A That's right.

13 Q OK. Now we're using different terms and I want to back
14 up here just a second and make sure the jury understands the
15 terms we're using. We used the word semen. Semen refers,
16 does it not to the white milky substance which is present in
17 an ejaculate.

18 A Right.

19 Q It is an ejaculate.

20 A That's correct.

21 Q The entirety of all those components---

22 A Right.

23 Q ---that are in the ejaculate. One of the components
24 which is present is a chemical known as acid phosphatase.

25 A Right.

1 Q And it's one of the indicators for the presence of se-
2 men.

3 A Right.

4 Q Another component that is present in some varieties of
5 semen, those that are secretors are blood factors.

6 A Right.

7 Q Another component that's present in some kinds of semen
8 is sperm or spermatazoa cells.

9 A Right.

10 Q They are, are they not, the -- when they're drawn or
11 visualized are little swimmy tadpole looking creatures which
12 are actually the reproductive -- reproductive cells.

13 A Right.

14 Q And all those components go in to make up what we call
15 that white, milky fluid---

16 MR. MYERS: Your Honor, I object. Counsel is mak-
17 ing a closing argument. It's very interesting but I think
18 the witness should testify. We object to it as being irrele-
19 vant anyway. He's not asking---

20 THE COURT: I would rule it's irrelevant.

21 MR. MYERS: Thank you.

22 THE COURT: It is interesting though.

23 Q The vaginal aspirate or the vaginal washing which you
24 received---

25 A Yes, sir.

1 Q ---did you have occasion to examine that microscopical-
2 ly?

3 A No.

4 Q OK. Is there any way that you can tell whether or not
5 from your experience sperm cells were ever present in that
6 vaginal washing?

7 A I don't know.

8 Q In fact, did you ever see sperm cells identified in any
9 of the material that you were brought?

10 A No.

11 Q Did you at any time see any Negroid hair evidence in
12 any of the materials that you were brought?

13 A No.

14 Q Now in the vaginal washing you also did another test
15 about which we haven't discussed so far. Isn't that right?

16 A I'm not sure what you're talking about.

17 Q Isn't it the case that you did a test on the vaginal
18 aspirate or the vaginal washing to detect the presence of any
19 blood factors?

20 A Oh, yes, sir.

21 Q Was that the same type of test you did to detect the
22 presence or the absence of blood factors with respect to the
23 stains in the panties?

24 A Yes, sir.

25 Q Isn't it the case, Agent Barron, that when you did that

1 when you did that test on the material in the vaginal washing
2 that you found no blood factors?

3 A Yes, sir.

4 Q Isn't it the case, Agent Barron, that when you do a
5 test on a vaginal washing and find no blood factors that the
6 normal forensic conclusion is that the donor of any semen in
7 that sample was a non-secretor?

8 A If the amount of semen is sufficient to make that con-
9 clusion.

10 Q That is the normal conclusion.

11 A Yes, sir.

12 Q John, from examining the panties and the stain on the
13 panties from the perspective of one month later, was there
14 any way whatsoever that you could determine forensically the
15 age of that stain on the panties by which I mean the time
16 that that stain was deposited on the panties?

17 A No.

18 MR. ROGERSON: No further questions, Your Honor.

19 REDIRECT EXAMINATION BY MR. MYERS.

20 Q And as to all the hair that you received relating to
21 the victim, as a matter of fact, all the hair was the victim's.

22 A Right.

23 MR. MYERS: No further questions. Thank you.

24 Your Honor, with that The State rests.

25 THE COURT: All right. Mr. foreman and ladies and

1 gentlemen of the jury, I ask that you go to the jury room for
2 just a few minutes, please.

3 (THE JURY LEFT AT 12:03 P.M.)

4 THE COURT: Any motions from The Defense?

5 MR. ROGERSON: Yes, sir, Your Honor. We would --
6 we would move The Court to direct a verdict of not guilty at
7 this time on the basis of the fact that the evidence when
8 viewed in the light most favorable to The State does not
9 present a case for the jury.

10 THE COURT: I would have to refuse that motion.
11 Anything else?

12 MR. ROGERSON: Yes, sir, Your Honor, we have a
13 couple of witnesses who are on call who will be here very
14 shortly. We'll go ahead and take up another witness at this
15 time. I'm going to try to get everybody here on time not to
16 cause delay.

17 MS. BERGERON: May it please The Court, could I
18 have a 5-minute break for myself?

19 THE COURT: OK.

20 MS. BERGERON: Thank you.

21 THE COURT: Three minutes.

22 (THE JURY RETURNED AT 12:18 P.M.)

23 MR. ROGERSON: May it please The Court. Your Honor,
24 The Defense calls Spurgeon Cole.

25 SPURGEON COLE, being duly sworn, testifies as fol-