

1 Would you please tell the jury a little bit about your
2 educational background?

3 A. Yes, ma'am. After high school I spent four years
4 in the Navy as a hospital corpsman. Was honorably
5 discharged, then went to San Diego State College and three
6 years later entered Loyola University Dental School in
7 Chicago, Illinois. That was 1957. Graduated from there in
8 1961. Then I went to the University of Chicago Zoller
9 Clinic, spent a one-year rotating internship, then entered
10 the graduate program at the University of Chicago and in
11 1960 -- well, I graduated in '66 but in '65, I had completed
12 everything to get a master's degree in general pathology at
13 the University of Chicago Medical School. I was offered a
14 job at the University of Texas Dental Branch. So, I came
15 here in 1965 and began to teach oral pathology and
16 radiology. 1968, we had the then-current medical examiner,
17 Dr. Jachimczyk, on the staff and he started having some
18 problems with patients -- patients. They were his patients.
19 With individuals for dental identification. So, I started
20 doing that in 1968, at the same time was teaching pathology
21 and got to be a consultant with M. D. Anderson next door for
22 25 years. I've written about 40 to 50 scientific articles.
23 I'm boarded by the American Board of Oral and Maxillofacial
24 Pathology. That's now an emeritus status, which means
25 retired, but I'm active with the American Board of Forensic

1 Odontology, served all offices in that, was president and
2 currently am senior consultant in forensic odontology to the
3 medical examiner of Harris County. Taught at the Armed
4 Forces Institute of Pathology in forensic dentistry or
5 forensic odontology, whatever you want to call it, for 30
6 years. Taught at the symposium over in San Antonio.

7 They've had 17 and I've taught in every one. I have written
8 four textbooks on this. The last one, second edition of the
9 last textbook, came out February of last year. So, that's
10 kind of who I am.

11 Q. Is it fair to say that you've been deemed an expert
12 in the field of oral pathology?

13 A. Oral pathology and forensic dentistry, yes, ma'am.

14 Q. And have you testified in the courts of Harris
15 County as an expert on few or many occasions?

16 A. Many.

17 Q. Okay.

18 A. I don't know what you classify as "many," but I've
19 testified here in bite marks and dental identifications.

20 Q. Okay. Can you tell the jury a little bit about
21 what oral pathology and forensic dentistry is?

22 A. Well, oral pathology, oral and maxillofacial
23 pathology is the study of diseases of the oral cavity. That
24 includes teeth and gums and surrounding structures, salivary
25 glands that secrete and make your saliva for you. The lymph

1 nodes that are here and all of this is connected to all of
2 the rest of the body. And so you learn pathology and then I
3 would also go over to M. D. Anderson and look at specimens
4 and materials over there.

5 So, in oral pathology what the local dentist
6 does is he suspects you have something in your mouth that's
7 unusual. So, two things can happen. He can send it to
8 another individual that's a specialist, which may be a
9 periodontist, an oral pathologist, an oral medicine person.
10 They can then look at it and say, well, I think that it is,
11 but let's take a biopsy. When they take a biopsy, they
12 actually incise into the tissue, take a small piece of it,
13 send it to us, the oral pathologist. We take it in the
14 laboratory, cut small samples of it, look at it under the
15 microscope and say, well, it's benign, it's malignant or
16 it's this or it's that. So, this, then, is the practice of
17 oral pathology.

18 Forensic odontology, that is where any dentist
19 that's skilled can read radiographs and look at things
20 because what you're doing is comparing dental records of
21 post-death to pre-death. And we also look at dental records
22 to see that the dentist treated the patient right and
23 properly and did what was right and proper. That's called
24 malpractice. Unfortunately in some cases we're called in to
25 look at the injuries to children because that's called child

1 abuse.

2 Sometimes we're called in -- what we were
3 doing before I retired was we have illegal aliens in the
4 Country and the Government is interested in the illegal
5 aliens with a cut-off date of 18 years. If you're 18 years
6 or older, you're treated as an adult. If you're less than
7 18, then you're treated as a juvenile or a child. So, we
8 would take radiographs and look at the development of the
9 third molars and assist the Federal Government this way, to
10 say they're over 18 or they're under 18 or it's 18 plus or
11 minus a year. We can't make the decision. You interview
12 them. You make the decision. So, basically that's what
13 forensic odontology does.

14 Q. Okay. Now, you stated that you're currently a
15 consultant with the Institute of Forensic Sciences?

16 A. Yes, ma'am, and I'm licensed in the state of Texas
17 to do that.

18 Q. Okay. Do you see patients anymore?

19 A. No.

20 Q. Okay. You're retired from that part of your
21 practice?

22 A. Yes. Well, I would -- I could see patients
23 because, like I say, I'm still licensed but most of the
24 students that I know, you know, they call me and I say, you
25 know, can you refer them to so-and-so and such-and-such.

1 It's just -- I'm retired. I'd like to stay that way, except
2 for my forensic activity.

3 Q. Okay. I want to call your attention to this case.
4 Were you called to bring in -- were you called to come in
5 and make a dental identification on a particular case?

6 A. Yes, ma'am.

7 Q. Specifically, ML10-1866?

8 A. Yes.

9 Q. Okay. Do you recall what day you were brought in
10 to do that identification?

11 A. My records show it was June 28th, 2010.

12 Q. Okay. First, before we go into specifically what
13 you did in this case, can you tell me, is it possible to --
14 how is it possible to identify people from their teeth?

15 A. Well, the forensic dentist's best friend is a
16 radiograph or a photograph. If you have photographs of
17 unusual dentition, for example, someone has very, very
18 crooked anterior teeth or they have unusual fillings in the
19 anterior teeth, like I've seen cases where individuals have
20 gold teeth with diamonds put into their -- I mean, that's
21 kind of unusual. So, you could take a picture before and
22 look at an individual after and say, yeah, that's unique
23 enough, I mean, I don't know a lot of people with diamonds
24 in their front teeth or stars or these sorts of things but
25 what you do is you compare the written record. Sometimes we

1 have trouble with written records, though, because it's easy
2 to substitute right for left and upper and lower or, you
3 know, instead of a molar tooth, you put it in a premolar
4 tooth or inside of a first molar, second molar. So, x-rays,
5 radiographs, are a dentist's best friend. And you take an
6 x-ray of a tooth and that's how it is. It doesn't change.
7 You can tell right and left because the radiograph has a
8 little dot in the film. So, you just have all of the
9 pre-death records that you get from the dentist.

10 The stickler for forensic dentists is I need
11 to know the dentist and we need to go to the dentist with
12 the name of an individual because if I just call them and
13 say, you know, do you have the records of Ms. Tilly Brown,
14 Tilly Brown, who is she, you know. If I could describe
15 something unusual in Ms. Brown, maybe he'd remember but, you
16 know, the average dentist sees, what? Ten patients a day
17 and he's been in practice ten years. I don't remember.

18 So, anyway, we get the dental records and the
19 x-rays, then when I get to the morgue, I always look at the
20 scene pictures, just in case there's something unusual or
21 they left something at the scene. I'm blessed that I work
22 with forensic anthropologists at the forensic institute and
23 they gather bones and teeth and all of these kind of things.
24 So, my job is now made easier because they're there to help
25 me. But anyway, I look at the scene pictures and then

1 usually I look at the decedent, the pictures of the decedent
2 that they take at the morgue because this helps me if I go
3 in and I'm supposed to examine a female and a male body
4 shows up, then I know there's a problem, they brought me the
5 wrong body or the numbers are mixed up or something. And
6 then I just go ahead and do a routine examination like I
7 would in a living patient.

8 Q. Okay. Now, specifically with the teeth, you
9 started to say that if somebody had dental work done to
10 their teeth, that that is one of the ways that you can
11 identify them if you have their dental records to show what
12 dental work was done. Is that fair to say?

13 A. If I have the radiographs, better than the dental
14 records because a dental record is just a drawing or a
15 description of what was done.

16 Q. Okay.

17 A. And if you think about teeth, each tooth is unique
18 and when you have a disease process in it called decay,
19 that's unique, too. It may eat out the tooth a little bit,
20 eat it out more, it may go more to the left, to the right,
21 the front, to the back, down to the pulp. So, each time the
22 dentist puts a filling in, it's unique. He has to take out
23 the diseased material and then maybe put a insulating
24 material in that we call a base and then he either puts in
25 silver filling or gold filling or now they have composite,

1 the tooth-colored fillings, and so each one that he puts in
2 is unique in the tooth and so this uniqueness then allows us
3 ultimately to look at the radiograph of the patient that was
4 alive, look at the same radiographs we've taken in the mouth
5 and compare the two like a fingerprint.

6 Q. Okay. So, you are -- you have from the dentist the
7 x-rays that are taken. You actually look at the -- look at
8 an x-ray, the teeth or the jaw that is -- that -- on the
9 victim, let's say, and you can compare those to x-rays and
10 look at the unique tooth qualities to make an
11 identification?

12 A. What I do in the morgue is we have a dental
13 radiographic set-up and it's digital x-rays and so I take
14 radiographs and it ends up ultimately on a computer screen,
15 then I have, like in this case, we have the x-rays that are
16 sent in from the dentist. So, I look at that and look at
17 the other x-rays and just match -- make the comparisons.
18 Are the fillings the same? Are the outlines the same? The
19 pulp chambers, do they look the same? Is the root structure
20 the same? In the bone area is what we call trabeculae,
21 which is just another term for, like, braces on a bridge and
22 so the bone -- everyone has unique trabeculae in their mouth
23 and the radiograph shows the before and after trabeculae
24 unless it's been changed by some disease process, such as an
25 abscess or something like that.