Guide to the Patricia Bath Innovative Lives Presentation and Interview, [videotapes]

NMAH.AC.0753
Alison L. Oswald
2001
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Collection Overview

Repository: Archives Center, National Museum of American History
Title: Patricia Bath Innovative Lives Presentation and Interview, [videotapes]
Date: February 17, 2000 and March 1, 2000.
Identifier: NMAH.AC.0753
Creator: Jerome and Dorothy Lemelson Center for the Study of Invention and Innovation.
Bath, Patricia, Dr., 1942-2019
Extent: 0.5 Cubic feet (2 boxes)
Language: English .
Summary: Dr. Patricia Bath was born in 1942 in New York. She conceived of the Laserphaco Probe in 1981 and patented it in 1988 (US Patent # 4,744,360 for an "Apparatus for ablatting and removing cataract lenses"). The collection contains original and reference video footage of Dr. Bath’s Innovative Lives Presentation documenting her work in the field of ophthalmology and her work creating and patenting the LaserPhaco Probe, an instrument to remove cataracts. Also included is an interview with Dr. Bath at her home in Los Angeles and an interview with her daughter, Eraka Bath and supplemental documentation assembled by Dr. Bath. The documentation includes photocopies of articles, patents, biographical sketch material, and selected publications and references to related to lasers and surgery of Dr. Bath

Administrative Information

Acquisition Information
This collection was recorded by the Innovative Lives Program of The Jerome and Dorothy Lemelson Center for the Study of Invention and Innovation on March 1, 2000. The Innovative Lives series brings Museum visitors and American inventors together to discuss inventions and the creative process and to experiment and play with hands-on activities related to each inventor’s product.

Provenance
The collection was transferred to the Archives Center in 2000.

Related Materials
An anatomical eye (accession # 2000.0038.01) was donated to the Division of Medicine and Science in 2000 by Dr. Patricia Bath.

Available Formats
Series 1: Original Videos, was digitized in 2014. See repository for details.
Biographical / Historical

Dr. Patricia Bath (1942-) was born in New York. She attended Charles Evans Hughes High School, Hunter College (B.A. 1964), and Howard University College of Medicine (M.D. 1968). Bath held a fellowship in ophthalmology at Columbia University (1969-1970) and an internship at New York University (1970-1973) where she was the first African American resident in ophthalmology. Dr. Bath later joined the faculty of UCLA and Charles R. Drew University in surgery and ophthalmology and later the Department of Ophthalmology at UCLA's Jules Stein Eye Institute. In 1976, Dr. Bath and other colleagues formed the American Institute for the Prevention of Blindness (AIPB). Dr. Bath conceived of the Laserphaco, an instrument to remove cataracts in 1981. She received US patent #4,744,360 for an "Apparatus for ablating and removing cataract lenses" on May 17, 1988. Later patents include a method and apparatus for ablating and removing cataract lenses; laser apparatus for surgery of cataractous lenses; and pulsed ultrasound method for fragmenting/emulsifying and removing cataractous lenses. Dr. Bath retired from the UCLA Medical Center in 1993 to work in telemedicine, the use of electronic communication to provide medical services to remote areas where healthcare is limited.

The Jerome and Dorothy Lemelson Center for the Study of Invention and Innovation was founded in 1995 at the Smithsonian Institution's National Museum of American History through a generous gift from the Lemelson Foundation. The Center's mission is: to document, interpret, and disseminate information about invention and innovation; to encourage inventive creativity in young people; and to foster an appreciation for the central role invention and innovation play in the history of the United States. The Innovative Lives series brings together Museum visitors and especially, school age children, and American inventors to discuss inventions and the creative process and to experiment and play with hands-on activities related to each inventor's product. This collection was recorded by the Innovative Lives Program of the Jerome and Dorothy Lemelson Center for the Study of Invention and Innovation.

Scope and Contents

This collection consists of 8.5 hours of original (BetaCam SP) video recordings and reference (viewing) copies (VHS) documenting the life and career of Dr. Patricia Bath. The recordings include a presentation by Dr. Bath for the Lemelson Center's Innovative Lives Program and interviews at her home and laboratory in Los Angeles. The collection also includes an interview with Dr. Bath's daughter, Eraka Bath, and copies of footage from other sources about Dr. Bath's work. Additionally, there is supplemental documentation
assembled by Dr. Bath. The documentation includes photocopies of articles, patents, biographical sketch material, and selected publications and references to related to lasers and surgery of Dr. Bath.

**Arrangement**

This collection is arranged into three series.

*Series 1, Original Videos, 2000*

*Series 2, Reference Videos, 2000*

*Series 3, Supplemental Documentation*

**Names and Subject Terms**

This collection is indexed in the online catalog of the Smithsonian Institution under the following terms:

**Subjects:**

- African American physicians
- African American women
- Eye -- Diseases
- Eye -- Examination
- Eye diagnosis
- Eye equipment and supplies
- Inventions -- 1980-2000
- Inventors -- 20th century
- Laserphaco (medical instrument)
- Medicine -- Communication systems
- Ophthalmologists
- Ophthalmology
- Women inventors
- Women inventors -- 20th century

**Types of Materials:**

- BetaCam SP (videotape format)
- Interviews -- 1980-2000
- Oral history -- 1990-2000
- Photographs
- Slides
- Videotapes

**Occupations:**

- Surgeons
<table>
<thead>
<tr>
<th>Box OV 1</th>
<th>OV 753.1 (RV 753.1), 2000 March 1</th>
</tr>
</thead>
<tbody>
<tr>
<td>Notes:</td>
<td>Dr. Patricia Bath Innovative Lives Presentation, Camera A</td>
</tr>
<tr>
<td></td>
<td>Total Running Time: 29:26</td>
</tr>
</tbody>
</table>

Sondra Berger, NMAH staff provides opening remarks about the videoconference, introduces Dr. Bath. Dr. Bath begins with a slide show discussing 3 basic areas: life/family background; laser invention; and basic anatomy of the eye. Discusses her family background growing up in Harlem, the importance of education, and her experiences at the Yeshiva Albert Einstein Medical College during high school which was her first exposure to science and one that shaped her decision to become a doctor. Emphasizes her enjoyment of international travel and encourages the students to travel and learn about places outside of their environment. Elaborates on several of her international trips, specifically to Tunisia where she performed corneal transplants. Eraka Bath, Dr. Bath's daughter provides narration of the work performed in Tunisia.

<table>
<thead>
<tr>
<th>Box OV 1</th>
<th>OV 753.2 (RV 753.2) , 2000 March 1</th>
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</thead>
<tbody>
<tr>
<td>Notes:</td>
<td>Dr. Patricia Bath Innovative Lives Presentation Camera A</td>
</tr>
<tr>
<td></td>
<td>Total Running Time: 29:52</td>
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</tbody>
</table>

Same information as RV 753.1, but shot a different angle.

<table>
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<tr>
<th>Box OV 1</th>
<th>OV 753.3 (RV 753.3), 2000 March 1</th>
</tr>
</thead>
<tbody>
<tr>
<td>Notes:</td>
<td>Dr. Patricia Bath Innovative Lives Presentation, Camera A</td>
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<tr>
<td></td>
<td>Total Running Time: 19:05</td>
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</table>

Continuing coverage of Dr. Bath’s work in Tunisia. Discussion of “telemedicine and reaching out to those who do not have access. Anatomy of the eye discussed with a camera shot of a model eye for the explanation. Slides are discussed during Dr. Bath’s presentation, but not shown. Gives the students a quiz.

<table>
<thead>
<tr>
<th>Box OV 1</th>
<th>OV 753.4 (RV 753.4), 2000 March 1</th>
</tr>
</thead>
<tbody>
<tr>
<td>Notes:</td>
<td>Dr. Patricia Bath Innovative Lives Presentation, Camera A</td>
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<tr>
<td></td>
<td>Total Running Time: 19:05</td>
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Same footage as RV 753.3, but shot at a different angle showing the slides and video footage components of Dr. Bath’s presentation.

<table>
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<tr>
<th>Box OV 1</th>
<th>OV 753.5 (RV 753.5), 2000 March 1</th>
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<tbody>
<tr>
<td>Notes:</td>
<td>Dr. Patricia Bath Innovative Lives Presentation, Camera A</td>
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</tbody>
</table>
Total Running Time: 22:09

Discusses the definition of a cataract, and opacity of the eye. Slides used by Dr. Bath at this point in the presentation are not seen from this camera angle. Demos where the lens of the eye is on dissected cow's eyeballs. Describes the types of lasers used in ophthalmology. Videotape of a television newscast discussing Dr. Bath is played, but not seen from this camera angle. Shows the prototype of her Laserphaco Probe and emphasizes to the students to exercise their minds, participate in community service, and to have discipline, work hard and be truthful. Slight loss of audio. Conclusion of her presentation. Closing remarks by Sondra Berger. Judy Chelnick, NMAH staff member displays and explains anatomical models of the whole eye and a cross section of the eye.

Box OV 1  
OV 753.6 (RV 753.6), 2000 March 1  
Notes: Dr. Patricia Bath Innovative Lives Presentation, Camera A  
Total Running Time: 22:09  
Same footage as RV 753.5, but this camera angle shows slides and video footage.

Box OV 1  
OV 753.7 (RV 753.7), 2000 March 1  
Notes: Dr. Patricia Bath Innovative Lives Presentation, Camera A  
Total Running Time: 28:50  
Laser demonstration by Tom O'Brien, NMAH staff member. Dr. Bath participates in a question and answer session with students. Interviews with students asking if they want to be inventors.

Box OV 1  
OV 753.8 (RV 753.8), 2000 March 1  
Notes: Eraka Bath Interview, 2000 March 1 (at National Museum of American History)  
Total Running Time: 20:35  
Discusses her background and interest in science and medicine and why she decided to become a doctor. Provides her image of her mother-professional, detail oriented person who is independent and confident. Speaks of the obstacles her mother had to overcome-growing up in Harlem and being the first black, female resident at New York University in ophthalmology. Eraka states that her goal is to identify areas in healthcare that need to be fixed and to allocate funds to the needed areas.

Box OV 1  
OV 753.9 (RV 753.9), 2000 March 1  
Notes: Dr. Patricia Bath Innovative Lives Presentation, Camera A  
Total Running Time: 3:50  
Dr. Bath and her daughter Eraka Bath walking outside the National Museum of American History.

Box OV 2  
OV 753.10 (RV 753.10), 2000 February 17
Discussion begins with the question what did you invent?
Bath discusses her research that culminated in the area of laser tissue interaction and the surgical technique of inserting devices used to restore vision. Bath invented while a practicing ophthalmologist. It was the one-on-one care that inspired her to do research. Bath cites her project work at UCLA that was successful and resulted in a publication, and recognition in the medical community. Explanation of her work in Tunisia where she restored sight to several patients. Discussion of her patenting, fiber optic technologies and her 1986 sabbatical at Berlin's Laser Medical Center where she perfected her technique of precise drill holes in the eyes lens and sculpting out parts of the lens.

Bath provides definition of cataract and the Laserphaco. The laser portion of the term refers to the modality for the procedure while the "phaco" is from the Greek term for hard lens. Continues speaking about her Berlin experience and filing for a patent in the United States in December 1986. In April 1987, Bath announces to the medical community her invention and the need for a major manufacturer to commit funding for clinical trials to bring it to market. In 1991, companies in the United States start FDA clinical trials with the Laserphaco. Clarifies the difference between Laserphaco and the laser technologies available in malls for refracting. In 1998, Bath's patent issues for an "Apparatus for Ablating and Removing Cataract Lenses, US patent #4,744,360. Provides a message to young people to have faith in the power of your own ideas and self.

Telemedicine meets Dr. Bath's goal of the perfect practice of medicine. It enhances knowledge and judgment of physicians and the way they practice. Discusses her work with St. Geoges University. Demonstration of Dr. Bath at her computer working.
<table>
<thead>
<tr>
<th>Box OV 2</th>
<th>OV 753.14 (RV 753.14), 2000 February 17</th>
<th>Notes: Dr. Patricia Bath Interview, 2000 February 17 (at home in Los Angeles)</th>
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</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td>Total Running Time: 28:49</td>
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<tr>
<td></td>
<td></td>
<td>Discussion of anthrax while Dr. Bath is at her computer. Her US patent #4,744,360, May 17, 1988, An Apparatus for Ablating and Removing Cataract Lenses is shown. Still photo of Dr. Bath; shots of academic and professional awards; still photo Dr. Bath with daughter Eraka as small child, interior shots of Dr. Bath's home; Dr. Bath leaving her home and getting into her car; Dr. Bath working in the lab.</td>
</tr>
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</table>

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<tr>
<th>Box OV 2</th>
<th>OV 753.15 (RV 753.15), 2000 February 17</th>
<th>Notes: Dr. Patricia Bath Interview, 2000 February 17 (in Los Angeles)</th>
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<tr>
<td></td>
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<td>Total Running Time: 21:03</td>
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<tr>
<td></td>
<td></td>
<td>Dr. Bath in lab at UCLA with eye model explaining the internal structure of the eye.</td>
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<thead>
<tr>
<th>Box OV 2</th>
<th>OV 753.16 (RV 753.16), 2000 February 17</th>
<th>Notes: Dr. Patricia Bath Interview, 2000 February 17 (in Los Angeles)</th>
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<td>Total Running Time: 13:11</td>
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<tr>
<td></td>
<td></td>
<td>Endocapsular Excimer Laser Cataract surgery video, no audio. Part 1 is the technique of phakoablation, a demonstration only.</td>
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</table>

<table>
<thead>
<tr>
<th>Box OV 2</th>
<th>OV 753.17 (RV 753.17), 2000 February 17</th>
<th>Notes: Dr. Patricia Bath Interview, 2000 February 17 (in Los Angeles)</th>
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</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td>Television news coverage regarding cataract surgery in general and excimer laser research featuring Dr. Bath. Dr. Bath explains the Laserphaco procedure with demonstrations at the Laser Medicine Center of Berlin. Includes a French television piece on Dr. Bath's work in Tunisia, January 1994.</td>
</tr>
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</table>
Series 2: Reference Videos, 2000 March 1

17 Videocassettes (VHS)

<table>
<thead>
<tr>
<th>Box</th>
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<tbody>
<tr>
<td>1</td>
<td>RV 753.1-14</td>
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<tr>
<td>2</td>
<td>753.15-17</td>
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</tbody>
</table>

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Series 3: Supplemental Documentation

2 Electronic discs (CD)

<table>
<thead>
<tr>
<th>Box 2, Folder 1</th>
<th>Articles about Dr. Patricia Bath</th>
</tr>
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<tbody>
<tr>
<td>Box 2, Folder 1</td>
<td>Selected publications and references related to lasers and surgery</td>
</tr>
<tr>
<td>Box 2, Folder 2</td>
<td>Photographs and Slides, 2000-03-01</td>
</tr>
</tbody>
</table>

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