



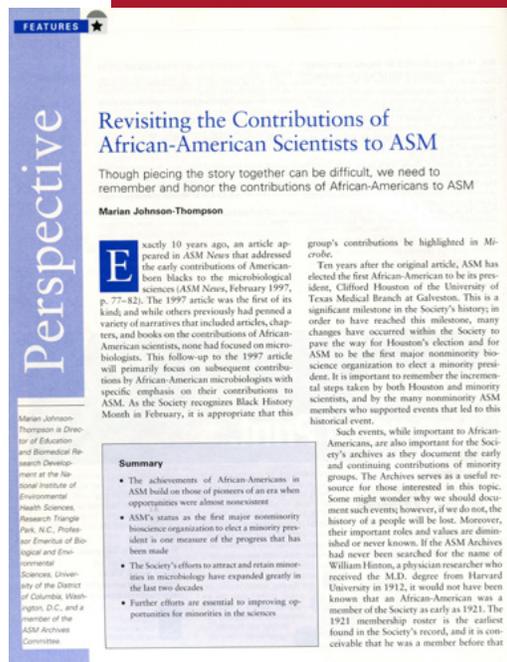
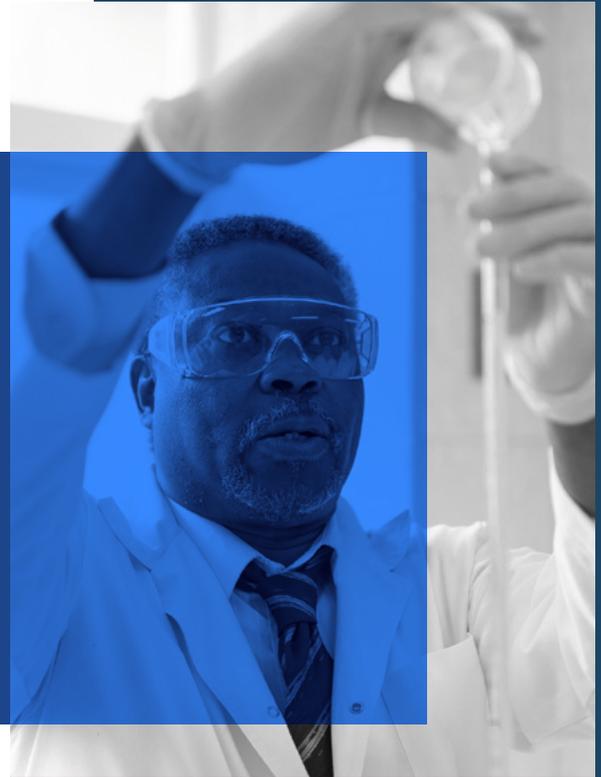
AMERICAN
SOCIETY FOR
MICROBIOLOGY

Revisiting the Contributions of African-American Scientists to ASM

Though piecing the story together can be difficult, we need to remember and honor the contributions of African-Americans to ASM.

Authors:
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Perspective

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Though piecing the story together can be difficult, we need to remember and honor the contributions of African-Americans to ASM

Marian Johnson-Thompson

Exactly 10 years ago, an article appeared in ASM News that addressed the early contributions of African-born blacks to the microbiological sciences (ASM News, February 1997, p. 77-82). The 1997 article was the first of its kind, and while others previously had penned a variety of narratives that included articles, chapters, and books on the contributions of African-American scientists, none had focused on microbiologists. This follow-up to the 1997 article will primarily focus on subsequent contributions by African-American microbiologists with specific emphasis on their contributions to ASM. As the Society recognizes Black History Month in February, it is appropriate that this

group's contributions be highlighted in Microbe. Ten years after the original article, ASM has elected the first African-American to be its president, Clifford Houston of the University of Texas Medical Branch at Galveston. This is a significant milestone in the Society's history; in order to have reached this milestone, many changes have occurred within the Society to pave the way for Houston's election and for ASM to be the first major nonminority bio-science organization to elect a minority president. It is important to remember the incremental steps taken by both Houston and minority scientists, and by the many nonminority ASM members who supported events that led to this historical event.

Such events, while important to African-Americans, are also important for the Society's archives as they document the early and continuing contributions of minority groups. The Archives serves as a useful resource for those interested in this topic. Some might wonder why we should document such events, however, if we do not, the history of a people will be lost. Moreover, their important roles and values are diminished or never known. If the ASM Archives had never been searched for the name of William Hinton, a physician researcher who received the M.D. degree from Harvard University in 1912, it would not have been known that an African-American was a member of the Society as early as 1921. The 1921 membership roster is the earliest found in the Society's record, and it is conceivable that he was a member before that

- Summary**
- The achievements of African-Americans in ASM build on those of pioneers of an era when opportunities were almost nonexistent
 - ASM's status as the first major nonminority bio-science organization to elect a minority president is one measure of the progress that has been made
 - The Society's efforts to attract and retain minorities in microbiology have expanded greatly in the last two decades
 - Further efforts are essential to improving opportunities for minorities in the sciences

Marian Johnson-Thompson is Director of Education and Biomedical Research Development at the National Institute of Environmental Health Sciences, Research Triangle Park, N.C., Professor Emerita of Biological and Environmental Sciences, University of Columbia, Washington, D.C., and a member of the ASM Archives Committee.

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earliest found in the Society's record, and it is conceivable that he was a member before that time. The fact that William Hinton's parents were former slaves shows that opportunities opened up during Reconstruction. Hinton apparently never attended an ASM meeting. His daughter, Jane Hinton, codeveloper of Mueller-Hinton agar, said that this was because he did not want it known that he was a Negro, and that if this were known, his work would not have been recognized. Before her death, Jane Hinton relayed much about her father's life, his relationship with Harvard University and how his professional battles with racism affected their family.



Clifford Houston

Another look at the Society's records shows that Ruth Moore, the first African-American to complete a traditional Ph.D. in microbiology in 1933, from Ohio State University, was registered for the 1936 meeting in Indianapolis, Ind. Both Hildrus A. Poindexter (M.D., Harvard, 1929; M.A. and Ph.D., Columbia, 1930, 1932, during internship residency training) and Moore were registered for the 1937 meeting in Washington, D.C., but they did not become Society members until 1944 and 1947, respectively.

The recorded involvement of blacks in the early part of the Society's history has been extensively researched by former ASM Archivist, Jeff Karr. Thomas Smith (1909—2006), U.S. Air Force Colonel, Ph.D., University of Bonn, Germany and one of the original Tuskegee Airmen, joined ASM as a full member in 1947 and was a continuous member through 2005.

The 1997 article primarily reflected "firsts" in terms of U.S.-born blacks who attained advanced degrees in microbiology during the first half of the 20th century. This beginning participation of U.S.-born black microbiologists was preceded by the removal of southern states that prevented full atten-

dance at Society meetings and of general societal practices that promoted exclusion. Thus, it was not until the 1980s that African-Americans began to fully participate in ASM activities and assume lead-

ership positions. (With perhaps one exception—Welton Taylor served on the editorial boards of *Applied Microbiology* from 1968—1970 and [as a founding editor] of the *Journal of Clinical Microbiology* from 1978—1983).

Times have changed, and environments are more supportive of the presence of blacks in the discipline of microbiology and in ASM. Previously, those few who attained degrees in microbiology faced many barriers. It was

extremely difficult to find employment, and most could attain a position only at a historically black college or university (HBCU) or at a secondary school. Typically, these schools did not have the resources to support microbiological research, and subsequently, these well-trained individuals ended up solely in teaching careers. This was true for other black scientists. Edward Bouchet (1852—1918), the first black to earn a Ph.D. in the United States (in Physics at Yale in 1886), spent most of his career teaching at the Institute for Colored Youth, a college preparatory school, in Philadelphia. Bouchet ranked 6th in a class of 124 and, in 1874, was the first black man in the nation to be nominated to Phi Beta Kappa, but he was not elected until 1884. George Henderson at University of Vermont was elected as the first black member of Phi Beta Kappa in 1877. As one reflects on the hardships faced by these early pioneers, one becomes overwhelmed with emotion and a strong need to hold in esteem and honor these individuals who paved the way. And so, we salute them.

Increasing the Participation of Black Microbiologists in ASM

When one looks at the black microbiologists who provided the leadership from within to increase the participation of black microbiologists in Society activities, one has to highlight the role of James Jay. Jay, Professor Emeritus of Biological Science, Wayne State University, Detroit, Mich., is best known for his classic popular textbook, *Modern Food Microbiology*, now in its 7th edition (Van Nostrand Reinhold, New York, 2005). Released first in 1970 in English, the text has been published in Spanish, Hindi, Malaysian and Chinese. Long revered by many, Jay is the singular individual who has been a repository of historical accomplishments and activities by black microbiologists, and he has played a significant role in mentoring many. Because of this, he is respectfully and honorably referred to as the “Father of Black Microbiologists,” and this article is dedicated to him.

The actual involvement of blacks in Society activities occurred at a very slow pace up to the mid-1990s. There were several nonminority ASM members who played significant roles in reversing this trend. One such individual who ranks high above others is Harlyn O. Halvorson (ASM President, 1974, and former chair of the Public and Scientific Affairs Board [PSAB], 1979—1987). As PSAB chair, Halvorson appointed ASM's first minority committee and was

a tireless supporter of advancing the involvement of minorities in Society activities. Halvorson demonstrated what can be accomplished when those in leadership positions call attention to an issue.



James Jay



Harlyn O. Halvorson

Mobilizing Black Microbiologists

Jay was a mentor and role model for many black microbiologists who attended ASM meetings in the 1970s and onward. It was at the 1978 General Meeting that I met Jay. He was busy organizing a group to meet on the outside perimeter of the convention center. At that time, there was no ASM-sponsored reception for minority microbiologists, and black meeting attendees would usually meet in a hotel room or at a restaurant over dinner. In 1981, Jay did a mailing to organize a formal gathering for the 1982 Atlanta meeting. The gathering was held at the Atlanta America, and invitees were asked to donate \$7.00 to cover refreshments. Atlanta University cordially paid for the location; and Rena Jones of Spelman College, who incidentally received her Ph.D. under Jay, organized the event. At the 1983 meeting in New Orleans, the gathering was held at the New Orleans Marriott Hotel, the donation request was \$10.00, and the group was growing. In 1984 or 1985, ASM began to sponsor the reception, and today the ASM Minority Mixer is well attended, not only by minorities, but also by a diverse group of ASM members, including the Society's officers.

Committee on Microbiological Issues Impacting Minorities (CMIIM)

In 1984, Halvorson appointed the Committee on the Status of Minority Microbiologists (CSMM) (now the Committee on Microbiological Issues Impacting Minorities [CMIIM]) with Gerald Stokes of George Washington University, Washington, D.C., as chair. Stokes chaired the committee until 1993; however, Henry Williams of the University of Maryland Dental School served as interim chair during a period when Stokes took leave to pursue tenure. Under the leadership of Stokes and Williams several very successful initiatives were established. These included the ASM/NIGMS Minority Student Science Careers Support Program (MSSCSP), initiated in 1986 along with the MSSCP Visiting Scientist Program; the establishment of minority microbiologist directories; recommendation of minority ASM members to serve on ASM committees and editorial boards; publication of the *Mentor* newsletter; and sponsorship of roundtable or symposium sessions at the ASM General Meetings.

Additionally, an ASM-sponsored national fellowship program for minority graduate students in the microbiological sciences, established in 1980, was renamed the Robert D. Watkins Graduate Research Fellowship in 1997. Watkins served as ASM's public relations director and was the first African-American to serve in a major staff position at ASM, and he was very active in promoting ASM's minority programs. Finally, CSMM was a founding member and the Society's representation to the SuperMAC, a coalition of minorities' affairs committees (MAC) of professional scientific organizations, established in 1993. The purpose of the SuperMAC is to collectively address common concerns of each MAC and to present a unified public policy/agenda to individual councils of scientific societies and to the nation.

Following Stokes' tenure, John Allen of North Carolina Agricultural and Technical State University served as chair through 1997. In 1997, Carlos Del Rio of Emory University in Atlanta, Ga., was appointed chair, and he served until 2003. During the period from 1993 to 2003, CSMM initiatives continued and some activities previously handled by CSMM were transferred to other newly formed ASM minority committees.

Table 1. William A. Hinton Research and Training Award Laureates

2007	Carolyn B. Brooks, University of Maryland, Eastern Shore
2006	Sally B. Jorgensen, University of Minnesota
2005	Willie Turner, Howard University
2004	John F. Alderete, University of Texas, San Antonio
2003	Henry N. Williams, University of Maryland, Baltimore
2002	Michael F. Summers, University of Maryland, Baltimore County
2001	Helen Buckley, Temple University
1999	Thoyd Melton (deceased), North Carolina State University
1998	Luther S. Williams, National Science Foundation

With the appointment of Marian Johnson-Thompson in 2003, the CSMM reassessed its role in light of the newly established minority committees. Thus, CSMM was renamed the Committee on Microbiological Issues Impacting Minorities (CMIIM) and revised its mission. Though education and membership continued to be important policy concerns of the committee, programs to address these areas were shifted to the education and membership boards, respectively. Nevertheless, CMIIM continued the policy-focused initiatives established by the CSMM and expanded its activities to include the establishment of an ASM General Meeting travel grant, with NIAID/NIH support and publication of an electronic newsletter, *The Minority Microbiology Mentor*.

Efforts by the Education Board

During the mid-1990s, the Precollege Committee of the Education Board initiated the “Heroes of Microbiology” poster featuring minorities for middle school students. With this poster being highly successful and in great demand, the committee decided to do a similar poster focusing on women, and the “Heroines of Microbiology” poster followed.

A significant milestone occurred when Houston was appointed chair of the Education Board in 1997, becoming the Society’s first African-American Board chair. During Houston’s tenure, there was a major increase in efforts to attract minority participation. One big accomplishment was the Society’s NIH award to manage the Annual Biomedical Research Conference for Minority Students (ABRCMS). ABRCMS has become the largest professional conference for minority students, with over 2,600 registrants. As a result of this effort, Houston received the Presidential Award for Excellence in Science, Mathematics and Engineering Mentoring in 2000.

Table 2. Known^(a) African-American Members of the American Academy of Microbiology

Event	Year
Welton Taylor	1974
Vincent Hollis	1976
Willie Turner	1977
George Royal	1979
John Wallace	(deceased, election year unknown)
Reginald Bennett	1988
Brendlyn Faison	1991
Luther Williams	1992
Gerald Stokes	1992
Marcia Moody	1995
George Counts	1996
Julius Jackson	1996
Ed Hanna	1997
James Jay	1997
Howard Johnson	1997
Clifford Houston	1997
Marian Johnson-Thompson	1998
Paul Edmonds	1999
Lizzie Harrell	2000
David Satcher	2001
George Hill	2002
Yilma Tilahun	2004
Lee Riley	2004
Henry Williams	2005

a. The AAM does not keep a list of racial and ethnic minorities. This list was compiled from information provided to the author.

Expansion of ASM's Minority Committees

Earlier efforts of CSMM led to the establishment of a Minority Task Force, cochaired by Henry Williams and Gail Cassell of the University of Alabama, Birmingham (currently at Eli Lilly and a former ASM President). This task force's recommendations led to additional minority committees and increased efforts to include minority members in ASM activities.

The Committee on Minority Education of the Education Board was created in 1993, and its first chair was George Hill (Meharry Medical College). In 1997, the Underrepresented Members Committee (UMC) of the Membership Board was created, and its first chair was George Counts of the Fred

Hutchinson Cancer Center, now retired. The UMC has established several initiatives, including the Faces of ASM Series, an online mentoring program and a mechanism for ensuring that minority members interested in serving on committees and editorial boards are able to do so. The American Academy of Microbiology (AAM) established a Diversity Committee in 1999, chaired by Eugene Cota Robles of the University of California, Santa Cruz, now retired. In 2003, Marian Johnson-Thompson was appointed chair of the Diversity Committee and became the first African-American to hold this position. Each of these committees has missions to increase minority participation in their respective domains.

Table 3. Landmark events in history of African-American ASM microbiologists, part II^(a)

Event	Year	Person(s)
First Elected to the AAM	1974	Welton Taylor
First Diplomate, American Board of Medical Microbiology, Emeritus, 1986	?	Welton Taylor
First Chair, CMIIM (formerly CSMM)	1984	Gerald Stokes
First Chair, Committee on Undergraduate Education, Member Education Board	1990	Marian Johnson-Thompson
First Chair of the Committee on Minority Education	1993	George Hill
First Chair of Hinton Awards Committee	1997	James M. Jay
First ASM Board Chair (Education)	1997	Clifford Houston
Renamed the ASM Minority Graduate Fellowship to the Robert D. Watkins Graduate Research Fellowship	1997	Robert Watkins
First ASM/UNESCO visiting scientist	1999	Marian Johnson-Thompson
First Hinton Award Recipient	1998	Luther Williams (NSF)
First recipient of the Presidential Award for Excellence in Science, Mathematics, and Engineering Mentoring	2000	Clifford Houston
First Chair of AAM's Diversity Committee	2002	Marian Johnson-Thompson
First Alice Evans Award	2004	Marian Johnson-Thompson
First ASM Founders Award	2005	George Counts
First President-Elect, ASM	2006	Clifford Houston

a. An earlier set of events has been published (*ASM News*, February 1997, p.77-82).

Hinton Award

Another outcome of the Minority Task Force was the establishment of the William A. Hinton Research Training Award in 1997. This award honors outstanding contributions fostering the research training of underrepresented minorities in microbiology and is directed by the American Academy of Microbiology, as are all of the Society's awards programs. The first Hinton Award Committee was chaired by James Jay, and the first award was made in 1998 to Luther Williams of the National Science Foundation (currently at Tuskegee University). Table 1 lists subsequent laureates.

It is instructive to look at similar awards of other professional societies. The American Society of Cell Biology Minorities Affairs Committee was launched in 1980, and in 1984 its members established the E. E. Just Award. The Minorities in Cancer Researcher, only recently established the Jane Wright (1919-) Award in 2006. The National Organization of Black Chemists and Chemical Engineers (NOBCChE), organized in 1972, made its first Percy Julian (1899-1975) Award in 1974. The American Chemical Society (ACS), the world's largest scientific organization, elected Henry A. Hill and its first African-American President in 1977. Following his death 1979, the Henry Hill Award was established, and it is presented by the ACS Division of Professional Relations.

American Academy of Microbiology

The American Academy of Microbiology (AAM) has more than 2,000 elected members. Welton Taylor, elected in 1974, is believed to be the first African-American Fellow, there are some 2 dozen African-American members (Table 2). A review of

election dates show that most were elected in the 1990s. African-American Fellows have participated in AAM colloquia and on the AAM's board of governors, and 2 members have served as chairs of AAM committees. The dates of certification by the American Board of Medical Microbiology (ABMM) are strictly confidential; however, Welton Taylor is believed to be the first African-American to be certified as a Diplomate of the ABMM.

Other Milestones

In 1999, the Society celebrated its centennial year, and one African-American—Ed Hanna of the National Institutes of Health—served on the Centennial Planning Committee. On the covers of the preliminary and final program booklets, only six microbiologists were featured, and Hinton was among the 6. Additionally, a poster was displayed that featured contributions by microbiologists and Hinton was included.

ASM began to form student chapters in 1990. While Johnson-Thompson served on the Ad Hoc Committee on Student Membership, the Thomas B. Smith Student Chapter was established at Howard University, in 1991 the first such chapter at a HBCU.

ASM has significantly increased its efforts to engage underrepresented members in all facets of Society activities, and to increase the participation of this group in the microbiological sciences. The early efforts of black microbiologists and subsequent efforts have paved the way for emerging black microbiologists and other underrepresented groups to be able to enjoy the full range of Society opportunities. Now that we have reached this point, we must continue the momentum and never forget the efforts of those who worked to ensure that a member of an underrepresented minority could become president of ASM.

SUGGESTED READING

Cobb, W. M. 1948. *William Augustus Hinton, M.D., 1883-*. J. Natl. Med. Assoc. 49:427-428.

Hayden, R. C., and J. Harris. 1976. *Nine black American doctors*. Addison-Wesley Publishing Co, Reading.

Johnson-Thompson, M. 2002. *Faces of ASM – Welton I Taylor*. ASM News 68:36-37.

Johnson-Thompson, M. 2003. *Faces of ASM – James Jay*. ASM News 69:253-254.

Johnson-Thompson, M. C., and J. M. Jay. 1997. *Ethnic diversity in ASM: the early history of African-American microbiologists*. ASM News 63:77-82.

Manning, K. P. 1983. *Black Apollo and science: the life of Ernest Everett Just*. Oxford University Press, New York.

Mickens, R. E., and E. Bouchet. 2002. *The first African-American doctorate*. World Scientific Pub. Co. Inc.

Kessler, J. H., J. S. Kidd, R. A. Kidd, and K. A. Morin. 1996. *Distinguished African American scientists of the 20th century*. Oryx Press Phoenix.

Poindexter, H. A. 1973. *My world of reality*. Balamp Publishing, Detroit.

Williams, S. 1997. *Physicists of the African diaspora-Edward Alexander Bouchet*. http://www.math.buffalo.edu/mad/physics/bouchet_edward_alexander.html

Yount, L. 1991. *American profiles – black scientists*. Facts on File, New York.