Introduction

Continued diversification of the physician workforce with respect to gender, race, and ethnicity is an ongoing goal. With respect to gender diversity in the physician workforce, it has been suggested that women may have unique leadership and communication styles, as well as different research and practice priorities when compared to their male counterparts. Women have been shown to be more likely than men to pursue clinical and research careers in women’s health, and studies suggest female patients report more trust and higher satisfaction when treated by a female physician. There is similar suggestion that patient satisfaction and engagement are increased for minority patients treated by ethnic minority physicians. A more diverse healthcare workforce could thus enhance the healthcare experiences of ethnic minority patients and may help to minimize health disparities. Diversity in the healthcare workforce could also improve the cultural competence and experiences of health care trainees and professionals.

Materials and Methods

13 year trainee data from the American Medical Association, and 15 year full-time faculty data from the American Association of Medical Colleges for the specialties Hematology/Oncology and Radiation Oncology were assessed for changes over time in the percentage of females (years: 1999-2013) and under-represented minorities (years: 2001-2013). Binomial models assessed for changes over time in females and under-represented minority representation with the first year used as a reference for comparison.

Results

Among radiation oncology trainees, no statistically significant change was seen in the percentage of females over the last 15 years (p=0.811). The years 2007 (p=0.02, OR 1.37) and 2009 (p=0.04, OR 1.33) revealed statistically significant increases over the year 1999 that have since decreased. Among hematology oncology trainees, almost the opposite pattern is seen, with a steady increase in the percentage of females over the last 15 years (p<0.001, OR 2.20) with nearly all years revealing statistically significant increases from the reference year 1999, with the exception of the year 2000. Among radiation oncology faculty, statistically significant increases, were observed for the years 2011-2013, with 2013 revealing the largest increase (p=0.007, OR 1.3). Among hematology oncology faculty, statistically significant increases were larger and observed earlier than radiation oncology, with the year 2013 revealing the largest increase (p<0.001, OR 2.05). Under-represented minority faculty saw no statistically significant changes over the last 15 years. No statistically significant increases from the reference year 2001 were observed for under-represented minority trainees in radiation oncology (p=0.44) or hematology oncology (p=0.54). The percentage of under-represented minority trainees in radiation oncology revealed statistically significant decreases from the year 2001 for the years 2003 (p=0.04, OR 0.49), 2005 (p=0.04, OR 0.49), and 2008 (p=0.03, OR 0.47).

Conclusions

The proportion of RO female trainees over the last 15 years has seen no appreciable change, in contrast to female HO trainees, which has steadily increased over this period, suggesting that interest in oncology is not a barrier. While the percentage of female RO full-time faculty has increased during this interval, these increases are slower and modest when compared to patterns observed in full-time female HO faculty. If RO female trainee numbers remain in the current range, this will constitute a de-facto ‘ceiling’ on the amount of females in our specialty, at a level that HO faculty has already surpassed. The percentages of URM oncology faculty and trainees have not changed over the time periods examined in this study. These findings are useful, particularly in RO which is lagging behind HO for females and similarly unchanged for URMs, for the design of targeted interventions (e.g. exposure, mentorship, research) to ensure that the oncology profession includes the diversity of the population it serves. Determining the factors that motivate internal medicine trainees to become medical oncologists may aid in the recruitment of women and URM in radiation oncology and will enable mentors to concentrate on these factors.

References

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Diversity in the Oncological Workforce: Comparison of Radiation Oncology and Hematology Oncology

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