Additional Degrees and Academic Radiology

Stephen R. Baker, MD
Naznin Daginawala
• What are the programs?
• Are they subscribed?
• What are their effects?
  – Now or in the future
We must differentiate between degrees earned in degree-granting programs within or adjacent in time with the terms of medical school or residency, or in continuity with academic practice and ...
advanced degrees obtained independently unassociated with such linkages
With respect to the number of degrees received the latter are probably much more common than the former
Example

• Our four fourth year residents
  1- Completed Nuclear Medicine before Radiology
  1- Masters Degree in Science before medical school
  1- MPH as part of combined 5-year MD/MPH program
Example

• Five 3rd year residents
  1- MPH before medical school
  2- MPH during residency
Example

• SRB
  – 2 masters degrees in Geography obtained when in private and then academic practice using GI Bill money after military service, completely separate from medical school or residency, done after hours
Example

• 75 applicants for residency this year
  – 5 had MBA independently
  – 5 had MPH independently
  – 1 had MPH and MBA
    • MBA independently
    • MPH within medical school
• We cannot gauge the extent of the pursuit of MBAs or MPHs earned independently by one early in their career in Radiology
• We do know more about additional degrees earned by current chairpersons but we cannot generalize from that
• So we will confine the first part of the talk to linked degrees through medical school and residency
• Our paper “Leadership Training for Radiologists: A Survey of Opportunities and Participants in MBA and MPH Programs by Medical Students, Residents, and Current Chairpersons”
  – Has been accepted by JACR to appear this Summer
Why Should Physicians Seek to Obtain Other Degrees?

1. Increasing complexity of practice
2. Need to develop relationships with a wider range of relevant stakeholders
3. Diversity of skill sets pertinent to job
Why Should Physicians Seek to Obtain Other Degrees?

4. Decision making - account taken of:
   - Clinical concerns
   - Financial issues
   - Regulatory matters
Why Should Physicians Seek to Obtain Other Degrees?

5. Leadership skills
   – Necessary to navigate across a “sea” of relationships as decision maker
• 2004 Institute of Medicine
  – Academic medical centers should “develop leaders at all levels who can manage the organizational and system changes necessary to improve health through innovation in health professions education, patient care, and research”
• ACGME general requirements recommendation that each program provide surveillance procedures directed to how residents and fellows learn to work with others in the organization and management of health care
• The compelling need for the acquisition of management competence is still largely unmet
• It could be addressed by a formal commitment of time and attention to pursuit of a degree in complementary disciplines such as through an MBA and/or MPH
MBA-MPH Opportunities Open to Medical Students
Methods: Medical School Programs

• All allopathic schools surveyed regarding
  – Available MD/MPH opportunities
  – Available MD/MBA opportunities
Methods: Medical School Programs

• In May 2010 email requests were sent to all medical school education offices
• If no response, office of admissions and website consulted
Results: MD/MPH

• 81 of 128 schools or 63.3% offered it in 2010
  – 35 in 1994
  – 64 in 2004
Results: MD/MBA

• 52 of 128 schools or 40.6% offered it in 2010
  – 13 in 1994
  – 42 in 2004
Other Programs- Less Common

• MHA (Master of Health Administration)  
  – 6 programs
• MPA (Master of Public Administration)  
  – 1 program
• MPP (Master of Public Policy)  
  – 5 programs
• MSPH (Master of Science in Public Health)  
  – 1 program
• MHSA (Master of Health Services Administration)  
  – 2 programs
• Masters in Leadership of Health Care Organizations  
  – 1 program
Growth in Combined Degree Programs

<table>
<thead>
<tr>
<th>Year</th>
<th>MD-MPH</th>
<th>MD-MBA</th>
</tr>
</thead>
<tbody>
<tr>
<td>1994-1995</td>
<td>20</td>
<td>10</td>
</tr>
<tr>
<td>2004-2005</td>
<td>50</td>
<td>35</td>
</tr>
<tr>
<td>2010</td>
<td>80</td>
<td>50</td>
</tr>
</tbody>
</table>
Growth Potential

• 2 schools planned to begin MD/MPH programs
• 2 other schools planned to begin MD/MBA programs
MPH-MBA Opportunities Open to Trainees
Methods- Residency Programs

• APDR members queried (August 2010)
  – Formal opportunities for such degrees related to their residency
  – Degree completed during or just beyond training interval
• All program directors answering affirmatively were contacted by telephone
  – Asked if program was for all trainees or specific to radiology
  – Number of trainees recorded
Complementary Data Form

• AMA’s FREIDA online database
  – Derived from GME Track/ National GME Census
    • If MBA or MPH offered, program directors interviewed by phone
Results

• 178 APDR members
  – 43 (24%) responded
  – 6 (14%) reported program existence
    • Yet low response
FREIDA Database

• 186 radiology programs
  – 131 responded
  – 11 (8%) answered affirmatively
FREIDA Database

• 11 program directors contacted by phone
  – 2 denied present program
  – 2 could not be reached
  – 3 offered MPH
  – 1 an MBA
  – 4 a PhD
    (1 offered a PhD and MPH)
Combining Two Surveys

• 147 programs
  – 8 (5%) MPH and/or MBA offered
MPH Programs

• 6 MPH-related programs
  – Only 1 had at least 1 trainee
  – 5 never had enrolled trainees
    (1 just opened)
MPH Programs

• 2 programs- specifically for radiologists
• 4 programs- all trainees eligible
• Only one program enabled completion within 4 years of residency
  – Our program at New Jersey Medical School
MPH Programs

• 2 programs- one extra year
• 1 program- two extra years
MBA Programs

• 3 programs had allied MBA
  – None had consistent enrollment
    • (1) had two students - past 10 years
    • (1) required an additional year
    • No program tailored to radiology residents
• Hence – MPH and MBA programs are very limited
• At present only the two residents in one program are to the best of our knowledge currently enrolled in an allied MBA or MPH
Additional Degrees Held By SCARD Members
Methods

• Survey Sent August 2010
  – ? MPH, MBA, PhD, or other degree
  – Temporal relation to medical school training interval or later
  – Programmatic tie or independently sought
Results

• 113 members – 53 responses (47%)
• 14 (26%) – additional degree besides MD
# Degrees Possessed by Current SCARD Members

<table>
<thead>
<tr>
<th>Degree</th>
<th>#</th>
<th>% of respondents with degree</th>
</tr>
</thead>
<tbody>
<tr>
<td>MBA</td>
<td>4</td>
<td>29%</td>
</tr>
<tr>
<td>MPH</td>
<td>3</td>
<td>21%</td>
</tr>
<tr>
<td>PhD</td>
<td>5</td>
<td>36%</td>
</tr>
<tr>
<td>MHCM*</td>
<td>1</td>
<td>7%</td>
</tr>
<tr>
<td>M. Phil</td>
<td>1</td>
<td>7%</td>
</tr>
</tbody>
</table>

* MHCM: Master of Health Care Management
<table>
<thead>
<tr>
<th>When Earned</th>
<th>#</th>
<th>Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td>Before medical school</td>
<td>2</td>
<td>14%</td>
</tr>
<tr>
<td>Between medical school and residency</td>
<td>2</td>
<td>14%</td>
</tr>
<tr>
<td>Well beyond training</td>
<td>10</td>
<td>71%</td>
</tr>
</tbody>
</table>
Conclusion

- Rapid growth of announced dual-degree programs in medical school
- Yet extent of enrollment not known
- Limited allied programs for residents
- Only one currently has students
• Most degrees earned during career
• MBA can be full program or shortened, executive program
  – Several hundred business schools offer this degree
Alternative - Leadership Courses

• AUR- Carestream Minicourse
• AUR- AGFA Radiology Management Program
• SCARD Leadership and Management in Radiology Program
New Initiatives

• ACR Multiphase Program
  – Commission to Oversee Practice and Leadership
  – Comprehensive, sponsored activities
  – On-site and web-based
  – Degree granting
New Initiatives- RSNA

• Leadership Track at RSNA
New Initiatives- Professionalization of Leadership

- Six-point development to create professional leaders by age 36
  1. MPH or MBA before residency
  2. Residency
  3. Fellowship
  4. MBA or MPH during training
  5. Practice- 3 years
  6. 9 months to a year in Washington as a lobbyist
• At completion - full range of capabilities - springboard to assumption of leadership role