

Why is Dental Public Health residency program needed in Pakistan?

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In Pakistan, the system of post graduate dental education and training started in year 1995 and so far, almost 650 specialists have been trained in various disciplines of dentistry. These graduates are serving as faculty in undergraduate and postgraduate teaching institutions, or consultants in hospitals in Pakistan and abroad. At present, only five dental specialties are recognized by the board at the College of Physicians and Surgeons of Pakistan. These specialties are: Oral Maxillofacial Surgery, Orthodontics, Operative Dentistry-Endodontics, Prosthodontics and Periodontology¹.

In comparison to developed world, academic dentistry in Pakistan has a lot to gain. Table 1 exhibits that in USA and UK, there are 10 to 12 established disciplines available for dental graduates to get residency training in^{2,3}, whereas in Pakistan, these are confined to only five. Even in India, there are nine established specialties, offering a more diverse and comprehensive training model⁴.

In Pakistan, the two dental disciplines that warrant immediate attention and should be established as subject specialties are: Dental Public Health (DPH) and Pediatric Dentistry^{5,6}. There are other specialty subjects such as Special Care Dentistry and Oral Medicine which too, are lacking in our country. However, these disciplines are locally overseen by faculty of Oral Maxillofacial Surgery. Interestingly, disciplines such as Dental Anesthesiology, Oral Radiology and Oral Pathology are standalone specialties recognized by the American Dental Association, but in Pakistan, these subject-

s fall in the domain of medical specialties of anesthesiology, radiology, and pathology respectively.

From teaching standpoint, there is an acute shortage of dentists trained in the DPH⁵. Due to limited number of people in this area, it's nearly impossible for the academic institutions to find, induct or retain suitable teachers in this discipline. Lack of properly trained teachers in DPH automatically translates into poor understanding of research amongst dental graduates.

From the professional services standpoint, there is a vacuum in public health dentistry at national level. The competency list of the DPH personals (table 2) exhibit that they should be the ones who should provide expertise in the areas of oral epidemiology and biostatistics. Similarly, they are expected to devise interventions that could improve the oral health of communities, carry out surveillance of the existing dental public health programs, and improve the overall quality of life of the populations. Thus, these DPH specialists could become the backbone of dental research in the institutions.

Both the academic and service aspects of DPH warrants attention. The first and foremost step is to establish DPH as a distinct specialty subject and initiate FCPS program in this discipline. Initially, the DPH training could be offered to the aspiring candidates, by first, incentivizing the subject experts who are already available in the country to serve as supervisors.

The team that could be the best resource for training DPH experts in the country is the faculty at Community Health Sciences department of the Aga Khan University. This department has already trained over 30 dentists in Epidemiology and Biostatistics. These graduates should be allowed to register in the proposed FCPS-DPH program as inter-

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mediate module passed candidates, receive years residency training under the mentorship of FCPS Community Medicine (Public Health) supervisors to fulfill the requirements. This will make them eligible for the exit level examination. Once the program is matured and academic momentum is gained, the DPH experts can take it from there.

If the above approach is implemented, an adequate pool of DPH academicians and researchers would be created in the country. This will not only eliminate the scarcity of DPH teachers but will also produce dental researchers who can contribute to indigenous research in their discipline.

Table 1. List of established dental specialties in Pakistan, India, UK and USA

USA(n=12)	United Kingdom (n=11)	India (n=9)	Pakistan (n=5)
Oral Maxillofacial Surgery	Oral Maxillofacial Surgery	Oral Maxillofacial Surgery	Oral Maxillofacial Surgery
Orthodontics	Orthodontics	Orthodontics	Orthodontics
Prosthodontics	Prosthodontics	Prosthodontics	Prosthodontics
Endodontics	Endodontics	Endodontics & Conservative Dentistry	Endodontics & Operative Dentistry
Periodontology	Periodontology	Periodontology	Periodontology
Pediatric Dentistry	Pediatric Dentistry	Pediatric & Preventive Dentistry	NA
Public Health Dentistry	Dental Public Health	<i>*Included in above</i>	NA
Oral Maxillofacial Radiology	Dental Radiology & Æ	Oral Radiology & Oral Medicine	NA
Oral Medicine	Oral Medicine	<i>*Included in above</i>	NA
Oral Maxillofacial Pathology	Oral Pathology & Oral Microbiology	Oral Pathology & Oral Microbiology	NA
Oro-facial Pain	Special Care Dentistry	NA	NA
Dental Anesthesiology	NA	NA	NA

Æ No exit level examination at royal surgical colleges presently exists.

*Component part of other specialty.

Table 2. Competency list of dentists trained in Public Health Dentistry⁷

1	Plan dental health programs for populations (especially those at high risk of diseases) and devise interventions for the prevention and control of oral diseases.
2	Implement, manage, and develop resources for oral health programs for the promotion of oral health in population.
3	Evaluate and monitor dental care delivery systems and use of surveillance systems to monitor oral health.
4	Advocate and evaluate public health policy legislation and regulations on public's oral health.
5	Critique appraisal of scientific literature to synthesize information/ form guidelines.
6	Design and conduct research studies to answer questions related to public health.
7	Incorporate ethical standards in dental health programs.
8	Teach community dentistry/ dental public health in undergraduate/ post graduate dental institution.

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