



Correspondence

Digital transformation and talent needs in the Greater China region: Additional perspectives from mainland China



KEYWORDS

Digital transformation;
Dental manufacturing
industry;
Market;
Talent need;
Health workforce;
Mainland China

Lin et al.'s paper¹ offers significant insights into the digital transformation and talent needs within the dental manufacturing industry in Greater China. Below, I aim to contribute additional perspectives from mainland China to enrich the discourse on this topic.

Lin et al. noted that digital transformation has somewhat reduced the technical barriers to talent entering the dental manufacturing industry. Nevertheless, the industry's demand for specialized expertise has not diminished. In mainland China, a similar situation exists. However, I contend that beyond the reduction in entry thresholds due to technological advancements, the underlying reason for the apparent disparity between the professionalism of talent and the industry's needs lies in the misalignment between the objectives of current dental medical education and the needs of the industry.

The primary objective of dental education programs in mainland China is to prepare future dentists for the profession. This focus has resulted in a training model characterized by extended academic programs and small-scale elite education. Most graduates secure positions as dentists after completing 8–11 years of specialized study. Dentistry ranks highly among medical specialties regarding income,² working environment,³ and doctor-patient dynamics.⁴ Consequently, compared to other

medical specialties, dentists tend to exhibit higher job satisfaction and are less inclined to relinquish their clinical roles to transition into the dental manufacturing industry.² Similarly, dental students are less likely to prioritize careers in dental manufacturing during their job search due to favorable expectations about their prospects as practicing dentists.⁵ This situation leads to professionally trained dentists not entering the dental manufacturing industry, which has a high demand for skilled professionals. Conversely, those who enter the dental manufacturing industry often lack a formal background in dentistry.

To address the growing need for specialized talent in the dental manufacturing sector within the context of digital transformation, I propose three potential strategies.

At the national level, medical schools could consider offering a specialized program in dental sciences with a shorter duration and flexible enrollment scales. The curriculum should be tailored to the needs of the dental manufacturing industry, emphasizing practical skills, industrial applications, and interdisciplinary fields such as marketing. This strategy ensures a more targeted and efficient training pathway that aligns closely with industry demands while fostering collaboration between academia and industry stakeholders.

At the industry level, dental manufacturing enterprises could explore partnerships with medical schools to design and implement systematic training programs aimed at cultivating high-caliber professionals. By enhancing the technical expertise and specialization of these talents, companies can better align their workforce with evolving industry standards and requirements.

At the individual level, it is crucial to continuously enhance personal competitiveness within the field. It is recommended that individuals deepen their professional knowledge, particularly in areas related to dental medicine and marketing, ensuring that their skills remain aligned with industry demands and expectations.

In conclusion, the ongoing digital transformation has significantly increased the demand for specialized talent in the dental manufacturing industry. Potential strategies to address this challenge include collaborative efforts across national, industry, and individual levels.

Declaration of competing interest

The author has no conflicts of interest relevant to this article.

Acknowledgments

None.

References

- Lin WC, Cheng FC, Tung B, Chiang CP. Digital transformation and talent needs in the Greater China region: the perspective of a regional sales manager with international expertise in the dental materials manufacturing. *J Dent Sci* 2025;20:1322–4.
- Shi K, Wang Y, Sun Z, et al. Turnover behavior and intention among dentists and medical doctors: a cross-sectional study in China. *BMC Oral Health* 2024;24:180.
- Auta A, Adewuyi EO, Tor-Anyiin A, et al. Global prevalence of percutaneous injuries among healthcare workers: a systematic review and meta-analysis. *Int J Epidemiol* 2018;47:19721980.
- Duan X, Ni X, Shi L, et al. The impact of workplace violence on job satisfaction, job burnout, and turnover intention: the mediating role of social support. *Health Qual Life Outcome* 2019;17:93.
- Wen C, Lyu X, Zhang Q. Factors affecting career decision-making of stomatology undergraduate students in China at graduation: a cross-sectional study on selection dilemmas. *BMC Med Educ* 2024;24:1087.

Hongnan Ye*

Department of Research and Medical Education, Beijing Alumni Association of China Medical University, Beijing, China

*Department of Research and Medical Education, Beijing Alumni Association of China Medical University, Room 106, Building 3, Jindian Garden, No. 9, Wenhuiyuan North Road, Haidian District, Beijing, 100000, China.

E-mail address: juventus_buffon@126.com

Received 20 April 2025

Final revision received 20 April 2025

Available online 28 April 2025