International medical migration: what is the future for Australia?

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Despite goals for self-sufficiency, migration seems certain to remain an imperative for Australia for the foreseeable future

Australia has developed extraordinary reliance on international medical graduates (IMGs) compared with other OECD (Organization for Economic Co-operation and Development) countries. Based on analysis of an unprecedented range of secondary data, I aim to define the recent scale and sources of medical migration, IMGs' immigration categories, their distribution, their performance in the Australian Medical Council examinations, and the impact of the Competent Authority Pathway.

From the 2005–06 financial year to 2010–11, 17 910 IMGs were sponsored to Australia on a temporary basis, with a further 2790 selected as permanent skilled migrants.[1,2] Thousands of additional IMGs arrived unfiltered in advance for human capital attributes, admitted as spouses and through Australia's family or humanitarian categories. Recent IMGs have trained in highly diverse countries, associated with very variable English language testing results and medical registration and employment outcomes.

Despite such challenges, I argue that Australia's reliance on IMGs is likely to be maintained in the future, owing to a combination of factors. First, medical migration remains Australia's key strategy for addressing medical workforce maldistribution, with competition to recruit and retain medical migrants recently intensifying rather than diminishing. Second, the Competent Authority Pathway for registration has improved IMGs' outcomes, enhancing their immediate value as a source of supply. Third, Australia has become increasingly reliant on internationally trained specialists to serve in select undersupplied fields. Fourth, there is growing Australian demand for international medical students, who achieve exceptional early outcomes relative to IMGs. Despite greatly enhanced investment in domestic student training, Australia's dependence on international migration thus appears likely to persist rather than reduce in the foreseeable future.

Australia's level of dependence on medical migrants

By 2006, 45% of medically qualified residents were overseas-born, including an estimated 25% who were overseas-qualified.[3] In 2001–2006, 7596 doctors migrated to Australia across all immigration categories — double the number admitted from 1996 to 2000. India, the United Kingdom/Ireland, Sri Lanka/Bangladesh, China, other southern and central Asian countries, North Africa/the Middle East, South Africa, sub-Saharan Africa (excluding South Africa), and the Philippines were the primary source countries at this time (Box 1).[4]

Medical workforce diversification has proven challenging, however. Just 53% of IMGs who arrived in Australia during 2001–2006 secured medical employment by 2006 (across all immigration categories). Doctors from English-speaking countries made the transition seamlessly, while Asian-Commonwealth doctors from countries such as Singapore and Malaysia, India, Sri Lanka and Bangladesh fared reasonably well. Outcomes were poor for many other birthplace groups (Box 1). Just 6% from China had found medical employment within 5 years, 23% from Vietnam and 31% from Eastern Europe. Many had arrived through the family and humanitarian categories — untested in advance for employment attributes or registerability.[4] Thousands were also admitted as spouses. Large numbers of recently arrived IMGs were defined as "not in the labour force" — a proxy for learning English and/or trying to pass preregistration exams. English testing for example was a powerful barrier. By 2010, a pass rate of only 43% was the Occupational English Test norm for medical applicants, rising to 52% in 2011.[1]

Despite highly diverse source countries, workforce integration is best for IMGs selected through Australia's 457 visa temporary sponsored pathway (99% employed at 6 months), followed by those entering under the permanent General Skilled Migration Program. These flows now dominate (Box 2). This pathway is highly attractive to governments and employers given the potential to prescribe IMGs' location as a condition of visa entry, allowing them to work for up to 4 years at undersupplied sites.

By 2009, 70% of labour migrants were sponsored, reflecting the recent dramatic privatisation of Australia's skilled migration program. From 2005–06 to 2009–10, 34 870 health professionals were selected as temporary 457 visa migrants. Nurses (46%) and doctors (44%) dominated. A further 2420 visas were awarded to temporary IMGs in 2010–11: 1190 for general medical practitioners and 1230 for resident (house) medical officers (mostly new appointments). In 2010–11, most such IMGs were recruited to Victoria (600), New South Wales (540), Queensland (500) and Western Australia (280).[2] From 2004–05 to 2009–10 an additional 15 940 General Skilled Migration category migrants holding health qualifications were admitted permanently, primarily qualified in nursing (52%), medicine (15%) and pharmacy (13%). In 2010–11, 460 more IMGs were approved.[1,2]

Additional doctors arrive from New Zealand — enjoying free entry rights under the Trans-Tasman

Mutual Recognition Arrangement, in a context where 12% of the New Zealand population is currently resident in Australia. By 2006, 1163 New Zealand physicians were based in Australia, including 240 admitted from 2001 to 2006.[1]

Performance in the Australian Medical Council examinations

New Zealand doctors face no employment barriers in Australia. Analysis of 28 years of Australian Medical Council (AMC) data, however, reveals that other IMGs experience highly variable registration outcomes. The most detailed study to date, commissioned by the Department of Health and Ageing, showed that just a third of recently arrived IMGs had attempted to pass the AMC preaccreditation exams in the years preceding 2007. Of those IMGs attempting it, 78% were medically employed within 5 years, despite just 41% having by then secured unconditional registration.[5]

According to the AMC Submission to the House of Representatives Standing Committee on Health and Ageing Inquiry into Registration Processes and Support for Overseas Trained Doctors (2011) and additional data provided to me, from 2004–10, 57% of IMGs aged 21–30 years passed the multiple choice question examination on their first attempt, compared with 46% aged 41–50 years and 31% aged over 50. Similar trends were evident in the clinical examination.[6] Box 3 reports outcomes by the top 10 countries of training.

In 2008, given mounting concern, the Australian Government initiated "a national assessment process for overseas qualified doctors to ensure appropriate standards in qualifications and training as well as increase the efficiency of the assessment process".[7] Multiple pathways to practice have since developed, including the fast-track "Competent Authority" option for doctors registered in New Zealand, the UK, Ireland, the United States and Canada. Eligible source countries may opt out — Singapore and South Africa have done so to minimise workforce loss.[6] For IMGs requiring greater periods of adjustment, alternative pathways have been designed to provide enhanced supervision, address differential levels of training need, and increase readiness for specific locations of practice.

Factors affecting Australia's reliance on IMGs

To redress medical workforce undersupply, Health Workforce Australia has been charged by the Australian Health Ministers' Conference with developing a national training plan. The goal is to reach self-sufficiency by 2025.

In the foreseeable future, however, medical migration seems certain to remain an imperative for Australia, given Australia's ageing patient and practitioner base, reduced hours worked by younger cohorts, the growing feminisation of medicine, limited access to internship places, and distribution challenges. The Department of Immigration and Citizenship has recently set "occupation ceilings" for skilled migration in 2012–13. In medicine, the ceiling is 4860 people, compared with 15 660 in nursing, 1380 in pharmacy and 720 in dentistry (numbers are reported at http://www.immi.gov.au/skills/skillselect).

1 Labour market outcomes for degree-qualified Australian and New Zealand-born medical graduates, compared with migrant medical graduates arriving 2001–2006 (2006 census)*

		Employed			Other	
Birth country	Number	Own profession	Other profession	Sub-total	Un-employed	NLF
Australia/New Zealand	39 381	58%	29%	88%	1%	12%
United Kingdom/Ireland	1004	71%	14%	85%	–	15%
Northern Europe	39	51%	18%	69%	–	31%
Western Europe	328	62%	20%	81%	2%	17%
South-eastern Europe	132	49%	24%	73%	2%	25%
Eastern Europe	160	31%	26%	56%	6%	38%
Vietnam	64	23%	25%	48%	5%	47%
Indonesia	73	8%	16%	25%	16%	59%
Malaysia	227	62%	5%	67%	3%	30%
Philippines	256	50%	27%	77%	5%	19%
Singapore	65	63%	14%	77%	–	23%
China (not SAR or Taiwan)	590	6%	47%	53%	11%	36%
Hong Kong/Macau	38	40%	40%	79%	–	21%
Japan/South Korea	102	14%	28%	42%	10%	48%
Other southern and central Asia	364	43%	10%	53%	7%	40%
India	1378	61%	12%	73%	7%	20%
Sri Lanka/Bangladesh	691	56%	16%	71%	7%	21%
Canada/United States	201	48%	17%	65%	2%	33%
Central/South America	117	40%	30%	70%	13%	17%
South Africa	496	75%	18%	93%	1%	5%
Other sub-Saharan Africa	342	71%	6%	77%	7%	16%
North Africa/Middle East	564	47%	13%	60%	10%	31%
Other	365	56%	20%	75%	3%	22%
Total migrants	**7596**	**53%**	**18%**	**71%**	**6%**	**23%**

NLF = not in the labour force. SAR = Special Administrative Region. – = insufficient cases for reliable reporting and issues of confidentiality. Many of the cells are based on very small numbers, therefore the results should be regarded as indicative only.
* Source: UNESCO global comparison study, Table 23.[4] Excludes those for whom birthplace or year of arrival is unknown. Due to missing data, imputation and aggregation, numbers may not add up to 100%. ◆

Migration remains Australia's key strategy for redressing medical workforce maldistribution, with states intensifying competition to recruit and retain IMGs

Between June 2000 and December 2002, 5304 temporary IMGs were sponsored to "areas of need". This level of dependence has been maintained, with 3860 IMGs selected by states or territories in 2007–08 compared with 3310 a year later. In 2008–09, based on state and territory medical board or medical council data, 17 141 doctors were employed under various forms of conditional registration. Further, 2695 IMGs were employed through "area of need" registrations (primarily in Queensland [50%]), with Australia remaining highly reliant on medical migrants for primary care in remote or very remote sites.[3] Definitions of eligible areas have also been extended rather than reduced. In 2007, larger regional centres characterised by significant workforce shortages were included.[8] Following 5 years of service in an area of need, IMGs can apply for permanent resident status.[2]

2 Top 10 recent source countries for permanent and temporary migrant health professionals, 2005–06 to 2009–10*

Country	Permanent migrant health professionals†	Country	Temporary migrant health professionals‡
United Kingdom	4120	United Kingdom	9350
India	1510	India	6420
Malaysia	1300	Philippines	1850
China	970	South Africa	1770
Philippines	510	Malaysia	1570
South Africa	500	Ireland	1560
Republic of Korea	480	China	1380
Egypt	420	Zimbabwe	1180
Singapore	390	Canada	950
Ireland	350	United States	830

* Source: Scoping paper for Health Workforce Australia, Table 6, p. 51, based on Department of Immigration and Citizenship data, reported by financial year.[1] † General skilled migration primary applicants; total all sources, 13 880. ‡ 457 long-stay business visa primary applicants; total all sources, 34 870. ◆

By 2010, 46% of doctors in rural and remote practice in Queensland were overseas-trained. Thirty-six per cent of the 1209 GPs working in rural and remote Victoria had obtained their basic medical qualification outside Australia, primarily in south Asia (11%), the UK or Ireland (7%), Africa (5%), eastern Europe (4%) and the Middle East (3%). IMGs constituted 53% of rural and remote GPs in WA, and were derived from 33 countries of training — double the level of reliance in 2002.[9-12] The majority were 457 visa (or equivalent) temporary sponsored arrivals, typically working under various forms of conditional registration. This practice has become widespread in the past decade, despite growing concerns for the risk of developing "two-tier" medical care.[6] New governance systems have been introduced through the 2010 establishment of the Australian Health Practitioner Regulation Agency;[13,14] however, these have coincided with concern about red tape related to changed recruitment and registration procedures.[15]

Australia's Competent Authority pathway has recently transformed IMG recruitment while enhancing their value as a source of supply

From July 2007 to late 2010, 4955 Competent Authority applications were received by the AMC, and 3327 Certificates of Advanced Standing were issued. This process had been successfully completed by 1990 applicants from 56 countries of training by December 2010, a year when 1281 assessments were handled.[6] In an unanticipated consequence, the Competent Authority model also enhanced Australia's global competitiveness. From 2007–10, the Competent Authority pathway attracted relatively young applicants; 54% of those issued Advanced Standing Certificates were aged 21–30 years, compared with 38% aged 31–40 years. UK-trained applicants were the major beneficiaries (1019), followed by IMGs qualified in India (422) and Ireland (176). Massive growth in arrivals who qualified in the UK or Ireland has occurred, surging to around 3000 in 2007–10, compared with up to a hundred per year previously.[16] These IMGs enjoy strong employment outcomes, despite debate over a registration scheme that allows thousands of IMGs to practise on a supervised basis.

Australia has become increasingly reliant on internationally trained medical specialists to serve in undersupplied fields

In recent decades, Australia's dependence on IMGs has also become marked in select specialties. From 2004 to 2010 the AMC handled 6604 IMG specialist applications, primarily in the fields of anaesthesia (13%), psychiatry (11%), obstetrics and gynaecology (8%), diagnostic radiology (8%) and general surgery (6%).[1] Most were from men (69%), with the top five countries of training being the UK, India, South Africa, the USA and Germany.

In terms of psychiatry, for example, disproportionate numbers of IMGs now work on temporary 457 visas in underserved sites.[17,18] They compensate for an exodus of domestic psychiatrists from public sector and regional practice, who work in large cities in affluent suburbs, near private hospitals where they admit their patients.[19] Rural psychiatrists, by contrast, typically lack access to urban amenities, quality schools and employment for their spouse. Many are on call 24 hours per day, 7 days a week, providing mental health services in regions characterised by gross undersupply.[19] Comparable IMG dependence prevails in many specialties.

There is now growing Australian demand to recruit and retain international medical students

Former international students have emerged as a key medical resource for Australia. By definition they are characterised by youth, full registration, and significant acculturation. They have funded themselves to meet Australian professional standards, and face none of the IMGs' barriers.

By December 2009, close to 3000 international students were enrolled in medical courses (and this has since accelerated). In 1999, following removal of a 3-year eligibility bar, they became immediately able to migrate.[20] As demonstrated by Australia's Graduate Destination Survey, since 2006, retention of international medical students has tripled, with large numbers wishing to

3 Australian Medical Council clinical examination outcomes by top 10 countries of training, 2004–2010*

Top 10 countries of training	No. of candidates	Pass	Fail	Retest
India	1823	52%	29%	19%
Bangladesh	799	42%	38%	20%
Pakistan	665	48%	31%	21%
Sri Lanka	660	58%	22%	20%
China	594	58%	23%	19%
Iran	481	56%	27%	17%
Philippines	437	34%	46%	20%
Burma	374	47%	31%	22%
Iraq	333	52%	29%	19%
Egypt	277	52%	29%	19%
Other countries	2646	58%	26%	16%
Total candidates	**9089**	**53%**	**29%**	**19%**

* Source: Scoping paper for Health Workforce Australia, Table 29, p. 97, based on Australian Medical Council data, reported by calendar year.[1] ◆

migrate. They achieve nearly identical immediate employment and salary outcomes to domestic graduates. By 2010, 98.9% were employed full-time, compared with 99.7% of domestic graduates. Analysis of the Medical Schools Outcomes Database and Longitudinal Tracking Project shows 78% of final-year international students initially stay — virtually all graduates, once sponsored students are excluded.[21,22] While the ethics of international student migration remain a matter of debate, parents rather than source countries have resourced their education. From an ethical perspective, their recruitment is less problematic than the normal recruitment method of OECD countries — selection of mature-age medical professionals fully trained by their countries of origin.[23,24]

Conclusion

Between 2004 and 2009, the number of Australian domestic medical completions rose from 1287 to 1915. Provisional registrations rose from 1699 to 2955.[25] Incentive schemes were also developed (most notably the Bonded Medical Places Scheme, to which 25% of all first-year Commonwealth supported medical school places are allocated) to encourage medical graduates to serve in areas with an undersupply of doctors. Despite such measures, dependence on IMGs seems certain to remain strong, as confirmed by the recent House of Representatives inquiry into overseas-trained doctors.[15] Australia is not alone in this reliance, which is intensifying across OECD nations.[26-29] The challenge will be positioning to recruit and retain "the best" medical migrants, in the context of the highly variable registration and employment outcomes that many initially achieve. To facilitate this, collective action by all relevant jurisdictions will be essential.

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