

Monitoring human resources for health in Hungary

Zoltan Cserhati

Hungarian Ministry of Human Resources

Department for Health Sector Human Resources Strategy

Human resources monitoring from the government's point of view

	Present	Future
Need	?	?
Stock	?	?

How is it possible to calculate the need of human resource for health?

Do we have exact numbers about the (present) stock?

Can we predict the future changes of the health system?

Is it possible to divide health workforce planning from healthcare planning?

Calculating the need

- Primary care: number of GP practices
- Outpatient care: number of financed specialist hours
- Inpatient care: based on minimum professional standards
- Self-assessment of service providers
- Benchmarking? International standards?

Identifying the stock (physicians, 2011)

Data source	Number of physicians
Office of Health Authorization and Administrative Procedures (EEKH) basic registry	48 355
Office of Health Authorization and Administrative Procedures (EEKH) operational registry	29 462
Annual report of staff, posts and incomes in healthcare sector (GYEMSZI)	17 891 (duplication possible)
Central Statistical Office (KSH) annual report	34 736 (incl. dentists, duplication possible)

Physician „clusters”

- Total stock: basic registry
- Main dimensions:
 - Operational registry (valid or not)
 - Prescribing habits (data from Health Insurance Fund)
 - Requests for verification certificates for working abroad
 - Age (below/above standard retirement age)

Type of activity	Headcount
Practising physicians	28 000
Practising physicians with international connection	2000
Potential re-entrants	1800
Working abroad (for less than 5 years)	1000
Working abroad (for more than 5 years)	800
Inactive physicians	11 800
Registered foreign-national physicians working abroad (graduated in Hungary)	3800
Total	49200

To be precise...

- Licenced: without registered foreign-national healthcare professionals, who left after graduation
- Professionally active: data is needed from outside the healthcare sector (university, research, industry, governmental sector)
- Practising: database containing workplace and personalised data together (under development)

Figure 9 – Number of GPs per 10,000 population, 2009



SOURCE: WHO Health database (<http://data.euro.who.int/hfad/>).

Number of general practitioners

Number of filled GP practices (HIF, 2012):

- Adult: 3544
- Child: 1520
- Mixed: 1392
- **Total: 6456**

Number of general practitioners: 3 543 (WHO, 2009)

What is missing from primary care HR statistics....

- Total number of GP practices: 6670
- There are 214 unfilled practices, more than half in „mixed” practices (rural and social inequality)
- 30 per cent of GPs above standard retirement age
- 75 per cent of GPs have licence in other specialties as well
- What to do with primary care service for children? Are they GPs or/and specialists?

Nurses and other healthcare professionals

- „Egészségügyi szakdolgozó” – „healthcare professional worker”
 - Excluding physicians, dentists, pharmacists and clinical psychologists
 - Category based on education: health-related licence/diploma (vocational training or higher education)

	Basic registry (2010)	Operational registry (2010)
„Healthcare professional workers”	192 742	85 839
Nurses	90 838	44 059
Assistants	82 259	32 448

Number of
nurses:
63 909
(WHO-HFA,
2010)

Source: Office of Health Authorization and Administrative Procedures (EEKH)

Critical shortages in certain professions

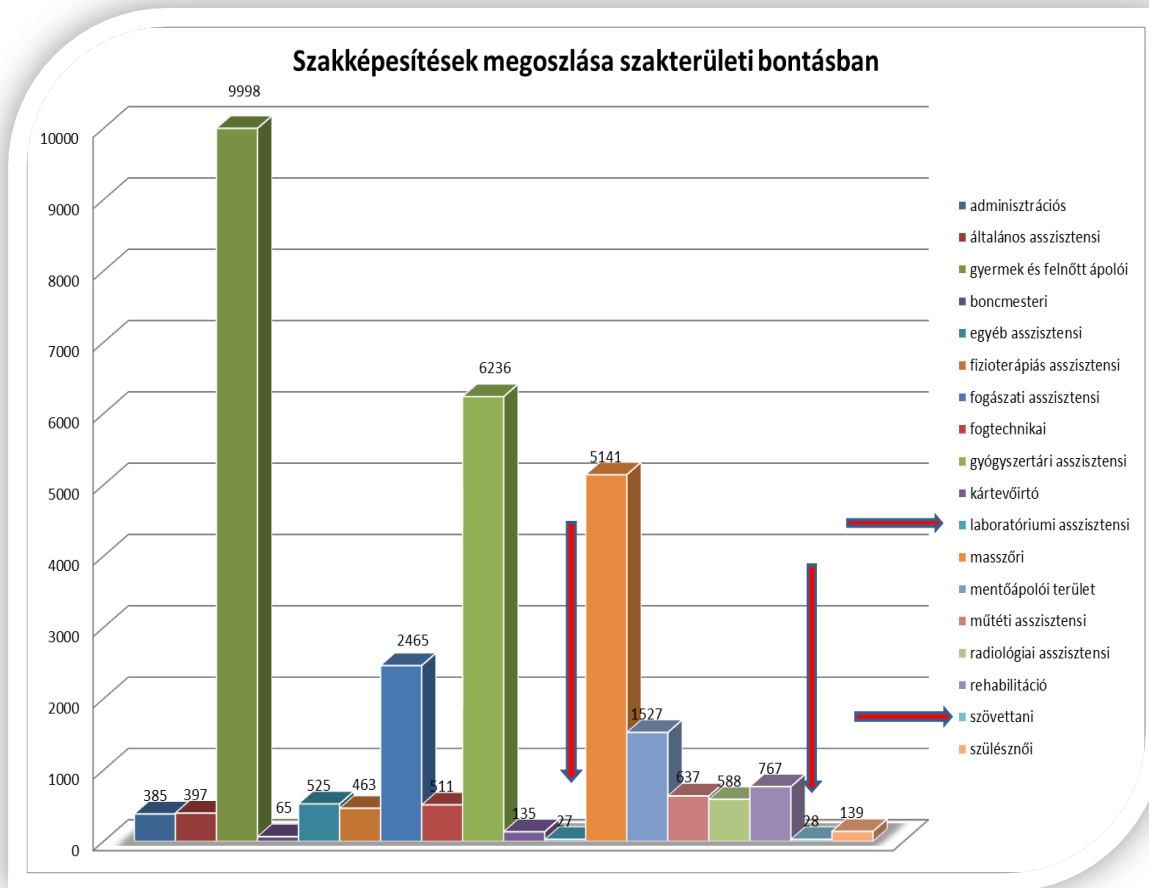
Graduates in vocational training (2008-2012)

Critical shortages:

Laboratory assistants

Cytology and cytopathology assistants

Assistants in anesthesiology and intensive care



Source: OSAP 1929 report on vocational trainings (GYEMSZI)

„Health visitor” network

- Who is a health visitor?
- Hungarian speciality – „hungaricum”
- The network is part of the primary care
 - Competencies for prenatal, infant and child care (until 14 years old children)
 - Close cooperation with general pediatricians
- Number of practices: 5060 (included 1044 school practice)
- Related to midwifery professions?
- **Number of midwives: 1750 (WHO-HFA, 2010)**

Monitoring flows

- Inflow
 - Education
 - Other sectors, temporary leave
 - Emigrants (only 151 health professionals, 55 physicians in 2012)
- Outflow
 - Abroad
 - Retirement
 - „Gradual” retirement
 - 25 per cent of physicians in operational registry above 60 years old
 - Other sectors, temporary leave

Medical education

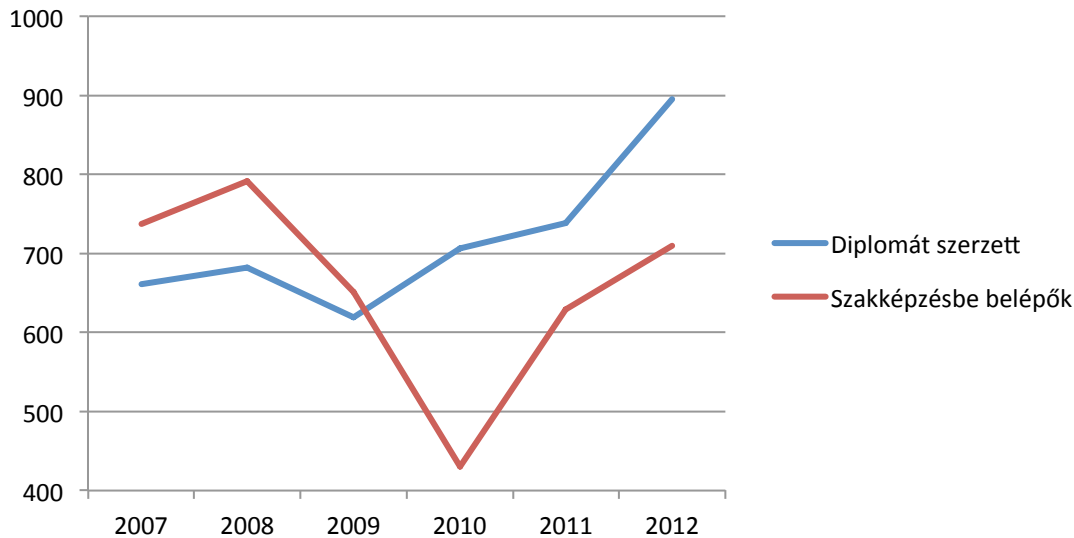
- Possible tool for intervention: university quotas
- Universities near their maximum capacities
- 69% of graduates in Hungarian language program; students from 48 countries



The real challenge is: motivate the graduates to enter into the residency training program

Entering residency training (2007-2012)

Diplomát szerzett és szakorvosképzésbe belépett orvosok száma



Blue line: number of graduated doctors

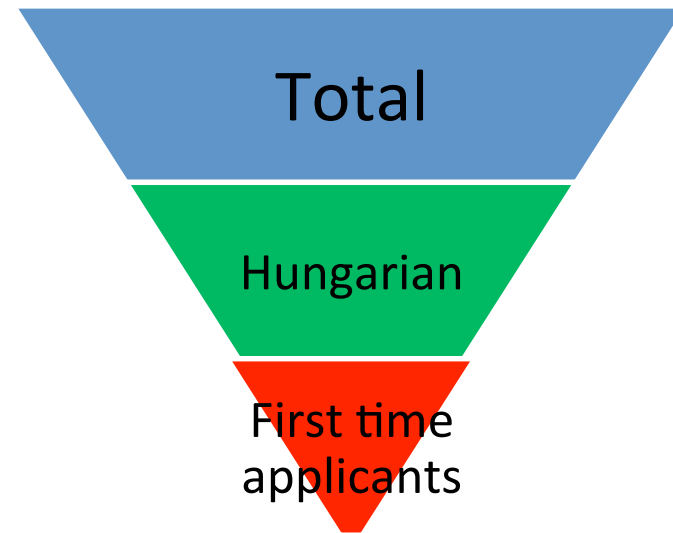
Red line: number of doctors entered into residency program

Interventions:

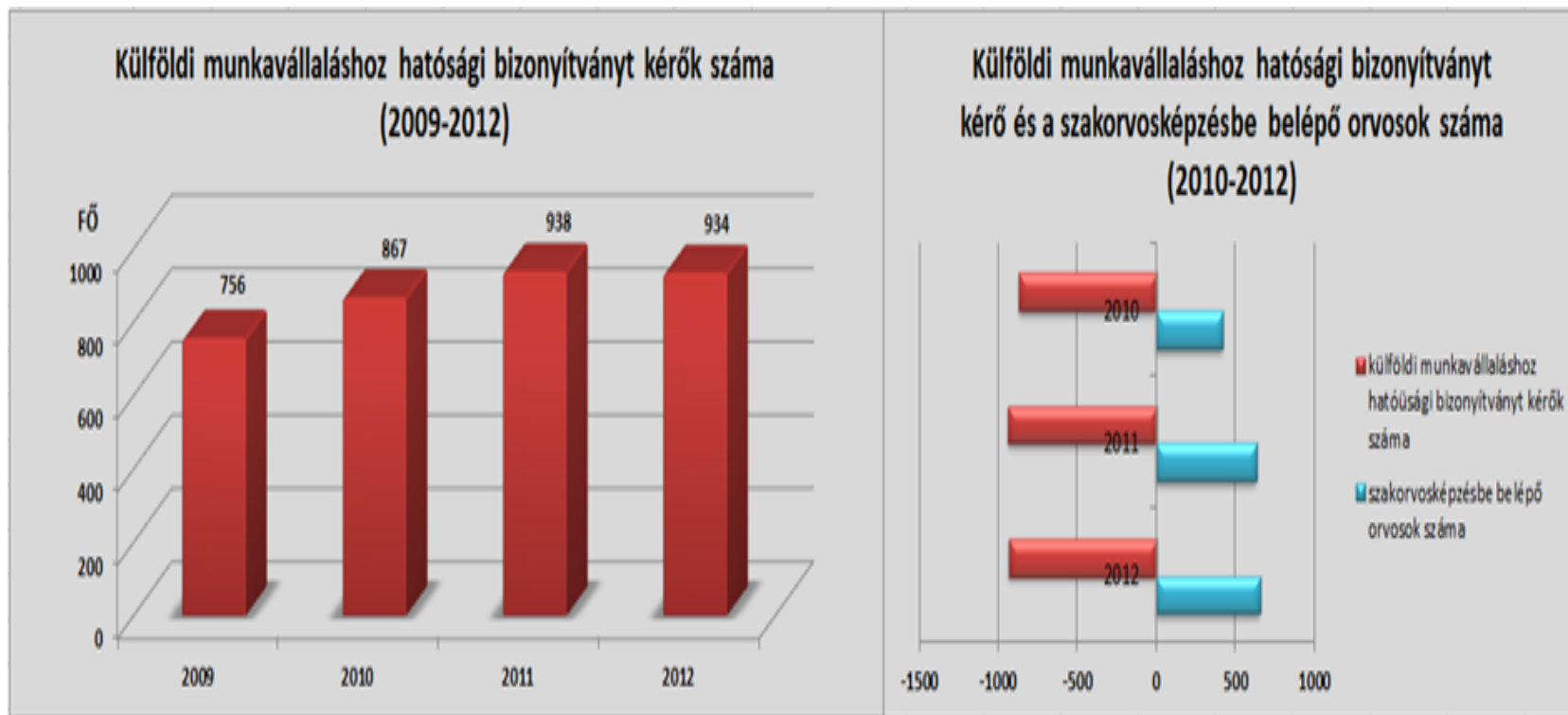
- Higher quota, filled positions based on hospitals' need
- Bonuses for specialties where is reasonable shortages
- Special grants

Indicators for international mobility

- Requests for verification certificates
 - Total number of applicants
 - Applicants without foreign-national professionals, who graduated in the last 12 months
 - Applicants requested certification for the first time
- Physicians with or without specialty
- Target countries



Inflow-outflow balance



Red columns: number of doctors requested verification certificates

Blue columns: number of doctors entered into residency training

Requests for verification certificates

Professional categories	Total	Hungarian	First time applicants	% of first time applicants
Physicians	1108	934	694	74%
specialists		551	375	68%
without specialisation		383	319	83%
Dentists	255	188	128	68%
Pharmacists	65	47	45	96%
Nurses	518	515	478	93%
Total health professionals	2061	1757	1447	82%

Moving abroad or intention to leave?

Connection between number of verification certificates for a target country and number of registered Hungarian physicians

Host country		2009	2010	2011	Aggr.
United Kingdom	Registered in host country	144	189	185	518
	Intention to leave in Hungary	285	309	322	916
	Proportion of registrants	51%	61%	57%	57%
Germany	Registered in host country	99	150	239	488
	Intention to leave in Hungary	205	265	351	821
	Proportion of registrants	48%	60%	68%	59%

Source: Office of Health Authorization and Administrative Procedures (EEKH), General Medical Council (UK) Deutsche Bundesärztekammer (Germany)

Hungarian-nationality doctors working in Germany (2002-2011)



Source: Deutsche Bundesärztekammer

Conclusions

- Challenges: not only calculating the demand, but precise measurement of the stock
- Human resource data from service providers essential
- Applying the „nurse“ definitions
- Inflow management: through residency program
- First time request for verification certificate shows good indicator for international mobility

Thank you for your attention!

