

CARDIOLOGY PROFILE

GENERAL INFORMATION

(Source: Pathway Evaluation Program and Royal College)

The study and practice of cardiology involves a wide range of patient care activities including: basic physical examinations; preventive health; and the diagnosis and management of cardiovascular disease through non-invasive treatment modalities or sophisticated interventions. They often see patients in a consultative role, but most of their patient involvement is long-term and ongoing.

Cardiologists are highly specialized practitioners in a dynamic field who place a premium on mastery and competence. They use their hands for invasive procedures and other manual tasks, but they also apply cognitive skills to the physical exam and other diagnostic procedures. Their daily tasks are diverse. With the pace of new developments (both in medical technology and in broader treatment trends) a high level of challenge and diversity, as well as significant intellectual demands are associated with this specialty.

Cardiologists are expected to act as consultants in cardiovascular disease to all branches of medicine and pediatrics. They must be proficient in the management of acute coronary care problems, participate in the medical and surgical therapy of coronary artery disease and deal with the pre- and post-operative evaluation of cardiac surgical cases. This specialist must deal with cardiovascular problems associated with hypertensive, rheumatic and congenital heart disease and with cardiomyopathies.

CARDIOLOGY PROFILE

A physician may choose whether to specialize in adult or pediatric cardiology. Upon completion of medical school, to become certified in **adult** cardiology it requires an additional 6-7 years of Royal College-approved residency training. This training includes:

- Royal College certification in internal medicine (4 years);
- 3 years of Royal College-approved adult cardiology training that must include rotations in: a clinical residency (acute cardiac care, clinical cardiology, including cardiology CTU and consultation); ambulatory cardiology (may be done longitudinally); pediatric cardiology (which may include adult and congenital heart disease); and a laboratory-based residency (cardiac catheterization, echocardiography, electrophysiology/pacemaker, ECG/ambulatory ECG monitoring/exercise stress testing, nuclear cardiology and an additional elective) research (clinical and/or basic).

For further details on training requirements go to:

http://www.royalcollege.ca/portal/page/portal/rc/credentials/start/routes/traditional_route

Canadian Cardiovascular Society

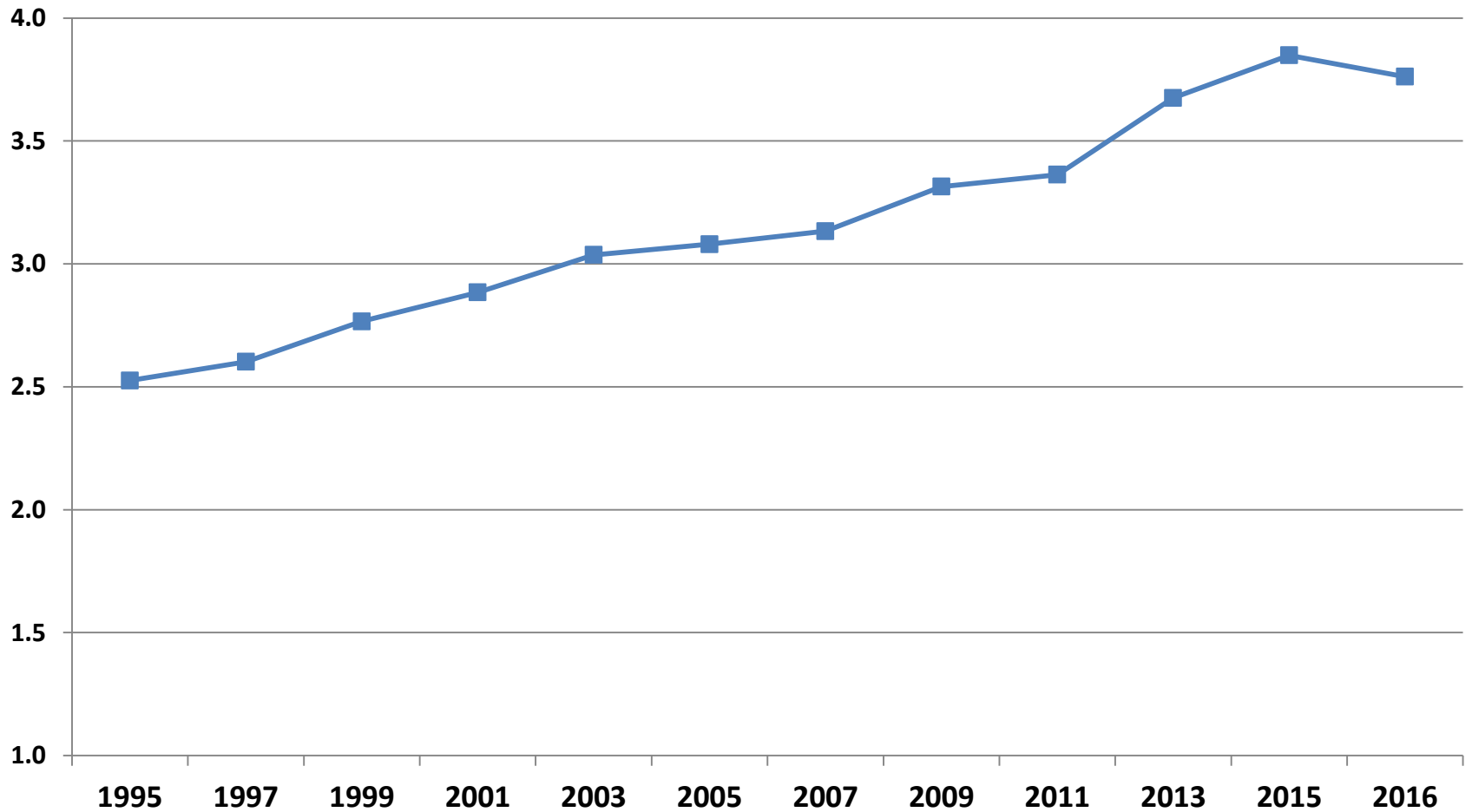
www.ccs.ca

Number of physicians and physicians/100,000 population in Cardiology in Canada, 2016

Province/Territory	Physicians	Phys/100k pop'n
Newfoundland/Labrador	17	3.2
Prince Edward Island	1	0.7
Nova Scotia	38	4.0
New Brunswick	19	2.5
Quebec	452	5.4
Ontario	503	3.6
Manitoba	28	2.1
Saskatchewan	22	1.9
Alberta	147	3.5
British Columbia	129	2.7
Territories	0	0.0
CANADA	1356	3.8

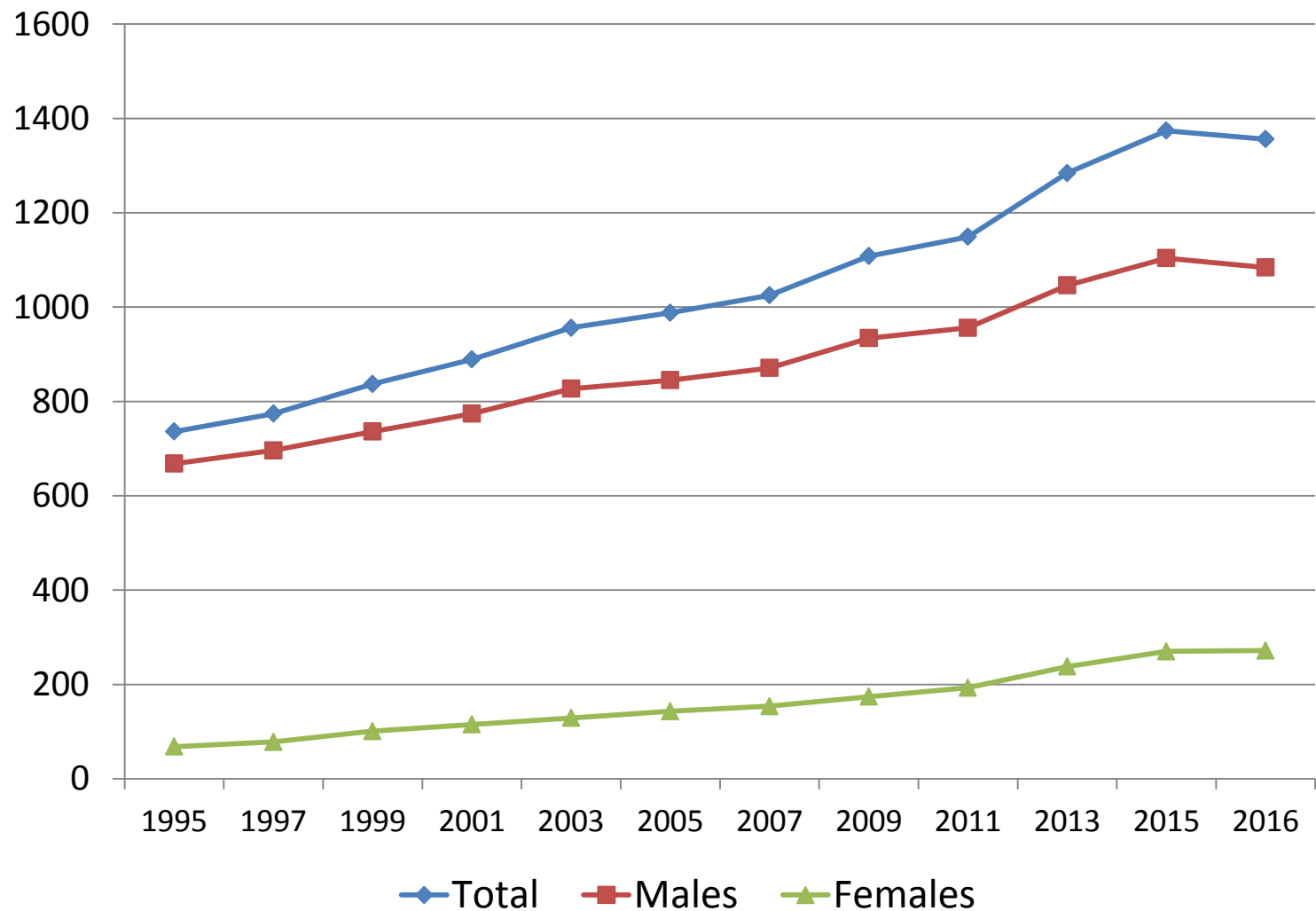
Source: 2016 CMA Masterfile

Physicians/100,000 population in Cardiology in Canada, 1995 to 2016



Source: CMA Masterfile

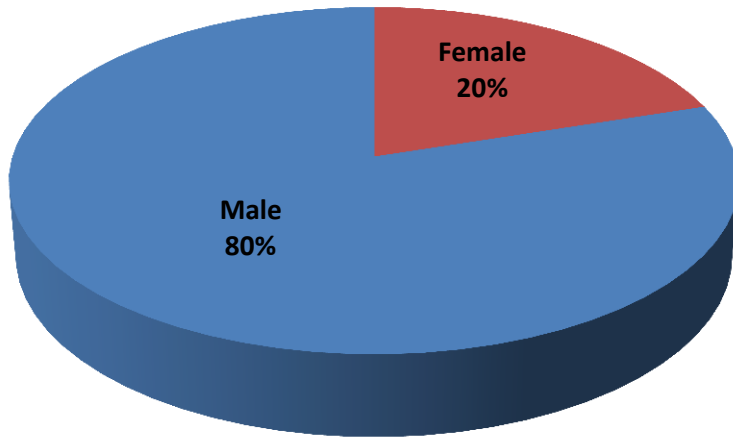
Cardiologists by gender and year in Canada, 1995 to 2016



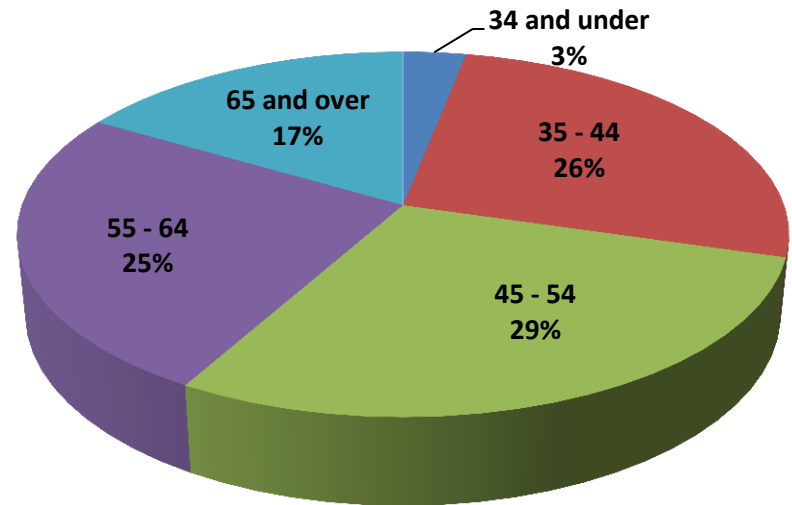
Source: CMA Masterfile

Cardiologists by age and gender in Canada, 2016

Gender

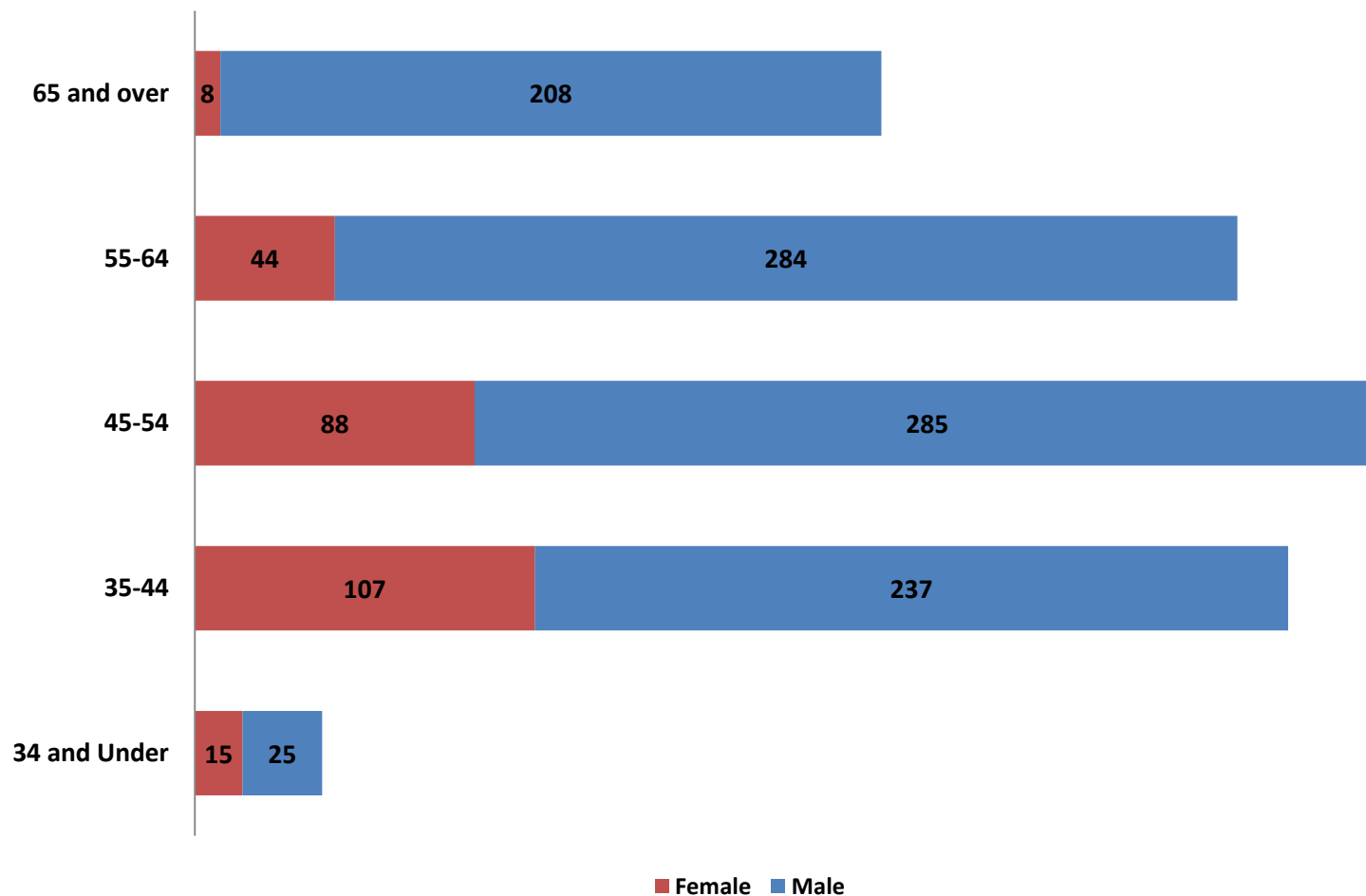


Age Group



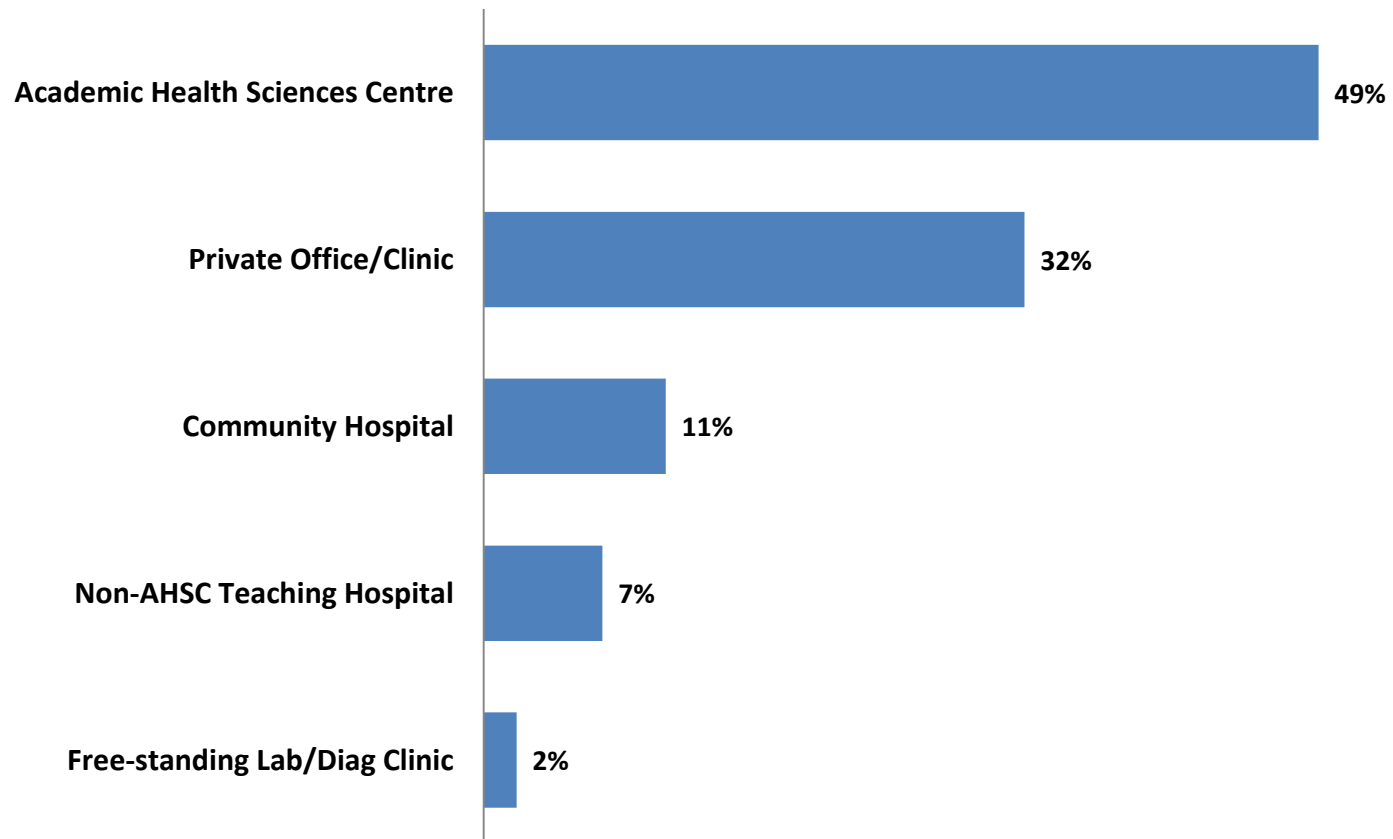
Source: 2016 CMA Masterfile

Cardiologists by age and gender in Canada, 2016



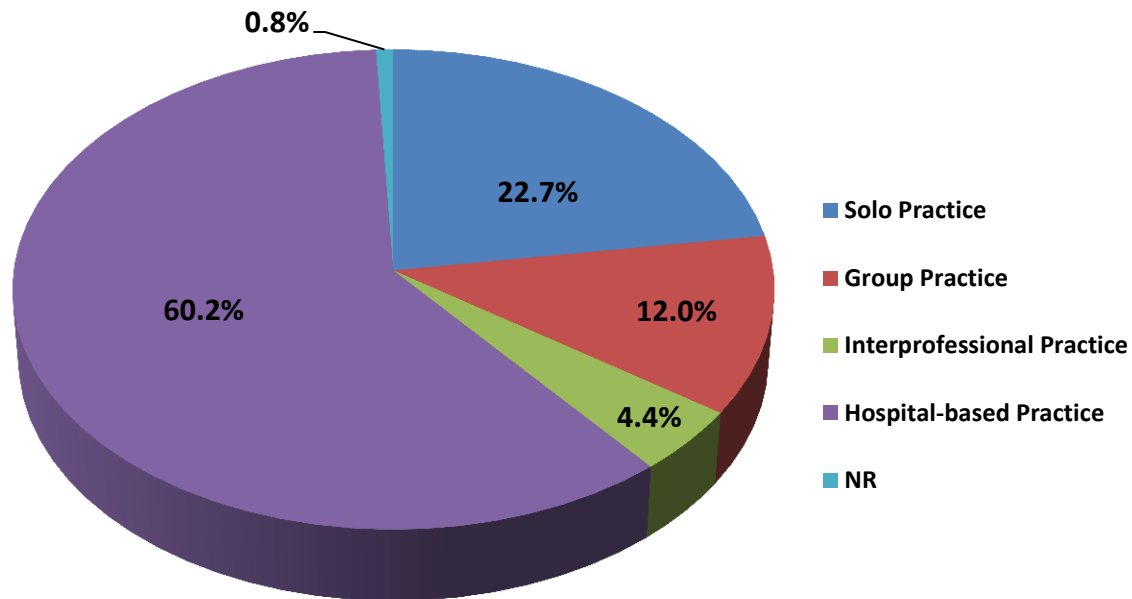
Source: 2016 CMA Masterfile

Main work setting of Cardiologists in Canada, 2014



Source: 2014 National Physician Survey. CFPC, CMA, Royal College

Practice organization for Cardiologists in Canada, 2014



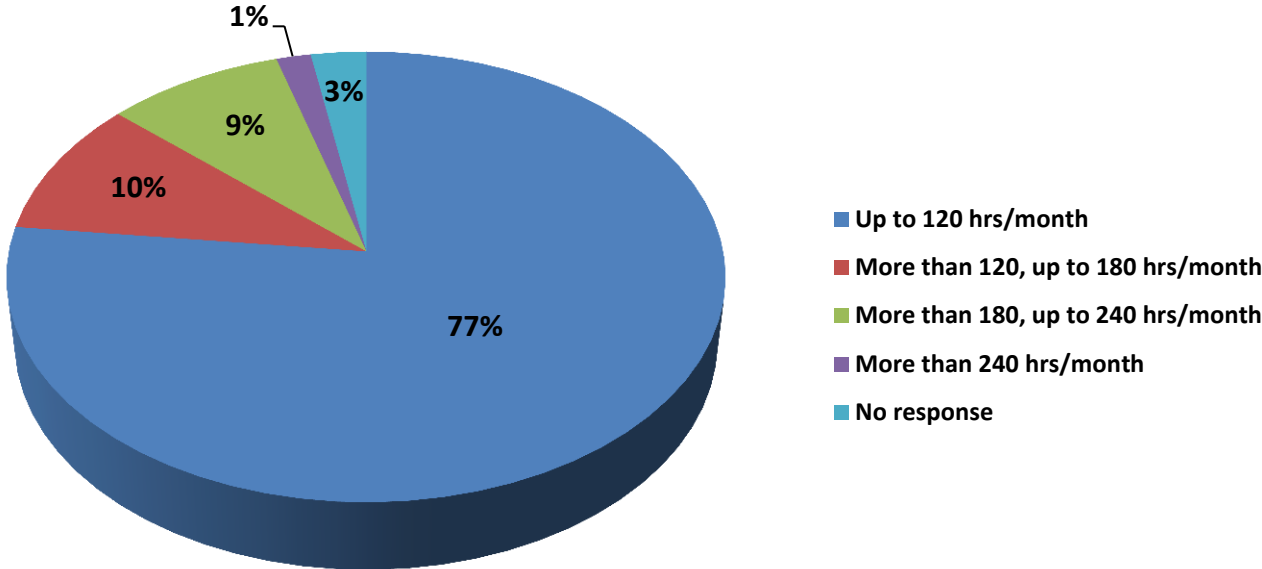
Source: 2014 National Physician Survey. CFPC, CMA, Royal College

Hours worked per week (excluding on-call) by Cardiologists in Canada, 2014

Activity	Hours worked per week
Direct patient care without teaching component	24.1
Direct patient care with teaching component	10.4
Teaching without patient care	2.9
Indirect patient care	7.5
Health facility committees	1.4
Administration	3.4
Research	3.8
Managing practice	1.5
Continued professional development	2.9
Other	0.7
TOTAL HOURS PER WEEK	58.7

Source: 2014 National Physician Survey. CFPC, CMA, Royal College

On-call duty hours spent per month by Cardiologists in Canada, 2014

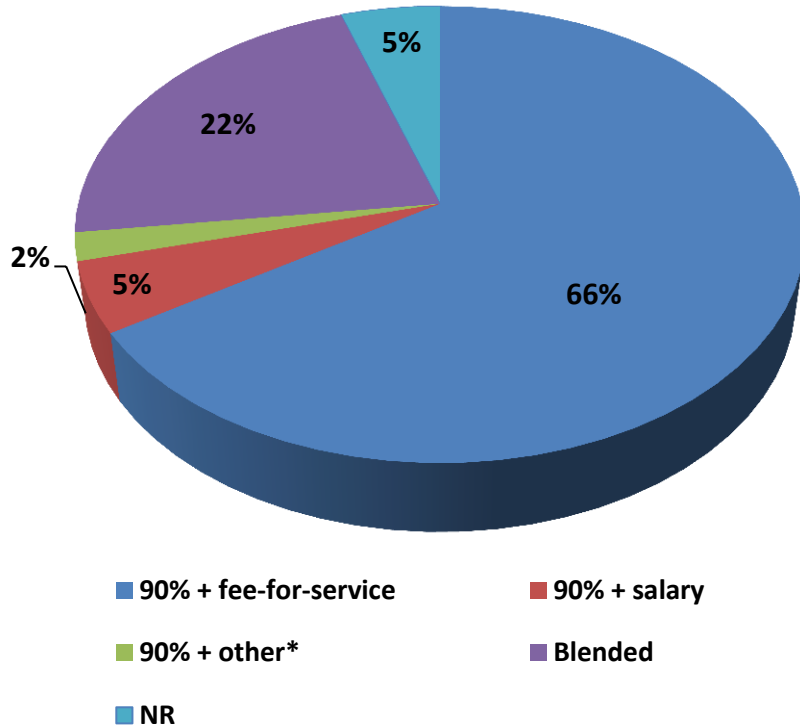


Time spent on call in direct patient care = 43 hrs./month

Source: 2014 National Physician Survey. CFPC, CMA, Royal College

Remuneration for Cardiologists in Canada

Primary payment method¹ in 2013



* Other includes capitation, sessional, contract and other methods

Average gross clinical earnings for Int Med & subspecialties in 2013/14 (those earning at least \$60,000) = \$396,105²

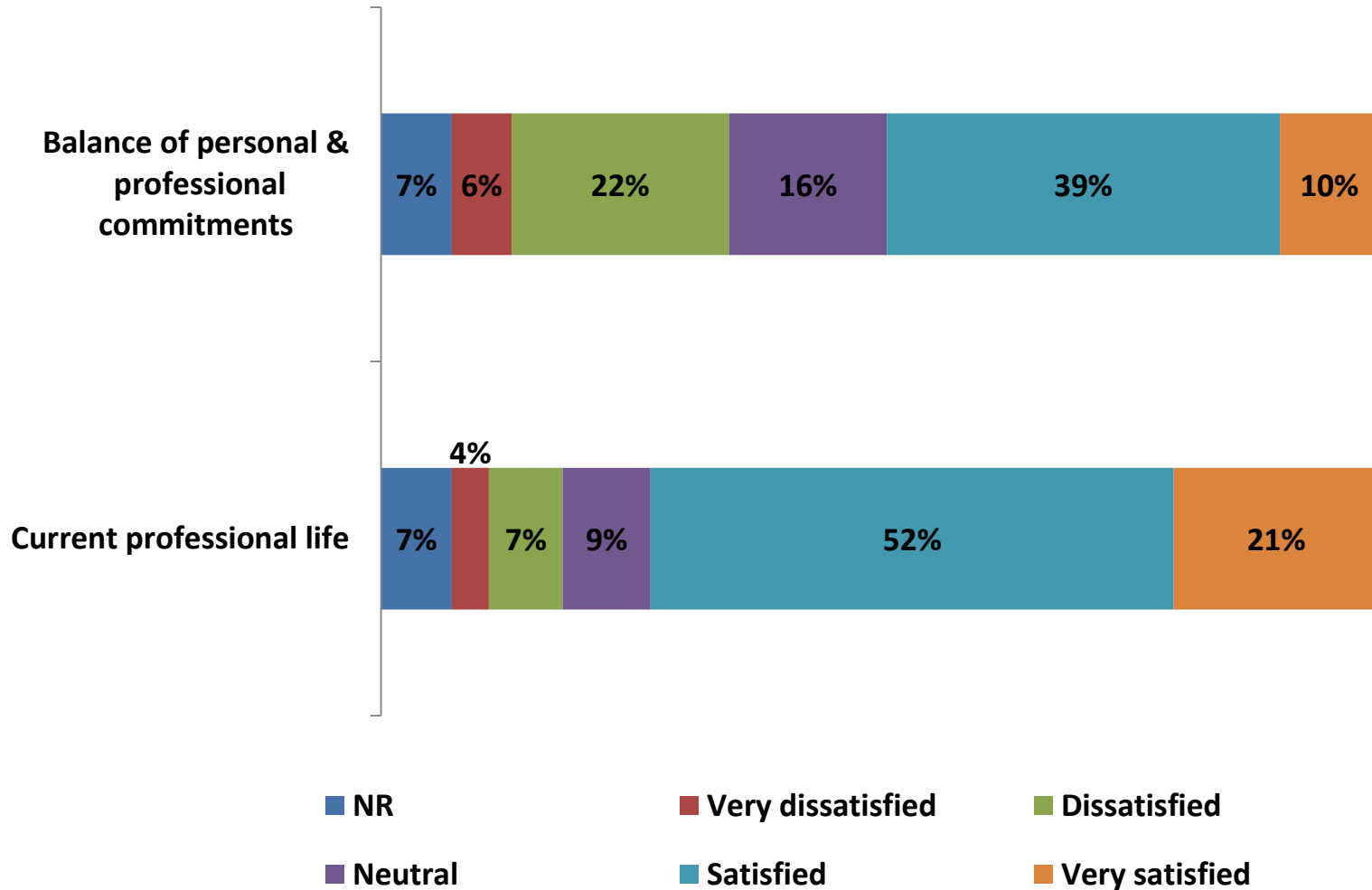
Average percent overhead reported by Internal Medicine specialists in 2010 = 22%³

¹ National Physician Survey, 2013, CFPC, CMA, Royal College

² National Physician Database, 2013/14, CIHI

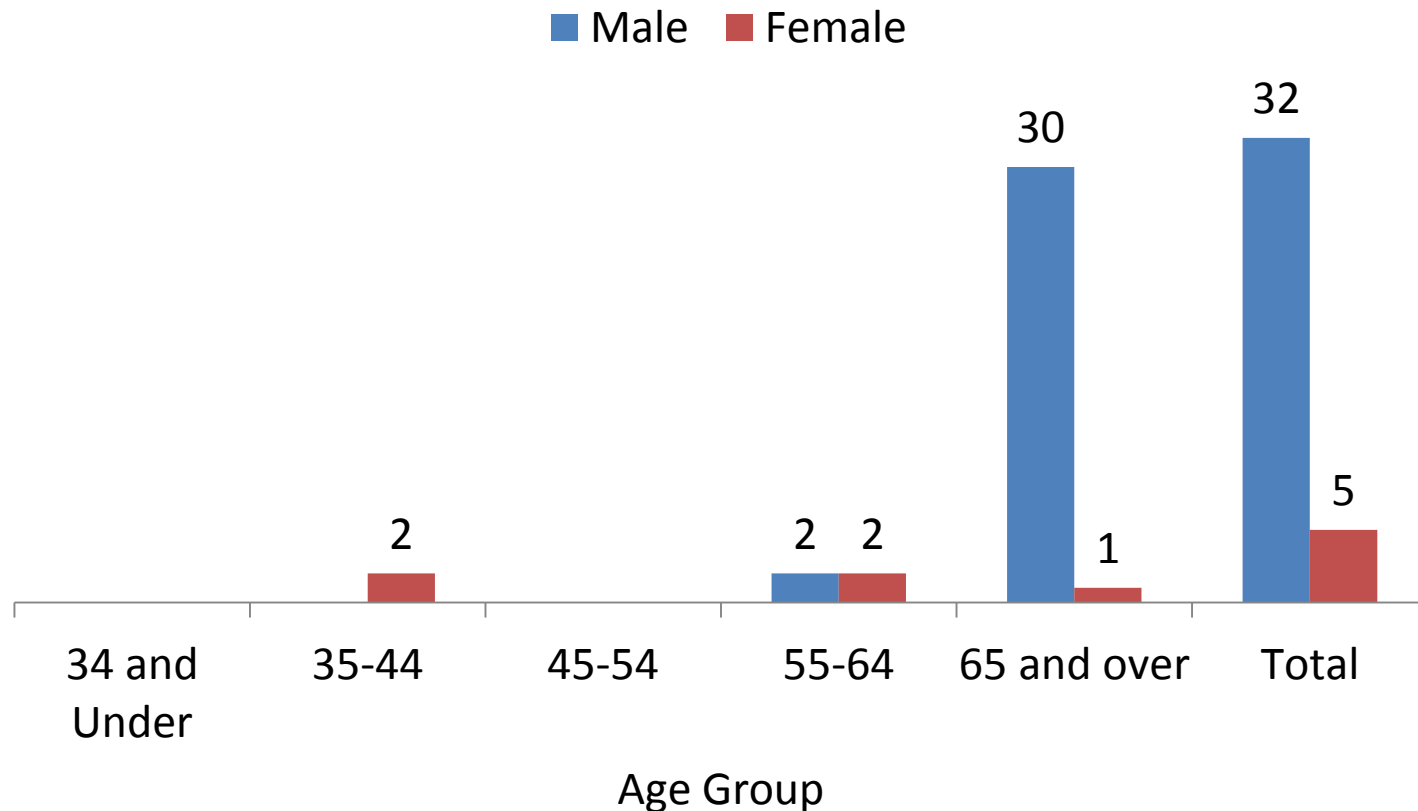
³ National Physician Survey, 2010, CFPC, CMA, Royal College

Satisfaction among Cardiologists in Canada, 2013



Source: 2013 National Physician Survey. CFPC, CMA, Royal College

Number of Cardiologists who retired during the THREE year period of 2013 to 2015



Source: CMA Masterfile – year over year comparisons

Note: “Retired” is based on giving up licence and is therefore excludes those who have retired from clinical practice but are still licensed; it includes physicians who have temporarily given up their licence but may return to practice at a later date.

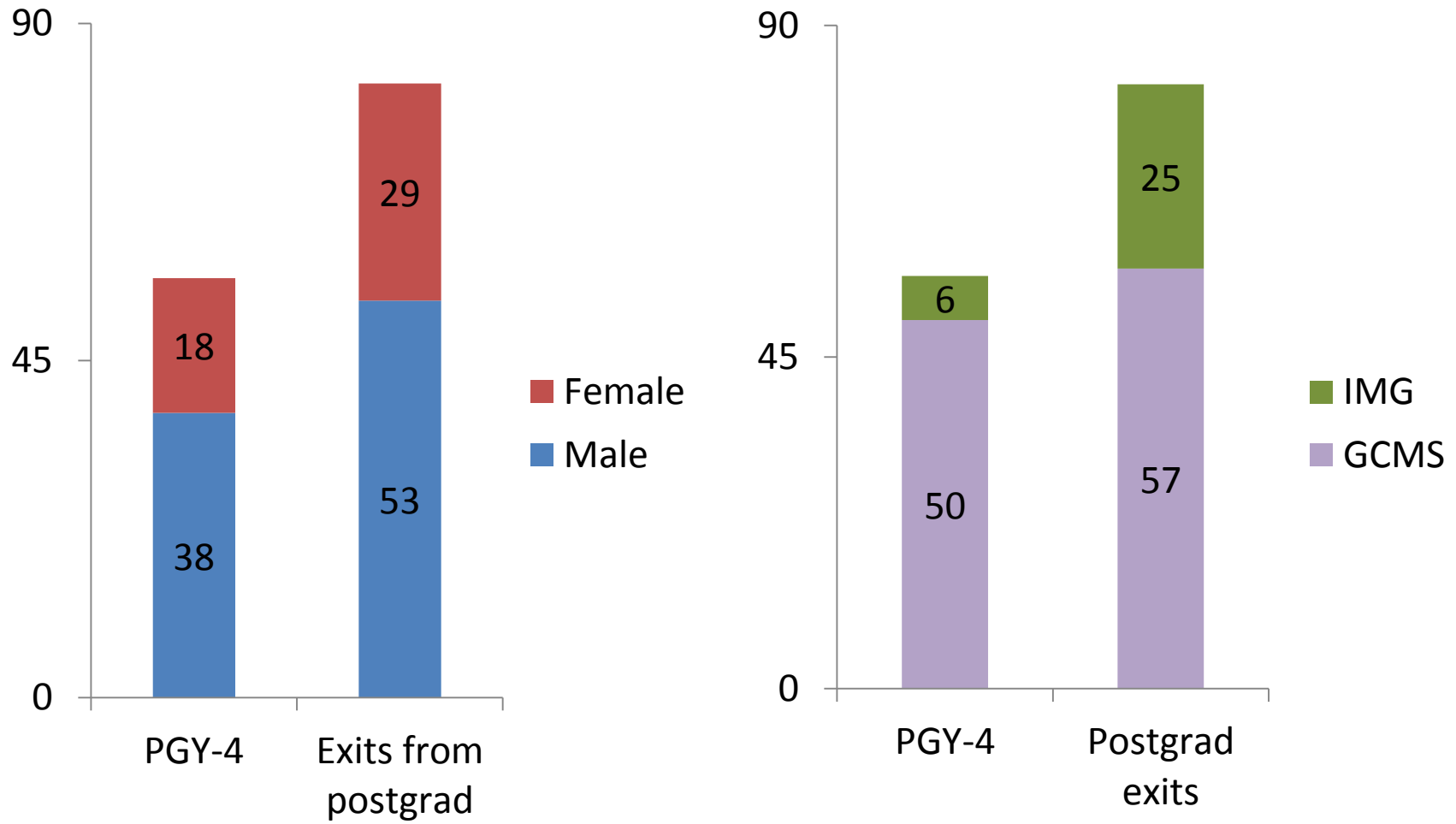
Total and Ministry funded postgraduate MD trainees in 2014/15 – Cardiology*

Faculty of Medicine	Ministry funded	Total	Faculty of Medicine	Ministry funded	Total
MUN	0	0	McMaster U	9	26
Dalhousie U	8	11	UWO	9	18
U Laval	8	22	NOSM	0	0
U Sherbrooke	9	9	U Manitoba	8	10
U Montréal	22	30	U Sask	7	7
McGill U	20	31	U Alberta	12	35
U Ottawa	10	37	U Calgary	10	21
Queens U	7	11	UBC	16	44
U Toronto	29	135	Canada	184	447

* Includes Cardiology (Int Med) and Cardiology (Ped)

Source: 2014/15 Annual Census of Post-MD Trainees, CAPER

PGY-4 and exiting postgraduate-MD trainees in 2014/15 – Cardiology

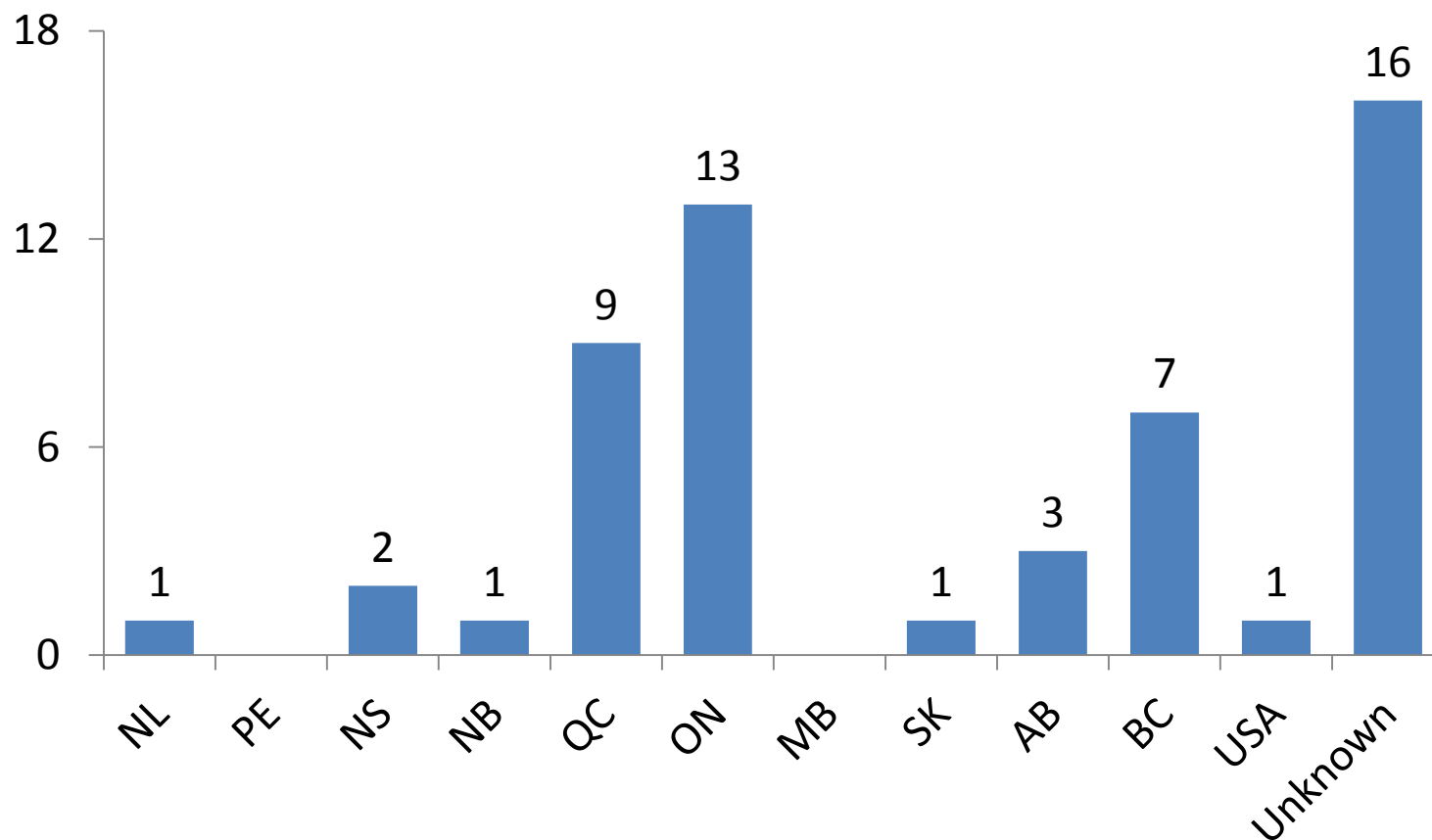


IMG – International Medical Graduates
GCMS – Graduates of Canadian Medical Schools

Postgraduate-MD trainees in 2014/15 – Cardiology

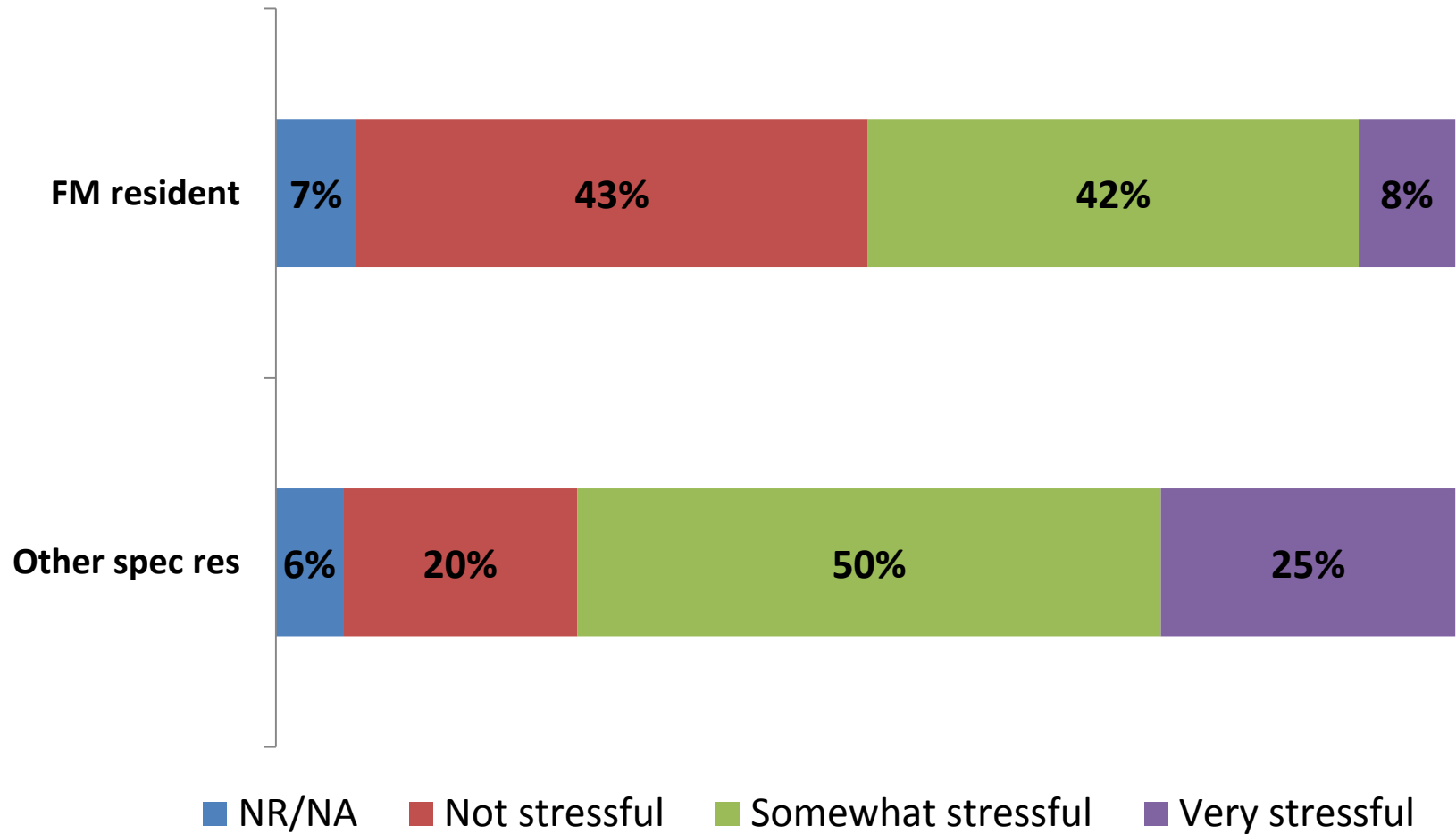
- Total of 56 PGY-4 Cardiology trainees representing 30% of all Cardiology trainees.
- Total of 184 Cardiology trainees representing 1% of all Ministry funded trainees.
- Total of 182 visa trainees in Cardiology.
- Total of 82 Cardiology trainees completed postgraduate training in 2014.

Location of 2013 Postgraduate-MD exits in 2015 – Cardiology



Of the 54 exits in 2013, 37 (69%) were known to be practising in Canada

Stress associated with finding employment at end of residency



Source: 2012 National Physician Survey of residents. CFPC, CMA, Royal College

Links to the organizations supplying information for this document

National Physician Survey

<http://www.nationalphysiciansurvey.ca>

Canadian Medical Association

<http://www.cma.ca/pdc>

Association of Faculties of Medicine of Canada

<http://www.caper.ca/>

Royal College of Physicians and Surgeons of Canada

http://www.royalcollege.ca/portal/page/portal/rc/credentials/start/routes/traditional_route

College of Family Physicians of Canada

<http://www.cfpc.ca>

Canadian Institute for Health Information

<http://www.cihi.ca>