Purpose

In March 2008, the CPA Board approved the “CPA Task Force on the Supply of Psychologists in Canada.” The mission of the Task Force was to examine issues related to the supply of, and demand for, psychologists in Canada. The Task Force was asked to make recommendations to the board of CPA about strategies for data gathering that would facilitate the development of policy, inform government, and help current and future psychologists make knowledgeable decisions about their careers.

Background

The Canadian Psychological Association recognizes that a number of pressing issues must be addressed regarding the supply of and demand for psychologists. A large proportion of the psychology workforce is approaching retirement. Although mandatory retirement has been abolished in most parts of the country, in the near future it is likely that many psychologists will be reducing their workloads and leaving the workforce. Who will take their places? How many people do we need to train? How should we plan to ensure that there are enough psychologists in growth areas such as prevention and health promotion? Rehabilitation? Services for an aging population? Will we have an adequate number of psychologists to conduct research, train future students, and develop programs? How will the change to a doctoral standard for psychologists in various provinces affect supply issues?

Current discussions about the supply of Canada’s health human resource focus far more on demand than they have in the past. Among decision-makers, there is growing recognition that we need a nimble health care system with the user, rather than the provider, at the centre to ensure that the right person receives the right care in the right place at the right time. The question that government and other stakeholders are asking is not just “How many do we need to maintain our supply?” but “What is the demand and what kind of supply do we need to meet it?” (Health Canada Health Workforce Productivity
Workshop, April 2010, Vancouver). Psychology-specific discussions with Canada’s Federal Healthcare Partnership lead us to understand that the recruitment and retention needs for psychologists as researchers and practitioners across seven federal departments are acute (http://www.fhp-pfss.gc.ca/fhp-pfss/home-accueil.asp?lang=eng).

It is clear that there is a substantial unmet need for psychological services. Data from the Canadian Community Health Survey reveal that 1 in 5 Canadians will experience a mental health problem or disorder in their lifetime (Health Canada, 2002). Of great concern, only one third of those who require mental health services actually receive them (Statistics Canada, 2003). The economic toll of mental disorder which includes use of health resources, lower productivity, as well as reductions in health-related quality of life reached $51 billion in 2003 (Lim, Jacobs, Ohinmaa, Schopflocher, & Dewa, 2008). Symptoms of mental disorders are often evident early in life. At any given time, almost one in six Canadian children experience a mental disorder that disrupts their functioning in multiple domains; untreated, many symptoms persist into adulthood; however, only 25% of these children in need receive any services (Waddell, Peters, Hua, McEwan, & Garland, 2007).

Issues of supply and demand are a topic of keen debate in universities. Many psychologists now identify themselves as cognitive scientists and neuroscientists and are employed in specialized research centres rather than in psychology departments. How do we ensure the vibrancy of training in basic science within departments of psychology? This is especially significant since we know that the number of students applying to experimental psychology programs is consistently below the number applying to clinical programs.

The science of psychology can inform a wide range of public and social policy issues (e.g., violence against women, advertising to children, prediction of dangerousness, workplace productivity) in addition to its more recognized applications in health (e.g., psychological determinants of health and illness, behavioural management of chronic disease, best practice in the treatment of psychological problems and conditions).

We know that too few Canadians have access to publicly-funded psychological services. Professions such as medicine and nursing have successfully lobbied government for increased training resources. There has also been a tremendous growth in the number of social workers in Canada. On the other hand, the number of psychologists has remained relatively stable. Should the number of psychologists be increasing? If so, what kinds of training will the next generation of psychologists require?

Health-care reforms have led to restructuring of many publicly-funded services, so that psychologists are being replaced by less highly-trained service providers. In considering supply and demand issues, it is important to be aware of the range of roles for which psychologists are uniquely prepared. Advocacy for psychology must promote awareness of the importance of regulated health care and recognition that different kinds of health care providers can provide care that differ in scope. Through its membership in the Health Action Lobby (HEAL), CPA has joined in the continued call for government to invest in the training of health human resource professionals.
We need information about the current supply of Canadian psychologists and the future demand. If we understand how many psychologists are currently in the system, and anticipate the need for psychologists in the twenty-first century, we will be in a better position to estimate how many psychologists should be trained, and in what fields.

**Membership of the Task Force**

The Task Force membership was designed to have representation from the CPA Board, CPA Head Office, the Association of Canadian Psychology Regulating Organizations (ACPRO), the Canadian Council of Departments of Psychology (CCDP), the Council of Provincial Associations of Psychology (CPAP), as well as a representative from Quebec and experts in work-force analysis. Task Force Co-Chairs Elizabeth Church and Catherine Lee invited members from different regions of the country, who were working in different areas of psychology.

The members of the Supply and Demand Task Force were:
- Stéphane Beaulieu : l’Ordre des psychologues du Québec; ACPRO
- Jean-Paul Boudreau: Developmental, Ryerson University
- Elizabeth Church: School psychology, Mount Saint Vincent University
- Karen Cohen: ED, CPA
- Arla Day: Industrial-organizational, St. Mary’s University
- Olga Heath Clinical, Memorial University of Newfoundland
- Kevin Kelloway: Industrial-organizational, St. Mary’s University
- Catherine M. Lee: Clinical, University of Ottawa
- Bob McIlwraith: Clinical health psychology, University of Manitoba
- Lisa Votta-Bleeker: AED, CPA.

**Overview of the Work of the Task Force**

The Task Force met twice in person at the CPA Conventions in 2008 in Halifax and 2009 in Montreal, as well as via teleconference on 10 other occasions.
Scan of Potential Sources of Canadian Data

The first objective was to take inventory of what is already known about the numbers of psychologists working in different areas with different populations. Our initial focus was to identify any existing relevant materials and resources. We consulted widely with many groups and organizations including:

- Association of Canadian Psychology Regulatory Organizations (ACPRO)
- Canadian Association of University Teachers (CAUT)
- Canadian Council of Departments of Psychology (CCDP)
- Canadian Institute of Health Information (CIHI)
- CPA:
  - Accreditation Panel
  - Practice Directorate
  - Science Directorate
- Council of Provincial Associations of Psychology (CPAP)
- Health Canada
- Statistics Canada

Consultation with APA Center on Workforce Studies

As our colleagues in the American Psychological Association are wrestling with many similar issues, in November 2008, the Task Force had a teleconference with Dr. Jessica Kohout, Director of the APA Center on Workforce Studies, which was established in 2006 and employs eight staff. The Center’s work is divided into four areas: Education Pipeline, Psychology Workforce, Environmental Scan, and Need and Demand. As much as possible, APA tries to draw on existing data sets because of the huge expense of collecting data. Even so, they have identified many gaps and missing and incomplete data even at the pipeline level. When we talked with Dr. Kohout, the Center had not attempted to estimate future needs and demand. Dr. Kohout stated that forecasting need is extremely difficult and complex, because it involves predictions about the particular areas in which psychologists will be needed. From this meeting, the Task Force concluded that it would be very difficult for CPA, with much fewer resources, to gather a lot of data and that CPA would be better served to identify existing databases and to partner with other organizations and groups when attempting to gather new information. Dr. Kohout generously shared their framework and many of their documents and offered to talk again in the future. CPA may want to consider consulting periodically with the Center.
Consultation with Membership of CPA

We communicated with the CPA membership at large through Psynopsis columns in the spring of 2008 and again in the spring of 2009. In response, a number of CPA members contacted us with ideas and suggestions.

The results of all these consultations were summarized by a research assistant and posted on a web portal created by CPA. Following a brief review of principles that guided our work, we present a brief overview of findings in the following sections, focusing first on existing data and next on recommendations.

Principles that Guided the Work of the Task Force

- Supply and demand issues are dynamic, so ongoing data collection is essential; data from snapshot surveys rapidly become obsolete;
- As psychology is both a discipline and a profession no single strategy will be adequate to gather data on the supply of all psychologists; a multi-faceted approach is required;
- CPA’s science and practice directorates may be well-positioned to play a coordinating role with gathering and/or collating the data with respect to the supply and demand within the discipline and the profession of psychology;
- CPA is committed to inter-professional collaboration, so a strategy of cooperation with other health professions is recommended.

Existing Data Sources

Academic Psychology

One question the Task Force was seeking to answer was whether Canadian universities are graduating enough academic psychologists to meet current and future needs for universities. We had received anecdotal feedback that some Canadian psychology departments were experiencing challenges in hiring new faculty in some areas of psychology. Similarly to other areas of demand, it is challenging to forecast accurately the demand for faculty. In 2007, the Association of Universities and Colleges in Canada (AUCC) predicted that Canadian universities would have increasing difficulty filling faculty positions (AUCC, 2007). Since the abolition of mandatory retirement some faculty are choosing not to retire at age 65, and the economic crisis that began in 2008 may have exacerbated this trend. In addition, a number of Canadian universities have instituted hiring freezes (Kershaw, 2009). These factors may serve to postpone the acute shortage of faculty. These kinds of unforeseen changes speak to the complications of attempting to predict demand. Three current data sets can provide some insight about the current and future numbers of faculty:
**Association of University Teachers’ (CAUT) Almanac**

Each year the Canadian Association of University Teachers (CAUT) publishes data on the number of full-time university teachers by discipline, subject, rank and sex, and the number of full-time university teachers appointed each year. They also specify the number of doctorates awarded by major discipline, field of study, and sex. CAUT has indicated that they would be willing to work with CPA if we wanted access to these data. If the CPA Science Directorate were to access this information annually from CAUT, it would give us baseline data on the number of faculty currently teaching in departments of psychology, help identify trends in hiring faculty, and give an idea of the number of graduates who are planning to enter academia. However, as many psychologists teach in non-psychology departments, such as Medicine, Education, and Community Health, these numbers would capture only a portion of psychologists in academic positions. It would be helpful if the Science Directorate were also to explore strategies for accessing data on these psychologists.

**Survey of Earned Doctorates (Statistics Canada)**

Each year Statistics Canada surveys doctoral graduates in Canadian universities regarding their employment plans following graduation, including whether they plan to live in Canada, which geographic region, their employer (education, government, private sector, other), the type of work they plan do, etc. Statistics Canada has indicated that, for a fee (starting at about $200), they would produce custom tables with data for some of the variables. The fee would increase with the complexity of the tables requested. As some of the numbers are quite small, they will not release some information because of privacy concerns. CPA would need to discuss with Statistics Canada what information they can release, but this data set would give us annual data about the number of doctoral-level psychologists who are planning an academic career.

**APA Graduate Study in Psychology Survey**

The APA Center on Workforce Studies annually surveys U.S. and Canadian graduate departments of psychology regarding demographic characteristics of faculty and first-year psychology graduate students, as well as their application, acceptance, and enrollment characteristics. Although these data need to be interpreted with caution because not all Canadian departments of psychology respond to the survey, they provide more detailed information than the previous two sources regarding demographic characteristics of faculty, such as ethnicity. If CPA were to consider greater reliance on the APA Graduate Study in Psychology Survey, it would require the cooperation of CCDP to encourage its members to participate in that survey, to ensure that Canadian data are as complete as possible.

**Education Pipeline**

The education pipeline refers to the numbers of students who are en route to becoming psychologists, and is an important part of predicting the future supply of psychologists. All three data sets described above are potential sources for understanding the numbers of
Canadian students who are in the psychology “pipeline.” The CAUT Almanac publishes annual data on Canadian student enrolment at the undergraduate, masters, and doctoral levels. This is reported both as the overall number enrolled in the discipline of Psychology, as well as in a number of students enrolled in 13 fields of Psychology: Clinical Child Psychology, Clinical Psychology, Cognitive Psychology, Counseling Psychology, Developmental Psychology, Educational Psychology, Experimental Psychology, Family Psychology, Industrial and Organizational Psychology, Physiological Psychology, School Psychology, and Social Psychology.

Statistics Canada “Survey of Earned Doctorates” also provides data about the number of doctoral-level psychologists who graduate each year in Canada, as well as information about graduates’ employment in academia, public institutions, or private practice. The APA Graduate Study in Psychology Survey provides information regarding the demographics of first-year psychology graduate students, as well as information about departments’ application, acceptance, and enrollment rates.

Some related information may be available from CPA’s own publications. For example, the Graduate Guide gives us information on existing graduate programs and their student enrolments. The CPA Accreditation Panel annually collects data about graduates and their first employment setting. Syntheses of these data could be helpful in tracking employment patterns.

**Internship Training**

An important part of the pipeline to applied psychology positions is the pre-doctoral internship. The Association of Psychology Postdoctoral and Internship Centers (APPIC) provides data each year on the number of applicants for internship (Clinical, Counselling and Clinical Neuropsychology programs only) and the number of available positions, including a separate report on Canadian students and programs. Insufficient internship capacity is a constraint on the supply of new graduates in these applied areas.
Although the number of CPA accredited internship programs has increased in recent years, the number of CPA accredited doctoral programs in clinical, counselling and neuropsychology has increased at a faster rate. The geographic distribution of internship positions is less than ideal for students. For example, each year Ontario universities produce almost twice as many students seeking internships as there are internship positions in the province. Quebec has very few paid internship positions and the rest of Canada has very few francophone or bilingual internship positions; francophone students, therefore, have extremely limited access to paid internships. The Task Force recommends that CPA maintain its liaison with the Federal Health Care Partnership (FHCP), which has data on vacant positions within federal government services, e.g., correctional institutions, in order to assist them in their efforts to develop accredited internships as part of their recruitment strategy.
Licensed Psychologists

In this section we discuss issues with respect to professional psychologists who are eligible for licensure by provincial and territorial regulatory bodies, including clinical psychologists, counselling psychologists, clinical neuropsychologists and school psychologists. We are aware that this analysis does not address issues with respect to professional psychologists who may not pursue or do not require licensure, such as industrial and organizational psychologists.

**Canadian Institute of Health (CIHI)**
Currently, licensing bodies in each province and territory gather data on their members at the time of renewal of licensure. These data are submitted to the Canadian Institute of Health Information (www.cihi.ca) which is the national body responsible for synthesizing data on health human resources and presenting annual reports on the supply of registered health professionals in the biannual publication *Health Personnel Trends in Canada*. It should be noted however, that 2006 is the last year for which data are available. CIHI data on psychologists indicate increasing numbers of psychologists in all provinces, the North West Territories and Nunavut, with the total number of active registered psychologists rising from 11,437 in 1997 to 15,751 in 2006. CIHI also presents data on the numbers of students graduating from CPA accredited professional programs, making this another source of information for the Education pipeline.

The CIHI data present only the broad brush-strokes of the portrait of registered psychologists in Canada. Essentially, they give us the overall number of licensed psychologists, but they do not address whether there are sufficient numbers of psychologists to meet the needs of those who require their services, nor do their data allow for a fine-grained analysis of the gaps in services. An understanding of health human resources requires data on the number of psychologists working in urban and rural settings, serving clientele of different ages and needs, and providing services in the public sector in different types of psychological services (e.g., counselling, clinical, health, neuropsychology, rehabilitation, criminal justice, school/education, and industrial organizational).

**Association of Canadian Psychology Regulatory Organizations (ACPRO)**
ACPRO represents the 11 colleges and boards that regulate the profession of psychology across Canada. As noted above, all regulatory bodies gather data on their members, but there is tremendous variability in the nature of the data gathered by each regulatory body. This variability reflects the legal requirements in each jurisdiction, as well as the resources available to each licensing body. So, for example, some provinces, such as Ontario, require regulatory bodies to collect extensive data that are part of a provincial health human resources initiative (http://www.healthforceontario.ca). The Québec regulatory body also collects data on the number of psychologists providing different type of services to the population in different types of employment settings. Also, the Québec Health Ministry has conducted an analysis of the planning of human resources for the field of
psychology. As a general principle, regulatory bodies with a larger number of members are more likely to have the resources for systematic data gathering and analysis than are regulatory bodies with fewer members.

Issues of human resources are of central concern to those Canadian regulatory bodies that are mandated to ensure that there is a sufficient supply of psychologists to competently meet the public’s needs for their services. For example, the discussion of transitions in licensing requirements (raising to doctoral level) has required close scrutiny by l’Ordre des psychologues du Québec as well as by the College of Psychologists of New Brunswick.

Since the introduction of the Agreement on Internal Trade in 1994 designed to promote mobility across the country, the idea of a common Canadian data set has been discussed by the member organizations of ACPRO. The Canadian Psychological Association has taken a leadership role in these discussions. In 2006, CPA and the Council of Provincial Associations of Psychology (CPAP, which at that time represented the regulatory bodies) proposed a common minimum data set which was endorsed in principle by the regulators.

The regulators of psychological practice represent a group with unique access to critical data regarding the evolution of the professional practice of psychology in Canada. The Task Force strongly recommends that the regulators be invited to play a key role in collecting and sharing information. A common data set that expands on the data required by CIHI could provide answers to some of the questions we need to address.

In the winter of 2010, ACPRO member organizations were surveyed regarding their interest in collecting a common data set as well as the resources they would have for such an initiative. Responses indicate that regulatory bodies of large provinces currently gather a great deal of data. Most of them would be willing to share such data with a national body. Although not able to require that members provide additional information, other than what is legally required for registration, one province declared it would agree to invite its members to report additional data. Some of the regulatory bodies from smaller jurisdictions expressed support for a common data set, but noted that they do not have the resources to gather further data. Support was expressed for the development of an on-line system that would allow regulators to gather data at the time of annual renewal of licensure. This would avoid imposing an additional burden on the regulatory body. To maximize involvement by members in all provinces, the potential benefits would need to be made very clear to members.

It is clear from these responses that the CPA will need to play a leadership role on this issue. It will need to:

a) provide a clear rationale for the new data to be gathered;
b) assess the overlap between the proposed data set and the data gathered by regulators;
c) play a lead role in obtaining funds for data gathering;
d) play a lead role in developing a system for collecting the data;
e) play a lead role in the synthesis and diffusion of data.

**Practice Directorate of the Canadian Psychological Association**

The newly formed Practice Directorate of the Canadian Psychological Association, under the directorship of Dr. John Service, brings together stakeholders who have wrestled with supply and demand issues for decades. As noted earlier, the issue of supply and demand as applied to practice is considered an issue of access to psychological services. A survey of members of the Council of the Practice Directorate conducted prior to the inaugural council meeting in January 2010 revealed that access/supply and demand issues were the only issues identified as important by all 12 council members.

Practice Council members from across Canada agree that demand for psychological services outstrips supply in every jurisdiction for publicly and privately funded services in general and more particularly in underserviced areas such as criminal justice, children/youth, seniors and rural/remote communities. This is consistent with the findings of other reports such as *Out of the Shadows at Last* (Standing Senate Committee on Social Affairs, Science and Technology, 2004).

The Practice Directorate is uniquely placed to play a leadership role in seeking funding to launch a national psychology human resource planning initiative. This work would be a logical extension of the collaborations in which CPA is already involved, including the Health Action Lobby (HEAL) and the Mental Health Table. HEAL is a coalition of national health, health care and consumer organizations dedicated to protecting and strengthening Canada’s health care system. Seven organizations came together to form HEAL in 1991 to respond to cuts in federal funding for health care. Since then, 22 other organizations have joined with HEAL to support the principles and objectives espoused by the coalition. Half a million Canadians are represented by these organizations. CPA’s Executive Director is one of the HEAL Co-Chairs. The Mental Health Table (MHT) is comprised of 12 of Canada’s national associations representing regulated health care professionals who provide health care in Canada. Some of these are health professionals who provide specialized mental health care services and others provide health services to patient groups that include persons with mental health disorders and problems. CPA is a founding member and Co-Chair of the MHT.

There is consensus regarding the value of Canadian psychology regulatory bodies engaging in ongoing data collection to facilitate health human resources planning. It is clear that such data gathering requires additional resources. The Executive Director and Associate Executive Director of the Canadian Psychological Association have explored several potential funding sources for this initiative.

1) **Canadian Institute of Health Information (CIHI):** CIHI’s function is to present secondary data and it does not have resources to fund additional data collection. Furthermore data collection is not seen as a priority by CIHI in terms of its strategic plan.
2) Canadian Institutes of Health Research (CIHR): CHIR offer funding for research-related to the delivery of health services and may consider a grant proposal headed by a university-based researcher in partnership with CPA. Research within this area would fit the mandate of CIHR’s Institute of Health Services and Policy Research. Although this may be an avenue to launch data collection, as CIHR’s mandate is research rather than service delivery, it should not be considered a long-term funding source for this project.

3) Project IN4M (pronounced Inform): Health human resource planning is not unique to psychology, and there are opportunities for collaboration with other professional groups. For example, Project IN4M has just been funded by Health Canada to examine current data sets, the reasonable data proxies and the data black holes in the service of developing a needs based mental health human resources model. The goal of the IN4M project is to help Health Canada level the playing field for mental health and to ensure that Canadians get equal access to the full range of needed mental health services. The goal of the project is to translate need into resource requirements – what we need to do to meet demand. Phase 1 of the project will take stock of what we know and do not know in terms of needs-based planning culminating in the establishing of a research roundtable. Phase 2 will develop a predictive model for mental health human resource and Phase 3 will roll out and evaluate the mode. John Service is one of the project’s principals, and the CPA is on the Advisory Committee in its capacity as Co-Chair of the Mental Health Professionals Table.
Recommendations

1. That CPA contract with the Canadian Association of University Teachers (CAUT) to obtain annual data on the number of faculty teaching in departments of Psychology, the number who are appointed, the number of doctorates awarded in Psychology, and student enrollment in Psychology.

2. That CPA contract with Statistics Canada to obtain annual data from the Survey of Earned Doctorates as well as data on psychologists from the long-form Census.

3. That CPA contact the Canadian Council of Departments of Psychology (CCDP) to determine whether Canadian programs would be willing to participate in large numbers in the APA Graduate Study Survey and contact the APA Center on Workforce Studies to see whether they would be willing to share the Canadian data from their APA Graduate Study in Psychology Survey.

4. That CPA maintain its liaison with the Federal Health Care Partnership (FHCP) program, which has data on vacant positions within federal government services, e.g., correctional institutions, in order to assist them in their efforts to develop accredited internships as part of their recruitment strategy.

5. That the provincial psychology regulators be invited and supported to play a key role in collecting and sharing information based on a common data set. The Task Force recommends that the Board allocate funds, or in kind support (e.g. IT support) for this purpose.

6. That the CPA board approves the allocation of funds for the development of an online system to collect annual data from licensed/registered psychologists.

7. That the CPA Practice and Science Directorates take leadership roles in seeking funding to launch a national psychology human resource planning initiative. This will require the Directorates to facilitate and coordinate partnerships and collaborations among many communities, including universities, health care organizations, educational and correctional institutions, governments, professional associations and learned societies, regulatory bodies, and consumer organizations.

8. That CPA continue to partner with other health organizations to seek funding for data collection that will facilitate planning of health human resources, especially in rural areas and for other underserved populations.

9. That CPA consult, on an ongoing basis, with experts in the area of workforce demand, such as the APA Center on Workforce Studies, in order to ensure it has a deep understanding of the need and demand for Canadian psychologists.
References


Standing Senate Committee on Social Affairs, Science and Technology (2004). *Mental Health, Mental Illness and Addiction: Overview of Policies and Programs in Canada,* Report 1, Ottawa: Author

