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In their own words: describing Canadian physician leadership

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Abstract

Purpose – This is the first study to compile statistical data to describe the functions and responsibilities of physicians in formal and informal leadership roles in the Canadian health system. This mixed-methods research study offers baseline data relative to this purpose, and also describes physician leaders' views on fundamental aspects of their leadership responsibility.

Design/methodology/approach – A survey with both quantitative and qualitative fields yielded 689 valid responses from physician leaders. Data from the survey were utilized in the development of a semi-structured interview guide; 15 physician leaders were interviewed.

Findings – A profile of Canadian physician leadership has been compiled, including demographics; an outline of roles, responsibilities, time commitments and related compensation; and personal factors that support, engage and deter physicians when considering taking on leadership roles. The role of health-care organizations in encouraging and supporting physician leadership is explicated.

Practical implications – The baseline data on Canadian physician leaders create the opportunity to determine potential steps for improving the state of physician leadership in Canada; and health-care organizations are provided with a wealth of information on how to encourage and support physician leaders. Using the data as a benchmark, comparisons can also be made with physician leadership as practiced in other nations.

Originality/value – There are no other research studies available that provide the depth and breadth of detail on Canadian physician leadership, and the embedded recommendations to health-care organizations are informed by this in-depth knowledge.

Keywords Organizational culture, Health leadership competencies, Health leadership initiatives, NVivo, Physician engagement, Physician leadership

Paper type Research paper

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Introduction

Much has been written about the value and necessity of engaging physicians in health-care leadership activities (Dubinsky *et al.*, 2015; Nath and Clark, 2014; Scott *et al.*, 2012, 2010). Recent research has shown that physician leaders can play a critical role in bringing about creative and innovative change within the health-care system (Baker and Denis, 2011; Spurgeon *et al.*, 2011; Weiss, 2011). However, participation in physician leadership activities is not consistent throughout the health-care system, and a significant need exists to understand the factors that may help support physicians in taking a more active role in leading health-care reform in Canada (Dickson, 2012).

According to the following resources, there is much that organizations can do to encourage and support physician leadership: preparing physicians before they take on leadership roles (Fierke and Lepp, 2011); reaching out to all levels of physicians within an organization to support leadership development and activities (Bohmer, 2012); understanding underlying psychological factors which can increase positive physician leadership (Quinn, 2012); and reducing the negative impacts physician leaders experience (Vize, 2015).

More is known about international physician leadership (Berkenbosch, 2014; Bohmer, 2012; Dickinson *et al.*, 2013; Johnson, 2014; Sood and Chadda, 2010) than is known about the responsibilities, settings and support received by Canadian physician leaders in formal and informal leadership roles. Some of the more notable Canadian physician leadership knowledge comes from two independent sets of studies, one by Denis *et al.* (2013) and the other was an initiative the Regina Qu'Appelle Health Region (RQHR) began in 2011. The RQHR commissioned three research papers for the purposes of furthering physician engagement by sharing its leading research and up-to-date insights from international leaders in physician engagement (Dickson, 2012; Grimes and Swettenham, 2012; Kaissi, 2012). However, the studies did not extend to gathering baseline data on the roles, functions and responsibilities of physicians in RQHR.

This Canadian Society of Physician Leadership (CSPL) study – in partnership with the Canadian Medical Association (CMA) and the Centre for Healthcare Innovation (CHI) at the University of Manitoba – aimed at gathering descriptive information about physician leadership in Canada. For the purposes of this study, the definition of physician leadership included formal and informal leadership, to be inclusive of a broad range of physician leadership activity. Definitions of formal and informal leadership were provided to the survey respondents and interview participants. The definitions encouraged those physicians who received no compensation for their leadership efforts to participate in the study.

Formal leadership was defined as:

> […] an assigned leadership based on the authority of a formal position/role; including clinical, management and executive positions; recognized leadership positions/roles that may or may not include compensation, i.e. salary, stipend.

Informal/voluntary leadership was defined as including:

> […] activities on your part, for which you do not receive direct compensation, that focus on the art of inspiring, enabling, and encouraging people to maximize their talents in the interests of improving your health care system, e.g. mentoring, coaching, leading improvement projects, committee work.

The study used a mixed-methods approach to develop a profile of Canadian physician leaders and identify factors that brought them into leadership and kept them in their leadership roles. This Canadian-specific knowledge expands our understanding of how organizations can encourage and support the critical involvement of physicians in health-care leadership.

Method

The study began with a snowball survey (Heckathorn, 2011; Hogan *et al.*, 2014) designed with the input of physicians in senior executive health-care roles across Canada. An invitation with a link to the survey was initially sent by email to 3,828 physicians, purposively selected for their participation within the past five years in identified Canadian organizations, educational events, programs and certificates concerning physician leadership. Recipients of the email invitation were encouraged to forward the invitation to colleagues who were also physician leaders.

Respondents to the survey were asked to confirm whether they were practicing physicians, i.e. not retired or residents/interns. Definitions of formal and informal/physician leadership were provided, which they used to self-identify the category or categories they belonged to. In turn, this dictated the questions they were asked. Response totals varied for each question, as many respondents did not answer all questions.

There were 362 men and 320 women survey respondents; seven respondents did not answer the gender question. In total, 90 per cent of the respondents were evenly distributed between the ages of 35-64 years, and respondents were from all provinces and territories in Canada. Respondents were employed in a wide variety of workplaces and positions. Table I provides a breakdown of survey respondents by gender and location, i.e. urban, rural and remote settings.

A semi-structured interview guide was developed after a preliminary analysis of the survey data. Physician leaders volunteered by completing a field on the survey asking for interview participants, and these volunteers were asked to invite their physician leader colleagues to participate in the study. In total, ten men and five women were interviewed, which satisfied the number necessary to reach data saturation for this particular study (Guest *et al.*, 2006; Morse, 2000; Wray *et al.*, 2007).

Participants were from both major centers and more remote parts of Canada. The age distribution was as follows: one participant was over 65 years; seven were 55-64 years, three were 45-54 years, two were 35-44 years and two were 25-34 years. Participants represented a broad cross section of physician roles, e.g. academic, surgical, psychiatry, military, family physicians or government.

Table I.
Gender and location

	Male		Female	
Location	No.	(%)	No.	(%)
Urban/Suburban	267	74.0	235	73.4
Small town	44	12.2	43	13.4
Rural	31	8.6	30	9.4
Geographically isolated/Remote	13	3.6	6	1.9
Cannot identify primary geographic location	6	1.7	6	1.9
Total	361	100.0t	320	100.0t

Consent forms were signed before interviews with physicians took place. Physicians had the opportunity to ask questions during a telephone meeting prior to the telephone interview. Interviews were between 60-75 minutes and were audio-recorded and transcribed. Ethics review was provided by the University of Manitoba.

Transcripts from the 15 interviews were coded and analyzed using NVivo 10 qualitative analysis software (Auld *et al.*, 2007; Fereday and Muir-Cochrane, 2006). Using an inductive approach, preliminary codes were created to delineate content topics (Bradley *et al.*, 2006). Further analysis of the topic areas resulted in a thorough coding of each transcript and development of a code taxonomy. Three subject matter experts each compared the code taxonomy to a different transcript to ensure all nuances had been captured. Through a process of decontextualizing and recontextualizing the data, themes emerged describing common elements between individuals' experiences (Ayres *et al.*, 2003; Egerod, 2009; Tesch, 1990).

Results

This section combines the quantitative and qualitative data acquired from the 689 valid responses to the survey and from the 15 participant interviews. The survey results are considered to be accurate within ±3.7 per cent 19 times out of 20. For a more detailed analysis by gender and type of leadership role, the accuracy rates are as follows: +5.2 per cent for men, +5.5 per cent for women, +7.7 per cent for clinical leaders and +9.4 per cent for academic/clinical leaders. The statistical analyses were completed in SAS version 9.3. (SAS Institute Inc, 2011).

The following themes were explicated through an analysis of the survey and participant data:

- What Canadian physician leadership looks like.
- Why Canadian physician leadership is needed.
- Becoming a physician leader.
- Being a physician leader.
- What works and what does not work for physician leaders.
- How Canadian health-care organizations can support physician leadership.

What Canadian physician leadership looks like

Canadian physician leaders work in a broad variety of settings, e.g. private office/clinics, community clinic/health centers, academic health science centers, hospitals and corporate offices. Those in formal leadership roles, worked at the executive, board, academic and clinical levels. The greatest number of physician leaders in board governance positions worked in a private office or clinic.

Many physician leaders reported taking on multiple leadership roles and putting in time beyond what they were compensated for. Table II demonstrates the amount of uncompensated time spent in comparison to the number of formal leadership roles performed. It can be seen that 50 per cent of the respondents had more than one leadership role, and 129 respondents were in informal/volunteer leadership roles only.

Physicians in the youngest age bracket (25-34 years) and oldest age bracket (65+ years) more commonly worked in general practice/family medicine. There was a steady increase up to age 65 years of physicians working in administrative/corporate roles. Proportionately, more physician leaders in the middle-age brackets (35-64 years)

worked in a medical specialty, e.g. psychiatry. Physicians working in a medical specialty spent the most amount of time on leadership activities, whereas the least amount of time was provided by physicians with a surgical specialty.

When asked about their future leadership plans, survey respondents with a medical specialty represented the greatest percentage of physicians who plan to make physician leadership a long-term career choice. Physicians, in general, practicing family medicine were the most likely to view their leadership activities as a shorter-term assignment.

The types of support provided for formal leadership roles varied widely. Further, 42 respondents reported receiving no support whatsoever for their formal leadership role and another 98 respondents reported receiving a stipend only – a stipend is usually considerably less money than a salary or wage. Table III provides a breakdown of the type of support received for a variety of leadership roles.

Physicians also contributed their time for informal leadership activities, such as teaching, mentoring, coaching, engaging with external organizations, research and community enhancement work. In terms of support for their informal leadership efforts (i.e. recognition, education, office space or administrative support), 40 per cent of respondents received no support for their informal leadership efforts and a further 17 per cent received only recognition.

Why Canadian physician leadership is needed

Survey respondents and interview participants were in full agreement that physician leadership is essential for effective health-care reform. A principal benefit of physician

Table II. Uncompensated time and number of physician leadership roles

# of formal leadership roles	*n*	No uncompensated time	No. of physician leaders 1-9 h/month	10-19 h/month	20-30 h/month	More than 30 h/month
Informal only	129	–	–	–	–	–
1	223	49	64	45	26	38
2	207	21	75	65	26	20
3	74	7	13	23	17	14
4	23	2	5	7	5	4
5	26	2	6	9	4	5

Table III. Type of support per leadership role

	Types of support received per functional level of leadership role									
	Stipend only		No support		Salary only		Salary and education (at least)		Stipend and education (at least)	
Level of leadership role	Count	(%)	Count	(%)	Count	(%)	Count	(%)	Count	(%)
Executive/Mngt/Registrar	16	16.2	5	11.9	9	31.0	48	42.9	25	27.5
Board Position	12	12.1	6	14.3	1	3.4	3	2.7	5	5.5
Academic Lead	2	2.02	0	0	0	0	12	10.7	11	12.1
Clinical Lead	34	34.3	17	40.5	10	34.5	15	13.4	31	34.1
Academic/Clinical lead	20	20.2	6	14.3	7	24.2	19	17.0	14	15.4
Other	14	14.2	8	19.1	2	6.9	15	13.4	4	4.4
Total	98	100	42	100	29	100	112	100	90	100

leadership put forward by the participants is related to the unique knowledge physicians have of the Canadian health-care system, which they maintained needs strong leadership to navigate all the many stressors it faces. "I think medical leadership is important because when physicians, in particular, are not engaged in making leadership roles or political advocacy, then others take our place", a participant commented. "If we leave this vacuum, essentially other things will fall into it".

Participants cited many examples of how physician leaders can inform health systems and organizations when they are included at all levels and involved in major decision-making. A number of respondents commented that physician leaders have unique qualifications to make a contribution in leading large institutions (e.g. hospitals, academic centers); it was noted this was on the upswing. Participants also mentioned circumstances where physician leaders were not included, to the detriment of various initiatives and projects.

Participants spoke of the leadership role physicians automatically take. "I think it's probably fair to say that even in their day-to-day clinical work, most physicians are considered leaders, whether for better or for worse", a participant offered. "Even in an interprofessional team, the assumption tends to be that the physician is the leader of that team".

Informal leadership was recognized as a key role for physician leaders. "Physicians without formal leadership positions can still be leaders", one participant noted. "Most departments and divisions have their informal leaders who are very influential. And physicians are often quite influential outside of their workplace". A participant defined physician leadership as "physicians who involve themselves, whether formally or informally, in helping manage the delivery of quality services and all that entails".

Becoming a physician leader

The stories of how participants became physician leaders held many commonalities. Research studies indicate that many physicians take on leadership roles starting in their youth and that often they are interested in being physicians from an early age, driven by the need to make a difference (Snell *et al.*, 2011). For many participants, it was always in their nature to lead, i.e. at play as a child; on sport teams as an adolescent; or volunteering to lead activities during undergraduate and medical school.

Once established as a physician, participants found themselves accepting leadership positions, for which many did not have prior leadership training. Their desire to make a difference propelled them into leadership situations, often without support or compensation. As one participant put it:

> I simply started to get frustrated when seeing a lot of the issues that my patients faced. I had no chance of really solving those systemic issues, unless I moved into a different role or started acting in a different way than as just a personal physician.

A number of participants did not plan to take on leadership roles; leadership by default was a common occurrence for those participants. Many spoke of being asked to take on committees, positions or projects with little to no experience to help them master the required tasks. This kind of "on-the-job training" was the norm for many of the participants. Some received support to one degree or another from supervisors and peers but many received no support at all and had to learn from trial and error.

Many of the participants cited mentorship as the key element that jumpstarted their ability to take on leadership responsibilities. Mentorship was in the form of a particular person advocating for and supporting a young physician, and it also occurred through the setting of an example. "She showed me that physicians can have a role outside of clinical medicine, that they can have a larger role to play in the health care system overall", a participant said.

Other forms of mentorship the participants mentioned included:

- being given the go ahead from supervisors to try something new;
- connecting with other physicians at training events who then offered mentorship; and
- getting support and encouragement from others at all levels in the workplace.

Many participants spoke of supervisors who put their names forward for opportunities and peers who helped teach needed skills on the job. Organizations proved helpful by supporting training:

> Even though they didn't necessarily pay me to attend the course, they also didn't penalize me for doing so. It helped to have colleagues that were supportive of me - colleagues that were willing to share my clinical load when I was away or simply encourage me to keep doing what I was doing, that was helpful.

Being a physician leader

For many participants, effective principled physician leadership was based on strong values. "It's about values. Leadership tends to be value-driven […] people must understand what your values are, so you become predictable because of the values", a participant offered.

Those values included a strong commitment to serving others. More than one participant used the term "servant leadership" to define their approach. A participant said, "I think the very effective physician leader is a humble leader, almost an invisible leader". This participant went on to say how proud she was of virtually never "throwing her weight around" and always working toward consensus.

A repeated comment from participants concerned the over-utilization of the same physicians volunteering for leadership roles, e.g. administration, meetings, initiatives. More than one participant believed this "leads to burn out". Participants maintained there were many potential physician leaders in their organization; however, that "talent pool" was not being accessed, and this led to a shortage of physician leaders.

Quite a few participants spoke of the difficulty in attracting physicians into leadership/administrative positions in their organizations and also finding physicians who understood what was required in their leadership position. One participant noted:

> It certainly can be a challenge to recruit people. That, of course, also leads to what I would say is some variation in the leadership abilities of the people who do end up in leadership positions.

A key question that confronts physician leaders is: "Do I need to maintain a clinical practice?" Most of the participants believed it was necessary, for the following reasons:

- to maintain credibility with other physicians and allied professionals;
- "a physician isn't a physician if they do not have clinical skills"; and

- maintaining a clinical practice allows one to stay in touch with the day-to-day realities of providing patient care.

Some participants kept up their clinical skills simply because they gained satisfaction from doing so. When asked what was the least amount of time a physician could spend clinically and still maintain credibility, there was a range of answers anywhere from a minimum of a shift twice a month to 50 per cent of work time. For those participants who did not believe it was necessary for a physician leader to maintain her or his clinical skills, they said they did not experience any noticeable lack of respect within the work environment, and they felt it allowed them to more fully concentrate on their leadership role. A participant noted that "once a doctor always a doctor".

What works and does not work for physician leaders

Participants were asked to describe what their key drivers of satisfaction were in regard to their physician leadership activities, and conversely, what led to dissatisfaction in those roles.

Satisfaction with being a physician leader. For the participants, there were many satisfying aspects to being a physician leader. As previous research has demonstrated (Snell *et al.*, 2011), being able to actively make a difference within and beyond the clinical realm is a strong driver for many physician leaders. The ultimate satisfaction stemming from physician leadership activities was deemed to be the resulting improvements in health-care systems and better outcomes for patients.

Participants found it very satisfying to have the ability to bring about necessary change. Many spoke of having a broad sphere of influence in terms of impacting provincial and federal policies and practices, organizational decision-making and the implementation of much-needed initiatives. Specifically, participants spoke of the positive impact they could have on a number of lives when in the role of a physician leader. A participant noted:

> I realized that even if only one or two out of ten initiatives succeed, I'm still at least influencing and helping more people than if I spent an equal amount of time seeing patients.

The capacity to create large-scale change is central to the satisfaction for some physician leaders. "In a senior leadership role, you really can think long term, be very strategic, and make big things happen", a participant offered. The opportunity to provide input and impact decision-making was also mentioned as immensely satisfying. "Being in the right place at the right table to discuss these things and bring them forward is what keeps me here", a participant claimed. "I'll make my voice heard, because my voice is the one for those who cannot speak. That is worth it. That is worth the evenings and the weekends".

Acquiring the leadership skill of "influencing people" and gaining positive results in using that skill was a source of satisfaction for this participant:

> Since getting into medical leadership, now that I have the skills to know how to influence people and to talk to people, I find that when I want to get something done, it actually does get done.

Participants also spoke of the satisfaction they gained from "understanding how things work". A participant offered, "I've always liked to understand how things work. I find that in medical leadership, you start to gain an appreciation of exactly how the health

care system works". Being in a position to effectively problem solve was considered satisfying by physician leaders. "I like fixing things, so I find it very satisfying to come up with a solution for something and then take a group of people and guide it to work with us", said a participant.

Working as a team and relationship-building were key areas of satisfaction for the participants. One participant noted that a key focus of physician leadership "is about forming relationships with people, getting to know people, understanding what their goals and aims are, and seeing if any of them are in alignment with your own". For many participants, supporting others was the most satisfying aspect of being a physician leader. Facilitating others to excel was important to this participant, "I am a facilitator of other people's careers, it is very satisfying because then, I can actually see the results of this". Although supervising staff was also a common source of dissatisfaction, many participants found it to be a source of satisfaction. A participant said, "I would say that the thing I enjoy the most is making opportunities for my staff to be better trained".

Leading other physicians was considered quite challenging for many participants, likening it to "herding cats". It was also considered a great source of accomplishment to lead other physicians successfully. A participant defined a physician leader as "one who's tasked with the theoretically impossible job of leading physicians […] Most other disciplines will accept leadership as part of their culture, physicians tend to push back".

Dissatisfaction with being a physician leader. A key theme running through the participants' stories concerned the presence of negative attitudes toward taking on physician leadership, i.e. "going to the dark side". Negative attitudes about the value of administrative work were present early in the lives of some participants. These same attitudes were echoed by medical school professors, residency supervisors and in the workplace. Participants acknowledged their own negative attitudes toward taking on physician leadership roles and the need to counter those internal attitudes.

Attitudinal impacts started early in life for the participants. As one participant put it:

> I did not understand whatsoever that being an administrator is a highly creative and challenging job […] I was raised in my growth as a physician to largely believe that administration was a backwater of the incompetent or the uncreative.

Many participants mentioned receiving negative messages about leadership in medical school and residency. "It's a very clear recollection of mine that all the physicians who were my professors, had a healthy contempt for administrators and managers", a participant added. "That stuck with me after I graduated for a while".

Some participants spoke about their own unenthusiastic reactions to leadership content while they were in medical school. A participant said:

> There were some professors in medical school residency that wanted us to take a larger view of things. They wanted us to take on a more advocate role. What happened was that those voices got drowned out, because all of us were so worried about passing our exams and pleasing our supervisors and receptors at our clinical locations that all that advocacy and leadership stuff just fell to the wayside.

Participants also commented on the impact of attitudes during residency. A participant offered:

> People come in from medical school being idealistic, having a lot of volunteer activities, working for charities, going overseas and seeing what health care looks in developing countries. So they want to make a change.
>
> It's actually quite alarming how quickly that all gets drilled out of them by the time they even get into residency.

Negative attitudes toward physicians in the workplace taking on leadership roles are a norm according to many of the participants. Many participants spoke of encountering negative attitudes personally and they were aware of negative attitudes in general. "To be honest what is most dissatisfying is that sometimes you get looked down upon by your clinical colleagues when you go into medical leadership", one participant said.

Gender issues comprised another form of negative attitudes as in negative attitudes to women as physician leaders. One participant was not sure if she would be "trusted" when she was about to take on a leadership role. A number of participants, both women and men, referenced "old boys clubs", which they saw as impediments for women to advance into senior leadership roles. The survey results showed that 37 per cent of female physician leaders had no direct reports compared to 30 per cent of male physician leaders. Overall, men and women had similar percentages of direct reports.

Another potentially dissatisfying aspect of physician leadership were the costs involved with taking on physician leadership activities – costs not only in terms of unpaid or poorly compensated time but also in terms of not seeing patients and perhaps adding to the load of colleagues who filled in for them while they took part in leadership work. For some, the lack of recognition for their long hours and accomplishments was an issue and reduced their satisfaction with being a physician leader.

Many participants expressed dissatisfaction with burdensome bureaucratic practices, which were named as one of the most dissatisfying factors in working as a physician leader. A participant commented, "You think about stress and the number of times you lie awake at night, most of those instances are related to administrative issues". Participants also experienced dissatisfaction and stress related to issues such as, having to fire people due to budget cuts, having too great a workload or having to tell staff "no" over an issue they had no control over.

As satisfying as it was for the participants to create change, it was as dissatisfying for them to not be effective. A participant said:

> I think that's one of the things that clinicians and physicians hate the most - is to learn something and then not to being able to do anything with it. It's very, very frustrating. Not only does a physician feel like they took a pay cut to get to this course, they won't take patients for the week. Then they get more frustrated because now they know how to change things […] but they're not allowed to. That's a double whammy and not very good.

Some participants had negative reactions to not being compensated for the long hours and specific uncompensated roles they took on. For example:

> I've received lots of praise for my work, nationally and otherwise. I've been honored for it, so it's very nice. It is irritating to a degree that it has never been compensated.

Responses to a survey question asking about areas of dissatisfaction were aligned with the comments interview participants provided, namely:

- lack of financial support and/or time;
- attitudinal challenges, such as issues related to trust and hierarchical power;
- no recognition of leadership efforts;
- change fatigue;
- provincial health systems' reorganizations;
- fee-for-service model;
- impacts of financial constraints and diminishing budgets;
- poor communication and lack of inclusion of physicians in decision-making);
- lack of organizational talent management strategies (i.e. succession planning, leadership development or retention); and
- no backfilling for clinical duties while performing leadership roles.

How Canadian health-care organizations can support physician leadership

Canadian physician leaders provided extensive detail on how health-care organizations and systems could support physician leaders. Key approaches and practices included leadership development, compensation, recognition and innovation, and the reduction of unwieldy bureaucratic processes.

Leadership development. Having a leadership development strategy was identified as a key tool for organizations. Supporting leadership training was noted as a particularly important aspect of a leadership development strategy. Participants commented that uptake of leadership development courses increased when organizations endorsed them. It was also commonly stated that it is important for leadership development training to be paid for or otherwise incentivized. Survey respondents indicated they both paid for their own training and attended employer-paid training. Almost half of the respondents indicated that they attended Physician Management Institute (PMI) courses (leadership courses offered through the Canadian Medical Association), and of those, roughly half had the costs covered by their employer.

Other avenues of leadership training (e.g. business schools with health-focused programs; certifications from organizations such as the Canadian Society of Physician Leaders) were promoted by the participants as excellent venues not just for leadership knowledge but for networking potential as well. Participants agreed that basic leadership skills were essential for all physicians, no matter what role they took on as a physician. It was noted that the professional medical bodies could do a better job of outreach to ensure that all physicians in Canada were aware of their existence and what they had to offer.

Another identified key component of an organizational leadership development strategy was the implementation of a robust mentorship program. Having a mentor/coach was considered an important contributor by many physicians in how they began their leadership activities; participants, in turn, strove to mentor others.

Compensation. The need to compensate physicians for time spent on leadership was a critical issue for the participants, and they offered a number of suggestions of how organizations could provide compensation, including creating a way of compensating for years of experience vs focusing solely on degrees earned, i.e. an MBA. A participant suggested that along with providing financial compensation, organizations could award

continuing medical education credits as incentives. A participant noted that in physician compensation agreements:

> […] compensation for leadership is like an addendum somewhere. It's in the back of the document […] it should actually be just as prominent as the fee that we pay people to deliver babies, because I think it's just as important.

Another commonly noted issue was that of including physicians who worked on a fee for service basis. These physicians were understood to have a "tremendous body of knowledge to bring to bigger decision-making, the systemic stuff, definitely a very valuable perspective that should be included". The compensation practices for fee-for-service physicians generally were not to pay them for their physician leadership work, and this was "not going to work for over a long period of time for anybody". Compounding the lack of compensation for their leadership activities, physicians:

> […] in a fee-for-service world are not only losing income, you're ramping up your overhead. So you're actually taking a financial loss. It's not like it's neutral, you're losing money to attend.

The compensation issue, whether for fee for service physicians or salaried/contracted physicians, was contentious for the participants:

> It's one of the difficulties in recruiting leaders, of course. Because medicine has to be one of the very few professions where, the higher the leadership role you take, potentially the less you may earn.

The impact on workplaces and quality of care due to ineffective leadership was highlighted by this participant:

> I think the entire manner in which physicians are compensated needs to be reevaluated […] I think health administration is profoundly important. If you work in a disorganized, dysfunctional, unhappy environment without proper leadership, it's going to impact the quality of care you're delivering.

On average, the participants worked at least 20 additional hours a week to fulfill their leadership commitments; however, many did not cite lack of compensation as a major area of dissatisfaction. A participant noted:

> I'm not compensated in terms of financially [for work on a particular committee]. I think there are other ways that we all achieve compensation in terms of feeling that we're contributing: personal satisfaction, improving my own learning for scholarship, those kinds of things.

Recognition. One of the most economical and straightforward ways of supporting physician leadership is for organizations to recognize the efforts their physician leaders are making. A participant noted, "Recognition is important. There's no way around that". A participant who regularly worked well beyond his required 40-h work week said the following when asked how he felt about the extra hours he put in, "It depends [laughter]. Sometimes it depends on how well-recognized I am for the work that I'm doing, or whether it's appreciated or not".

How can physician leaders be recognized? Participants had a number of suggestions for recognition practices:

- have physician leaders' names easily visible on hospital websites;
- acknowledge results;
- provide opportunities;

- stimulate potential;
- be inclusive when defining leaders;
- be inviting of involvement;
- encourage younger physicians;
- encourage women; and
- identify and support interested physicians.

Innovation. Both the survey respondents and interview participants were asked about innovative practices within their organizations and were offered a wide range of what they considered innovative practices. Survey respondents provided varied examples of innovation within their organizations, such as dyad relationships; professional development (PMIs, LEAN, in-house, universities, coaching); committee structures to facilitate quality improvement, collaboration and networking; and physician engagement strategies.

Participants agreed that having mechanisms to encourage and support physician leaders to implement innovative health-care improvements is something all organizations should strive for. They agreed that encouraging innovation provides an outlet for physician leaders to enact change, bringing new ideas and potentially increasing the effectiveness and efficiency of organizations.

Many participants felt supported by their organization and were excited about the prospects for implementing innovative changes. A participant offered, "Innovation plays a very important role, and creating an environment where innovation is honored and acceptable and encouraged is paramount to the job of an effective administrator".

Some participants were not positive about their organization's receptivity to innovative ideas or their organization's support for innovation, e.g. providing needed access to data and information. One participant added:

> The thing is innovation often means change and change usually means that it ends up inconveniencing somebody along the way; they have to change what they're doing. People are fine with innovation, and the idea of it and the ethic of it. But when the actual innovation means you've got to do something differently, people are very resistant to change.

The size, structure and reporting relationships of organizations made a difference in the ability to implement innovative ideas. The larger the organization, the less likely innovation was encouraged, possibly due to risk aversion; political pressures were also cited as deterrents to embracing innovation. A participant said:

> I think most of our work provincially and federal leaders at the political level right now are way too conservative. It takes a long time for new stuff to be discussed, and even longer to be accepted.

A number of participants pointed out that in their experience, innovation suffered when governmental entities were involved, for example, "The more that my organization is directly responsible to a minister, the less innovative it is".

Support for innovation was not consistent among organizations; 80 survey respondents noted that their organization did not support innovation. Respondents provided the following comments about their organizations:

- physicians are not included in decision-making;
- no budget put toward innovation; and
- physicians are expected to conform, not innovate.

Discussion

The profile of Canadian physician leaders that emerges from the study provides information that has not previously been available. The profile of Canadian physician leaders illustrates that over 50 per cent of physician leaders work in two or more leadership roles at a time, and that many hours of their time were not compensated for. Despite that, physician leaders are largely satisfied with their work load as long as they are seeing results from their efforts.

The study indicates, as did Denis *et al.* (2013), that health-care organizations have an essential role to play in supporting physician leadership through implementing physician leadership development strategies; providing equitable compensation; embedding comprehensive recognition practices; and supporting innovation. Denis *et al.* (2013) recommended that organizations should enhance physician leadership skills, align and increase physicians' capacity to contribute to health-care improvements. The review goes further, suggesting greater system alignment, arguing "that physician leadership and physician engagement are probably part of a continuum and are mutually reinforced at the individual, *organizational and system levels* [emphasis added]" (p. 4).

Recognizing that physician leaders will respond to organizational efforts is an important factor in developing a leadership strategy, and organizations should be "looking for those people and trying to acknowledge them and giving them some more opportunity". A Scandinavian study by Bååthe and Erik Norbäck (2013) concludes that physician leaders are more engaged when managers take the time to communicate with physicians and create multiple opportunities for physicians to engage in organizational development work.

The issue of negative attitudes within the physician community toward those who take on formal physician leadership roles was highlighted in this study. It was found that negative attitudes toward administrative work are put forward by some medical school professors, residency supervisors and in the workplace. In a Canadian study by Doja *et al.* (2015), the presence of underlying negative attitudes, hierarchal dominance and tolerance of unprofessional behaviors within medicine are explicated. The authors also discuss the negative impact on idealism that occurs in the face of such behaviors.

As previously established, effective health reform requires greater engagement of physicians in leadership roles. Providing leadership development training throughout the education and career of every physician is a viable method of assuring such engagement. Barzdins (2012) studied the curricula from medical education departments in universities in Baltic and other European countries and assessed the degree of non-technical content, i.e. organizational, leadership and management competencies. He found many gaps in the availability of leadership content and concluded that governments, health providers and universities should work more closely together to respond to trends in health care.

Our study found agreement that all physicians could take on leadership roles, whether formally or informally. It is encouraging to see younger physicians stepping up, and it is acknowledged that the experience of more seasoned physicians is also needed.

In The Netherlands, Berkenbosch (2014) investigated medical residency programs in four countries, including Canada, and sought the opinions of residents in those programs. Berkenbosch found that while there was only some agreement as to what specific additional leadership training was needed, the majority of residents believed that there should be more leadership/management training during residency.

Limitations

A potential limitation of this study is that the survey respondents and interview participants were all currently involved in physician leadership activities; therefore, the results may not be representative of Canadian physicians as a whole. Conversely, the subject matter expertise of the respondents and participants allows confidence in the results when viewing description of the Canadian physician leadership experience as a whole.

Another potential limitation arises from the fact that Canadian provincial health-care systems differ widely from each other, in organizational structures and in population demographics. The more populous provinces with their more urban populations were overrepresented in comparison to less populous provinces with more rural and remote populations. The structural differences between provincial health-care systems create nuances that may not have been captured fully.

Implications

Health-care organizations have a vital role to play in identifying and supporting physician leadership (Lee, 2010), and they have every reason to do so to benefit from physicians, who are a vital voice to be heard in managing health-care delivery; however, Bohmer (2012) cautions against implementing reforms that do not in fact support physician leadership. Health-care organizations must ensure their efforts are appropriate and effective, as evidenced by the results of this study explicating the dissatisfaction experienced by physicians within their organizations.

Physician leaders generally receive less pay for the time they spend on leadership activities, time that their busy schedules can ill-afford. This is a significant deterrent for physicians when they are considering whether to step up to leadership activities. The costs of being a physician leader in terms of financial losses and lost clinical time cannot be overlooked, particularly when trying to determine how to encourage physicians to initiate leadership activities. The development and initiation of alternate payment plans is one approach that could ameliorate the discrepancies in compensation for physician leadership actives.

If it is the case that many physicians are drawn to the profession at a young age in the interests of making a difference, it would behoove educational and organizational bodies to ensure that physicians gain the required tools to provide effective leadership. To understand how to encourage and support physician leadership activities, it is necessary to take deliberate action to counter the negative attitudes toward administrative functions and physician leaders promulgated in some medical schools, as well as in health organizations by physicians who continue to harbor those attitudes. Dickinson *et al.*, 2013, concluded that impediments to the development of physician leadership included:

> […] the nature of health care organisations as professional bureaucracies, the persistence of tribal relationships between doctors, nurses and managers, and the still fragile nature of leaders occupying hybrid roles […] (p. 206).

Health-care organizations must begin to address these underlying factors that inhibit physicians from taking on leadership activities.

A core enabler of improved physician leadership is to elevate, elucidate and add legitimacy to the role of physician leader. Whether this is done through the development of a physician leadership credential or specialty, through existing physician representative bodies, through educational institutions, through creation of a specialty college for medical leaders (e.g. the Royal Australasian College of Medical Administrators [RACMA], *www.racma.edu.au/*) or through a combination of these, the study clearly identifies that physician leadership does not receive the respect it warrants. It is clear that physician leadership efforts are vulnerable to underlying negative attitudes which must be addressed if the goal is to encourage more physicians to practice physician leadership.

Conclusion

This study provides significant data for Canadian health-care systems to learn about how to better describe, identify, educate, compensate, utilize and support physician leadership. Having a baseline of data on many aspects of physician leadership in Canada today is a resource that will provide the answers to many varied questions. Hearing the voices of physician leaders and understanding their unique realities that echo their colleagues' experiences, thoughts and feelings, allows us to begin to customize solutions to what are research-based common issues for physician leaders.

A wealth of information was gained concerning what motivates and supports physicians to take on leadership roles, and what deters them, and what is satisfying and dissatisfying about being a physician leader. This knowledge can be utilized across the health-care system to learn more about how to ensure the capacity exists to harness the invaluable contribution physician leaders can make to health-care reform. Our health-care systems are overburdened to say the least. Physicians must be part of the solution and their voices must be included. Health-care organizations have a ready pool of physician leader candidates; they must understand how to enable them.

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