

## *Original Paper*

# Successful Leadership in Medicine

Anthony A. Zehetner<sup>1, 2\*</sup>

<sup>1</sup> Adolescent Medicine Unit, the Children's Hospital at Westmead, Sydney, Australia

<sup>2</sup> Faculty of Medicine and Health, the University of Sydney School of Medicine, Sydney, Australia

\* Anthony A. Zehetner, Faculty of Medicine and Health, the University of Sydney School of Medicine, Sydney, Australia

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### ***Abstract***

*Leaders remain as visible, influential and controversial in today's society and media as ever. Twenty-first century doctors are called to be inherent leaders, dependent and determined by their surrounding team of staff, organizational hierarchy and health care system structure. This paper examines today's clinician as leader: through differing leadership styles, workplaces, function, how they relate to (and are constrained by) the practice of medicine under the Australian health care system and asks what makes a good medical leader. The unique setting of General Practice and a woman's perspective are also considered. Sections on Medical Leadership's Contribution to Change, Risk-taking and Tolerating Chaos cover the concepts of unpredictability in medicine and if and how doctors as medical leaders attempt to cope with this eventuality. Each assertion raised is supported by current business and medical literature referenced data. The reader is encouraged to ponder their own workplace committee practices, leadership style and consider areas which they may wish to address and improve upon.*

### ***Keywords***

*leadership, workplace, risk, change, bureaucracy, transformation, protocol, organization, clinical governance*

## 1. Introduction

Doctors in the twenty-first century are no longer solely clinicians. They are teachers, researchers, advocates, managers, employers, administrators and, most importantly, leaders. Leaders are increasingly visible in today's society, on social media and in the news. Historically and now, they remain influential and controversial. Though what makes a good leader and particularly in the field of medicine?

The nature of modern medicine in Australia, where practitioners manage a patient's health in collaboration with one another, necessitates and defines a bureaucratic leadership model. Patients are not treated in a vacuum or in isolation. The General Practitioner (GP) coordinates allied health services and provides primary care. The subspecialist (secondary tier level of care) relies on referrals from the GP to see patients. Hospitals (predominantly university teaching tertiary care sites) refer the patient back to local community health services and their GP once treatment is completed.

Each workplace operates under different environmental conditions and a leader is required to adapt any prevailing systemic processes suitably and logistically. To maintain advantage, the organization must have unique qualities (chiefly their staff's skills) which differentiate it from its competitors. The effective leader is able to recognize and nurture these. This co-dependent leader-follower relationship ensures the organization's viability and longevity. A strong leader knows their organization's SWOTs (Strengths, Weaknesses, Opportunities and Threats) (Souba, 2000). This aspect of leadership is not unique to medicine but vital to its success.

## 2. Method

Organizations may have many different leaders within them, each with a different leadership style. Bureaucratic leaders with a directed-management approach (Marshall et al., 2003) are most likely to succeed in medicine practiced within a hospital-setting. They are able to liaise with multiple departments, coordinate their operation, possess agency and meet outcomes, such as Key Performance Indicators (KPIs), within fixed resource and budgetary constraints.

Bureaucratic leaders tend to operate "by the book", so staff are comfortable with their leadership style and know what to expect. However there may be few new changes in the organization's direction. A bureaucratic leader may be a misnomer, because leadership is "by numbers" and protocol (transactional leadership). Should there be a precedent, it is referred up the management line for an executive decision. This suits a hospital environment as systemic protocols, policies and pathways are embedded in workplace culture to maintain safety, operate at a proficient standard (best practice) and routine tasks are performed repetitively, consistently and precisely.

Leaders who adopt democratic or participative styles tend to be seen as more positive (successful), though this still assumes that one leadership style is "best". Certainly this arrangement works well for

committee meetings when taking into account different personalities and aligning them to a common process. It is less effective consulting staff junior in their roles. This behavioral construct does not take into account situational leadership. Clinicians adept at coordinating cardiopulmonary resuscitation in the crucible of an Emergency Department may not translate these teamwork skills to the hospital's boardroom. A Nursing Unit Manager may not organize a team of non-nursing staff equally as well.

Within small private or solitary medical practices, autocratic leaderships tend to flourish. While this may prove useful in the context of new and inexperienced staff, it promotes staff becoming dependent on their managers and stunts initiative. Over time, autocratic leaders are usually shunned by employees as work practices are shaped by negative consequences (less pay or reprimands) and employee input is not encouraged.

Visionary, transformational and charismatic leaders may reinvigorate and motivate any field, including medicine. This is usually reserved for large corporate practices as existing clientele (patients) do not take kindly to new approaches, which may be considered experimental in their eyes. Quality is linked with trust in medicine (Berwick, 2003) and any failed outcomes from unproven new processes can be damaging to both traditionalist patients and pressured managers.

An inflexible, autocratic leader brought into any organization may stifle it if that leader is not cognizant of the existing workplace's culture and needs.

### **3. Result**

#### *3.1 Why Health Care Leaders and Funding Don't always Mix*

In Australia, hospitals are funded via the State and outpatient General Practice (Medicare) services federally. The total health care budget in Australia is 10.3% of Gross Domestic Product (GDP) with two-thirds being derived from government sources and of this, 61% from federal and 39% from state funds (Australian Institute of Health and Welfare, 2018).

The patient population case mix also determines funding rather than absolute numbers. For example, a patient undergoing an appendectomy with a history of smoking would receive more funding than one without, based upon coding under Diagnostic Related Groups (DRGs) and recently implemented Activity Based Funding (ABF). An orthopedic ward with a high turnover of patients may still receive less funding than a smaller oncology ward (with less "occasions-of-service") due to the greater amount of comorbidities and treatment complications, even if total patient numbers are higher in the orthopedic ward.

All of these instruments and measures are used to reduce heterogeneity between cases and provide effective benchmark comparisons (such as length-of-stay). This is to guide budget and resource allocation, optimize patient care (via staffing ratios matched to clinical need) and to predict (and plan for) future trends.

ABF is less accurate when there is an outlier present to skew results. The long-term ventilated patient may increase total length of stay and costs, possibly leading to a financial loss in the immediate term but an excess monetary gain in future if the budget is summarily increased but a second “outlier” doesn’t then arrive.

If tertiary hospital A specializes in a specific procedure (e.g., organ transplant), it will attract funding dedicated to that specialty in the health budget, and away from hospital B, which does not perform that procedure. However, should hospital B wish to establish performing the procedure, resistance may be met? This may be because hospital B may be underfunded and cannot provide cost-effective resources to provide the new service, as it has not been budgeted for this in the past. There may also be resistance from hospital which may be unwilling or unable to relinquish funding, or fear an exodus of trained staff to hospital B.

These cross-divisions and potential lateral tiers of management add another level of complexity to current hospital funding. There is a potential disincentive for hospitals to provide greater clinical services—does creating a service actually increase demand and potentially unhappy clientele who now have to wait for something they wouldn’t previously have been offered? As progress occurs in medicine, does availability become the new gold standard of care and thus best practice? If so, savings have to be found and the pie of resources carved up into ever smaller slices.

By changing a reimbursable service from a hospital to a community general practice setting (state to federal funding), may result in savings from one sector (here the state health budget) to an increased deficit in another (here the federal health budget); while the total national health care expenditure remains the same.

Individuals and departments which are able to make efficient use of their budgets and resources are currently stripped away of their “excess” funding and are expected to fulfill the same outcomes in the next financial year using this new, smaller budget. This conflict of interest makes a department disinclined to save money and operate efficiently. In effect, proficient departments are penalized and inefficient ones rewarded!

Preventative health care also fares poorly under this arrangement. This field deals with potential (or virtual) inpatients. Illness prevention campaigns usually require several years to become established and beneficial effects on illness rates may take years to be seen (for example, the reduction in melanoma incidence with increased sun protection initiatives). Unfortunately the health budget is finalized each year and governments can rarely plan for a term in office beyond four years. “Fashionable” illnesses in the public limelight of advocacy groups (such as breast cancer, childhood cancer and mental health) are also very visible on a political agenda (Australian Institute of Health and Welfare, 2018). This influences voters with these illnesses, rather than those too young to vote (or are yet to be born!) Unfortunately rare congenital illnesses, such as metabolic disorders, are often

overlooked. The health dollars saved through health prevention are frequently channeled into other projects (reprioritized spending). Even if those prevention programs pay for themselves over the long-term—a healthier population is able to pay more taxes for a longer time—the dollars saved are virtual (and not tangible; though are still likely to be spent before they have been collected)!

### *3.2 Unique and General Practice*

General Practice is uniquely placed at a junction between small and large business, non-profit organization and commercial concern, private enterprise and public service. It has autonomy but answers to regulatory bodies (and is defined by them). Funding may be public, private or a combination of both. Practices may be established as sole-traders, partnerships, companies or franchisees. Some clinics are not for profit concerns and are publically-funded; receiving a monetary allowance from the government to operate (e.g., Aboriginal Health Services) (Australian Institute of Health and Welfare, 2018).

Within the practice, there may be a single practitioner (autocratic leader), a governing board (bureaucratic leadership) or an external one (if the organization is a satellite institution). The staff is likely to be diverse—administrative, clerical and clinical; each with differing levels of expertise and/or areas of interest. Some general practices include allied health personnel (for example physiotherapists, psychologists, dieticians and pharmacists); others employ doctors holding specific skills; such as sexual health, addiction medicine, cosmetic medicine and obstetrics expertise.

All of these factors influence the general practice workplace, the type of leader which is required and what sort evolves and thrives. Competing interests of large gross profits are hindered by Health Insurance Commission audits if too many patients are seen within a short period of time compared to peer benchmarks. Other local general practices are seen as rival competition in the eyes of business but as colleagues and friends during area Divisions of General Practice and Continuing Professional Development meetings. The autonomic practitioner may be constrained by Health Department directives, clinical practice guidelines and public health policy. Similarly, alliances with a pharmaceutical wholesaler, pathology testing company or private franchise may also influence performance, profitability and scope of services offered. The leader of a general practice may be a non-clinical practice manager or a nurse in a co-dependent physician leadership arrangement (Ponte, 2004).

### *3.3 A Woman's Perspective*

General Practice tends to have a varied workforce demographic, like the arts industry. Within medicine, the specialty of general practice has a higher proportion of female workers (who may also work more part-time hours), contains more ethnicity minority groups and has diverse practice settings in both rural and urban localities (Kilminster, et al., 2007).

Women comprise the dominant gender within the healthcare industry and are the greatest consumers of health care (Kirchheimer, 2007). Female gender dominates part-time employment (Australian Bureau of Statistics, 2018). Women remain underrepresented in the top echelons of healthcare leadership. Women are more likely to be departmental heads but men are more likely to be Chief Executive Officers and corporate presidents. A salary disparity (up to 20% less for women) prevails, even when controlling for gender differences in educational attainment, age and experience (Lantz, 2008). Females are more likely to voluntarily withdraw from the workforce for a family-related reason, such as spouse career move or to raise children, than men. However with respect to patient care, communication style, not gender, is more important in determining patient response to a doctor (Aruguete & Roberts, 2000).

### *3.4 Medical Leadership's Contribution to Change*

Change is inherent to leadership, which may be described as an adjective referring to the capacity of motivation to change (Fry, 2003). The leader's vision will define the organization's culture and attitude towards change (contingency theory).

Change involves loss: to the status quo, predictability and traditions. Leaders need to make the pain of change worth the effort (Tichy & Devanna, 1986). This is achieved through clarity of purpose or mission (Pietersen, 2002). Honest communication, participation, goal and example setting are the currency to allow change to pay off.

Leaders are reformists under a myriad of guises: service redesign, workplace management, productivity review, etc. The clash of innovator and conservative, rather than generating a spark of dynamism, slows the winds of change.

The more established an organization and its philosophy, the slower is the pace of change. A wise leader knows how to play the long game, position themselves ideally and achieve permanent change through increments, rather than introduce radical maneuvers which may prove a step too far to accept. Stand still and they fail too by preventing future innovation from occurring.

Leadership without direction is useless (Chervenak & McCulloch, 2001). Change provides direction to pursue excellence. Visionary leaders can see the benefits for change that others cannot and thus initiate it and do not resist it (Ham, 2003). The transforming leader raises the aspirations of his or her followers so that the leader's (or organization's) and follower's aspirations are fused (Parry & Bryman, 2006). Skillfully handled, this will also apply to change.

Change is continual and anticipatory (Hindle & Natsagdorj, 2002) and conditions need to be in place for it to happen (Ham, 2003). Rapid organizational change may cause demoralization and reduced quality of care (Gershon, Stone, Bakker, & Larson, 2004). Being diplomatic, leaders can enlist other professionals (who may initially be reticent) and engage them in reform top-down. Hopefully over time, within the organization a converse bottom-up process of input and reform is established that everyone may contribute to. This also has the advantage of the employees generating change themselves and not

having it thrust upon them (Ham, 2003). By including this adaptation to change as part of Continuing Professional Development, it also becomes integrated into workplace culture, collegially acceptable (adopted by existing and new workers), and an industry standard rather than revolutionary. We come full-circle back to systemic protocols, policies and pathways embedded in sites such as public hospitals.

### *3.5 Risk-Taking in Medical Leadership*

Leadership involves taking risks (Reinertsen, 1998). Good leaders know which risks to take (bad leaders don't). They take calculated risks but not unnecessary ones. An autocratic leader may make harmful decisions by not having the foresight and varied perspectives that a bureaucratic leader enjoys. Similarly a paranoid mistrusting chief may make large, preventable mistakes (Joni, 2004). However a bureaucratic leader may become an endemic "non-risk taker" due to the structure that system employs in maintaining the status quo—potentially stifling innovation and creativity (Lok & Crawford, 2004). Workplace-leadership discrepancies may arise in situations where an entrepreneur in private practice takes over the running of a "not-for-profit" public hospital or when a temperate civil servant used to conservative "middle management" policy and decision via consensus, is asked to spearhead groundbreaking reforms.

A leader must know when to take risks with personnel. Excessive loyalty, such as a seniority hierarchy, engenders over-protectiveness and may reduce the productivity of the organization (Joni, 2004). It may be time for new blood to reinvigorate the organization and challenge established work practices so they become more efficient. A true leader does not shy away from self-audit despite the potential pain of reality. Responsibility over an organization also implies accountability for it.

### *3.6 Risk-Taking in Medicine*

Unlike the military or sporting arenas, the field of medicine is not traditionally seen as one in which to take risks. Doctors like to deal with certainties (even though nature itself is uncertain), such as the predicted course of a disease or the response rate to a particular chemotherapeutic agent. The science of medicine means that doctors tend to remove emotion from decision-making, yet making decisions lies at the heart of taking risks. Leaders in-tune with their employees' emotions tend to be more effective decision-makers (Parry & Bryman, 2006).

Frequently doctors take risks on behalf of others: the patient with cancer, the one about to undergo surgery and when allocating spending from public coffers. While consent and the ultimate decision lies with the patient, budget signatory, health minister, etc., the way doctors frame risk and expected results influences the decisions being made in medicine. Consumers (patients) in medicine are adverse to risks being taken for managerial protection and (those managers') increased personal gain. This "customer-as-expert" shares decision making (and risk) with the technical expert (Harrow, 1997).

Risk-taking is not simply acknowledging potential negative consequences, and weighing the risks against benefits, but also recognizing vulnerabilities and having an alternative plan to cope with

unexpected problems (McGowan, 2007). This is where leaders shine or fall.

Risk-taking is not anathema to teamwork. Being able to share risk with an informed team is a critical attribute for the modern leader. Here the leader is not seeking self-protection from the team in the case of failure, rather gathering support and approval from the team through sharing the same vision, benefits and risks of the venture (McGowan, 2007). The leader is captain of the team and is not coaching from the sidelines.

#### **4. Discussion**

##### *4.1 Clinical Governance*

Inherent in any leadership position are expected outcomes. Risk-taking is frequently the path travelled to achieve these. Risk-taking in an organization is generally not seen as negative so long as it achieves results and is supported by effective leadership (Borins, 2000). The concept of clinical governance in medicine places risk in a managerial context as something to be viewed openly. Methodology, such as root cause analysis, seeks to define risk as a wholly manageable concept which can be negated through well-developed systems. While this may lead to greater (and more public) visibility of misadventures in medicine, unless remedial approaches are in place, best practice is not delivered and public confidence in medicine and its capacity for autonomy is eroded (Donaldson, 1998) (The naive or overconfident leader feels that all risk may be negated!).

Some leaders are risk-avoiders to their peril. Laissez faire (“hands off”) leadership, where free-reign is excessively delegated to subordinates, may result in targets not being met and the organization failing (a ship without a captain). Staff may feel insecure under this type of leader.

Management by exception, where the leader avoids giving corrective direction as long as the old ways appear to work and performance goals are met (Sarros & Santora, 2001) is similarly destructive. An organization stagnates without innovation and self-reflection. The structure of a system remains fixed without the input of an effective leader and the potential for entropy increases (Nolan, 1998).

Without risk and the prospect of failure, achievements lose their meaning. A risk-free workplace environment where employees operate through trial and error without consequence defeats the function and value of their work (Denis, Langley, & Pineault, 2000)!

Good leaders don't have a fear of failure they just have a healthy respect of it. Great leaders learn from failure and act differently on subsequent occasions. They blame themselves and transform adversity into opportunity. Like risk-taking, learning is another integral part of any good leader.

##### *4.2 Tolerating Chaos as a Medical Leader*

Chaos may be thought of as change without direction, uncertainty without purpose. Before any new age there exists a tumultuous period of change, akin to volcanic activity occurring before the creation of a new land mass. Reformation, like evolution, has the tendency to proceed through fits and starts (Denis,



Langley, & Pineault, 2000).

Effective leaders adopt democratic or participative styles. They take into account the bureaucratic model but are not afraid to also be transformational or visionary. Such a leader, assisted by charisma, is able to motivate an organization, provide reassurance and transcend work practices (and an atmosphere of apprehension) during times of chaos, so that employees remain calm and continue to strive for more. This empowers employees with morale, encourages dialogue and imbues a dedicated work ethic. Modulating organizational performance from effective leadership is achieved through establishing a workplace culture (Lok & Crawford, 2004). Good leaders create it, poor leaders don't.

Management is primarily focused on short term (transactional) results. As stated earlier, leadership is about playing the (transformational) long game: motivating people to change, to achieve long-term results (Fry, 2003). Motivation energizes, directs and sustains human behaviour, as well as long-term change. By taking ownership of the change, even catalyzing it within the organization, the transformational leader may deftly navigate the organization through the storm of chaos.

Organizations demand of leaders hard evidence, that changes introduced incrementally over time or that their navigation through episodes of uncertainty, will truly result in more effective and enduring service improvements (Sarros & Santora, 2001); with the organization surviving intact (possibly even triumphing) when the period of chaos is over.

Leaders, being transformational and visionary, may not be able to offer such tangible guarantees, despite having a proven track record of taking gambles which pay off (and probably led to them being offered the position in the first place).

#### *4.3 Constancy*

Influence is a tool to enable change intrinsically, authority is the right to do so and power enforces change extrinsically.

An organization led through fear (control and employee compliance, a carrot and stick model) will reject change as it is solely extrinsically motivated. Here workers respond only to low order needs, such as salary and working conditions, independent to the nature of the task. Intrinsic motivation transcends self-interest for group worth. It promotes concern and enjoyment of an activity for its own sake, facilitating growth and satisfying higher order needs. In addition to the follower (employee), the leader similarly enjoys competence (task-mastery), autonomy (including internal motivation) and relatedness, through empowered teamwork. Individuals, who take ownership and are completely engaged, stimulate creativity and take pride in their work. They also feel a sense of progress and accomplishment which ultimately leads to superior organizational gains and outcomes (Fry, 2003).

In times of uncertainty and chaos, capable leaders possess an eye for change and a steadying hand. They have an enduring vision and the reassurance that change can be mastered (Barker, 2002). The one constant in change should be the organization's leader.

## References

- Aruguete, M. S., & Roberts, C. A. (2000). Gender, affiliation and control in physician—Patient encounters. *Sex Roles, 42*(1/2), 107-118. <https://doi.org/10.1023/A:1007036412480>
- Australian Bureau of Statistics. (2018, December 20). *6202.0—Labour Force, Australia, Nov 2018*. Retrieved January 2, 2019, from <http://www.abs.gov.au/AUSSTATS/abs@.nsf/mf/6202.0>
- Australian Institute of Health and Welfare. (2018). *Australia's Health 2018*. Retrieved January 2, 2019, from <https://www.aihw.gov.au/reports/australias-health/australias-health-2018>
- Barker, L. (2002). Power, influence and action: Making leadership work. In *Australia Institute of Management. The Heart and Soul of Leadership*, Sydney, Australia: McGraw-Hill.
- Berwick, D. M. (2003). Improvement, trust, and the healthcare workforce. *Qual Saf Health Care, 12*, 448-452. <https://doi.org/10.1136/qhc.12.6.448>
- Borins, S. (2000, Nov/Dec). Loose cannons and rule breakers, or enterprising leaders? Some evidence about innovative public managers. *Public Admin Rev, 60*(6), 498-507. <https://doi.org/10.1111/0033-3352.00113>
- Chervenak, F. A., & McCullough, L. B. (2001). The moral foundation of medical leadership: The professional virtues of the physician as fiduciary of the patient. *American Journal of Obstetrics and Gynecology, 184*(5), 875-880. <https://doi.org/10.1067/mob.2001.113854>
- Denis, J. L., Langley, A., & Pineault, M. (2000, Dec). Becoming a leader in a complex organization. *J Manage Stud, 37*(8), 1063-1099. <https://doi.org/10.1111/1467-6486.00217>
- Donaldson, L. J. (1998). Clinical governance: A statutory duty for quality improvement. *J Epidemiol Community Health, 52*, 73-74. <https://doi.org/10.1136/jech.52.2.73>
- Fry, L. W. (2003). Toward a theory of spiritual leadership. *The Leadership Quarterly, 14*(6), 693-727. <https://doi.org/10.1016/j.leaqua.2003.09.001>
- Gershon, R. R. M., Stone, P. W., Bakken, S., & Larson, E. (2004). Measurement of Organizational Culture and Climate in Healthcare. *JONA, 34*(1), 33-40. <https://doi.org/10.1097/00005110-200401000-00008>
- Ham, C. (2003). Improving the performance of health services: The Role of Clinical Leadership. *Lancet, 361*, 1978-1980. [https://doi.org/10.1016/S0140-6736\(03\)13593-3](https://doi.org/10.1016/S0140-6736(03)13593-3)
- Harrow, J. (1997). Managing risk and delivering quality services: A case study perspective. *Int J Pub Sector Manage, 10*(5), 331-352. <https://doi.org/10.1108/09513559710172140>
- Hindle, D., & Natsagdorj, T. (2002). Treating Organisational Illness: A practical approach to facilitating improvements to health care. *Australian Health Review, 25*(6), 171-180. <https://doi.org/10.1071/AH020171a>
- Joni, S-nJ. (2004). The Geography of Trust. *HBR, 82*(3), 82-88.
- Kilminster, S. et al. (2007). Women in medicine—Is there a problem? A literature review of the

- changing gender composition, structures and occupational cultures in medicine. *Medical Education*, 41(1), 39-49. <https://doi.org/10.1111/j.1365-2929.2006.02645.x>
- Kirchheimer, B. (2007). A Woman's Place Is In... *Modern Healthcare*, 37(16), 6-7.
- Lantz, P. M. (2008, Sep-Oct). Gender and leadership in healthcare administration: 21st century progress and challenges. *J Healthc Manag*, 53(5), 291-301; discussion 302-303. <https://doi.org/10.1097/00115514-200809000-00004>
- Lok, P., & Crawford, J. (2004). The effect of organizational culture and leadership on job satisfaction and commitment—A cross national comparison. *Journal of Management Development*, 23(4), 12-18. <https://doi.org/10.1108/02621710410529785>
- Marshall, M. N. et al. (2003, September 13). Managing change in the culture of general practice: Qualitative case studies in primary care trusts. *BMJ*, 327(7415), 599-602. <https://doi.org/10.1136/bmj.327.7415.599>
- McGowan, J. J. (2007, January). Swimming with the sharks: Perspectives on professional risk taking. *J Med Libr Assoc*, 95(1), 104-113.
- Nolan, T. W. (1998). Understanding Medical Systems. *Annals of Internal Medicine*, 128(4), 293-298. <https://doi.org/10.7326/0003-4819-128-4-199802150-00009>
- Parry, K. W., & Bryman, A. (2006). Leadership in organizations. In S. Clegg, C. Hardy, T. Lawrence, & W. Nord (Eds), *Sage Handbook of Organization Studies*. London, UK: Sage Publications Ltd. <https://doi.org/10.4135/9781848608030.n15>
- Pietersen, W. (2002). The Mark Twain Dilemma: The theory and practice of change leadership. *Journal of Business Strategy*, 23(5), 32-37. <https://doi.org/10.1108/eb040272>
- Ponte, P. R. (2004). Nurse-Physician Co-leadership: A Model of Interdisciplinary Practice Governance. *JONA*, 34(11), 481-484.
- Reinertsen, J. L. (1998). Physicians as Leaders in the Improvement of Health Care Systems. *Annals of Internal Medicine*, 128(10), 833-838. <https://doi.org/10.7326/0003-4819-128-10-199805150-00007>
- Sarros, J. C., & Santora, J. C. (2001). Leaders and values: A cross-cultural study. *Leadership & Organization Development Journal*, 22(5), 243-248. <https://doi.org/10.1108/01437730110397310>
- Souba, W. W. (2000). Editorial: The Core of Leadership. *The Journal of Thoracic and Cardiovascular Surgery*, 119(3), 414-419. [https://doi.org/10.1016/S0022-5223\(00\)70118-8](https://doi.org/10.1016/S0022-5223(00)70118-8)
- Tichy, N. M., & Devanna, M. A. (1986). *The Transformational Leader*. New York, NY: John Wiley.

**Note**

Dr Anthony Zehetner is a Staff Specialist in Adolescent Medicine at the Children's Hospital at Westmead, a Consultant Paediatrician in private practice and a Clinical Senior Lecturer for the University of Sydney. He completed a Master of Medicine (Paediatrics) including studies in medical leadership and also has a management degree.