



Burning out

International Approaches
to Clinician Wellbeing



Dr Caitlin Weston

DECLARATION

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Report by Caitlin Weston, 2016 Churchill Fellow

To explore strategies that improve the wellbeing of clinicians, optimising their mental health and productivity.

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Caitlin Weston
27th May 2018

EXECUTIVE SUMMARY

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AIM

To explore strategies that improve the wellbeing of clinicians, optimising their mental health and productivity

METHOD

Twenty-eight interviews were conducted with 37 individuals across ten institutions in the United States of America, Canada, and the United Kingdom. The full list of individuals interviewed can be seen in the next section. I attended the two-day 'American Conference on Physician Health' in San Francisco, two-day 'Enhancing Caregiver Resilience: Quality Improvement and Burnout' course at Duke Patient Safety Center, the 'NHS England (London Region) Responsible Officer and Appraisal Lead Network Meeting', and the presentation by Professor Clare Gerada to the Lord and Lady Justices of the Royal Courts of Justice: 'The Judiciary: a view from the NHS'. I visited the Stanford WellMD Center, the Canadian Medical Association, the Canadian Medical Protective Association, Duke Patient Safety Center, Johns Hopkins Hospital, the University of Utah, the NHS (London) Practitioner Health Programme and the Point of Care Foundation.

Interviews were based around a few key questions, depending on the type of program offered.

- How is clinician wellbeing assessed?
- What are the important drivers of adverse clinician wellbeing in each context?
- How are administrators persuaded to support and fund interventions, and how is ongoing leadership support ensured?
- What input does each intervention require in terms of funding, personnel and other resources in the stages of design, implementation and ongoing operation? How is sustainability ensured?
- How are interventions evaluated?
- What have been the greatest challenges in the design, implementation and evaluation of each program?

RESULTS

A few major themes emerged from my interviews:

- Conceptual frameworks for the drivers and solutions to adverse clinician wellbeing
- The importance of measurement to both assessing clinician wellness and its impacts, and designing and evaluating solutions
- The critical role of leadership support to the growth and success of programs, and ways in which leadership support can be obtained
- Interventions are most successful when they target locally important causes and harness local strength and skills

DISSEMINATION AND IMPLEMENTATION

- This report will be freely available to the public from the Churchill Trust website.
- I will present my Fellowship findings at local, regional, and international meetings
- I have interrupted my anaesthetic training to take up the position of Wellbeing Project Lead with health technology start-up MedApps Pty Ltd. This company, founded by doctors, makes mobile applications designed to improve the working lives and wellbeing of clinicians. The company's flagship application Resident Guide has a user base of 2,500 Australian doctors-in-training that is rapidly growing, providing an incredible opportunity to implement large-scale wellbeing interventions for an especially vulnerable group of doctors, and offering a potential platform for longitudinal data collection.
- I will maintain active membership of committees and working groups with the Australian Medical Association, advocating for doctors' welfare.
- I will continue to communicate and collaborate with individuals and teams from the international research community to maintain a global dialogue around clinician welfare
- I will engage with Australian mental health organisations such as Everymind and the Black Dog Institute that have been engaged by government bodies to research and implement wellbeing solutions for clinicians.

DEDICATION

I dedicate this report to my friend Dr Chloe Abbott.

Ever a staunch advocate for the rights of her colleagues, Chloe herself fell prey to the brutal culture of medicine, taking her own life on 9th January 2017. Chloe, you will always be missed and never forgotten, and we will never stop fighting to enlighten the system that darkened your world.



ACKNOWLEDGEMENTS

This Fellowship and report are the work of a village of incredible people who have been behind me throughout. My family, and in particular my parents, Sue and Peter Weston, who have encouraged and believed in me from the moment I first excitedly voiced my idea to apply. Dr Tracey Tay, who has been a wonderful mentor and friend from the day we met at the Churchill Trust Roadshow in Newcastle in 2016. Dr Ben Veness, already a valued friend from medical school, for also becoming a great mentor and endless font of wisdom and good advice throughout my Churchill journey. Central Coast Local Health District, and in particular Dr Frances Page and Dr Scott Fortey, for believing in the importance of this project and supporting me by every means possible along every step of the journey. Ray O'Donoghue for his unerring faith in my ability, and his invaluable assistance in preparing for my interviews and planning my trip. Bick Fulton for her much-needed support in the lead-up to my departure. Dr Marion Andrew, Dr Clair Whelan and Dr Peter Thomas for believing in me enough to act as referees on my initial application. Everyone I met with on my trip who shared their time, knowledge, expertise, friendship and homes with me! You made this the trip of a lifetime; you have given me so much inspiration and renewed passion and vigour for both my research and life. Everyone who assisted in the preparation of this report, in particular Sam Seabourn for the typesetting and finishing of this document, Carmel Sealey for her skilful editing, Dr Priya Rajaendran for spirited discussion and planning and Dr Jessica Elmasry for assistance searching the literature. I am also grateful to Dr Rob Pearlman for the opportunity to implement my findings through my work at Resident Guide. Lastly and most importantly, I owe a huge debt of thanks to the Winston Churchill Memorial Trust for giving me the opportunity of a lifetime.

PROGRAMME

UNITED STATES OF AMERICA

2017 AMERICAN CONFERENCE ON PHYSICIAN HEALTH

San Francisco, California

Dr Jo SHAPIRO

Director, Center for Professionalism and Peer Support, Brigham and Women's Hospital

Dr Tina SHAH

White House Fellow, Department of Veterans' Administration

Ms Mary-Lou MURPHY

Administrative Director, Stanford WellMD Center

Ms Patty DE VRIES

Director of Strategic Projects, Stanford WellMD Center

Director, Stanford Health Promotion Network

Dr Mickey TROCKEL

Director of Scholarship and Health Promotion, Stanford WellMD Center

Dr Maryam HAMIDI

Associate Director of Scholarship and Health Promotion, Stanford WellMD Center

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Dr Bob HOROWITZ

Consulting Professor, Stanford Prevention Research Center

Dr Magali FASSIOTTO

Assistant Dean and Director of Programs and Research, Stanford Medicine Office of Faculty Development and Diversity

Dr Larry KATZNELSON

Association Dean, Medical Graduate Student Education, Stanford University

Dr Bryan Bohman

Senior Advisor and Former Interim Director, Stanford WellMD Center

ENHANCING CAREGIVER RESILIENCE: BURNOUT AND QUALITY IMPROVEMENT

Duke Patient Safety Center, Duke University, North Carolina

Dr J. Bryan SEXTON

Director, Duke Patient Safety Center, Duke University

Dr Carrie ADAIR

Research Associate, Duke Patient Safety Center, Duke University

Dr Janel SEXTON

Research Associate, Duke Patient Safety Center, Duke University

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Ms Suzette GOUCHER

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Dr Christopher SIMON

Advisor, Canadian Medical Association

Ms Taylor MCFADDEN

PhD Candidate, University of Ottawa

Research Associate, Canadian Medical Association

Dr Pamela EISENER-PARSCHÉ

Director of Physician Consulting Services, Canadian Medical Protective Association

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Medical Director, NHS Practitioner Health Programme

Ms Lucy WARNER

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CEO, NHS GP Health Service

Ms Louisa DALLMEYER

Commissioner, NHS Practitioner Health Programme

Ms Joanna GOODRICH

Head of Evidence and Learning, The Point of Care Foundation

Dr Caroline WALKER

Co-Founder, Tea & Empathy Support Network

Founder, The Joyful Doctor

BACKGROUND

Poor clinician wellness is rapidly gaining recognition in Australia as a significant threat to both the clinicians themselves and to the quality of care the healthcare system is capable of providing. The most compelling evidence of the scale of the problem in Australia came from the *National Mental Health Survey of Doctors and Medical Students*, with this group of healthcare professionals showing disconcertingly high levels of psychological distress and suicidality compared to the general population and other professionals, as well as high levels of burnout [1]. Groups most at risk include young and early career doctors, females, those practicing rurally and doctors of Aboriginal or Torres Strait Islander origin. Another study demonstrated that female doctors, as well as nurses of both genders, show a substantially higher risk of suicide than their counterparts among the general Australian population [2].

The problem of poor mental health among clinicians is not a new one, and nor is it an issue faced by Australia alone. In 1881 the risk ratio for suicide among male physicians in England and Wales compared to males in the general population was 1.5, a figure comparable to calculations of suicide risk among male doctors today [3, 4]. Female doctors and doctors overall displaying still higher risk ratios [5-8].

International interest in clinician burnout and poor mental health has grown rapidly in recent years, as has our understanding of the effect these problems have on patient care and on the efficiency of healthcare systems. Clinician depression and burnout have been linked to higher rates of medication errors, surgical errors, infection rates, mortality, patient complaints, and high staff turnover [9-14]. The growing body of evidence has brought thought leaders in the field to herald “clinician wellness and engagement” as the “fourth quality indicator” in healthcare, placing it alongside “improving patient experience” and “reducing the per capita cost of healthcare” as key goals in supporting the overall aim of improving population health [15, 16].

After a tragic spate of suicides in 2016–2017 by New South Wales doctors at a range of career stages, the issue of doctors’ mental health began to feature prominently in the media, driven largely by the families and colleagues of those who took their lives. This garnered both state and federal recognition of the problem, with both NSW and federal health ministers (Brad Hazzard and Greg Hunt, respectively) committing to address doctors’ wellbeing as a matter of urgency, and the federal department of health allocating \$1 million specifically to mental health programs for doctors. The current level of industrial and public engagement with these issues in Australia is unprecedented.

Box 1 Frequently-cited drivers of clinician burnout and adverse wellbeing in Australia

Clinical

- Healthcare system emphasis on throughput of patients
- Distress associated with perceived or actual clinical errors
- Increased complexity of pathology and comorbidities in the patient population
- Higher patient and family expectations of healthcare than in decades' past
- Vicarious trauma from repeated exposure to patient and family distress
- Moral distress associated with futile care

Industrial

- Excessive or unsociable work hours limiting capacity for appropriate maintenance of physical, psychological, and social health
- Administrative and clerical barriers to finding meaning in work
- Lack of psychologically/socially ergonomic systems and workplaces
- Excessive unclaimed or unpaid overtime
- Lack of support from supervisor
- Inability to take leave due to chronic staffing shortages
- Concurrent study for high-stakes professional examinations
- Geographical isolation from social and other supports during secondments
- Intense competition for jobs driving an “educational arms race”
- Lack of long-term job security
- Fear of complaints, reports to the medical board, and litigation
- Increasing risk of physical violence in the workplace

Cultural

- Lack of recognition or appreciation from organisation/leadership
- Healthcare’s hypocritical “hidden curriculum” and “iron man” culture
- Systemic, public, and personal expectations of perfection
- Decreasing collegiality and camaraderie
- Bullying and harassment
- Lack of preparation for transition to work for students
- Lack of preparation for transition between career stages; for example: resident to junior registrar, fellow to junior consultant, transition to retirement
- Discrimination by employers, colleagues, and patients on the basis of race, gender, sexual orientation, and religion

Box 2 Frequently-cited barriers to help-seeking for Australian clinicians

- Lack of awareness of available programs and resources
- Stigmatisation of “weakness” and help-seeking
- Threats to confidentiality when being treated by colleagues
- Concern for potential impact on career advancement
- Perceptions of current mandatory reporting laws and possible impact on registration and right to practice
- Difficulty accessing primary care around work hours and secondments
- Difficulty accessing leave entitlement due to chronic staffing shortages
- Lack of time to attend to self-care

APPROACH

It is useful to have a good model for conceptualising and approaching any public health problem. There are a number of models in use for discussion of clinician wellness, most of which are divided into individual and systemic interventions and several of which employ the public health principles of stratification into primary prevention, secondary screening, and tertiary treatment [17, 18]. These approaches highlight the importance of early intervention and health promotion, and can help to ensure a balanced and comprehensive approach to program design in terms of groups targeted.

Figure 1. Prevention Model of Physician Well-Being

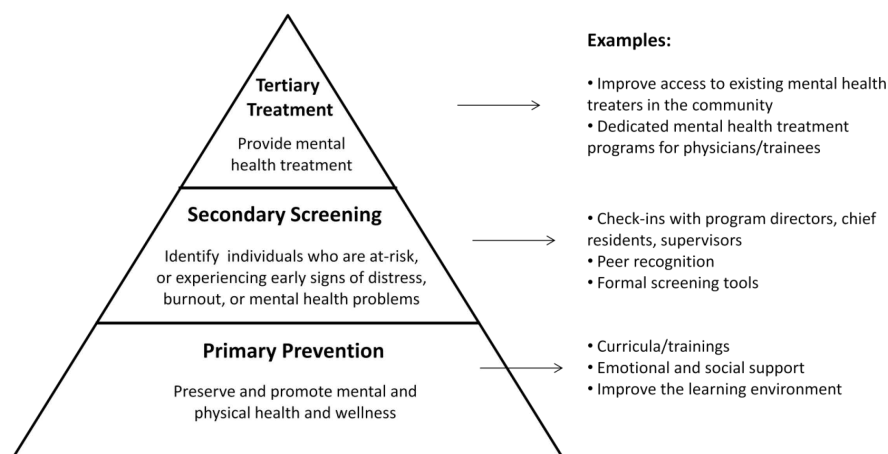


Figure 1 A public health prevention framework proposed as an approach to the problem of physician burnout. This model focuses on the level of risk of individuals or groups of clinicians. Reproduced with permission from Chaukos et al 2018..

The model conceived by Dr Patty de Vries from the Stanford WellIMD Center, which has been taken up by multiple institutions around the USA and the world, focuses on the drivers of burnout and poor wellbeing. It divides drivers and solutions into three domains: Culture of Wellness, Efficiency of Practice, and Personal Resilience (see **Figure 2**, below). This model highlights that the bulk of responsibility for reversing the current problem lies with healthcare organisations rather than individuals (only one of the three domains targets individuals), and aids organisations in designing or selecting programs that address specific drivers within their context.



Figure 2 Stanford WellIMD Center Conceptual Framework for physician wellness. This model was devised based on identified drivers of physician burnout and emphasises the important role of the systemic interventions in promoting professional fulfillment for clinicians. Reproduced with permission from WellIMD Center.

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My own approach in this report will be to begin by discussing approaches to measurement and areas for further research; move on to the importance of leadership support and ways of attaining it; then discuss interventions at the systems-level followed by those targeted toward individuals. I will then discuss systems currently in use in Australia, considerations for implementation of new programs, areas for further work, and specific recommendations for the Australian context.

MEASUREMENT AND RESEARCH

In order to not only assess the scale of a problem, but also our successes and failures in remedying it, reliable, valid, and easily applied measures are vital. Metrics are made still more valuable if they are standardised to some extent across institutions and the world to facilitate benchmarking, clear communication and research collaboration to accelerate the establishment of best practice guidelines. Measurement of patient outcomes and economic impact related to clinician wellbeing are also critical to compile a business case for investment in clinician wellness and thereby assist policy-makers and administrators in allocating appropriate resources to the problem.

We have some knowledge about the extent of poor clinician wellbeing in Australia, and a wealth of research from around the world about the effect this has on healthcare [19-24]. We must now make measurement of clinician wellness in the Australian system a priority commensurate with its importance in terms of workforce productivity, quality of care and cost efficiency. Many reliable, validated metrics are available for the assessment of the various domains of clinician wellness and institutional culture, with new instruments constantly being developed.

Several such metrics may be combined in modular surveys to build up a comprehensive picture of wellness in healthcare systems while enabling the addition of measures in subsequent surveys as new areas of concern come to light [19, 22]. Dr Christopher Simon and Taylor McFadden of the Canadian Medical Association (CMA) discussed with me the design of the *2017 Canadian Physician Health and Wellness Survey*, which focused on the current crises of physician burnout and workplace culture. On reviewing the results of the previous survey which was conducted in 2007, the team noted that many of the metrics used examined issues no longer at the forefront of industry concern, limiting its usefulness in targeting and refining CMA policies. The working group tasked with the design and implementation of the 2017 survey had to select which metrics should be included, balancing the concept of “gold standard” metrics against survey length, validation for the Canadian physician population, and the availability of comparisons with other physicians, other healthcare professionals, and the general population. This process reflects the criteria recommended by Tait Shanafelt for selection of metrics [19].

Further research needs to be undertaken within the Australian context to more clearly establish the relationship between clinician wellness and economic outcomes, in order to facilitate organisations compiling business cases for investment in physician wellbeing [13, 23, 25]. Clear business cases will not only back up the compelling moral and ethical argument for investment in clinician wellbeing, but will also assist policy-makers and administrators to allocate funding and personnel to improving the wellbeing of the workforce through improvements to systems, workplace culture, and relevant programs [25]. Contextual differences have a large impact here. For example, qualified physicians in Canada (with the exception of Prince Edward Island) operate as sole traders with admitting rights rather than as direct employees of the health service, making the business case for physician wellness in that country much more complex than that in the USA.

Research is also needed to better understand the importance of various drivers of burnout in different areas of our healthcare system. This was a notable point of difference across the three countries I visited during my Churchill travels. For example, the working hours and patient load for doctors-in-training (DITs) seems to

be modestly lower in Australia than in the USA, Canada, and the UK. Doctors in the USA graduate from medical school shouldering a much larger educational debt than their counterparts in Australia, Canada, and the UK exerting financial pressure that may drive individuals to work to the point of burnout. Australian doctors spend between two and ten years after graduation trying to attain a place in a training program which will then take them between three to seven years of full-time training to complete. During which time they may well be trying to start a family while having minimal control over their schedule and moving cities up to every three months, exacerbating work-life conflict. Meanwhile, most doctors in Canada and the USA will enter specialty training straight from medical school and attain their fellowship in three to seven years of full-time training. The drivers of poor staff wellbeing in any healthcare system also change depending on specialty, environment, and throughout an individual's professional lifetime. This necessitates an assessment of drivers for a given context through surveys and focus groups prior to implementation of programs [19].

Return on investment in measurement and research will be increased by adopting common metrics across the Australian healthcare system to facilitate comparison and benchmarking [23]. Furthermore, adopting validated measures already in use by healthcare research institutions internationally will allow us to benefit more from research undertaken around the world. It will also accelerate the establishment of global best practice in burnout in various contexts and caused by various drivers [23, 26]. The recommendation from a 2016 'Joy in Medicine Summit' to establish alliances that address physician burnout has resulted in Stanford University founding the Physician Wellness Academic Consortium, a collection of more than ten large academic organisations across the United States cooperating in research on clinician wellness impacts and interventions, with plans to expand the group internationally.

Infrastructure needs to be established by healthcare systems to facilitate regular data collection and good response rates by staff. This will enable longitudinal measurement of clinician wellness to become a routine component of organisational performance evaluation. For example: organisations could provide protected time for staff to complete the survey within work hours and set departmental targets for staff response rates tied to a funding bonus. Such decisions also demonstrate leadership investment in staff wellness. Enabling staff to complete the survey on personal devices would reduce the administrative burden associated with processing paper-based surveys and the bottleneck caused by limited access to hospital computers.

The administrative burden associated with attempting large-scale surveys without established infrastructure has historically been a barrier to longitudinal measurement. Surveys of doctors-in-training by the Australian Medical Association, beyondblue and the NSW Ministry of Health have generally been stand-alone surveys with response rates below 25% despite repeated email and social media reminders to participants [1, 27-32]. The ten-year gap between iterations of the *Canadian Physician Health and Wellness Survey* severely limited its usefulness in guiding policy and program development, and for this reason the current team are hoping to repeat the survey more frequently in future years. The Mayo Clinic, which has undertaken regular testing of clinician burnout since 2010, increased the frequency of its assessments from biannual to annual in 2016 [19]. Drivers of poor clinician wellness follow predictable patterns throughout the year with seasonal changes in workload, therefore I would advocate annual surveys taken at approximately the same time each year.

Guidelines also need to be established for the evaluation of wellness initiatives for the purpose of ongoing quality assurance. In the *Enhancing Caregiver Resilience: Quality Improvement and Burnout* course at Duke Patient Safety Centre, Dr J. Bryan Sexton advocates evaluation no sooner than 12–18 months after

implementation of a program in order for its effect to be reflected in the data. Discussion between Professor Barbara Friedrichson and members of the Johns Hopkins Hospital (JHH) RISE Team raised another issue for program evaluation in that one must maintain the confidentiality of service users and not disrupt service provision. For these reasons, evaluation of the RISE program has formerly been restricted to coarse usage data and irregular qualitative feedback. Regular wellness surveys at JHH provide longitudinal data pre- and post-intervention, as well as the opportunity to add survey items on awareness, uptake, and utility of services.

Box 3 Principles for evaluation of clinician wellness

- Measurement of clinician wellness needs to become a priority in our system commensurate with its importance in terms of workforce productivity and longevity, quality of care and cost efficiency.
- Individual metrics: validated and reliable for selected population and timescale; correlate with patient and economic outcomes, widely used to provide external benchmarking data.
- Surveys: comprehensive, quick and simple to complete to maximise response rate, modular to allow addition of measures as new areas of concern come to light.
- Longitudinal measurement: repeat regularly to monitor trends over time; ideally track non-identifiable individual results.
- Establish infrastructure to facilitate regular testing.
- Establish guidelines for program evaluation.
- Standardise timing of surveys to avoid confounding effect of seasonal changes in workload etc.
- Repeating too frequently risks declining response rates due to survey fatigue; repeating too rarely provides reduced opportunities to alter policy and adapt programs that are not working.

Box 4 Priority areas for research in Australia

- Further establish the links between clinician wellness and financial and patient outcomes in the Australian context.
- Further clarify the drivers of adverse clinician wellness in Australia to enable targeted intervention.
- Further research on effectiveness of interventions for specific contexts, drivers and clinician/patient/financial outcomes.

POLICY AND LEADERSHIP

The key to success for any program is the “tone at the top” of the organisation. This fact was made abundantly clear over the course of my program visits. In many cases, passionate individuals and groups had been working behind the scenes for years on programs to promote clinician wellbeing, but it was only when executive staff were engaged with the problem that things really took off. Organisational structures dedicated to clinician welfare, clear chains of accountability, and plans for monitoring trends over time sprung up almost overnight once this happened. The energy and expertise of those individuals already working at the grassroots were harnessed and utilised so that, instead of those programs floundering and the individuals burning themselves out, their efforts were recognised and made more visible. Senior medical staff in organisations with engaged leadership were far more open and realistic about the hardships of clinical practice and showed respect to those working to ameliorate things, setting off an immediate process of thawing the harsh “iron man” culture of medicine, with juniors visibly more comfortable acknowledging difficulties.

When it comes to addressing burnout and wellbeing in healthcare, “Commitment from executive leadership is the prerequisite, assessment the first step, and front-line leadership a force multiplier” [25]. So how do we engage executive leadership? This question featured prominently at the ‘American Conference on Physician Health’, and has been the main priority of the Stanford WellMD Center in its founding years [33]. The common theme in conference presentations and my interviews on the subject was that the key to engaging leadership is to “speak to leaders in their language”. Many executive leaders and policy-makers are sympathetic to the moral and ethical case for improving wellbeing but feel that the issue is beyond their power and means to address. However, there is substantial evidence that the cost of the problem goes beyond the human; that the economic impact of burnout is substantial and can be quantified to form a compelling business case [19, 25].

Differences in structure and funding between the healthcare systems in the USA and Australia mean that the business case model developed by Professor Tait Shanafelt may require reworking and further research for the Australian context. As the US healthcare system is largely privatised, the language used to discuss the economic costs in the United States’ system focuses on the capacity of physicians to generate revenue for the organisation, and costs associated with staff turnover and recruitment [13, 25]. Cost estimates for the Australian context— where universal healthcare means that even the private system is heavily reliant on government funding— may be more dependent on the cost of suboptimal test-ordering and prescribing habits, reduced efficiency of burned out clinicians and reduced quality of care; for example, increased healthcare-associated infections and surgical complications. The cost of burnout to the NHS is likely to be similarly difficult to calculate, compounded by the sheer scale of the system. It may be even more difficult in the Canadian system, where nearly all qualified physicians act as sole traders rather than direct employees of the hospital. However, as clinician wellbeing is fundamentally a quality and safety issue, many arguments put forward in business cases for the quality and safety movement 20 years ago will be applicable in this case too [34]. Another consideration is the potential for investment by commercial stakeholders who are likely to benefit from a reduction in clinician burnout, such as medical indemnity providers.

The World Medical Association’s recent amendment to the Declaration of Geneva to include the phrase “I will attend to my own health, well-being, and abilities in order to provide care of the highest standard”

reflects an inexorable global cultural shift toward recognition of the importance of clinician wellbeing [35]. The next step is to fortify the place of clinician health in Australia through federal, state, and professional college policies, and by establishing clear chains of accountability within organisations. Significant progress toward this goal could be achieved by making key metrics of clinician wellness a component of accreditation standards for public and private healthcare organisations. Setting Key Performance Indicators with financial incentives linked to longitudinal targets will be another key step in assuring change [19]. Organisations can recognise the place of clinician wellbeing as the fourth quality indicator by establishing an executive role whose responsibility is the measurement and maintenance of staff wellbeing [15, 16, 19, 25]. This step has already been taken at Stanford University Hospital and at University of Utah Health, where the introduction of a Chief Wellness Officer reflects the current cultural shift in health from “patient-centred care” to “person-centred care”. Both these organisations, as well as the Mayo Clinic, are taking a strategic and structured approach to developing, coordinating and surfacing wellness resources for staff.

Shanafelt outlines nine strategies for leaders seeking practical means of addressing burnout and poor wellbeing in their institutions, and describes the typical organisational trajectory in addressing clinician wellbeing [19, 25]. In the next two sections, I will further outline some of the described strategies through the lens of system-targeted and individually-targeted approaches.

Box 4 Principles of leadership and policy

- “Tone at the top” is crucial to organisational change and the success of programs
- The development of a business case for the Australian healthcare system will be important in securing leadership buy-in and guiding ongoing allocation of funds
- The importance of clinician wellness to quality of care needs to be reflected in policy through KPIs and accreditation standards
- A Chief Wellness Officer or equivalent should be appointed in larger organisations to oversee measurement efforts and coordinate services
- The organisational strategies described by Tait Shanafelt provide executive leaders at the organisation level with practical guidance for addressing burnout and poor wellbeing [36], and outline the expected trajectory of development for an organisation [25]

Box 5 Advocating for change from the ground up in your institution: steps and resources

- Measure the problem and compile a business case to engage leadership [25]
- Identify main drivers in your institution or unit (perform cultural and needs assessments through surveys of front-line clinicians, focus groups, and working groups)
- Identify strengths and resources within your institution or unit (same process as above: engage front-line staff, make them feel listened-to and useful; show leaders that many of the components necessary for change are already there in the institution)
- Coordinate and surface existing services through centralised directories and staff contacts, empower individuals to access services
- Quality improvement cycle: establish mechanisms for feedback and evaluation of interventions

INTERVENTIONS

“Resilience” quickly becomes an emotionally charged topic when improved personal resilience is discussed as the prime solution to adverse clinician wellbeing. Objection to the term springs largely from the fact that clinicians are *already* incredibly resilient people. For example, despite high prevalence of psychological distress, specific mental health diagnoses, burnout and suicidality among Australian doctors and medical students, it appears to have minimal impact on their work [1]. Furthermore, a study of medical students in the USA showed that the individuals choosing to study medicine are in fact healthier and more resilient than their compared with matched peers entering other postgraduate courses, a pattern which is overturned after two years of study [37].

Placing the bulk of responsibility on individuals not only denies clinicians’ inherent resilience, but may also be seen as an attempt to absolve policy-makers, organisations, and managers from the responsibility of addressing dysfunctional systems and workplace cultures [38]. This may merely have the effect of breeding cynicism, eroding staff engagement, and undermining trust in the institution. Despite considerable political interest in Australian doctors’ wellbeing at the state and federal levels only 51% of New South Wales doctors-in-training felt that their employers valued their health and wellbeing, and only 24% believed that any action would be taken to improve their situation [27]. Conversely, acknowledging problems and engaging with frontline clinicians to develop solutions that specifically address their needs may help executive leaders to address the high levels of cynicism seen in Australia.

While systems-targeted and individual-targeted interventions have both proved to be beneficial in addressing clinician burnout and poor wellbeing, two systematic reviews and meta-analyses have demonstrated some superiority in the effectiveness of systems-targeted interventions [39, 40]. The Stanford WellMD Center conceptual framework (**Figure 2**) places the bulk of responsibility for addressing clinician wellness on healthcare organisations, with two of the three domains (culture of wellness and efficiency of practice) representing system-level drivers and solutions, and only one focusing on the individual [41]. This framework provides the lens through which I will discuss interventions, using the Well MD Centre’s Domain definitions [41].

CULTURE OF WELLNESS

Organisational work environment, values and behaviours that promote self-care, personal and professional growth, and compassion for ourselves, our colleagues and our patients.

Stanford WellMD Center Domain Definitions

Approaches to improving the culture of wellness observed in the organisations I visited include leadership optimisation, clinician involvement in program design, programs for peer support and debriefing, and efforts to improve collegiality and professionalism in workplaces.

Leadership has been shown to be a strong predictor of wellbeing, professional satisfaction, and burnout at the work-unit level [19, 24, 36]. Routine assessment of work-unit leadership can provide a screening tool to detect departments at high risk of burnout, and allow targeted education of underperforming managers in leadership and communication skills [36].

Active engagement and collaboration between leaders and front-line clinicians to identify and address problems provides an opportunity to tailor programs to local need and to locally-available skills and resources [19, 42]. A strategy used by the team at University of Utah Health and Patty De Vries of Stanford's WellMD Center leverages grassroots skills and promotes engagement with programs through "Wellness Champions". Groups and teams write a proposal and may be provided with seed funding or other resources to implement clinician-designed programs at the department level. These range from resources for resilience-writing groups to subsidised team registration in local sporting competitions [43]. The benefits are threefold: by engaging local individuals in the design of the programs they are likely to address local drivers and leverage local skills sets, making them more efficient for a given investment; secondly, individuals from the team are more likely to be engaged with and invested in programs they requested and designed themselves, so programs are more likely to experience sustained success; thirdly, this demonstrates that leadership is receptive and responsive to the needs of individuals and teams, combatting cynicism.

Peer support systems of all formats are increasingly being utilised to enhance workplace culture and collegiality, and to address second victim syndrome [44-47]. Training programs for peer supporters— vital in view of existing evidence of harm due to poorly conducted or timed debriefing [48] – have been developed at Johns Hopkins and Brigham and Women's Hospitals to scale interventions across multiple sites [44, 46]. "Gatekeeper training" delivered in routine protected teaching time at University of Utah Health teaches residents and fellows how to recognise and approach a colleague they suspect to be struggling; in an effort to promote early intervention for individuals who may be suffering from burnout, distress, or suicidality. London's Practitioner Health Programme provides remote multidisciplinary supervision and support to general practitioners throughout the UK through the National GP Health Service.

Johns Hopkins' Resilience in Stressful Events (RISE) peer support program demonstrates the power of volunteers [49]. The team behind RISE devised an educational program to provide clinicians with skills in psychologically safe debriefing after distressing events in the workplace, and holds the ultimate goal of providing every clinician at Hopkins with these skills. The RISE team itself runs an on-call roster of selected, trained clinician volunteers to provide a 24/7 debriefing service. The service is available to every staff member, clinical or non-clinical, and debriefing sessions can be delivered to teams or individuals. At the time of my visit there were 34 volunteers on the roster, with the team receiving about one call per week. In the day or two following a call, anyone available from the team attends to debrief the debriefer. The passion and compassion of volunteers at the team meeting I was lucky enough to attend was electric. Their passion is not only harnessed but strengthened and multiplied through participation in the program and a common goal to improve life for their colleagues.

Formal debriefing sessions are likewise gaining popularity. The format encountered most frequently was Schwartz Center Rounds, a multidisciplinary facilitated debriefing session held in a 'Grand Rounds'-style format. This intervention fosters improved interdisciplinary understanding and teamwork through discussion of common and individual experiences of challenging aspects of patient care. I was able to attend one Schwartz Round session at Duke University Hospital, and witnessed powerful discussion of issues of conflict with families in palliative care settings. Two cases were described from the perspective of doctor, nurse, social worker, and hospital chaplain, and a respectful, thought-provoking and poignant discussion facilitated with the large audience. Designed in the USA, Schwartz Center Rounds are established at more than 440 sites around the world, including five sites across Australia and New Zealand. The program was piloted in the UK in two NHS trusts by the Point of Care Foundation in 2009. The rounds have been so successful that by

the end of 2017 they had been successfully implemented at 180 sites across the UK.

Strategies to cultivate collegiality and professionalism are likewise being utilised to improve workplace culture. Strong, positive relationships promote both psychological and physical health, and fostering the development of trusting, supportive professional relationships while appropriately and promptly addressing unprofessional behaviour has been used to great effect to enhance workplace culture [47, 50].

Addressing barriers to staff participation is important to the success of these interventions. Building debriefing sessions and interventions for collegiality into well-established structures in the hospital setting, ideally with protected time and food provided for attendees, may be the best way of introducing such interventions. Many such structures already exist in the Australian setting: Grand Rounds, resident teaching, nursing in-services, and department meetings; these could be used to pilot systems similar to Schwartz or to introduce short exercises to foster collegiality and community within departments (see later segment on positive psychology techniques taught at Duke Patient Safety Center). If barriers to participation include a sense of discomfort having such discussions in the workplace, or the work setting reinforcing hierarchy, off-site voluntary meetings may be more appropriate have also been used successfully for debriefing interventions [51, 52]

EFFICIENCY OF PRACTICE

Workplace systems, processes, and practices that promote safety, quality, effectiveness, positive patient and colleague interactions, and work-life balance.

Stanford WellMD Center Domain Definitions

Efficiency of practice is currently a topic of keen interest in the United States, with federal incentives introduced in 2010 and 2014 for digitisation of health records meaning that Electronic Health Records (EHRs) were rolled out across the nation more quickly than they could be tailored to local need [53]. A concurrent increase in documentation requirements led Dr James Madara, CEO of the American Medical Association, to comment that “Physicians have become the most expensive data entry force on the face of the planet” [54]. This has led many clinicians to feel disconnected from their sense of vocational purpose, reducing professional satisfaction and compounding many of the other drivers of the burnout epidemic [19, 55, 56]. Considerable discussion at the American Conference on Physician Health revolved around ways of streamlining EHR documentation and better utilising ancillary staff to allow clinicians to devote their time to clinical over clerical tasks.

Many interventions falling under this category are extremely beneficial to the efficiency of the organisation. Stanford WellMD Center uses its conceptual framework to demonstrate to clinicians that many initiatives of the healthcare organisation that are not directly related to wellness in fact address systems issues they themselves had cited as problematic in their working lives. This has the effect of reinforcing to both leaders and staff the benefits of two-way feedback on systems improvements.

Dr Pamela Eisener-Parsche, Director of Physician Consulting Services at the Canadian Medical Protective Association, spent the first two years of her term of leadership focusing on the wellbeing and efficiency of her own team. Along with providing protected time to attend wellness activities, she facilitated a grassroots groups of team members to restructure the workflows of the unit to make the system more efficient,

collegiate and equitable. The new increased the ability of staff to work cooperatively rather than as siloed individuals, with task shifting and sharing, increased workplace flexibility and improved capacity to allocate schedules and workload according to the changing demand on individuals and teams. Her team has expressed great satisfaction with the new system.

The intervention for efficiency of practice that struck me as the most innovative was the Academic Biomedical Career Customisation pilot program at Stanford University Hospital [57]. This program, initially conceived to address the observed gender imbalance in academic medicine, aimed to mitigate work-life and work-work conflicts for staff through career coaching and a time banking scheme. The pilot was immensely successful, with measurable improvements on a number of staff satisfactions scores, a reduction in staff turnover, and an average \$1.1 million worth of additional grants per participant. The return on investment for this intervention is staggering, with \$250,000 initial funding for the two-year pilot program, and only \$2,000 per participant per year to continue the time banking component as a permanent program for Emergency Physicians [58]. Unfortunately, the emergency department was the only group that continued the program, with other departments awaiting further results before committing funding.

PERSONAL RESILIENCE

Individual skills, behaviours, and attitudes that contribute to physical, emotional, and professional well-being.
Stanford WellMD Center Domain Definitions

Interventions for personal resilience focused on three areas: training in skills of self-compassion, mindfulness, and positive psychology; education around optimal nutrition, sleep, and exercise for shift workers; and provision of access to truly confidential medical treatment and case management.

Self-compassion or mindfulness-based interventions have been widely implemented with much success, though research is ongoing at many sites, including University of Utah Health and Stanford WellMD Centre, to maximise the efficacy of programs while ensuring they are time-efficient and simple for clinicians to participate in. The 'Enhancing Caregiver Resilience: Quality Improvement and Burnout' course at Duke Patient Safety Center teaches participants practical and evidence-based positive psychology techniques. The techniques, which capitalise on the psychological benefits of cultivating social connection and emotions such as awe and gratitude, have measurable dose-response relationships, reliable duration of effect, are quick to implement, and almost entirely cost-neutral. Individuals are also taught skills in resilience writing, an auto-debriefing exercise that accelerates the processing of stressful events [59]. The course is well attended by work-unit leaders, and attendees are provided with resources, tools, and support to disseminate and implement the techniques in their home units.

Although clinicians are universally urged to attend to their own physical wellness with sufficient sleep, a healthy diet, and regular exercise, there are barriers to achieving this inherent in many clinical roles. We understand the detrimental health and cognitive effects of shift work sleep disturbance and yet there is a paucity of research and even less education around optimal sleep hygiene practices or safe rostering patterns for shift workers. Happily there are expert recommendations emerging on the topic [60, 61], though the information needs to be included in standard education for clinicians and roster managers, and should be used to inform policies for safe rostering practices. A similar state of play exists with regards to nutrition for optimal performance during shift work, with little published on the matter, and access to healthy food options lacking in hospitals; particularly overnight [62]. Intermountain Health Care last year

banned junk food from its campuses, driving wide availability of healthy food options for visitors and staff from hospital cafeterias and vending machines, and also provides access to reasonably-priced onsite gym facilities for staff [63]. In attending Enhancing Caregiver Resilience: Quality Improvement and Burnout at Duke University, I had my first exposure to formal education on the topics of sleep, exercise and nutrition for shift work [48]. Hopefully in time access to education and resources facilitating healthy sleep, nutrition and exercise for clinicians will become the norm.

The care of individual clinicians cannot be assured without addressing one of the primary barriers to seeking help: a lack of access to confidential healthcare. Several of the organisations I visited offer counselling and case management, and I was privileged to be able to take a close look at the services available to London-based doctors through the Practitioner Health Programme (PHP). The PHP offers clinicians truly confidential GP access; specialised training and supervision for doctors outside of London interested in treating their fellow clinicians; case management for doctors undergoing investigation by regulatory bodies; referral to other services; Balint-style support groups and more. The organisation has been condoned by regulatory bodies to the extent that the PHP clinicians are able to independently oversee the rehabilitation of individuals with conditions imposed on their licenses.

DISCUSSION

The dialogue around clinician wellbeing in Australia has never been more active than it is now. Although many of the cultural, industrial and clinical drivers still exist, increased societal awareness of mental health and increasing education in medical schools is beginning to erode the stigma surrounding mental health and wellbeing in clinicians. Many longstanding supports and programs are gaining visibility and finesse, new programs are experiencing less resistance to their development and more active leadership support than before, and individuals with an interest in the area are increasingly encouraged to pursue it. We must further establish infrastructure to support organisations and individuals to address root causes and to break down barriers to solutions. We must also facilitate the sharing of ideas and experiences of what works in different contexts in order to maximise efficiency of our collective learning. The establishment of interdisciplinary meetings on wellbeing in healthcare across medical, nursing, allied health, and ancillary staff; in hospitals and the community, and in public and private sectors will facilitate this.

Programs for clinician wellness exist at all levels of the Australian system. For example, Federal Work, Health and Safety legislation has led the majority of healthcare organisations subscribe to Employee Assistance Programs. These programs are an excellent resource but perhaps under-utilised due to a lack of awareness among staff of what support is available or of protections for confidentiality. Organisations need to take steps to demystify and destigmatise such existing services to promote staff engagement. The Doctors' Health Services provide 24-hour free, confidential advice to doctors on matters of physical and psychological health in each state and territory. In New South Wales, a Junior Medical Officer Support Line has been established in partnership with an Employee Assistance Program Provider to offer free 24-hour, confidential advice to junior doctors around inappropriate workplace behaviours. Services such as these likewise need to be made more visible and accessible to individuals.

Organisations such as the Australian Nursing and Midwifery Federation, the Australian Medical Association and the Australian Salaried Medical Officers' Association will continue advocating for the interests of clinicians at federal and state policy level. In doing this, they must strive to ensure that their voice is representative of clinicians working in all contexts: public and private; large and small organisations; metropolitan, rural and remote. Federal and state bodies as well as local organisations must also engage front-line clinicians wherever possible in discussion around policy decisions to anticipate and address adverse effects on staff from implementation.

More attentive workforce planning is needed especially for doctors-in-training and junior nurses. A lack of job security creates an atmosphere of fear and insecurity that we cannot afford in the face of predicted workforce shortages. Intense competition for vocational training positions for doctors-in-training puts enormous pressure on individuals to prioritise their employment prospects far above self-care, and amplifies the already high stakes placed on the outcome of professional examinations. A solution to these problems will require considerable cooperation between the ministries of health, professional associations, colleges and regulatory bodies.

As mentioned previously, within large healthcare organisations the appointment of a Chief Wellness Officer

will create a chain of accountability for staff wellness, but who is responsible for ensuring the wellbeing of the many clinicians working outside such organisations? Professional Indemnity Insurance providers are extremely well-placed to play a key role here, having a clear stake in the maintenance of optimal performance by clinicians while also having almost unparalleled reach to clinicians operating independently from large organisations.

Professional Colleges and Universities are likewise in a good position to reach a large audience of clinicians to provide education, health promotion and screening. Many medical schools around Australia are developing wellbeing curricula, harnessing their capacity to shape the future medical workforce both in equipping individuals and in effecting cultural change. This movement should be encouraged in all disciplines, as should the sharing of techniques and resources between educational centres. Many but not all professional colleges have subscribed to the Canadian Medical Association's CanMEDS Framework that lists self-care as a core component of professionalism. All professional colleges and regulatory bodies ought to adopt a formal position of clinician wellbeing and encourage the development of skills in this area through accreditation of wellness-related Continuing Professional Development activities and, importantly, a more flexible and humane approach to dealing with clinicians in difficulty.

Some but not all health care organisations in Australia have achieved the "Novice" stage of the Organisational Journey Towards Expertise in Physician Well-being (Shanafelt et al 2017), offering programs targeted toward individuals that are often scheduled during busy work days with no protected time for attendance and without an attempt to coordinate a comprehensive, measurable and evidence-based approach. Unfortunately, these programs in effect do little more than pay lip service to the issues at hand, and place responsibility for reversing this public health crisis largely on the shoulders of individual clinicians. A meta-analysis of physician burnout prevention programs noted that systemic interventions are significantly more effective in reducing clinician burnout than individual-focused interventions [40]. There is still a long way to go on our country's journey toward "Expertise" in this field. Encouragingly, Royal Prince Alfred Hospital's Pilot Program *BPTOK* demonstrates a rare example of an institution demonstrating a comprehensive, integrated and serious investment in the wellbeing of its doctors with a commitment to evaluation and ongoing development. Programs like this need ongoing support for their operation, evaluation and upscaling across the country.

It is important that we as an industry address the barriers to individuals prioritising self-care and seeking help when required. This will include providing access to a range of services and resources to allow individuals to assess and address their own needs, and maximising accessibility to services during work hours, after hours, on-site and off-site. The problem of a lack of confidential care for doctors is currently being addressed in NSW with advocacy from federal and state branches of the Australian Medical Association, and these changes will need to be broadly publicised. Furthermore, training ought to be offered to clinicians seeking to debrief and treat their colleagues so that these services are provided in a psychologically safe as well as confidential manner.

Although this report serves as a basis for discussion, I am necessarily restricted somewhat in my perspective to that of a middle class, female New South Wales doctor-in-training. Issues that I have not addressed in this report but which are nonetheless a priority include workplace violence, discrimination, and a deeper discussion of the issues affecting nurses and allied health as well as doctors at later career stages.

RECOMMENDATIONS

1. Measurement and Research

- 1.1. Standardised, validated metrics need to be adopted to facilitate benchmarking across the Australian healthcare system. Adopting measures already in use by healthcare research institutions internationally will allow us to benefit more from research undertaken around the world and accelerate the establishment of a global best practice standard
- 1.2. Universities and organisations with a strong research base should form the centre of ongoing advances in Australian clinician wellness, clarifying drivers and best practice interventions, and offering research support to organisations implementing new programs
- 1.3. Australian research bodies should partner with international research groups such as the Physician Wellness Academic Consortium to fortify research efforts and remain up to date with best practice in the assessment and management of clinician wellness
- 1.4. Infrastructure needs to be established to allow regular, ideally longitudinal measurement of clinician wellbeing across the healthcare system
- 1.5. Priority areas for research include the links between clinician wellness and financial and patient outcomes in the Australian context, drivers of poor wellbeing in different contexts and populations, and the effectiveness of different interventions for specific contexts, drivers and clinician/patient/financial outcomes.
- 1.6. Guideines for the evaluation of clinician wellness initiatives need to be established, ideally assessing uptake, engagement, social return-on-investment, clinician outcomes and patient outcomes without disrupting service provision or compromising confidentiality

2. Leadership and Policy

- 2.1. Leadership engagement may be achieved more meaningfully by supporting the moral/ethical argument with a business case presenting financial and patient-centred outcomes
- 2.2. Australian regulatory bodies should formally acknowledge the place of clinician wellness as the fourth quality indicator in health care by linking key metrics of clinician wellness to accreditation standards for public and private healthcare organisations
- 2.3. Health organisations need to prioritise the measurement and improvement of clinician wellbeing by making staff wellness a Key Performance Indicator for top executives, with financial incentives for meeting targets linked to longitudinal outcomes
- 2.4. A clear chain of accountability needs to be established for tackling clinician wellness issues. As such, a Chief Wellness Officer or similar should be appointed in every healthcare institution at FTE proportional to the number of staff. It will be their role to coordinate and promote existing wellness programs, and oversee the measurement of staff wellness as an essential component of quality assurance
- 2.5. Professional Indemnity Insurance providers are well placed to play a key role in clinician wellness, clearly having a stake in maintaining optimal performance of clinicians, and having the advantage of contact with clinicians operating in isolation in the private sector and through locum agencies
- 2.6. All Australian Professional Colleges ought to include wellness in definitions and assessment of Professionalism as per the CanMEDS framework.
- 2.7. Institute a regular regional conference on clinician wellbeing to encourage continuing dialogue and research on current issues and the sharing of best practice initiatives across the country and across disciplines

- 2.8. Engage clinicians in the design and implementation of wellness programs at the local level
- 3. System-Level Interventions
 - 3.1. The majority of interventions need to be system-targeted rather than individually-targeted
 - 3.2. Bulk of investment should be in primary prevention and early intervention to in order to ensure the greatest return on invested time, personnel and funding
 - 3.3. Education for cultural change: universal training in psychological first-aid, peer support and recognition of when you are the bully [64]
 - 3.4. Mandate the provision of debriefing/peer review/supervision sessions with trained facilitators. The Peer Review activities mandated by the Royal Australian New Zealand College of Psychiatrists are an example of one format this process can take, however Schwartz Centre Rounds, Balint Groups and remote multidisciplinary supervision have been used to good effect in various contexts.
- 4. Individual-level interventions
 - 4.1. Organisations should aim to provide a comprehensive range of programs in response to identified drivers to take advantage of marginal gains and allow individuals to select programs according to personal need
 - 4.2. Provide resources and interventions for individuals from all career stages from students through to late-career and retired clinicians
 - 4.3. Organisations should empower staff to take control of their own wellness through real and meaningful steps: for example, provision of *truly* protected time or a time banking system
 - 4.4. Further research is needed to establish evidence-based recommendations for shift workers with regards to nutrition, sleep hygiene, exercise. Establishment of targets for organisations to facilitate clinician compliance with best practice e.g. availability of healthy food options overnight, availability of safe place to sleep on night shift, program to address workplace violence
- 5. Address barriers to help-seeking
 - 5.1. Ensure truly confidential physical and mental health services for clinicians, ideally with after-hours options to suit shift workers
 - 5.2. Compile a national directory of general practitioners and psychologists willing to treat fellow clinicians
 - 5.3. Develop and institute a training and accreditation pathway for doctors treating clinicians; provide confidential supervision to those providing treatment
 - 5.4. Ensure transparency of privacy protection where existing non-confidential services are used

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