Gender Disadvantage in Physiotherapy

Julie Cullen BHSc (Physiotherapy), PGDipHSc Paediatric Physiotherapist, Te Whatu Ora, Auckland, New Zealand

ABSTRACT

Gender inequality exists in healthcare, resulting in a gendered division of labour where women generally receive lower pay and status in the industry than male health professionals. This critical review will examine the state of gender disadvantage in health work and physiotherapy using feminist theories and exposing social norms and beliefs that allow these practices to be perpetuated. Gender disadvantage within the physiotherapy profession is explored, demonstrating gender disparity permeating through career lifespans from training to retirement, including, among others, differences in career specialisation, workplace violence, and unequal treatment of patients. Using historical references, the evolution of gender discrimination and disruption is reviewed. In understanding these factors, a pathway can be exposed to move towards gender equality within our profession.

Cullen, J. (2023). Gender disadvantage in physiotherapy. *New Zealand Journal of Physiotherapy*, *51*(2), 159–166. https://doi.org/10.15619/nzjp.v51i2.351

Key Words: Gender, Inequality, Physiotherapy, Wage Gap

INTRODUCTION

Gender norms and inequalities exist in healthcare, contributing to a gendered division of labour where women generally receive lower pay and status in the industry than male health professionals (Hay et al., 2019). Workplace structures, cultures, and social norms can contribute to gender disadvantage, leading to trends such as pay and promotional advantage for men, fewer job offers for mothers while men experience a fatherhood 'bonus', and medical dominance (Fuller & Cooke, 2018; Stamarksi & Son Hing, 2015; Templeton et al., 2020). Combined with the impact of family workload and expectations, issues faced in the workplace seem only to reflect the wider disadvantage women face in our society. The Covid-19 pandemic hindered progress in reaching gender equality in the workplace, instead highlighting just how common gender bias is (Zamarro & Prados, 2021). Yet considerable changes have taken place both socially and professionally towards gender equality over the past century. These developments call into question the role gender plays in the lived experience of a physiotherapist in Aotearoa New Zealand today, and the extent to which gender bias within physiotherapy currently impacts on patients in the clinical setting.

This critical review will examine the state of gender disadvantage in health work and physiotherapy using feminist theories. Understanding how gender roles have developed historically and been disrupted can lay the pathway for further change, so the next generation of women will not face inevitable discrimination in their own careers and personal lives.

HOW FAR HAVE WE COME? A BRIEF HISTORY OF FEMINISM

In 1910, several hundred women protested at Downing Street, demanding economic and political equality, the right to vote, and social reform. At the time, protestors were fighting a universal assumption that women belonged at home as wives and mothers. Women had no legal existence, no property rights, or control over inheritance or custody (Donovan, 2012). The end

of the 19th century was the high point of first-wave feminism, a movement that sought to open opportunities to women with a focus on the right to vote. Early activists included influential figures such as Olympe de Gorges, who argued, among other topics, that women should have the same rights as men, and Mary Wollstonecraft, who called for men and women to be educated equally (Cokely, 2018; Wollstonecraft, 1845). When suffrage was achieved (albeit for women of a certain age and status), this was largely considered the end of this period. The first wave, however, has been criticised for its focus primarily on the rights of white women (Breines, 2007).

This first wave of feminist activism disrupted the gender norms of the time, and further gains were made in the 1960s to 1970s with the second wave of feminism, including to women's rights over their own bodies (Hilden, 1982; Reger, 2015). Following the third wave of feminism in the 1990s, which explored the interrelations of gender, race, and class in women's lives and sought to change the narratives on women's sexuality, female physiotherapists today face fewer barriers in the workplace than previous generations (Braithwaite, 2002; Mahoney, 2016). Yet a continued theme of gender difference, gender bias (receiving different treatment based on stereotypes of a person's real gender or perceived gender), discrimination, and disadvantage both professionally and personally continue for women (both trans and cis).

THEORIES OF GENDER DISADVANTAGE

Exploring the evolution and theory of gender norms can explain how we arrived at the point where this societal structure seems to be taken for granted (Germov, 2013). Mainstream family sociology in the 1950s and 1960s argued a biological basis for 'women's roles' (Targ, 1989). This is of course relevant to the professional sphere, as if the woman's role is in the home, then her economic role is not the primary one, if it exists at all. Earnest Burgess and Talcott Parsons (Burgess, 1926; Parsons, 1959; Parsons & Bales, 1955) theorised that the role of husbands and wives were biologically based, complementary and necessary for a healthy functioning society. The wife's role

was expressive, nurturing, and in the home, while the husband was the breadwinner, primarily based out of the home in the economic sphere. All this was deemed necessary in order that children were socialised and would develop healthily and 'correctly'.

'Women's work' is an extension of this biological narrative, where kindness, patience, and caring were the typical characteristics expected in female careers such as nursing and physiotherapy, which were also poorly paid and of low status (Carter, 1994). Women were thought to enter 'caring' and lower status / paid roles professionally, as their 'longing' for social connectedness resulted in a 'feminine' motivational force, where relationships and community were the focus, not power and status (Freedberg, 1993; Gilligan, 1982; Gino et al., 2015).

This biological narrative was critiqued and challenged by feminists, along with a view that the position in society white male sociologists occupied led them to make sexist conclusions. Ann Oakley specifically described sociology as male-orientated and male-biased, lacking a feminine perspective and rendering women inconspicuous (Oakley, 1974; Smit, 2016). Feminists challenged the concept of a harmonious family unit, noting it had different effects on men and women, and not all of these were positive. 'Family responsibility' usually fell to the mother, and the family home could be a mentally and physically dangerous place for some women (Gavron, 1966; Oakley, 1974; Targ, 1989).

Oakley (1974) challenged the view that the 'woman's role' was biologically driven, instead explaining this as a socialisation process that girls learn from their mothers. In her study she analysed women's experiences of housework, and demonstrated how this work stood in striking contrast to the male sociologist view of women fulfilling a biologically expressive and caring role. Rather than simply being part of a caring woman's role, Oakley highlighted housework as 'real work', a clear form of unskilled manual labour, defended as involving hard work and long hours (Smit, 2016).

While Oakley's theory that challenges biology as the basis of 'women's roles' has merit, her study faced criticism and included a number of limitations. These included a small sample size and phrasing of questions that may have elicited a negative response (Smit, 2016). However, the non-biological basis for women finding themselves in a caring role is further supported by research arguing that women were not staying at home raising children and doing housework because they are biologically wired to be more loving, but because they were shut out of higher education, and discriminated against in paid labour (Crompton, 1987; Fillion, 1996).

Ann Witz's (1992) research into feminist sociology gives insight into this exclusionary process. She describes how social norms serve to continue male domination of women, with a focus on sociology of the professions and occupational closure with a gendered lens. Her work documents how medical men used exclusionary strategies to maintain their male dominance and position of high status and power, by unpicking neo-Weberian theory and gender relationships. Female medical roles such as nursing were required to be subordinate to doctors, to show them unreciprocated respect and to ask their permission to

treat, an experience that can still occur (Carter, 1994; Hay et al., 2019).

The central role women's unpaid labour plays in a capitalist society was highlighted more recently by Silvia Federici (2010). She noted that by reducing the economic cost of overall work through women's unpaid domestic labour, profits, surplus profits, and the power they afford are then directed principally to men. Extending this gendered dynamic to healthcare, the lower pay and status of female 'caring' professions such as nursing and allied health allow contrasting power and financial reward to dominant 'elite' professions such as medicine (Adams, 2010; Nicholls, 2022). Such roles are more often male, particularly highly paid specialist 'heroic' roles such as orthopedics, surgery, and intensive care (Dua, 2010; Medical Council of New Zealand, 2019). In addition, by viewing women's caring roles as innate, and objective/scientific knowledge as masculine, women experience further barriers to acquiring the knowledge required to achieve roles of high status in health (Kelly, 1985; Pavco-Giaccia et al., 2019). These narratives in society extend well beyond medicine and conditioning begins early. Indeed, toys that build scientific knowledge and expertise, dominance, and excitement are preferentially marketed to and purchased for boys, while toys encouraging caring, socialising, and being pretty are directed to girls (Fine & Rush, 2018). While parents may find it acceptable for girls to play with toys associated with the opposite gender, surveys show this belief is significantly reduced when it is reversed (Boe & Woods, 2018).

With a wider focus on identity, Judith Butler (1988) theorised that gender is socially constructed rather than inherent, and that these notions serve to continue the domination of women by men, as well as queer communities. A biological explanation for women's roles ignores the differences between gender and sex, and different cultural learnings about gender. Being a man or a woman means learning what it is to be masculine or feminine in your culture, and this differs in different regions, highlighting the weakness of this argument (Storkey, 2000). Evidence that a social construct of gender disadvantages women can be seen in studies that identify learned bias women face in the workplace, including ideas such as that women are less competent than men, and are lacking in leadership potential (Diekman & Eagly, 2000; Heilman, 2012). Further, studies have also shown that when women see successful ambitious female role models, they report greater aspiration and motivation to achieve high-status positions themselves (Laguía et al., 2022). If women simply biologically longed for social connectedness and prioritised this over career goals, one wouldn't expect this to change when presented with different role models than the current status quo.

Butler's theories also serve to explain research showing that women don't argue for pay rises or promotion as often as men, and a phenomenon I have witnessed in my own career: that female physiotherapists are criticised by their female colleagues for bringing up the issue of low pay, with a narrative that you shouldn't be doing this job unless you're doing it because you care (Babcock & Laschever, 2007). This is an example of internalising a socially constructed belief that nice women should be focusing on caregiving and community, not economics and self-interest.

Hartmann (1981) proposed that the gendered division of labour is the main structure in society that perpetuates men's dominance over women, keeping women generally in lower paid positions, which in turn increases their dependence on men. Occupational division of labour has been used to keep the best paid jobs for men, who then expect their wives to carry out domestic duties for them, and in turn men now benefit from both higher paid/status positions and reduced domestic work. Hartmann argues that these two forms of oppression then reinforce each other, as the women's disadvantaged position in paid work means they are vulnerable when making arrangements within marriage regarding the division of unpaid labour, then their position in the family goes on to further disadvantage their potential for paid work.

This theory incorporates both how society is structured along with social norms that allow the cycle to be perpetuated. Research supports Hartmann's theory, with studies showing that when women marry, their unpaid domestic labour increases while men's reduces, and that women do more household work even when employed for the same hours as men (Ferreant & Thim, 2019). Currently, across every demographic, women still do more housework than men (Hess et al., 2020). Indeed, the oppression of women currently plays an important economic role. The contribution that unpaid work makes towards a country's gross domestic product (GDP) has been calculated, revealing that women's unpaid labour in New Zealand contributes to a significant share of the GDP at 23% (Ferreant & Thim, 2019). The Covid-19 pandemic response further exacerbated gender inequality, and the unequal division of childcare during lockdowns (irrespective of work hours and fathers being home) was associated with women transitioning out of paid employment, described as the 'pink-collar pandemic' (Zamarro & Prados, 2021).

These theories may go some way to exposing dynamics behind gender inequality. To create a bridge between scholarly literature and the clinical setting, however, it becomes important to understand the influence of gender within physiotherapy currently, and to consider concrete steps to reduce existing gender disadvantage within this sector.

REALITY BITES: GENDER AND PHYSIOTHERAPY TODAY

Gender and the clinician

The impact of gender in physiotherapy and the prevalence of gender bias has become more widely acknowledged and explored, and the means to address these challenges considered (Dahl-Michelsen & Solbrække, 2014; Enberg et al., 2007; Hammond, 2013; Linker, 2005; Nicholls, 2022; Parry, 1995; Sudmann, 2009).

Impacts of gender are multiple, complex, and can intersect with other biases, permeating through career lifespans from training to retirement. The influence of gender in physiotherapy training has been explored, from effects on presentation of sexuality when classmates use each other's bodies as models, to career and specialisation choice (Dahl-Michelsen & Solbrække, 2014; Enberg et al., 2007; Stenberg et al., 2021). Gender has previously been noted as a factor in academic achievement in physiotherapy school, with female students outperforming

male students, and male students more likely to fail the course (Hammond, 2013; Hammond, 2009).

In the workplace, male physiotherapists more frequently work in sports and private business, while women are disproportionately represented in the public sector, illustrating how gender constructs influence physiotherapy professional norms (Enberg et al., 2007; Stenberg et al., 2021). These expectations can be formed before training is even initiated, and may in part be a reflection of media focus on physiotherapists in sport, where men are the most common providers of therapy on the sideline (Hammond, 2013).

From training to the workplace, female physiotherapists have been noted to 'de-sensualise' their bodies, both during interactions with intimate modelling for training purposes, and during therapy sessions (Dahl-Michelsen & Solbrække, 2014; Sudmann, 2009). This is particularly so for younger female therapists working with elderly male clients. Strategic approaches in physiotherapy also highlight the objective and unsensual nature of the profession, such as viewing the body as a machine, and being able to demonstrate this biomechanical approach to both medical professionals and the public (Nicholls & Holmes, 2012). These approaches may have originated from a need to establish a clear separation of physiotherapy from masseuses (a term previously used by sex workers to evade prosecution), and to demonstrate professionalism in order to secure the position of physiotherapy in the medical marketplace (Linker, 2005; Nicholls & Holmes, 2012). However, such strategies may additionally aim to serve a protective role, particularly to younger female therapists.

Inappropriate sexual behaviour or harassment towards physiotherapists is high. Studies report that 70% to more than 80% of therapists (mean 77%) experience inappropriate sexual behaviour in the workplace, more widely experienced by younger, less experienced female physiotherapy students or clinicians (Amanulla et al., 2021; Boissonnault et al., 2017). As witnessed in my own public health career, harassment of young female medical staff comes not only from patients, but from other medical staff. Following male patients, the second most common source of sexual harassment of nurses has been reported to occur from physicians (Williams, 1996). Among other risk factors, hierarchical workplace structures, where there are gendered power and status differences between employees (i.e., men are in more valued or higher positions overall than women), are known risk factors for sexual harassment (Bond, 2014; Feldblum & Lipnic, 2016; McDonald & Charlesworth, 2019). The public sector, predominantly filled with female physiotherapists, is traditionally a hierarchical organisation (Brennan & Davidson, 2019; Fernandopulle, 2021; Robinson & Compton, 1996). While demographics are changing, women are still under-represented in senior medical specialties and senior executive positions in public hospitals (Medical Council of New Zealand, 2019; Mose, 2021).

Despite such high levels of workplace violence and the health consequences that can result, therapists note a lack of training on how to respond to or make a complaint about inappropriate sexual behaviour (Cooper & Jenkins, 2008). Education seems essential both during training and in the workplace, including

increasing awareness of inappropriate sexual behaviour alongside responses and strategies to reduce risk or resulting harm, how to report incidents, and where to get support (Amanulla et al., 2021). Alongside training, wider workplace dynamics may need addressing to respond to internal sexual violence (Enberg et al., 2007; Sebrant, 1999). Dismantling hierarchical structures, replacing these with more flexible solutions such as team organisation, and greater focus on utilising female skills in leadership positions are among proposed solutions (Sebrant, 1999). Shifting expectations of career pathways and removing barriers to women obtaining senior positions may also reduce gendered status/power differences and gender disadvantage (Evans & Maley, 2021). Assessment of workplace harassment risk by employers and creating a culture where harassment is not tolerated are key. Developing workplace training and a system where employees are held accountable (including complaints and disciplinary procedures) are steps that can be taken to achieve this culture, alongside the promotion of an overall diversity and inclusion strategy (Feldblum & Lipnic, 2016). Workplaces that tolerate harassment have higher levels of harassment than workplaces that do not (Bergman et al., 2002; Feldblum & Lipnic, 2016).

Gender in clinical settings

Gender bias in physiotherapy extends beyond impacts to the clinician, and unequal treatment of patients based on preconceived stereotypes of gender have been documented. Gender bias is noted to predominantly affect women and marginalised genders, and can intersect with other biases (Fikkan & Rothblum, 2012; Hankivsky, 2012; Kristoffersson et al., 2016; Kristoffersson et al., 2018; Ross & Setchell, 2019; World Health Organization, 2019). Unequal treatment is not a unique phenomenon, and gender bias in physiotherapy reflects a wider trend in healthcare.

Healthcare research, which impacts clinicians' understanding of pathological processes and treatments, involves a majority of male subjects (Johnson et al., 2014; Nowogrodzki, 2017). Specific to sports medicine, available data on treatment results of patellar tendinopathy relating to women were reported as 'astonishingly low', at 2% of all available literature, while only 5% of studies using all or mostly male subjects recognised this as a limitation (Mondini Trissino da Lodi et al., 2022). This lack of representation reduces the ability of clinicians to understand possible treatment differences between male and female patients that may impact on health outcomes (Johnson et al., 2014).

Studies have found that women receive a diagnosis after a longer interval than men for the majority of diseases, and are less likely to be investigated and treated for numerous conditions (Din et al., 2015; Hamberg, 2008; Lee et al., 2019; Westergaard et al., 2019). Recent research indicates that women are more likely to experience adverse outcomes (15%) and to die (32%) following surgery, when operated on by a male surgeon compared to female surgeons (Wallis et al., 2022). Women receive inadequate pain management compared to men and are both less likely to be taken seriously or treated effectively. Despite reporting more frequent, severe, and a longer duration of pain than men, women receive less

pain medication and treatment (Chen et al., 2008; Hoffmann & Tarzian, 2001; Zhang et al., 2021). Women are more likely to be prescribed antidepressants and anti-anxiety medication than pain relief, and are less likely to be referred for diagnostic investigation and further treatment of chronic pain than men, including referral to physiotherapy (Stålnacke et al., 2015). These differences have been attributed in part to gender bias originating from historical perceptions of women as being less able to reason, and more prone to hysteria and hypochondria (Hoffmann & Tarzian, 2001; Pavco-Giaccia et al., 2019).

In physiotherapy, research into the influence of gender bias on treatment decisions is limited and results are mixed. When investigating the influence of gender on the treatment of back and neck pain, a study involving 76 physiotherapists in Sweden found that male and female patients were treated with minimal difference (Stenberg & Ahlgren, 2010). However, there were significant differences in techniques used, with female therapists using treatment that favoured mental function and acupuncture, while male therapists used more joint mobility training. Gender differences in advice to patients with back or neck pain were found in a qualitative study involving 12 participants, 10 of whom were seen initially by a physiotherapist, and two initially seen by a doctor (Stenberg et al., 2014). Female patients were more likely to perceive a message to 'be careful', with men recalling messages that 'heavy work leads to pain' (despite many of the women also having heavy physical tasks). Men were also given fewer exercise suggestions due to a perception of their increased strength. Gender bias in accessing rehabilitation for children with cerebral palsy was noted in a study on 303 children, with boys more likely to receive physiotherapy intervention, and to more frequently receive physiotherapy intervention than girls (Degerstedt et al., 2017). Current research provides a weak level of evidence but suggests that physiotherapists are not immune to gender bias and further research is needed. Challenging this bias with gender discussions during training could disrupt the current course and allow the profession to evolve (Dahle, 2001). Physiotherapists themselves recognise a need for gender training (Bisconti et al., 2020).

Gender and the health workforce: The current state of pay

Perhaps the greatest focus of gender disadvantage in the workforce falls to renumeration. The gender pay gap is higher in the health care sector than most other sectors, and the feminisation of this industry has been highlighted as the key factor behind pay disparity (World Health Organization, 2022).

A high proportion of employees in the health sector are women, and a substantial gender-wage gap exists between professional and technical fields (Newman, 2014). An analysis by the World Health Organization (WHO) of 104 countries puts the overall gender imbalance in the general health sector as 67% female, with an overall pay gap of 28% for women compared to men's wages. Once hours worked and similar occupations have been controlled for, a gap remains at 11.2% (Boniol et al., 2019).

Female-dominated professions such as nursing and physiotherapy show an even wider gap, and, specifically for physiotherapists in Aotearoa New Zealand, 76% of the workforce in 2018 were women (Potera, 2015; Reid & Dixon,

2018). In 2018, the average income for male physiotherapists was \$82,138 with an hourly rate of \$38.50, while the average income for female physiotherapists was \$60,649, with an hourly rate of \$37.40 (Reid & Dixon, 2018). The wage gap does not just exist across gender, but a racial wage gap also exists, and both this and 'the double disadvantage' of being an ethnic minority and female urgently need to be addressed (Mandel & Semyonov, 2016).

This analysis of the wage gap in physiotherapy faces limitations, as a number of employment factors that could explain the data were not controlled for. Nursing research has previously been criticised for similar limitations, including the use of crosssectional studies and outdated data (Muench et al., 2015). Pay disparities are thought to occur due to many factors including, among others, unequal work hours, occupational distribution, years in the labour force, work hierarchy, and discrimination (Sin et al., 2017). Women work fewer hours than men, leading to lower earnings, and, like other careers (even those femaledominated), men dominate more senior and higher status positions within the profession (Carter, 1994; Tabassum & Nayak, 2021; World Health Organization, 2022). Indeed, the governing body of Physiotherapy New Zealand (PNZ) is more than half made up of men (Reid & Dixon, 2018). However, in studies that account for these factors, women are still paid less than men, despite contributing the same value to their employer (Boniol et al., 2019; Muench et al., 2015; World Health Organization, 2022).

Looking to how gender norms have been successfully disrupted over history can outline how to break down the barriers for future generations. This has previously occurred through scholarly activity and the sharing of information, and the digital age widens this opportunity. Already feminist bloggers such as 'A Mighty Girl' and 'Everyday Feminism' have a wide audience, and feminist art and creative platforms are visible and gaining attention (Danckaert & Smith, 2022; Kim, 2022). Activism and protests can exist on a large and immediate scale. Yet physiotherapists have been far less active in calling for improved pay and working conditions, when compared with teachers and nurses in Aotearoa New Zealand.

Eliminating the gender pay gap in health is essential not only to achieve equality, but to address the global shortage of health care workers. Further, elimination of the gender pay gap is required to meet international commitments by 2030. All United Nations member countries, including Aotearoa New Zealand, are signatories to the United Nations 2030 Agenda for Sustainable Development, committing to productive, sustainable and inclusive economic development, including the promotion of gender equality and empowerment of women and girls (United Nations, 2015). The World Health Organization (2022) has noted steps that can be taken to achieve this. These include, among others, 1) the collection and analysis of sector-specific wage data, 2) introducing wage transparency and tools to confront pay discrimination, and 3) the provision of training, mentoring, and opportunities for women to ascend to more senior positions, alongside wider societal challenges to gender norms.

CONCLUSION

Despite significant gains to equality made over several generations, gender disadvantage is alive and well, in both the workplace and the home. By understanding components that contribute to gender disadvantage and increasing awareness of these issues, concrete steps can be taken to achieve gender equality and, with it, a resilient health sector. Discussions on the impact of gender during physiotherapy training and professional development will be an important step towards reducing gender disadvantage both for patients and clinicians. Wider workplace dynamics and structures need addressing to achieve gender equality, and gender equality has been successfully promoted in some countries through policy change, including the provision of paternity leave (Rocha, 2021). To create lasting change, social norms, structures, and culture need to be challenged to reduce the disadvantage of being female.

KEY POINTS

- Gender disadvantage exists for health workers, including physiotherapists.
- 2. Female physiotherapists get paid less than male physiotherapists in New Zealand after accounting for hours worked, and other contributing factors.
- 3. Exploring how gender bias has evolved and been disrupted historically can allow understanding of how to move towards equality.
- 4. Feminist theories are critiqued using scholarly literature to explore how gender discrimination is supported and perpetuated in our society.
- 5. Pathways for disruption are broad with new technologies and advocacy, and structural policy change may be needed for long-term equity.

DISCLOSURES

No funding was obtained for the completion of this study. There are no conflicts of interest that may be perceived to interfere with or bias this study.

PERMISSIONS

None required.

ADDRESS FOR CORRESPONDENCE

Julie Cullen, Paediatric Physiotherapist, Te Whatu Ora, 55–75 Lincoln Rd, Henderson, Auckland 0610, New Zealand.

Email: juliemcullen3@gmail.com

REFERENCES

Adams, T. L. (2010). Gender and feminization in health care professions. Sociology Compass, 4(7), 454–465. https://doi.org/10.1111/j.1751-9020.2010.00294.x

Amanulla, S., Saju, I., Solé, S., Campoy, C., Martínez, L., Pérez-Yus, M. C., Sitjà-Rabert, M., Serrat, M., Bravo, C., & Lo, K. (2021). Inappropriate patient sexual behavior in physiotherapy: A systematic review. Sustainability, 13, 13876. https://doi.org/10.3390/su132413876

Babcock, L., & Laschever, S. (2007). Women don't ask: The high cost of avoiding negotiation and positive strategies for change. Bantam.

- Bergman, M. E., Langhout, R. D., Palmieri, P. A., Cortina, L. M., & Fitzgerald, L. F. (2002). The (un)reasonableness of reporting: Antecedents and consequences of reporting sexual harassment. *The Journal of Applied Psychology*, 87(2), 230–242. https://doi.org/10.1037/0021-9010.87.2.230
- Bisconti, M., Brindisino, F., & Maselli, F. (2020). Gender medicine and physiotherapy: A need for education. Findings from an Italian national survey. *Healthcare*, 8(4), 516. https://doi.org/10.3390/healthcare8040516
- Boe, J. L., & Woods, R. J. (2018). Parents' influence on infants' gender-typed toy preferences. Sex Roles, 79(5–6), 358–373. https://doi.org/10.1007/ s11199-017-0858-4
- Boissonnault, J. S., Cambier, Z., Hetzel, S. J., & Plack, M. M. (2017). Prevalence and risk of inappropriate sexual behavior of patients toward physical therapist clinicians and students in the United States. *Physical Therapy*, *97*(11), 1084–1093. https://doi.org/10.1093/ptj/pzx086
- Bond, M. (2014). Prevention of sexism. In T. Gullotta & M. Bloom (Eds.), Encyclopedia of primary prevention and health promotion (2nd ed.). Springer-Verlag.
- Boniol, B., McIsaac, M., Xu, L., Wuliji, T., Diallo, K., & Campbell, J. (2019). Gender equity in the health workforce: Analysis of 104 countries. (Working paper 1.) World Health Organization. https://www.who.int/publications/i/item/gender-equity-in-the-health-workforce-analysis-of-104-countries
- Braithwaite, A. (2002). The personal, the political, third-wave and postfeminisms. *Feminist Theory, 3*(3), 335–344. https://doi.org/10.1177/146470002762492033
- Breines, W. (2007). Struggling to connect: White and black feminism in the movement years. *Contexts*, *6*(1), 18–24. https://doi.org/10.1525/ctx.2007.6.1.18
- Brennan, P. A., & Davidson, M. (2019). Improving patient safety: We need to reduce hierarchy and empower junior doctors to speak up. *BMJ*, *366*, l4461. https://doi.org/10.1136/bmj.l4461
- Burgess, E. W. (1926). The family as a unity of interacting personalities. *The Family, 7*(1), 3–9. https://doi.org/10.1177/104438942600700101
- Butler, J. (1988). Performative acts and gender constitution: An essay in phenomenology and feminist theory. *Theatre Journal*, 40(4), 519–531. https://doi.org/10.2307/3207893
- Carter, H. (1994). Confronting patriarchal attitudes in the fight for professional recognition. *Journal of Advanced Nursing*, *19*(2), 367–372. https://doi.org/10.1111/j.1365-2648.1994.tb01094.x
- Chen, E. H., Shofer, F. S., Dean, A. J., Hollander, J. E., Baxt, W. G., Robey, J. L., Sease, K. L., & Mills, A. M. (2008). Gender disparity in analgesic treatment of emergency department patients with acute abdominal pain. *Academic Emergency Medicine*, *15*(5), 414–418. https://doi.org/10.1111/j.1553-2712.2008.00100.x
- Cokely, C. L. (2018). Declaration of the rights of woman and of the [female] citizen. Encyclopedia Britannica. https://www.britannica.com/topic/ Declaration-of-the-Rights-of-Woman-and-of-the-Female-Citizen
- Cooper, I., & Jenkins, S. (2008). Sexual boundaries between physiotherapists and patients are not perceived clearly: An observational study. *Australian Journal of Physiotherapy, 54*(4), 275–279. https://doi.org/10.1016/S0004-9514(08)70007-2
- Crompton, R. (1987). Gender, status and professionalism. *Sociology, 21*(3), 413–428. http://www.jstor.org/stable/42854000
- Dahl-Michelsen, T., & Solbrække, K. N. (2014). When bodies matter: Significance of the body in gender constructions in physiotherapy education. *Gender and Education*, 26(6), 672–687. https://doi.org/10.108 0/09540253.2014.946475
- Dahle, R. (2001). Foståelse av kjønn i fysioterapi. *Fysioterapeuten, 68*(11), 12–15.
- Danckaert, C., & Smith, A. (2022). *A mighty girl*. https://www.amightygirl.com/blog

- Degerstedt, F., Wiklund, M., & Enberg, B. (2017). Physiotherapeutic interventions and physical activity for children in Northern Sweden with cerebral palsy: A register study from equity and gender perspectives. *Global Health Action*, 10(Suppl 2), 1272236. https://doi.org/10.1080/1654 9716.2017.1272236
- Diekman, A. B., & Eagly, A. H. (2000). Stereotypes as dynamic constructs: Women and men of the past, present, and future. *Personality and Social Psychology Bulletin*, *26*(10), 1171–1188. https://doi.org/10.1177/0146167200262001
- Din, N. U., Ukoumunne, O. C., Rubin, G., Hamilton, W., Carter, B., Stapley, S., & Neal, R. D. (2015). Age and gender variations in cancer diagnostic intervals in 15 cancers: Analysis of data from the UK Clinical Practice Research Datalink. *PLoS ONE*, *10*(5), e0127717. https://doi.org/10.1371/journal.pone.0127717
- Donovan, J. (2012). Feminist theory: The intellectual traditions (4th ed.). Continuum International Publishing Group.
- Dua, S. (2010). The third Women in Surgery (WinS) annual conference 19th October, Royal College of Surgeons of England, London, UK. *International Journal of Surgery, 8*(2), 173–175. https://doi.org/10.1016/j.iisu.2009.11.009
- Enberg, B., Stenlund, H., Sundelin, G., & Öhman, A. (2007). Work satisfaction, career preferences and unpaid household work among recently graduated health-care professionals – a gender perspective. Scandinavian Journal of Caring Sciences, 21(2), 169–177. https://doi. org/10.1111/j.1471-6712.2007.00453.x
- Evans, K. J., & Maley, J. F. (2021). Barriers to women in senior leadership: How unconscious bias is holding back Australia's economy. *Asia Pacific Journal of Human Resources*, *59*(2), 204–226. https://doi.org/10.1111/1744-7941.12262
- Federici, S. (2010, October 25). The reproduction of labour-power in the global economy, Marxist theory and the unfinished feminist revolution [seminar]. The crisis of social reproduction and feminist struggle, UC Santa Cruz. https://caringlabor.wordpress.com/2010/10/25/silvia-federici-the-reproduction-of-labour-power-in-the-global-economy-marxist-theory-and-the-unfinished-feminist-revolution/
- Feldblum, C. R., & Lipnic, V. A. (2016). Select task force on the study of harassment in the workplace. US Equal Employment Opportunity Commission. https://www.eeoc.gov/select-task-force-study-harassment-workplace# ftn155
- Fernandopulle, N. (2021). To what extent does hierarchical leadership affect health care outcomes? *Medical Journal of the Islamic Republic of Iran,* 35(1), 880–883. https://doi.org/10.47176/mjiri.35.117
- Ferreant, G., & Thim, A. (2019). Measuring women's economic empowerment: Time use data and gender inequality (OECD Development Policy Papers, Report No. 16). OECD Publishing. https://www.oecd.org/development/gender-development/MEASURING-WOMENS-ECONOMIC-EMPOWERMENT-Gender-Policy-Paper-No-16.pdf
- Fikkan, J. L., & Rothblum, E. D. (2012). Is fat a feminist issue? Exploring the gendered nature of weight bias. *Sex Roles*, 66(9), 575–592. https://doi.org/10.1007/s11199-011-0022-5
- Fillion, K. (1996). *Lip service: The myth of female virtue in love, sex and friendship*. Harper Collins.
- Fine, C., & Rush, E. (2018). "Why does all the girls have to buy pink stuff?" The ethics and science of the gendered toy marketing debate. *Journal of Business Ethics*, 149(4), 769–784. https://doi.org/10.1007/s10551-016-3080-3
- Freedberg, S. (1993). The feminine ethic of care and the professionalization of social work. *Social Work, 38*(5), 535–540. https://www.jstor.org/stable/23717150
- Fuller, S., & Cooke, L. P. (2018). Workplace variation in fatherhood wage premiums: Do formalization and performance pay matter? Work, Employment and Society, 32(4), 768–788. https://doi. org/10.1177/0950017018764534

- Gavron, H. (1966). *The captive wife: Conficts of housebound mothers*. Routledge & Kegan Paul.
- Germov, J. (2013). Second opinion: An introduction to health sociology (6th ed.). Oxford University Press.
- Gilligan, C. (1982). In a different voice: Psychological theory and women's development. Harvard University Press.
- Gino, F., Wilmuth, C. A., & Brooks, A. W. (2015). Compared to men, women view professional advancement as equally attainable, but less desirable. *Proceedings of the National Academy of Sciences*, 112(40), 12354–12359. https://doi.org/10.1073/pnas.1502567112
- Hamberg, K. (2008). Gender bias in medicine. Women's Health, 4(3), 237–243. https://doi.org/10.2217/17455057.4.3.237
- Hammond, J. (2013). Doing gender in physiotherapy education: A critical pedagogic approach to understanding how students construct gender identities in an undergraduate physiotherapy programme in the United Kingdom [Doctoral dissertation]. Kingston University. https://eprints. kingston.ac.uk/id/eprint/27739/1/Hammond-J-27739.pdf
- Hammond, J. A. (2009). Assessment of clinical components of physiotherapy undergraduate education: Are there any issues with gender? *Physiotherapy*, 95(4), 266–272. https://doi.org/10.1016/j. physio.2009.06.003
- Hankivsky, O. (2012). Women's health, men's health, and gender and health: Implications of intersectionality. *Social Science & Medicine, 74*(11), 1712–1720. https://doi.org/10.1016/j.socscimed.2011.11.029
- Hartmann, H. I. (1981). The family as the locus of gender, class, and political struggle: The example of housework. *Signs*, *6*(3), 366–394. http://www.jstor.org/stable/3173752
- Hay, K., McDougal, L., Percival, V., Henry, S., Klugman, J., Wurie, H., Raven, J., Shabalala, F., Feilding-Miller, R., Dey, A., Nabamallika, D., Morgan, R., Atmavilas, Y., Saggurti, N., Yore, J., Blokhina, E., Huque, R., Barasa, E., Bhan, N., ... Gender Equality, Norms, and Health Steering Committee. (2019). Disrupting gender norms in health systems: Making the case for change. *Lancet*, 393(10190), 2535–2549. https://doi.org/10.1016/S0140-6736(19)30648-8
- Heilman, M. E. (2012). Gender stereotypes and workplace bias. *Research in Organizational Behavior, 32*, 113–135. https://doi.org/10.1016/j.riob.2012.11.003
- Hess, C., Ahmed, T., & Hayes, J. (2020). Providing unpaid household and care work in the United States: Uncovering inequality [Briefing paper]. Institute for Women's Policy Research. https://iwpr.org/wp-content/ uploads/2020/01/IWPR-Providing-Unpaid-Household-and-Care-Work-inthe-United-States-Uncovering-Inequality.pdf
- Hilden, P. (1982). Women's history: The second wave. *The Historical Journal*, 25(2), 501–512. http://www.jstor.org/stable/2638839
- Hoffmann, D. E., & Tarzian, A. J. (2001). The girl who cried pain: A bias against women in the treatment of pain. *Journal of Law, Medicine & Ethics*, 29(1), 13–27. https://doi.org/10.1111/j.1748-720X.2001.tb00037.x
- Johnson, P. A., Fitzgerald, T., Salganicoff, A., Wood, S. F., & Goldstein, J., M. (2014). Sex-specific medical research: Why women's health can't wait. Mary Horrigan Connors Center for Women's Health & Gender Biology at Brigham and Women's Hospital. https://www.brighamandwomens.org/assets/bwh/womens-health/pdfs/connorsreportfinal.pdf
- Kelly, A. (1985). The construction of masculine science. British Journal of Sociology of Education, 6(2), 133–154. http://www.jstor.org/ stable/1393046
- Kim, S. (2022). Everyday feminism. https://everydayfeminism.com
- Kristoffersson, E., Andersson, J., Bengs, C., & Hamberg, K. (2016). Experiences of the gender climate in clinical training – a focus group study among Swedish medical students. *BMC Medical Education*, 16, 283. https://doi.org/10.1186/s12909-016-0803-1

- Kristoffersson, E., Diderichsen, S., Verdonk, P., Lagro-Janssen, T., Hamberg, K., & Andersson, J. (2018). To select or be selected – gendered experiences in clinical training affect medical students' specialty preferences. BMC Medical Education, 18, 268. https://doi.org/10.1186/s12909-018-1361-5
- Laguía, A., Wach, D., Garcia-Ael, C., & Moriano, J., A. (2022). "Think entrepreneur – think male": The effect of reduced gender stereotype threat on women's entrepreneurial intention and opportunity motivation. *International Journal of Entrepreneurial Behaviour & Research*, 28(4), 1001–1025. https://doi.org/10.1108/JEBR-04-2021-0312
- Lee, K. K., Ferry, A. V., Anand, A., Strachan, F. E., Chapman, A. R., Kimenai, D. M., Meex, S. J. R., Berry, C., Findlay, I., Reid, A., Cruickshank, A., Gray, A., Collinson, P. O., Apple, F. S., McAllister, D. A., Maguire, D., Fox, K. A. A., Newby, D. E., Tuck, C., ... Mills, N. L. (2019). Sex-specific thresholds of high-sensitivity troponin in patients with suspected acute coronary syndrome. *Journal of the American College of Cardiology, 74*(16), 2032–2043. https://doi.org/10.1016/j.jacc.2019.07.082
- Linker, B. (2005). The business of ethics: Gender, medicine, and the professional codification of the American Physiotherapy Association, 1918–1935. *Journal of the History of Medicine and Allied Sciences, 60*(3), 320–354. https://doi.org/10.1093/jhmas/jri043
- Mahoney, K. (2016). Historicising the 'third wave': Narratives of contemporary feminism. *Women's History Review, 25*(6), 1006–1013. https://doi.org/10.1080/09612025.2015.1131052
- Mandel, H., & Semyonov, M. (2016). Going back in time? Gender differences in trends and sources of the racial pay gap, 1970 to 2010. American Sociological Review, 81(5), 1039–1068. https://doi. org/10.1177/0003122416662958
- McDonald, P., & Charlesworth, S. (2019). Academic evidence on the causes, manifestations and responses to workplace sexual harassment (Submission 170). Initial submission to the Australian Human Rights Commission's National Inquiry into Sexual Harassment in Australian Workplaces. https://humanrights.gov.au/sites/default/files/Submission%20170%20-%20 Prof%20P%20McDonald%20and%20Prof%20S%20Charlesworth.pdf
- Medical Council of New Zealand. (2019). *The New Zealand medical workforce in 2019*. https://www.mcnz.org.nz/assets/Publications/Workforce-Survey/6be731ea72/Workforce-Survey-Report-2019.pdf
- Mondini Trissino da Lodi, C., Landini, M. P., Asunis, E., & Filardo, G. (2022). Women have tendons ... and tendinopathy: Gender bias is a "gender void" in sports medicine with a lack of women data on patellar tendinopathy—A systematic review. *Sports Medicine Open, 8*, 74. https://doi.org/10.1186/s40798-022-00455-6
- Mose, J. N. (2021). Representation of women in top executive positions in general medical-surgical hospitals in the United States. *Women's Health Reports*, 2(1), 124–132. https://doi.org/10.1089/whr.2020.0111
- Muench, U., Sindelar, J., Busch, S. H., & Buerhaus, P. I. (2015). Salary differences between male and female registered nurses in the United States. *Journal of the American Medical Association*, 313(12), 1265–1267. https://doi.org/10.1001/jama.2015.1487
- Newman, C. (2014). Time to address gender discrimination and inequality in the health workforce. *Human Resources for Health*, 12, 25. https://doi. org/10.1186/1478-4491-12-25
- Nicholls, D. A. (2022). *Physiotherapy otherwise*. Tuwhera Open Books. https://ojs.aut.ac.nz/tuwhera-open-monographs/catalog/view/8/13/60-1
- Nicholls, D. A., & Holmes, D. (2012). Discipline, desire, and transgression in physiotherapy practice. *Physiotherapy Theory and Practice, 28*(6), 454–465. https://doi.org/10.3109/09593985.2012.676940
- Nowogrodzki, A. (2017). Inequality in medicine. *Nature, 550*(7674), S18–S19. https://doi.org/10.1038/550S18a
- Oakley, A. (1974). The sociology of housework. The Pitman Press.
- Parry, A. (1995). Ginger Rogers did everything Fred Astaire did backwards and in high heels. *Physiotherapy, 81*(6), 310–319. https://doi.org/10.1016/S0031-9406(05)66790-9

- Parsons, T. (1959). The social structure of the family. In R. Anshen (Ed.), *The family: Its function and destiny* (pp. 173–201). Harper.
- Parsons, T., & Bales, R., F. (Eds.). (1955). Family, socialization and interaction process. The Free Press.
- Pavco-Giaccia, O., Little, M. F., Stanley, J., & Dunham, Y. (2019). Rationality is gendered. *Collabra: Psychology*, 5(1), 54. https://doi.org/10.1525/ collabra.274
- Potera, C. (2015). In nursing it still pays more to be a man. *The American Journal of Nursing*, 115(6), 14. https://doi.org/10.1097/01. NAJ.0000466300.61755.7d
- Reger, J. (2015). Feminism, first, second and third waves. In G. Ritzer (Ed.), *The Blackwell encylopedia of sociology*. https://doi.org/10.1002/9781405165518.wbeosf036.pub2
- Reid, A., & Dixon, H. (2018). *M4king sen5e of 7he numbers:*Analysis of the physiotherapy workforce. BERL. https://pnz.org.nz/
 Folder?Action=View%20File&Folder_id=1&File=PNZ%20Workforce%20
 Issues%20December%202018.pdf
- Robinson, M. E., & Compton, J. V. (1996). Decentralised management structures – the physiotherapy experience at John Hunter Hospital. Australian Journal of Physiotherapy, 42(4), 317–320. https://doi. org/10.1016/S0004-9514(14)60396-2
- Rocha, M. (2021). Promoting gender equality through regulation: The case of parental leave. The Theory and Practice of Legislation, 9(1), 35–57. https:// doi.org/10.1080/20508840.2020.1830565
- Ross, M. H, & Setchell, J. (2019). People who identify as LGBTIQ+ can experience assumptions, discomfort, some discrimination, and a lack of knowledge while attending physiotherapy: A survey. *Journal of Physiotherapy*, 65(2), 99–105. https://doi.org/10.1016/j.jphys.2019.02.002
- Sebrant, U. (1999). Being female in a health care hierarchy. On the social construction of gender and leader identity in a work organization having a predominance of women. *Scandinavian Journal of Caring Sciences, 13*(3), 153–158. https://doi.org/10.1111/j.1471-6712.1999.tb00533.x
- Sin, I., Stillman, S., & Fabling, R. (2017). What drives the gender wage gap? An executive summary of working paper 17–15. Motu Economic and Public Policy Research Trust. https://www.motu.nz/assets/Documents/ our-work/population-and-labour/individual-and-group-outcomes/Gender-Wage-Gap-Executive-Summary.pdf
- Smit, R. (2016). The sociology of housework. *Journal of Family Theory & Review, 82*(2), 231–236. https://doi.org/doi:10.1111/jftr.12144
- Stålnacke, B.-M., Haukenes, I., Lehti, A., Wiklund, A. F., Wiklund, M., & Hammarström, A. (2015). Is there a gender bias in recommendations for further rehabilitation in primary care of patients with chronic pain after an interdisciplinary team assessment? *Journal of Rehabilitation Medicine*, 47(4), 365–371. https://doi.org/10.2340/16501977-1936
- Stamarksi, C. S, & Son Hing, L. S. (2015). Gender inequalities in the workplace: The effects of organizational structures, processes, practices, and decision makers' sexism. *Frontiers of Psychology, 6*, 1400. https://doi.org/10.3389/fpsyg.2015.01400
- Stenberg, G., & Ahlgren, C. (2010). A gender perspective on physiotherapy treatment in patients with neck and back pain. *Advances in Physiotherapy*, 12(1), 35–41. https://doi.org/10.3109/14038190903174270
- Stenberg, G., Fjellman-Wiklund, A., Strömbäck, M., Eskilsson, T., From, C., Enberg, B., & Wiklund, M. (2021). Gender matters in physiotherapy. Physiotherapy Theory and Practice, 38(13), 2316–2329. https://doi.org/10.1080/09593985.2021.1970867

- Stenberg, G., Fjellman-Wiklund, A., & Ahlgren, C. (2014). 'I am afraid to make the damage worse' fear of engaging in physical activity among patients with neck or back pain a gender perspective. Scandinavian Journal of Caring Sciences, 28(1), 146–154. https://doi.org/10.1111/scs.12043
- Storkey, E. (2000). Created or constructed? The great gender debate. UNSW Press.
- Sudmann, T. T. (2009). *(En)gendering body politics. Physiotherapy as a window on health and illness* [Doctoral dissertation, Universitas Bergensis]. http://hdl.handle.net/11250/2481729
- Tabassum, N., & Nayak, B. S. (2021). Gender stereotypes and their impact on women's career progressions from a managerial perspective. IIIM Kozhikode Society & Management Review, 10(2), 192–208. https://doi. org/10.1177/2277975220975513
- Targ, D. B. (1989). Feminist family sociology: Some reflections. Sociological Focus, 22(3), 151–160. http://www.jstor.org/stable/20831512
- Templeton, K., Nilsen, K. M., & Walling, A. (2020). Issues faced by senior women physicians: A national survey. *Journal of Women's Health, 29*(7), 980–988. https://doi.org/10.1089/jwh.2019.7910
- United Nations. (2015). Transforming our world: The 2030 agenda for sustainable development. Department of Economic and Social Affairs. https://sdgs.un.org/2030agenda
- Wallis, C. J. D., Jerath, A., Coburn, N., Klaassen, Z., Luckenbaugh, A. N., Magee, D. E., Hird, A. E., Armstrong, K., Ravi, B., Esnaola, N. F., Guzman, J. C. A., Bass, B., Detsky, A. S., & Satkunasivam, R. (2022). Association of surgeon-patient sex concordance with postoperative outcomes. *Journal of the American Medical Association Surgery*, 157(2), 146–156. https://doi. org/10.1001/jamasurg.2021.6339
- Westergaard, D., Moseley, P., Sørup, F. K. H., Baldi, P., & Brunak, S. (2019). Population-wide analysis of differences in disease progression patterns in men and women. *Nature Communications*, 10, 666. https://doi. org/10.1038/s41467-019-08475-9
- Williams, M. F. (1996). Violence and sexual harassment: Impact on registered nurses in the workplace. *American Association of Occupational Health Nurses Journal*, 44(2), 73–77.
- Witz, A. (1992). *Professions and patriarchy*. Routledge. https://doi. org/10.4324/9780203167786
- Wollstonecraft, M. (1845). A vindication of the rights of woman: With strictures on political and moral subjects. G. Vale.
- World Health Organization. (2019). *Health and gender equality*. https://www.euro.who.int/__data/assets/pdf_file/0008/404495/SDG-5-policy-brief_2.pdf
- World Health Organization. (2022, July 13). The gender pay gap in the health and care sector: A global analysis in the time of COVID-19. https://www.who.int/publications/i/item/9789240052895
- Zamarro, G., & Prados, M. J. (2021). Gender differences in couples' division of childcare, work and mental health during COVID-19. *Review of Economics of the Household, 19*, 11–40. https://doi.org/10.1007/s11150-020-09534-7
- Zhang, L., Losin, E. A. R., Ashar, Y. K., Koban, L., & Wager, T. D. (2021). Gender biases in estimation of others' pain. *The Journal of Pain, 22*(9), 1048–1059. https://doi.org/10.1016/j.jpain.2021.03.001