

HOW GENDER INEQUITY IMPACTS ON MEN'S HEALTH. AN EXPLORATION OF THEORETICAL PATHWAYS

Shane A Kavanagh^{1,2} and Melissa Graham¹

¹Department of Public Health, School of Psychology and Public Health, La Trobe University, Bundoora, Victoria, 3086.

²School of Health and Social Development, Faculty of Health, Deakin University, Geelong, Victoria, 3220, Australia.

Correspondence may be directed to: shane.kavanagh@deakin.edu.au

Accepted May 15, 2018. Published January 31, 2019.

ABSTRACT

Empirical studies suggest gender inequity increases men's health risks. Multiple pathways may explain this relationship. These pathways however have not been explored concurrently. This paper is based on an extensive review of the theoretical literature linking gender inequity to men's health. It identifies a range of theoretical approaches and examines links between them. In particular, it discusses masculinities and health theory, which argues gender inequity is linked to gender norms that lead to poor health-related beliefs and behaviours; the impact of gender inequity on men's psychosocial and emotional experiences through limiting social roles, setting unattainable and restrictive expectations, and reducing access to social and emotional support; reproductive pathways, wherein gender inequity compromises optimal reproductive and early life outcomes leading to lifelong health impacts for males; and political, economic and social processes influenced by women's social position that shape the social and economic resources, such as welfare and support, available to men. There are important interdependencies between these pathways. For example, masculine gender norms appear to not only increase poor health-related beliefs and behaviours, but also limit men's opportunities to satisfy psychosocial and emotional needs. The findings suggest the extent of gender inequity can accentuate or buffer the negative health effects of other social inequalities. Further, while gender inequity provides men with many benefits, it limits access to the rich array of resources required to meet a diversity of lifelong health-related challenges. The paper provides the basis for richer theoretical approaches to men's health.

Key Words: *men's health; masculinities; gender inequality; social inequalities; psychosocial; socioeconomic factors*

Gender inequity refers to systematic differences in the political, economic and social circumstances between women and men.¹ These differences overwhelmingly benefit men^{2,3} and are the consequence of unequal power relations.^{4,5} This should lead to men experiencing better health. Yet, a growing number of studies suggest gender inequity actually increases men's

health risks. Gender inequity and similar measures have been associated with men's heightened risk of mortality,⁶⁻⁸ violent death,⁹ poorer self-rated health,¹⁰ and depression.^{9,11} For example, 2 recent multilevel studies based on large US datasets found aspects of state-level gender inequity predicted men's risk of mortality and poorer self-rated health.^{6,10}

Identifying gender inequity as a potential contributor to men's health risks offers the prospect of better approaches to improve the health of men. This is important, as while the issue of men's health is often overlooked,¹² men face multiple health challenges. Men in Europe for example have a higher overall rate of hospital admission than women for all principal diseases and health problems.¹³ Further, men in middle age across some of the world's most populous countries have over 4 times the risk of coronary heart disease mortality.¹⁴ Perhaps most strikingly, men display lower life expectancy than women in almost every country.¹⁵ Biological factors likely play a role in this pattern,¹⁶ but the variability of men's health across different contexts suggests social factors are of fundamental importance.^{13,17}

While there is growing evidence to support a relationship between gender inequity and men's health, not all studies have shown a consistent effect. Some studies have found null or some positive effects.¹⁸ More work is required to ascertain if, how, and why gender inequity contributes to the poor health of men. This work depends on the development of coherent theoretical models that explain how a social process that benefits men as a group can also undermine their health. Yet, to the best of our knowledge, no papers have identified and concurrently discussed the diverse theoretical approaches that could explain this relationship.

This paper is based on an extensive literature review that sought to identify plausible theoretical pathways linking gender inequity to men's health risks. It examines these pathways to provide the basis for a more integrated and holistic theory. The paper begins with important concepts linking gender inequity to men's health. It then discusses different theoretical approaches and the links between these approaches before finishing with some critical observations.

IMPORTANT CONCEPTS LINKING GENDER INEQUITY TO MEN'S HEALTH

Two concepts derived primarily from feminist literature are important for understanding how the power relations that sustain gender inequity can damage men's health. The first concept, patriarchy, can be defined at a basic level 'as a system of social structures,

and practices in which men dominate, oppress and exploit women'.⁵ Patriarchy operates through social institutions including the labour market, the state, male violence, sexual norms, marriage and cultural institutions.⁵ It serves to provide men with a range of benefits including higher social status, greater access to economic wealth and an increased ability to attain political power.⁴ These benefits have been referred to as the 'patriarchal dividend'.⁴

But, while patriarchy provides advantages to men as a group, its impacts are complex. The benefits of patriarchy are unequally shared with the majority of benefits flowing to men in higher social positions.⁴ For some men, especially those in lower social positions, the benefits may be limited.⁴ Patriarchy also constrains men's social experience. Within the household it serves to divide labour so men have reduced engagement in housework and childcare.^{5,19} It also serves to define men's social role as the breadwinner successfully engaged in the labour market.^{5,19} Thus, patriarchy privileges men's social position, but places narrow expectations on their social roles. As will be discussed, these narrow expectations can reduce men's access to a range of resources beneficial for health and also expose them to increased health risks.

The second concept, gender, refers in its broadest definition to the differences between males and females that arise through social processes rather than biology.²⁰ A social constructionist approach views gender as a range of normative social practices shaped by the patriarchal power relations between men and women. It also argues that gender is tied to the power relations amongst men.^{4,19,21} Key here is the concept of hegemonic masculinity, which embodies what is considered to be the 'most honoured way of being a man' in a particular social context and is observed in men who hold power and also in exemplars, such as film actors and characters or fantasy figures.^{19,21} Hegemonic masculinity acts to legitimize men's domination over women and to structure social hierarchies amongst men.^{19,21} In many contexts, hegemonic masculinity is displayed by practices such as strength, independence, lack of vulnerability and toughness.²²

Hegemonic masculinity provides a reference point for a range of other masculinities.^{19,21} Complicit masculinities, for example, reflect men who receive the

benefits of the patriarchal dividend, but who exhibit less overt hegemonic practices;¹⁹ subordinate masculinities reflect men who are 'expelled from the circle of legitimacy', such as gay men;¹⁹ and compensatory masculinities are enacted by lower status men as a means to assert their social position.²³

Masculinities theory is particularly important for understanding how gender inequity impacts on men's health. It links the social norms arising from unequal power relations between women and men and amongst men to a range of social processes that shape the social environment in ways that impact on health risks.

Drawing on these concepts, the following sections describe 4 theoretical pathways through which gender inequity can have negative consequences for men's health: masculinities and health theory; psychosocial and emotional experiences; reproductive pathways; and the impact of gender inequity on broad political, economic and social processes.

MASCULINITIES AND HEALTH THEORY

Perhaps the most developed theoretical approach for explaining how gender inequity impacts on men's health is masculinities and health theory.^{24,25} It suggests gender inequity negatively shapes men's health-related beliefs and behaviours. In particular, it argues men's poor health can be traced to the gender related ideals and practices used by men to justify and contest their social position.²²⁻²⁴ Men display poor health-related beliefs and behaviours to construct forms of masculinity that mark themselves out as superior to women and to assert their social position with respect to other men.^{22,24} These forms of masculinity often emphasize hegemonic ideals such as strength, power and lack of vulnerability and are acted out through risk-taking behaviour and a lack of care for health.^{22,24,26} This can manifest in behaviours such as smoking, overconsumption of alcohol, poor dietary habits and reduced engagement with health services.²⁷

Men can also use health-related beliefs and behaviours to construct alternative masculinities to defy existing power structures.^{22,23} In some cases, these resistant masculinities can be health protective as they undermine risk-related gender norms.²² But, often they increase health risks. Pyke,²³ for example, argues men may 'compensate' for a lower social position

by engaging in risk-taking behaviours to construct a compensatory masculinity that displays independence from control. While poor health-related beliefs and behaviours can impose health costs, men may enact them to negotiate social hierarchies to provide a sense of autonomy and agency.^{23,28,29}

A growing number of studies have investigated the relationship between masculinities and health. These studies are highly heterogeneous in how they measured masculinities and the health outcomes investigated. Many have found aspects of masculinity are associated with poor health behaviours, poor health-related beliefs and health outcomes.³⁰⁻³⁷ For example, a meta-analysis of 74 studies using the Conformity to Masculine Norms Inventory found the norms of self-reliance, power over women and playboy were strongly and consistently associated with poorer mental health and psychological health seeking.³⁰ The authors argue the findings, with regards to playboy and power over women, underscore the idea that 'sexism is not merely a social injustice, but also has deleterious mental health-related consequences for those who embrace such attitudes.'³⁰

But, the empirical literature also suggests the relationship between masculinities and health is complex.³⁸ Some masculine norms may be protective.^{33,39} Men for example can appeal to hegemonic ideals to justify healthy behaviours such as physical activity.^{38,40} Further empirical work is required to tease out the processes involved. It is possible only some aspects of masculinity are important, and that specific aspects of masculinity may be related to specific health behaviours.³⁰

THE PSYCHOSOCIAL ENVIRONMENT AND EMOTIONAL EXPERIENCES

In addition to its effects on health-related beliefs and behaviours, gender inequity can impact on men's health through psychosocial and emotional experiences. These experiences appear to 'get under the skin' and impact on physiological functioning and contribute to disease.⁴¹⁻⁴⁵ Multiple physiological pathways have been identified including the functioning of the hypothalamic-pituitary-adrenal axis, the sympathetic nervous system, the immune system, inflammatory processes and cellular function.^{41,42,46}

Gender inequity can impact on men's psychosocial and emotional experience by limiting social roles. As noted, gender inequity is linked to an emphasis on men's role as the breadwinner and a diminished role in the domestic realm.^{5,19} Yet expanding the number of social roles men engage in has multiple benefits.⁴⁷ Men who take on household management and childcare, for example, increase the potential for shared relationship experiences with their partners facilitating greater communication and improving relationship quality and emotional support.⁴⁷ Expanded roles also increase opportunities to experience success and build self-confidence and self-efficacy as well as facilitating the development of greater self-complexity and a greater frame of reference.⁴⁷ These positive experiences are bolstered by women's workforce participation taking pressure off men as the sole income generator.⁴⁷

In sum, having multiple roles provides access to psychological resources that can mitigate the negative effects of stress.⁴⁷ These resources may help counter threats in the economic environment, such as workplace conflict and unemployment.^{47,48} Conversely, having reduced social roles restricts men's assessment of self-worth to a narrow identity heightening the negative effects of failure in the economic role.⁴⁸

There is evidence to support role expansion theory with regards to men's health,⁴⁹⁻⁵³ though not all studies are supportive.⁵⁴ The most extensive review was undertaken by Barnett⁵⁰ who found benefits to psychological and physical health for men who take on multiple roles. There is also evidence taking parental leave is protective for men's health.^{49,51,52} Evidence for health benefits from men's participation in housework is however mixed. Some studies suggest benefits to men from more equitable arrangements in household responsibilities,⁵⁵⁻⁵⁷ while other studies suggest benefits to men from less equitable arrangements, or suggest no effect.⁵⁸⁻⁶⁰

The benefits of expanded roles may not arise in all situations. Positive effects are unlikely if the number of roles is too high, the demands of one role are excessive, or if the quality of roles is poor.⁴⁷ Benefits also depend on the broader socioeconomic context. Notably, many studies suggesting a benefit to men's health from a role in childcare come from Sweden, which has generous parental leave provisions for

men.⁶¹ Benefits of multiple roles are also more likely to be experienced by men with less rigid gender-role beliefs who are not threatened by non-normative social roles.⁴⁷

In addition to the effects of multiple roles, gender inequity can impact on men's psychosocial and emotional experiences through the influence of gender ideals. Hegemonic masculinities impose restrictive and unattainable expectations on men, which leave little space for validating their lived experience.^{19,26} This serves as an ongoing threat to men's self-esteem and may be most acutely felt by those who do not receive the expected rewards of the social system, such as men who do not identify as heterosexual and men who have subordinate racial or ethnic positions.²⁹ Further, boys and men who do not conform to gender ideals can face social disciplining processes.^{19,26} Gender inequity and hegemonic ideals are authoritarian belief systems and those who do not conform can suffer discrimination, punishment, ridicule and even violence for failing to engage in traditional behaviour.^{19,26}

There are links here to men's poor health-related beliefs and behaviours, which may result from men's attempts to deal with psychosocial and emotional threats by appealing to hegemonic gender ideals. Subordinate men may use poor health-related behaviours to compensate for the undermining of their masculine identity and self-esteem.^{23,29} This may lead men 'to engage in extreme macho behaviours in order to regain social status through appealing to hierarchies of masculinity rather than hierarchies of social class.'²⁹ Courtenay²⁴ argues, while potentially damaging their health, men who achieve hegemonic ideals are compensated with social acceptance and 'diminished anxiety about their manhood'. In contexts with limited means for empowerment, poor health behaviours can provide men with a form of agency to meet social challenges.^{28,29}

A final impact of gender inequity on men's psychosocial and emotional experiences is through undermining social support. A cultural emphasis on independence leads men to lack the rich networks often maintained by women.^{27,48} This is particularly problematic in times of acute need, such as during marital breakdown and unemployment, and may contribute to suicide risk.^{32,48} Gender inequity may also

impact on the supportiveness of social environments with one study suggesting supportive social relationships, particularly in the school context, explain an association between country level gender equality and male (and female) adolescent life satisfaction.⁶²

It is important to note that, while the above discussion suggests reducing gender inequity will improve the psychosocial and emotional environment for men, in some cases it can have the opposite effect. Improvements in women's social position without broader social changes could threaten men's sense of self-worth.^{29,63} In this case, men in disadvantaged social positions may engage in risky behaviours to reassert a diminished masculine identity.¹⁸ This points to gender inequity interacting with other forms of social inequality.

REPRODUCTIVE AND EARLY LIFE PATHWAYS

Gender inequity damages women's health¹ and denies them the social support and resources necessary to achieve optimal outcomes for their male (and female) offspring.^{64,65} This intimately ties men's health to women's social position as poor outcomes during critical early life periods increase lifelong health risks.^{64,66,67} Low birthweight for example is associated with higher rates of heart disease, stroke, hypertension and type 2 diabetes.⁶⁸

Extensive evidence links levels of gender inequity to reproductive and early life outcomes and suggests broad population effects.^{65,69} A systematic review including 22 studies found greater women's autonomy in developing countries is associated with better child nutritional status.⁷⁰ Further, studies from the US have found state level measures of gender inequity and women's status are associated with birthweight and infant mortality suggesting impacts of women's position on the developmental environment.^{71,72} Perhaps the most dramatic illustration of the relationship between gender inequity and reproductive outcomes is provided by a study suggesting intimate partner violence has similar impacts on birthweight to smoking.⁷³

An important consideration is that the effects of gender inequity on reproductive and early life outcomes may be heightened for disadvantaged women who are at particular risk of poor health and have

reduced access to resources.⁷⁴ It is possible gender inequity re-enforces intergenerational health disadvantage for men (and women) by accentuating the negative effects of poor reproductive outcomes tied to low social position.

As with other pathways the relationship between gender inequity and men's health through reproductive pathways is complex. While greater gender equity is likely to lead to overall beneficial effects on male health, in some cases it may place children at risk. A US study found that in urban settings greater participation by women in the labour force increased homicide risk for infants and children.⁷⁵ Therefore, benefits may be context dependent and affected by access to resources such as childcare.

THE IMPACTS OF GENDER INEQUITY ON POLITICAL, ECONOMIC, AND SOCIAL PROCESSES

The extent of gender inequity is not only shaped by, but also shapes the broader political, economic and social environment in ways that affect men's health. Improvements in women's position are linked to social processes including greater governmental responsiveness to population needs⁷⁶ and greater welfare and healthcare spending.^{77,78} These processes increase access to resources for men in vulnerable economic positions, such as those experiencing unemployment or poverty.⁷⁹ Increased resources also support women to provide optimal care during critical reproductive periods thus providing benefits through reproductive and early life pathways.

Several studies illustrate these processes. Bolzendahl and Brooks⁷⁷ found, in a cross-sectional, time-series study of 12 OECD countries, levels of women's political representation and labour force participation were predictors of greater welfare spending. Wyndow et al.⁷⁶ found improvements in women's labour force participation and educational attainment as well as lower fertility rates were drivers of democratization.

One theory explicitly linking gender inequity to men's health through political processes is structural pluralism.⁸⁰ It argues a greater active role in political and policy processes by diverse segments of communities, including women, improves population health.^{78,80,81} Improvements occur through effective

pressuring of authorities to provide appropriate health facilities, and through improved biological functioning as a consequence of collective problem solving.⁸¹ Support for a structural pluralist approach is provided by a study of 152 countries which found women's status was a predictor of male and female life expectancy and lower infant mortality as well as greater health expenditure.⁷⁸

Structural pluralism can be linked to the concept of collective efficacy,⁸² which is a mechanism identified in social capital literature.⁸³ Collective efficacy refers to a community's ability to mobilize to take collective action.^{82,83} An aspect of this approach worth noting is that collective efficacy provides a community with the ability to sanction negative behaviours.⁸³ This may allow risk-taking behaviours linked to negative masculinities to be controlled.

DRAWING TOGETHER THE PATHWAYS LINKING GENDER INEQUITY TO MEN'S HEALTH

This paper set out to explain how the power relations that sustain gender inequity are intertwined with social processes that damage men's health. It identified 4 pathways. These are summarized in Table 1.

There is considerable overlap and interdependence between the pathways. As noted, there are links between masculinities and psychosocial and emotional

experiences. Masculine gender ideals appear to not only increase poor health-related beliefs and behaviours, but to also limit opportunities for men to satisfy psychosocial and emotional needs. A further example of interdependence between pathways is the link between social and economic policies and reproductive and early life outcomes. Social investments in infrastructure and welfare can improve reproductive and early life outcomes reducing lifetime health risks and the intergenerational transfer of disadvantage. There is potential for the development of a more integrated theoretical model that identifies the linkages between the different pathways.

An important observation is that gender inequity appears to play a role in accentuating or buffering the negative health effects of other social and economic inequalities. For example, in a context of high gender inequity and narrowly defined gender ideals, men in lower social positions may engage in health damaging behaviours as a means to reassert their social position.^{23,29} Conversely, a context of greater gender equity allows men access to a range of resources that buffer against the negative effects of a lower social position. Men may be able to access social support and engage in multiple social roles with consequent psychological benefits. Further, a context of greater gender equity could provide men with greater access to welfare and social supports.

TABLE 1 Pathways Linking Gender Inequity To Men's Health

Theoretical Approach	Pathways
Masculinities and health	Gender inequity is linked to hegemonic gender norms emphasizing beliefs and practices (e.g., strength and invulnerability) that lead to poor health-related beliefs and behaviours.
Psychosocial and emotional experiences	Gender inequity impacts on men's psychosocial and emotional experience by limiting social roles, imposing restrictive and unattainable expectations and reducing social support.
Reproductive and early life pathways	Gender inequity compromises women's ability to achieve optimal outcomes for their offspring leading to lifelong impacts on male (and female) health.
Political, economic and social processes	Greater gender <i>equity</i> is linked to social and economic processes that increase the resources available to men (e.g., welfare and healthcare spending) and increase social efficacy for reducing negative masculinities.

An illustrative case is unemployment, a predictor of premature mortality in men.⁸⁴ Gender inequity can accentuate the negative effects of unemployment by increasing the likelihood of men engaging in unhealthy behaviours as they appeal to masculine ideals to defend their self-esteem.²⁹ On the other hand, reductions in gender inequity offer men greater opportunities to experience self-esteem and self-efficacy that are not directly linked to employment. This may occur through more diverse social roles and less rigid social expectations as well as increased social support. Further, reductions in gender inequity can increase the level of resources, such as welfare provisions that men can draw on. Empirical support for this view is provided by a study of the effects of economic shocks across 20 European countries.⁸⁵ It found greater country level gender equality substantially reduced the association between male unemployment and suicide.⁸⁵

More broadly, a picture emerges of gender inequity limiting the range and extent of resources available to men to deal with complex and evolving challenges. These are psychosocial and emotional resources, such as self-esteem and social and emotional support, and material resources, such as access to welfare. Such resources are important at multiple stages across the life-course when men are faced with challenges that could impact on their health, whether emotional, such as relationship breakdown, or those arising in the economic realm. This conceptualization resonates with a reserve capacity model, which argues individuals in lower socioeconomic positions experience poor health due to having smaller reserves of resources available to manage stressful events.⁴³

Gender inequity may provide men with many benefits, but it also appears to limit their access to a rich array of resources that are important for meeting a diversity of lifelong challenges. Exploring the nexus between different arrays of resources and the health-related challenges experienced at different life stages may provide a focus for developing more integrated theory.

CONCLUSION

Evidence increasingly suggests gender inequity contributes to the poor health of men. The theoretical

pathways outlined in this paper provide a basis to understand the processes underlying this relationship. This knowledge can be used to develop better theoretical models and to guide future empirical work. It can also be used to enhance current approaches to addressing gender inequity as a social determinant of health.^{1,17} As well as benefiting women, ameliorating gender inequity appears to hold potential for improving the lives of men.

GRANT/FUNDING SUPPORT

Nil.

REFERENCES

1. Sen G, Östlin P. Unequal, unfair, ineffective and inefficient gender inequity in health: Why it exists and how we can change it [Internet]. Women and Gender Equity Knowledge Network; 2007. Available from: http://www.who.int/social_determinants/resources/csdh_media/wgekn_final_report_07.pdf
2. United Nations Development Programme. Human Development Report 2016 [Internet]. New York: United Nations Development Programme; 2016. Available from: http://hdr.undp.org/sites/default/files/2016_human_development_report.pdf
3. World Economic Forum. Global gender gap report 2016 [Internet]. World Economic Forum; 2016 [cited 2017 Apr 26]. Available from: http://www3.weforum.org/docs/GGGR16/WEF_Global_Gender_Gap_Report_2016.pdf
4. Connell RW. Gender - short introductions. Polity; 2002.
5. Walby S. Theorising patriarchy. *Sociology*. 1989;23(2):213–34.
6. Kavanagh SA, Shelley JM, Stevenson C. Does gender inequity increase men's mortality risk in the United States? A multilevel analysis of data from the National Longitudinal Mortality Study. *SSM - Population Health* 2017 Dec;3:358–65.
7. Kawachi I, Kennedy BP, Gupta V, Prothrow-Stith D. Women's status and the health of women and men: a view from the States. *Social Science & Medicine*. 1999 Jan;48(1):21–32.
8. Stanistreet D, Bamba C, Scott-Samuel A. Is patriarchy the source of men's higher mortality? *J Epidemiol Comm Health* 2005 Oct 1;59(10):873–6.
9. Holter ØG. "What's in it for men?" Old question, new data. *Men Masculin* 2014 Dec 1;17(5):515–48.

10. Kavanagh SA, Shelley JM, Stevenson C. Is gender inequity a risk factor for men reporting poorer self-rated health in the United States? *PLOS ONE* [Internet]. 2018 Jul 17 [cited 2018 Sep 12];13(7):e0200332. Available from: <https://journals.plos.org/plosone/article?id=10.1371/journal.pone.0200332>
11. Van de Velde S, Huijts T, Bracke P, Bambra C. Macro-level gender equality and depression in men and women in Europe. *Sociol Health Illness* 2013;35(5):682–98.
12. Rovito MJ, Leonard B, Llamas R, Leone JE, Talton W, Fadich A, et al. A call for gender-inclusive global health strategies. *Am J Mens Health* [Internet]. 2017 Nov 1 [cited 2018 Sep 10];11(6):1804–8. Available from: <https://doi.org/10.1177/1557988317723424>
13. European Union. The state of men's health in Europe [Internet]. Directorate-General for Health and Consumers, European Commission; 2011. Available from: http://ec.europa.eu/health/population_groups/docs/men_health_extended_en.pdf
14. Bots SH, Peters SAE, Woodward M. Sex differences in coronary heart disease and stroke mortality: a global assessment of the effect of ageing between 1980 and 2010. *BMJ Global Health* [Internet]. 2017 Mar 1 [cited 2018 Sep 20];2(2):e000298. Available from: <https://gh.bmj.com/content/2/2/e000298>
15. Wang H, Dwyer-Lindgren L, Lofgren KT, Rajaratnam JK, Marcus JR, Levin-Rector A, et al. Age-specific and sex-specific mortality in 187 countries, 1970–2010: a systematic analysis for the Global Burden of Disease Study 2010. *The Lancet* 2012 Dec 15;380(9859):2071–94.
16. Seifarth JE, McGowan CL, Milne KJ. Sex and life expectancy. *Gender Med* 2012 Dec;9(6):390–401.
17. World Health Organization. The health and well-being of men in the WHO European Region: better health through a gender approach [Internet]. 2018 Sep [cited 2018 Oct 31]. Available from: <http://www.euro.who.int/en/publications/abstracts/the-health-and-well-being-of-men-in-the-who-european-region-better-health-through-a-gender-approach-2018>.
18. Stanistreet D, Swami V, Pope D, Bambra C, Scott-Samuel A. Women's empowerment and violent death among women and men in Europe: an ecological study. *J Men's Health Gender* 2007 Sep;4(3):257–65.
19. Connell RW. *Masculinities*. Australia: Allen & Unwin; 1995.
20. Stevenson A, editor. *Oxford Dictionary of English* [Internet]. 3rd Edition. Oxford University Press; 2010 [cited 2014 Feb 12]. Available from: <http://www.oxfordreference.com>
21. Connell RW, Messerschmidt JW. Hegemonic Masculinity Rethinking the concept. *Gender Soc* 2005;19(6):829–59.
22. Courtenay W. Constructions of masculinity and their influence on men's well-being: a theory of gender and health. In: *Dying to be men: psychosocial, environmental, and biobehavioral directions in promoting the health of men and boys* [Internet]. 1st ed. Hoboken: Taylor and Francis; 2011. Available from: <http://ebookcentral.proquest.com>
23. Pyke KD. Class-based masculinities: the interdependence of gender, class, and interpersonal power. *Gender Society* 1996 Oct 1;10(5):527–49.
24. Courtenay WH. Constructions of masculinity and their influence on men's well-being: a theory of gender and health. *Soc Sci Med* 2000;50(10):1385–401.
25. Evans J, Frank B, Oliffe JL, Gregory D. Health, illness, men and masculinities (HIMM): a theoretical framework for understanding men and their health. *J Men's Health* 2011 Mar;8(1):7–15.
26. Courtenay W. Engendering health: the social construction of gendered health beliefs and behaviors. In: *Dying to be men: psychosocial, environmental, and biobehavioral directions in promoting the health of men and boys* [Internet]. 1st ed. Hoboken: Taylor and Francis; 2011. Available from: <http://ebookcentral.proquest.com>
27. Courtenay W. Behavioral Factors Associated With Disease, Injury, and Death Among Men Evidence and Implications for Prevention. In: *Dying to be men: psychosocial, environmental, and biobehavioral directions in promoting the health of men and boys*. 1st ed. Hoboken: Taylor and Francis; 2011.
28. Dolan A. 'Men give in to chips and beer too easily': How working-class men make sense of gender differences in health. *Health (London)*. 2014 Mar 1;18(2):146–62.
29. Lohan M. How might we understand men's health better? Integrating explanations from critical studies on men and inequalities in health. *Soc Sci Med* 2007 Aug;65(3):493–504.
30. Wong YJ, Ho M-HR, Wang S-Y, Miller ISK. Meta-analyses of the relationship between conformity to masculine norms and mental health-related outcomes. *J Counsel Psychol* 2017;64(1):80–93.
31. Courtenay W, McCreary DR. Masculinity and Gender Role Conflict How They Influence the Likelihood That

- Men Will Engage in Multiple High-Risk Behaviors. In: *Dying to be Men: Psychosocial, Environmental, and Biobehavioral Directions in Promoting the Health of Men and Boys*. 1st ed. Hoboken: Taylor and Francis; 2011.
32. Pirkis J, Spittal MJ, Keogh L, Mousaferiadis T, Currier D. Masculinity and suicidal thinking. *Soc Psychiatr Psychiatr Epidemiol* 2017 Mar 1;52(3):319–27.
 33. Levant RF, Wimer DJ. Masculinity constructs as protective buffers and risk factors for men's health. *Am J Mens Health* 2014;8(2):110–20.
 34. Rogers AA, DeLay D, Martin CL. Traditional masculinity during the middle school transition: associations with depressive symptoms and academic engagement. *J Youth Adolescence*. 2016 Jul 19;1–16.
 35. Leone JE, Rovito MJ, Mullin EM, Mohammed SD, Lee CS. Development and testing of a conceptual model regarding men's access to health care. *Am J Mens Health* [Internet]. 2017 Mar 1 [cited 2018 Sep 10];11(2):262–74. Available from: <https://doi.org/10.1177/1557988316671637>
 36. O'Neil JM. The Psychology of Men. *The Oxford Handbook of Counseling Psychology* [Internet]. 2011 Nov 25 [cited 2018 Sep 17]; Available from: <http://www.oxfordhandbooks.com/view/10.1093/oxfordhb/9780195342314.001.0001/oxfordhb-9780195342314-e-014>
 37. Dworkin SL, Treves-Kagan S, Lippman SA. Gender-transformative interventions to reduce hiv risks and violence with heterosexually-active men: a review of the global evidence. *AIDS Behav* [Internet]. 2013 Nov 1 [cited 2018 Jan 16];17(9):2845–63. Available from: <https://link.springer.com/article/10.1007/s10461-013-0565-2>
 38. Sloan C, Gough B, Conner M. Healthy masculinities? How ostensibly healthy men talk about lifestyle, health and gender. *Psychol Health*. 2010;25(7):783–803.
 39. Sloan C, Conner M, Gough B. How does masculinity impact on health? a quantitative study of masculinity and health behavior in a sample of UK men and women. *Psychol Men Masculin* 2014 Jul 21.
 40. de Visser RO, McDonnell EJ. “Man points”: masculine capital and young men's health. *Health Psychol* 2013 Jan;32(1):5–14.
 41. Kubzansky LD, Seeman TE, Glymour MM. Biological Pathways Linking Social Conditions and Health. In: Berkman LF, Kawachi I, Glymour M, editors. *Social Epidemiology*. Oxford University Press; 2014.
 42. Kubzansky LD, Winning A, Kawachi I. Affective States and Health. In: Berkman LF, Kawachi I, Glymour M, editors. *Social Epidemiology*. Oxford University Press; 2014.
 43. Matthews KA, Gallo LC, Taylor SE. Are psychosocial factors mediators of socioeconomic status and health connections? *Ann N Y Acad Sci* 2010 Feb 1;1186(1):146–73.
 44. McEwen BS. Protective and damaging effects of stress mediators. *New Engl J Med* 1998 Jan 15;338(3):171–9.
 45. Siegrist J, Marmot M. Health inequalities and the psychosocial environment—two scientific challenges. *Soc Sci Med* 2004 Apr;58(8):1463–73.
 46. Kristenson M, Eriksen HR, Sluiter JK, Starke D, Ursin H. Psychobiological mechanisms of socioeconomic differences in health. *Soc Sci Med* 2004 Apr;58(8):1511–22.
 47. Barnett RC, Hyde JS. Women, men, work, and family. *Amer Psychol* 2001 Oct;56(10):781–96.
 48. Payne S, Swami V, Stanistreet DL. The social construction of gender and its influence on suicide: a review of the literature. *J Men's Health* 2008 Mar;5(1):23–35.
 49. Månsson A, Lundin A. How do masculinity, paternity leave, and mortality associate? –A study of fathers in the Swedish parental & child cohort of 1988/89. *Soc Sci Med* 2010 Aug;71(3):576–83.
 50. Barnett RC. Chapter 5 - On Multiple Roles: Past, Present, and Future. In: Karen Korabik, Donna S. Lero and Denise L. WhiteheadA2 - Karen Korabik DSL, Denise L. Whitehead, editors. *Handbook of Work-Family Integration*. San Diego: Academic Press; 2008;75–93.
 51. Månsson A, Backhans M, Hallqvist J. The relationship between a less gender-stereotypical parenthood and alcohol-related care and death: A registry study of Swedish mothers and fathers. *BMC Pub Health* 2008;8(1):312.
 52. Månsson A, Lindholm L, Winkvist A. Paternity leave in Sweden—Costs, savings and health gains. *Health Pol* 2007 Jun;82(1):102–15.
 53. Nordenmark M. Multiple social roles and well-being a longitudinal test of the role stress theory and the role expansion theory. *Acta Sociologica*. 2004 Jun 1;47(2):115–26.
 54. Chandola T, Martikainen P, Bartley M, Lahelma E, Marmot M, Michikazu S, et al. Does conflict between home and work explain the effect of multiple roles on

- mental health? A comparative study of Finland, Japan, and the UK. *Internat J Epidemiol* 2004 Aug;33(4):884–93.
55. Harryson L, Novo M, Hammarström A. Is gender inequality in the domestic sphere associated with psychological distress among women and men? Results from the northern Swedish cohort. *J Epidemiol Community Health* 2012 Mar 1;66(3):271–6.
56. Harryson L, Strandh M, Hammarström A. Domestic work and psychological distress—what is the importance of relative socioeconomic position and gender inequality in the couple relationship? *PLoS ONE*. 2012 Jun 13;7(6):e38484.
57. Kalmijn M, Monden CWS. The division of labor and depressive symptoms at the couple level Effects of equity or specialization? *J Soc Personal Relat* 2012 May 1;29(3):358–74.
58. Bird CE. Gender, household labor, and psychological distress: the impact of the amount and division of household work. *J Health Soc Behav* 1999 Mar 1;40(1):32–45.
59. Bird CE, Fremont AM. Gender, time use, and health. *J Health Soc Behav* 1991 Jun;32(2):114–29.
60. Shelton BA, John D. The division of household labor. *Ann Rev Sociol* 1996;22:299–322.
61. European Foundation for the Improvement of Living and Working Conditions. Parental leave in European companies [Internet]. 2007. Available from: http://www.eurofound.europa.eu/sites/default/files/ef_files/pubdocs/2006/87/en/1/ef0687en.pdf
62. Looze ME de, Huijts T, Stevens GWJM, Torsheim T, Vollebergh WAM. The happiest kids on earth. gender equality and adolescent life satisfaction in Europe and North America. *J Youth Adolescence* [Internet]. 2018 May 1 [cited 2018 Oct 30];47(5):1073–85. Available from: <https://doi.org/10.1007/s10964-017-0756-7>
63. Backhans MC, Lundberg M, Månsdotter A. Does increased gender equality lead to a convergence of health outcomes for men and women? A study of Swedish municipalities. *Soc Sci Med* 2007 May;64(9):1892–903.
64. Osmani S, Sen A. The hidden penalties of gender inequality: fetal origins of ill-health. *Econom Hum Biol* 2003 Jan;1(1):105–21.
65. Caldwell JC. Routes to Low Mortality in Poor Countries. *Populat Develop Rev* 1986 Jun;12(2):171–220.
66. Marmot M, Atkinson T, Bell J, Black C, Broadfoot P, Cumberlege J, et al. Fair Society, Healthy Lives: The Marmot Review [Internet]. 2010. Available from: <http://www.ucl.ac.uk/ghcg/marmotreview/Documents/finalreport>
67. Shonkoff JP, Garner AS, Siegel BS, Dobbins MI, Earls MF, Garner AS, et al. The lifelong effects of early childhood adversity and toxic stress. *Pediatrics* 2012 Jan 1;129(1):e232–46.
68. Barker DJP. The developmental origins of adult disease. *J Am Coll Nutr* 2004;23(sup6):588S–595S.
69. Malhotra A, Schuler SR, Boender C. Measuring Women's Empowerment as a Variable in International Development [Internet]. World Bank; 2002. Available from: <https://siteresources.worldbank.org/INTGENDER/Resources/MalhotraSchulerBoender.pdf>
70. Carlson GJ, Kordas K, Murray-Kolb LE. Associations between women's autonomy and child nutritional status: a review of the literature. *Matern Child Nutr* 2014 Mar 1;2015;11(4):452–482.
71. Koenen KC, Lincoln A, Appleton A. Women's status and child well-being: A state-level analysis. *Soc Sci Med* 2006 Dec;63(12):2999–3012.
72. Homan P. Political gender inequality and infant mortality in the United States, 1990–2012. *Soc Sci Med* [Internet]. 2017 Jun 1 [cited 2018 Feb 28];182:127–35. Available from: <http://www.sciencedirect.com/science/article/pii/S0277953617302472>
73. Aizer A. Poverty, Violence, and Health. *Journal of Human Resources*. 2011 Summer;46(3):518–38.
74. Aizer A, Currie J. The intergenerational transmission of inequality: Maternal disadvantage and health at birth. *Science*. 2014 May 23;344(6186):856–61.
75. Hunnicutt G. Female status and infant and child homicide victimization in rural and urban counties in the U.S. *Gender Issues* 2007;24(3):35–50.
76. Wyndow P, Li J, Mattes E. Female empowerment as a core driver of democratic development: a dynamic panel model from 1980 to 2005. *World Develop* 2013 Dec;52:34–54.
77. Bolzendahl C, Brooks C. Women's political representation and welfare state spending in 12 capitalist democracies. *Social Forces*. 2007 Jun;85(4):1509–34.
78. Young FW. Structural pluralism and life expectancy in less-developed countries: the role of women's status. *Soc Indic Res* 2001 Aug 1;55(2):223–40.
79. Clark R, Peck BM. Examining the gender gap in life expectancy: a cross-national analysis, 1980–2005. *Soc Sci Quarter* 2012;93(3):820–837.

80. Young FW. The structural ecology of health and community [Internet]. Ithaca, NY: The Internet-First University Press; 2009. Available from: <http://dspace.library.cornell.edu/bitstream/1813/11809/1/Young%20Structural%20Ecology%20Health%20and%20Community.pdf>
81. Young FW, Lyson TA. Structural pluralism and all-cause mortality. *Am J Pub Health* 2001 Jan;91(1):136–8.
82. Sampson RJ, Raudenbush SW, Earls F. Neighborhoods and violent crime: A multilevel study of collective efficacy. *Science* 1997 Aug 15;277(5328):918–24.
83. Kawachi I, Berkman LF. Social Capital, Social Cohesion and Health. In: Berkman LF, Kawachi I, Glymour MM, editors. *Social Epidemiology*, 2nd Edn. 2nd ed. New York, NY, USA: Oxford University Press; 2014.
84. Roelfs DJ, Shor E, Davidson KW, Schwartz JE. Losing life and livelihood: A systematic review and meta-analysis of unemployment and all-cause mortality. *Soc Sci Med* 2011 Mar;72(6):840–54.
85. Reeves A, Stuckler D. Suicidality, Economic Shocks, and Egalitarian Gender Norms. *Eur Sociol Rev*. 2016 Feb 1;32(1):39–53.