The 1918/19 Influenza Pandemic & COVID-19 in Ireland and the UK

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Abstract: "Die Influenza-Pandemie 1918/19 und COVID-19 in Irland und dem Vereinigten Königreich«. The global spread of the coronavirus pandemic has prompted inevitable comparisons with the flu pandemic of 1918–1920. However, in order for such comparisons to be fruitful, it is necessary to acknowledge the similarities between the two outbreaks and their differences. This paper compares different aspects of the "Spanish" flu and coronavirus pandemics in Ireland and the UK during the two periods. The first part of the paper provides a general overview, taking account of the nature of the two diseases and the contexts in which they occurred. The following two sections explore the extent to which both outbreaks exposed underlying social and economic inequalities and the measures taken by central and local government, as well as civil society, to combat the spread of disease. The final section examines the extent to which both pandemics highlighted existing failures and sparked demands to "build back better."

Keywords: "Spanish" flu, coronavirus, epidemics, inequality, health policy, reconstruction.

1. Introduction

At some point during the autumn of 2019, a new and highly infectious virus began circulating in the Chinese city of Wuhan, but the emergence of this new disease was not acknowledged officially until the last week of December, by which time it had already begun to spread to other parts of the world (Calvert and Arbuthnott 2021, 32-3). We now know that the first COVID-related death occurred in the UK on 30 January 2020, even though this was only acknowledged publicly on 5 March (Calvert and Arbuthnott 2021, 51). In Ireland, the first case was detected formally on 26 February 2020 (Perumal,

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Curran, and Hunter 2020) and the first COVID-related death was announced on 11 March (Cullen 2020). By 30 September 2021, the total number of deaths that had been directly associated with COVID-19 across the whole of the UK and Ireland was 141,919 (UK Health Security Agency 2021; Health Protection Surveillance Centre 2021). These deaths represented just under three per cent of the officially-recognised global number of COVID-related deaths at that point (JHU-CRC 2021).

The coronavirus outbreak invited inevitable comparisons with the so-called "Spanish" flu pandemic, which occurred just over a century earlier. This was also a "novel" virus, which spread rapidly throughout the world, even without the additional "boost" supplied by the global aviation industry. It has been estimated that the total number of flu-related deaths across the whole of the UK and Ireland was likely to have been at least 245,000 (Johnson 2003, 137; Milne 2018, 81). The global number of deaths was likely to have ranged between 50 and 100 million (Johnson and Mueller 2002, 115).

As the World Health Organization (WHO 2020, 87-96) acknowledged, we can gain a lot by studying the experience of past epidemics but, in order to do so, it is important to recognise not only their similarities but also their differences. This paper compares the experiences of the 1918/19 flu pandemic and the current coronavirus pandemic in both Ireland and the UK through three different lenses. We begin by providing a general overview of the main similarities and differences between the two pandemics and the circumstances in which they occurred. Section two contains a more detailed analysis of the impact of social and economic inequalities on mortality from the two diseases and section three looks at the full range of both official and unofficial responses. The final section examines the extent to which either or both of the two pandemics influenced debates about the need for social reconstruction or "building back better" (OECD 2020).

2. Similarities and Dissimilarities

Since the start of the COVID-19 pandemic, historians have weighed in on the implications of past experience for the present. Those with expertise in the 1918/19 influenza pandemic were rapidly in demand with the media, which deemed the "Spanish flu" the obvious precedent thanks to its death count and global reach (Spinney 2020; Honigsbaum 2020; Bresalier 2020). Others (and not just those lacking such expertise) were more cautious, bridling at glib "lessons of history" exercises, and pointing out that all epidemics are distinct and of their time (Lachenal and Thomas 2020). From this early skirmish, fruitful outcomes soon emerged, in dialogue with the evolving pandemic. As the woeful under-preparedness of the US and UK became apparent, contemporary historians plausibly argued that path dependencies in public health

policies over recent decades were vital to understanding (Berridge 2020). When major cross-national disparities were recorded in mortality and morbidity rates, and linked to the stringency of state intervention, the evidence of similar causalities in 1918 became more salient (Markel 2020; Bristow 2020). As the longevity and grave social effects of the pandemic set in, so the ethnographic history pioneered by Charles Rosenberg, which seeks commonalities across all epidemics, became a focus of effective shared endeavour (WHO 2021; Rosenberg 1989). Historians therefore found a place in the public discourse.

With respect to origin and initial circulation the comparison is at once banal and opaque. Banal, because it is a statement of the obvious to say that both viruses spread through dense human networks composed of the vectors of globalisation: trade, communication, conflict, leisure, and sociability. Opaque, because in neither case is place or cause of origin certain. Three main theses attend the arrival of the 1918/19 influenza. US-centric analysis treats as decisive early public health reporting of a severe flu outbreak in a poultry farming region of Kansas (Barry 2004). This is held to have spread in early 1918 to a nearby army camp, from where troop movements of First World War recruits carried the virus to Europe. British scholars instead argue that the massive military base camp in Étaples, France, was the site of the jump from animal to human, possibly in 1917 (Oxford et al. 2005). The proximity of soldiers to live poultry, swine, and horses, coupled with leakage of stored phosgene and chlorine gases, provided optimal environmental conditions. Finally, unverified plague death reports from Northern China in late 1917 may actually have been the first sighting, in which case diffusion was likely through the Chinese Labour Corps, transported to the US and Europe (including to Étaples) to furnish ancillary manpower to Allied troops (Humphries 2014).

China also appears to be the primary locus of COVID-19's emergence. The most widely accepted account proposes a species jump of the coronavirus from horseshoe bats to a wild animal, probably a pangolin (possibly a mink or cat), which was then shipped to Wuhan as game meat for sale at a wet market (Joint WHO-China Study 2021). Others suspect it is more than coincidence that China's main centre of virological research is geographically proximate to the Wuhan wet market, that experimental mutation programmes using bat coronaviruses were conducted there, and that the first recorded deaths were located between the Institute and the market (Calvert and Arbuthnott 2021, 15-52; Joint WHO-China Study 2021, 118-20). Could there have been a laboratory leak? Virologists, often with vested interests, are divided on whether the genetic structure of SARS-CoV-2 bears evidence of human manipulation (Wade 2021). Meanwhile, no cognate wild coronavirus has yet been traced to validate the alternative "pangolin soup" thesis (Volpato et al. 2020). Nor have external experts been able to interrogate the records of the Wuhan

Virological Institute: Chinese state secrecy, compounded by American geopolitical sabre-rattling, further obscures the search. Determining whether the virus was natural misfortune or biosecurity disaster is perhaps immaterial though. Humanity has, after all, not yet proven capable of acting upon the obvious lesson of 1918/19, that war can be a crucible of devastating disease.

The aetiology and symptoms of the two viruses were alike to the extent that respiratory difficulties were common features leading to death. Patients in 1918/19 experienced the aching limbs and fever common to flu, with fatal outcomes typically due to secondary bacterial pneumonia, which occurred after three or four days. Death followed soaring temperature, delirium, fluid filling the lungs, and heliotrope cyanosis, a discolouration of the head and feet due to lack of oxygen (Honigsbaum 2009, 16; Ministry of Health 1920, viii-ix). COVID-19 fatalities took a longer course, beginning with common early symptoms including aching limbs, constant coughing, sore throat, and anosmia, followed by gradual worsening of respiratory capacity that became critical after about one week. If breathing did not respond to oxygenation therapy, death followed, typically between 12 and 18 days from onset (Zhou et al. 2020; Hawryluk et al. 2020).

There are of course other substantial differences between the two pandemics as well, relating to the greater sophistication of virology and vaccinology today and to the elaborate welfare states through which governments now manage the response. The identity of the 1918/19 influenza was not established contemporaneously (Humphreys 2018; Crosby 1989, 264-94). The filtration technology which distinguishes virus from bacterium was barely established, and initially scientists assumed that an influenza bacillus must be the causative agent (Wilkinson 1974). An ineffective vaccine was duly developed and deployed in some places (Eyler 2009). Only in March 1919 was laboratory infection using filter-passing agents achieved, thus demonstrating the viral cause. Nor was the zoonotic transmission of influenza yet understood, with the isolation of the H1N1 virus in swine and humans first accomplished in the 1930s, and avian to human zoonosis established only in 1967. Archaeovirological investigation, first involving the exhumation of flu victims buried in the Alaskan permafrost, and more recently the genetic sequencing of 1918 autopsy samples, led in the 1990s to firmer conclusions. The 1918 strain appears to have been a novel human influenza, H1N1, with avian flu-like features, rather than a reassortant virus (Taubenberger, Hultin, and Morens 2007).

By contrast, the causative virus of COVID-19 was rapidly isolated from early patients in Wuhan, and sequencing established its homology with the coronavirus responsible for the Asian SARS (Severe Acute Respiratory Syndrome) outbreak in 2002. These results were shared internationally in January 2020 and vaccine development began immediately, with that of Pfizer BioNTech

the first to receive validation from the World Health Organization (WHO) in December 2020, followed by Astra Zeneca (February 2021), then inter alia Moderna (April) and China's Sinopharm (May) and Sinovac (June); Russia's widely used Sputnik V was still awaiting approval on 13 October 2021. Production and administering then accelerated, with about 36% of the world's population (2.9 billion people) "fully vaccinated" (i.e., with two doses) by the middle of October 2021, albeit with great variations in levels of population coverage between, for example, United Arab Emirates (87%) and Portugal (86%) at one extreme and Cameroon (0.5%) and South Sudan (0.3%) at the other (JHU-CRC 2021). Social policies were also rapidly implemented, and although some were novel, such as digital surveillance technologies, national responses were generally path dependent extrapolations of existing welfare regimes. Typically, this meant types of "emergency Keynesianism" in highand middle-income countries, with tools such as income support, wage subsidies, furlough schemes, and cash payments (Béland et al. 2021). Variation in response also depended on political institutions (federalism, presidentialism, etc.), regime types (democratic, despotic, etc.) and state capacity (Greer et al. 2020). For example, China's authoritarian polity mobilised quickly, using existing bureaucratic systems successfully to impose strict lockdowns and population control (Mei 2020).

Although influenza and COVID-19 are different diseases, both diseases exhibited cyclical, or wave-like, features. In the UK, the first "wave" of pandemic influenza began in the summer of 1918, with a second and much larger wave in the autumn and a third wave towards the end of the following winter (Figure 1A). In the case of COVID-19, the first cases were recorded in the latewinter and spring of 2020, although it is difficult to form an accurate estimate of the true number of cases in the absence of effective testing. This was followed by a second wave in the autumn of 2020, sparked initially by a relaxation of lockdown arrangements followed by the emergence of a new variant, with a third wave in the autumn of 2021 (Institute for Government 2021; Parliamentary Papers 2021, paras. 133-4, 369). There were also two marked peaks in the numbers of deaths in the spring of 2020 and the winter of 2020/21. However, the link between infection and mortality appeared to have been broken by the introduction of a successful vaccination programme at the start of the new year (Figure 1B).

18.000 16.000 14.000 Number of deaths 12.000 10.000 8.000 6.000 4.000 2.000 0 23.10.1918 23.11.1918 23.09.2928 23.12.1918 23.01.1919 23.03.1919 23.02.1919 23.06.1918 Week commencing

Figure 1A Influenza Deaths, 23/6/2018 – 18-10/5/2019

Source: Parliamentary Papers (1920b, 78-80; Table X). For information on the monthly incidence of deaths in Scotland, see Parliamentary Papers (1919, Chart no. 1); and for Ireland, see Milne (2018, 61).

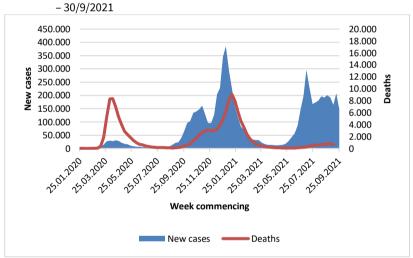
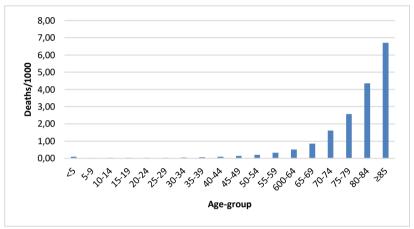


Figure 1B New Cases and Deaths From COVID-19: England and Wales, 25/1/2020

Source: ONS (2021a, 2021b).

One of the most obvious differences between the two pandemics concerns their impact on different age groups. As several contemporaries observed, influenza normally recruited the majority of its victims among the elderly (see, e.g., Parliamentary Papers 1920b, 8 and Figure 2A). From this point of view, one of the most frightening features of the "Spanish" flu pandemic was the fact that so many deaths were recorded among children and young adults (Figure 2B). In this respect, the age profile of COVID-19 deaths has much more in common with the normal pattern of flu deaths than with the pandemic of 1918/19. As we can see from Figure 2C, the COVID-19 pandemic has had a very minor effect on death rates at younger ages, with a much greater impact on those aged 60 and over (Figure 2C).

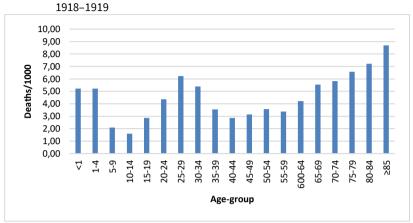
 $\textbf{Figure 2A} \mbox{ Age-Specific Female Death Rates from Influenza: England and Wales,} \\ 1914-1917$



Source: Parliamentary Papers (1920b, 8).

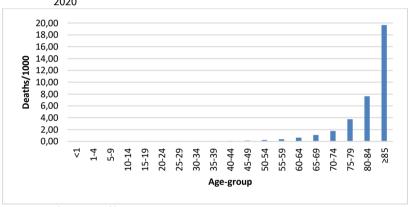
The data shown in Figure 2B differ from those shown in the Registrar-General's report. His figures were based on the number of deaths recorded in the final quarter of 1918 and were calculated by dividing the number of deaths by one-quarter of the estimated population figure (Parliamentary Papers 1920b, 8; see also Johnson 2006, 86). The current figures are based on the total number of deaths during the last three quarters of 1918 and the first quarter of 1919, divided by the estimated mid-year population for 1918. For comparable information on the agestructure of mortality in Scotland, see Parliamentary Papers 1919, 9, and Johnson 2004; and, for Ireland, see Milne 2018, 68.

Figure 2B Age-Specific Female Death Rates from Influenza: England and Wales,



Source: Parliamentary Papers (1920a; 1920b, 9).

Figure 2C Age-Specific Female Deathrates from COVID-19: England and Wales,



Source: ONS (2021a, 2021b).

These differences in the age-profile of mortality during the two pandemics have attracted considerable attention. In both cases, the high rates of mortality experienced by older age-groups are likely to reflect the fact that older individuals are more likely to experience comorbidities, such as pre-existing respiratory illness, obesity, and cardiovascular diseases, which lead to greater vulnerability (see section 2 below). However, the extra mortality experienced by young children and, especially, young adults, in 1918/19 has not yet been satisfactorily explained. Some writers have attributed this to the higher levels of economic activity and thus environmental exposure of this age group, including in war production and social service. Others speculated

that earlier influenza pandemics were decisive, either because previous exposure had conferred a degree of immunity on those over 60 or had "dysregulated" the immune systems of those who caught it as children, making them more vulnerable to a cytokine storm (Taubenberger and Morens 2006; Nickol and Kindrachuk 2019; Langford 2002; Shanks and Brundage 2012; Gagnon et al. 2013).

3. Inequality

Although a lot of attention has been paid to the peculiar age-structure of mortality in 1918/19, less attention has been paid to its socio-economic characteristics. These factors may of course be related, insofar as high levels of mortality among the fittest age-groups may have helped to divert attention from any greater susceptibility experienced by those living in the worst conditions. In Australia, the Railway Commissioners sought to dispel anxieties among tramway workers by explaining that "all sections of the community are liable to attack, and to approximately the same degree" (McCracken and Curson 2003, 120). Edwin Jordan (1927, 475) argued that, in the United States, "the rich died as readily as the poor" (cited in Crosby 1989, 227). These sentiments were echoed in the official report of the Registrar-General for England and Wales in 1920. He concluded that, so far as London was concerned, "the mortality of the late epidemic fell almost alike on the sanitarily just and on the unjust" and that there was "even less correlation of influenza mortality with wealth than [...] health" (Parliamentary Papers 1920b, 29).

However, even though some historians have continued to suggest that "the epidemic was remarkably democratic in its victims" (Tomkins 1992, 446), other writers have been more sceptical. As early as 1931, the US statistician, Edgar Sydenstricker (1931, 155), argued that "the lower the economic level, the higher [...] the attack rate," and these conclusions have been echoed, for different locations, by more recent commentators. McCracken and Curson (2003, 131) found that "while the epidemic affected all social groups [in the Australian city of Sydney; ...] working-class and blue-collar workers experienced the heaviest death rates." Echeverri (2003, 189) argued that "poverty was an aggravating factor during the pandemic" in Spain and Mamelund (2006, 933) found that mortality in two socially-contrasting districts of the Norwegian city of Kristiania (Oslo) was inversely related to social class and directly associated with levels of overcrowding. Zylberman (2003, 199) found little direct evidence of lower mortality in the wealthier districts of Paris, but

he argued that this was because any underlying differences were obscured by the impact of domestic service on residential living patterns.²

A number of writers have also revisited the statistics of mortality for the United Kingdom. In Dublin, Milne (2018, 69-76) found that mortality rates were at their highest among those who worked with the public, such as shop-keepers, police, medical workers, bank officials, and priests. Johnson (2006, 105-6) also reported that death rates were linked to occupational differences, although he highlighted the additional risks faced by "those whose work involved 'exposure to dirt and other respiratory risks." However, these occupational differences did not necessarily map onto conventional socio-economic hierarchies. Milne (2018, 71) concluded that "high death rates were not so much class-dependent as job-dependent," whilst Johnson (2006, 105) found that "while [...] there may be an element of class differential [... it] is not [...] particularly strong."

In the absence of clear evidence of a social class gradient in mortality, researchers have also examined geographical variations. In 1920, the Ministry of Health compared prewar death rates for the period 1911-1914 with influenza death rates during each of the three pandemic waves. They concluded that "the prewar standardised death rate is substantially correlated with the influenza death rate of the summer quarter, less closely associated with the influenza death rates of the subsequent quarters" (Ministry of Health 1920, 48). These conclusions have been partially reinforced by Pearce et al.'s (2011) analysis of the relationship between prewar mortality and pandemic mortality in 333 registration districts, but they also argued that pre-pandemic mortality was "predictive in all three waves" after "extract[ing] geographical variance" (92). They also hypothesised that this was related to underlying levels of deprivation.3 Bambra, Norman, and Johnson (2021) have suggested that similar factors are likely to account for the existence of a clear "north-south divide" in pandemic mortality across England and Wales and an association between flu mortality and population densities.

As Bambra, Lynch, and Smith (2021, 8-9) have argued, the social patterning of morbidity and mortality from infectious diseases reflects the interaction of four separate forces: exposure, transmission, susceptibility, and vulnerability. In the first instance, some people are more likely to be *exposed* to infections because of the environments in which they live and work and the people

This may also help to explain the absence of any clear relationship between wealth and mortality in London, where the proportion of domestic servants was used as a proxy to measure the affluence of the city's boroughs (Parliamentary Papers 1920b, 29).

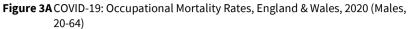
These findings may be open to question. In addition to controlling for geographical factors, Pearce et al. also introduced an interaction term to control for the possible effect of immunity on differences in mortality between the first and second waves. Their argument that prewar mortality rates reflected underlying patterns of social disadvantage was based on an analogy with the relationship between deprivation and mortality in the 1980s (see Eames, Ben-Shlomo, and Marmot 1993).

with whom they come into contact. The influence of these factors is likely to be compounded if they live or work in crowded or poorly-ventilated conditions, which make *transmission* more likely. Third, some people are more *susceptible* to infection because their immune systems have been compromised by psycho-social stress or by poor nutrition or living conditions. Finally, they can also be more *vulnerable* to infection if they have underlying health conditions.

During the COVID-19 pandemic, one of the clearest indications of differential exposure to infection was provided by the statistics of occupational mortality (Figures 3A and 3B). As in 1918/19, some people were more likely to become infected because they worked in industries that brought them into closer contact with other people, such as those employed in caring or service occupations, or because their jobs made it much more difficult to work from home, such as those employed in "elementary" occupations, such as cleaning, security, or shelf-stacking. The figures also show how the impact of these factors varied by sex, in that the occupational gradient in mortality was more marked among males than females, and overall male death rates were also higher.

As influenza and coronavirus are both droplet infections (Centers for Disease Control 2021), one might have expected them to be transmitted in similar ways. In 1918/19, it was widely expected that the pandemic would spread more rapidly in overcrowded households, but contemporary researchers found surprisingly little evidence of this (Ministry of Health 1920: 164-72).⁴ However, there is stronger evidence of a link between overcrowding and the spread of coronavirus. A review published in December 2020 concluded that "higher COVID-19 mortality rates in areas with higher levels of deprivation are partly related to household overcrowding," partly because overcrowded households were more likely to contain members of multiple generations and partly because closer proximity was likely to impose a higher "viral load" (Marmot et al. 2020, 28).

This does not mean that they therefore excluded overcrowding as a contributing factor. After acknowledging the problems caused by inadequate data, they concluded that "what has been adduced does no more than make it improbable that domestic overcrowding can be deemed a principal factor of the spread of epidemic influenza" (Ministry of Health 1920, 172; emphasis in original).



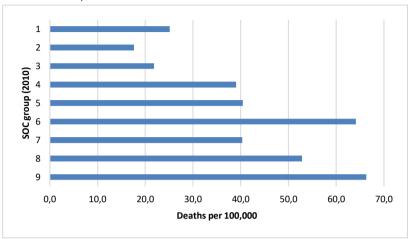
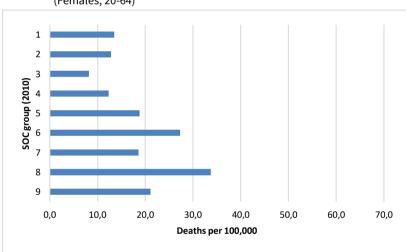


Figure 3BCOVID-19: Occupational Mortality Rates, England & Wales, 2020 (Females, 20-64)



Notes: Standard Occupational Classifications (SOCs) are as follows: 1: Managers, Directors and Senior Officials; 2: Professional Occupations; 3: Associate Professional and Technical Occupations; 4: Administrative and Secretarial Occupations; 5: Skilled Trades Occupations; 6: Caring, Leisure and Other Service Occupations; 7: Sales and Customer Service Occupations; 8: Process, Plant and Machine Operatives; 9: Elementary Occupations. Deaths were recorded during the period 9 March-28 December 2020.

Source: ONS (2021).

The COVID-19 pandemic has also exposed the ways in which some individuals – and groups of individuals – may be more susceptible to infection than others. This may be because they have lower levels of resistance, as a result of poorer nutrition, or because their immune systems have been compromised, possibly as a result of psychosocial factors (see also Bambra, Lynch, and Smith 2021, 32). In their review of the relationship between inequality and health during the pandemic, Marmot et al. (2020, 44) argued that "higher levels of stress" were among the factors contributing to disproportionate rates of mortality from COVID-19 among members of particular ethnic minorities.

During the early stages of the COVID-19 pandemic, a number of studies highlighted the high proportion of deaths occurring among individuals with pre-existing health conditions. As Marmot et al. (2020, 19) reported, "the average number of pre-existing conditions for deaths involving COVID-19 between March and June 2020 was 2.1 for those aged 0 to 69 years and 2.3 for those aged 70 years and over." The most common conditions were dementia, diabetes, hypertension, cardiovascular disease, and other chronic diseases such as chronic obstructive pulmonary disease and chronic kidney disease. Some of these diseases were associated with COVID-19 deaths because they were common within the age-groups at which COVID-19 deaths were most likely to occur but others, such as diabetes, also seem to have been aggravating factors in all age-groups. However, Marmot and his colleagues also observed that the prevalence of these underlying conditions was itself related to socio-economic factors.

Contemporary researchers have also paid particular attention to differences in mortality rates by ethnic group. As Marmot et al. (2020, 38-46) pointed out, members of particular ethnic minorities are more likely to be employed in occupations with high levels of COVID-19 exposure, and they are also more likely to live in overcrowded households and to have underlying health conditions. All of these factors are reflected in their mortality experience. These variations are apparent among both men and women, but they are especially prevalent among men. As we can see from Figure 4, the agestandardised mortality rates for males of Black African, Pakistani, and Bangladeshi origin were more than double the equivalent rates for those identifying as "white British."

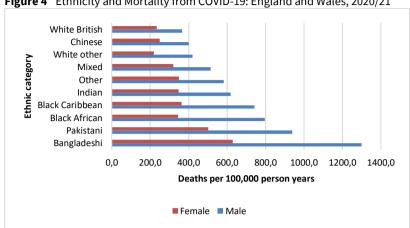


Figure 4 Ethnicity and Mortality from COVID-19: England and Wales, 2020/21

Notes: The data are age-standardised mortality rates for men and women aged 30-100 and refer to deaths which occurred between 24 January 2020 and 31 March 2021. Source: ONS (2021b), Updating ethnic contrasts in Deaths involving the coronavirus (COVID-19), England: 24 January 2020 to 31 March 2021.

As this account has suggested, one of the characteristic features which underpins the social patterning of COVID-19 mortality is the interaction of different forms of inequality. Bambra, Lynch, and Smith (2021, 7-8) have used the term "syndemic" to describe these interactions. As Singer et al. (2017, 941) explained, "syndemics involve the adverse interaction between diseases and health conditions of all types [...] and are most likely to emerge under conditions of health inequality caused by poverty, stigmatisation, stress or structural violence." In 2020 and 2021, the starkest illustration of the impact of these factors was provided by statistics which compared the incidence of mortality from COVID-19 with an index of multiple deprivation (Ministry of Housing, Communities and Local Government 2019). In 1918/19, contemporary researchers argued that there was no consistent relationship between "wealth" and mortality but, in 2020 and 2021, mortality among those living in the most deprived parts of England was more than double the equivalent rates for those living in the least deprived areas (Figures 5A and 5B).5

Similar results were also reported for Scotland. See Priestley 2021.

Figure 5A Age-Standardised Male Mortality Rates (COVID-19) by Deprivation Deciles: England, 2020

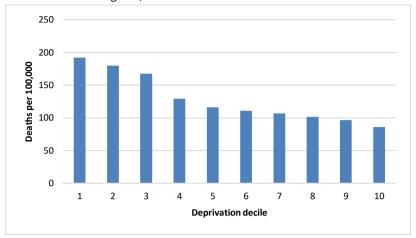
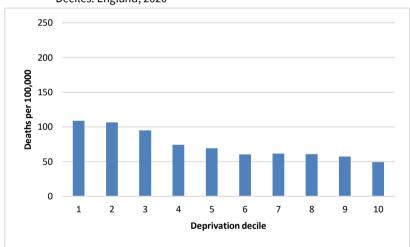


Figure 5B Age-Standardised Female Mortality Rates (COVID-19) by Deprivation Deciles: England, 2020



Notes: The graphs are based on the Index of Multiple Deprivation, which is used to rank areas on the basis of a range of deprivation indicators. The bottom ten per cent of areas ("1") are the most deprived and the top ten per cent ("10") the least deprived. The figures are based on the number of deaths associated with COVID-19 between 1 March 2020 and 31 July 2020.

Source: ONS (2020), Table 3.

As we shall see in the following section of this paper, one of the main differences between the experience of "Spanish" flu in 1918/19 and the more recent

experience of COVID-19 is that much more effort has been made during the current pandemic to suppress the circulation of the virus by social restrictions. These measures have undoubtedly helped to reduce the spread of infection, but they have also created new difficulties (see also Bambra, Lynch, and Smith 2021, 35-53). In the first place, they may have helped to exacerbate the impact of existing inequalities because it has often been easier for those living in more affluent circumstances to observe these restrictions because they enjoy better living conditions and are employed in occupations that facilitate remote working. However, the introduction of restrictions also increased levels of social isolation and many researchers have argued that this has not only created mental health problems but done so in ways that are themselves socially-patterned. As the authors of one official survey explained,

analysis has found that some groups have been more likely to experience poor or deteriorating [mental health] symptoms during the pandemic. These groups include women, young adults [...] adults with pre-existing mental or physical health conditions, adults experiencing loss of income or employment, adults in deprived neighbourhoods, some ethnic minority populations and those who experienced local lockdowns. (Public Health England 2021)

4. Management and Control

During 1918, the central authorities in both Ireland and Britain failed to produce a coherent policy for or official guidance on influenza. The central bodies who should have borne this responsibility were the Local Government Boards in England and Wales (LGB), Scotland (LGBS), and Ireland (LGBI). The LGB's Chief Medical Officer, Arthur Newsholme, acknowledged these shortcomings at the Royal Society of Medicine (Newsholme 1919). He admitted that more could have been done especially during the first wave of the pandemic. Although measures should have been taken to isolate the sick, prevent mass migrations, and reduce overcrowding, he believed that this was not an option due to the demands of war as "it was necessary to carry on and the relentless needs of warfare justified incurring the risk of spreading infections" (Eyler 1997, 268-9). It was therefore left to the local authorities (LAs) and their Medical Officers of Health (MOHs) to take responsibility for public health in their respective towns and cities and it was the MOHs in particular who were tasked with the production of an influenza policy for the management of the disease. This meant that it was very much at the discretion of the MOH as to what preventive measures were to be put in place in their towns. In Ireland, it was the Poor Law medical system of the union infirmary and dispensary districts - administered by Boards of Guardians (BOGs) - that was responsible for the administration of public medical care. The LGBI controlled the activities of the BOGs in relation to the administration of the dispensary medical system, union infirmaries, and fever hospitals. It also controlled the administration of the Public Health Acts by the rural, urban, and county councils (Parliamentary Papers 1920c, 4).

The first wave of influenza, which occurred in the summer of 1918, was considered to be a mild wave in both Britain and Ireland. Even though this outbreak was relatively mild, it was held responsible for approximately 12,000 deaths in England and Wales and a further 1,240 deaths in Scotland (Parliamentary Papers 1920b, 7; Ministry of Health 1920, 51) and caused havoc as businesses were forced to close or function on reduced staff, with transport and other services disrupted. Nevertheless, and maybe not surprisingly, the public health officials treated this outbreak like a seasonal influenza and, therefore, did not respond with preventive or indeed therapeutic recommendations for their citizens. However, as influenza returned for a second and third wave, the LA response through their public health and sanitary officials was more apparent and also more consistent as many of the LAs took similar preventive measures (Honigsbaum 2009, 35-150).

Most LAs throughout Britain and Ireland recommended the closure of schools and technical colleges (Johnson 2006, 129). However, this was only a recommendation and some Irish secondary schools, such as the Methodist College in Belfast and the Friends' School in Lisburn, remained open with tragic consequences (Marsh 2021, 232-4). In London, schools remained open unless they had to close due to staff absenteeism (Tomkins 1992, 448; Tanner 2002, 55). The closure and ventilation of cinemas concerned many LAs. Although the LGB did react in this instance by producing regulations on duration of performance and ventilation of premises, cinema closure was not endorsed (Johnson 2006, 127). Public notices were produced by LAs in some British and Irish towns, with advice taken from the memoranda sent out to MOHs by the LGB in late October 1918. These contained lists of precautions to avoid influenza. They recommended avoiding crowds, as well as thorough cleanliness, free ventilation, and isolation of patients, all placing responsibility for prevention of influenza on the individual rather than preventive measures that the LAs would take themselves (Marsh 2021, 251-3). Attendance at "wakes" was a big problem in Ireland.6 The gathering of people in confined crowded houses in both rural and urban areas of Ireland facilitated the spread of the virus and was of concern to public health officials throughout the country (Marsh 2021, 53-7). As a result, LAs in both Newry and Ballyclare produced public notices prohibiting wakes, as well as recommending the prompt burial of influenza victims. Again, the LAs depended on the LGBI

^{6 &}quot;Waking the dead" was an Irish tradition where family, friends and neighbours of the deceased would gather, usually in the deceased's house in advance of the official funeral and burial. This gathering would often be accompanied by "hospitality."

to be able to enforce these recommendations, but this authority was not forth-coming (Marsh 2021, 251-3).

Influenza was not made a notifiable disease anywhere in the United Kingdom (UK), and in Ireland the LGBI decided that influenza should not be added to the list of notifiable diseases as they believed, probably correctly, that it would not curtail its spread (Parliamentary Papers 1920c, xxxvii-xxxviii). Nevertheless, the LAs of Larne and Belfast made septic pneumonia notifiable during the second wave, mandating certain measures to be put into place regarding the notification, isolation, and treatment of the disease (Marsh 2021, 252). The wearing of masks in both Britain and Ireland was not a compulsory measure. Although some MOHs, such as James Niven in Manchester and Maxwell Williamson in Edinburgh (Van Hartesveldt 1992, 99; Scotsman 1919) advocated the use of masks, their use did not catch on more widely (Johnson 2006, 120). There is little evidence of widespread use of masks in Ireland (Marsh 2021, 142).

Vaccines too were problematic. Several British and Irish laboratories made vaccines, usually based on streptococcus, pneumococcus, and *Pfeiffer's Bacillus* (now known as a type of haemophilus influenzae bacillus or HIB); as these were bacteria (contemporary medical science understood influenza to be a bacterial rather than viral infection), their efficacy would have been limited, except possibly against secondary bacterial infections. The LGB made several alternative vaccines available but their use was limited due to lack of specificity (Johnson 2006, 145). In Ireland, the LGBI expressed doubt that inoculation with the proposed vaccines would confer immunity from an influenza attack (Parliamentary Papers 1920c, xxxviii). As a result, they did not advocate the use of vaccination or supply vaccines to BOGs for use in the treatment of influenza, but this may have had more to do with the cost of the vaccines than their effectiveness as a treatment.

Despite the high death tolls and levels of infection, people continued with their normal lives, attending work unless sickness prevented them from doing so. Schools, libraries, and other public buildings closed, especially during November 1918 (Marsh 2021, 165), but businesses such as factories only closed if forced to do so due to staff shortages and not as a preventive measure to stop the spread of disease (Marsh 2021, 253). There were shortages of medical personnel as many doctors and nurses were away at war, which meant that Irish BOGs struggled to find replacement nurses (Marsh 2011, 211-2). Many workhouse infirmaries were unable to recruit professional nurses and depended on the largesse of local ladies who volunteered their services to help (Marsh 2011, 212). In London, one LA reported that as most households were affected by influenza, they were unable to rely on the service of women who would normally have volunteered to help in this situation as they were nursing their own family members who were ill (Tomkins 1992, 450). Replacement doctors were also difficult to source and those physicians

remaining in the Irish Poor Law dispensary service struggled to cope with the huge numbers requiring their services; their medical officers paid in excess of 100,000 extra home visits compared to the year preceding the pandemic (Parliamentary Papers 1920c, xxvi; Marsh 2011, 208). This resulted in the forced closure of some dispensaries, leaving the local poor with no medical help to treat the disease (Marsh 2021, 253). Some union infirmaries were filled to capacity, unable to accommodate and treat influenza sufferers, so helping families in need of food, fuel, and nursing was not a consideration (Marsh 2021, 253). In Manchester, the Public Health Committee - aware of the gravity of the situation - supplied additional nurses, provided domestic assistance where needed in the city, and supplied food and coal for those people unable to provide the same for themselves due to influenza (Johnson 2006, 133). Similar action was taken in several London boroughs by councils that also recognised the limitations of just having preventive measures to deal with influenza (Ministry of Health 1920, 483; Tomkins 1992, 450). In Ireland, such provision was largely provided by philanthropic organisations: for example, in towns such as Cookstown, Newry, and Clones, middle class residents provided money via subscription lists as well as volunteering their services to help their neighbours (Marsh 2011, 217-9). In other towns such as Rathvilly, Co Carlow, and Straffan, Co Kildare, local landlords provided soup for the poor and sick, helping to save lives (Fennell and Bunbury 2006, 140; Milne 2018, 37).

The LGB provided little guidance to LAs on influenza apart from two memoranda produced in November 1918 (Johnson 2006, 128). They often shifted the responsibility back to the LA when queried about a proposed course of action. In both Britain and Ireland, the LGB and LGBI's main input concerned the sanctioning of remuneration – often not without a complaint – for temporary medical staff needed for the infirmaries and dispensary districts throughout the country (Tomkins 1992, 451; Milne 2018, 104). LAs in Britain and Ireland were unprepared and ill-equipped to respond to the scale of this public health catastrophe and depended on guidance from the LGB and LGBI, guidance that they seemed reluctant to provide. This resulted in a response that lacked any cohesion and consistency resulting in high death tolls throughout Ireland, England, Wales, and Scotland.

So how does this compare to the present ongoing pandemic of COVID-19? During the early years of the 21st century, the UK Government issued a series of plans to deal with possible pandemic outbreaks, but these were all based on the assumption that the "next" great pandemic would be an influenza pandemic, with the result that little attempt was made to anticipate the risks associated with other potentially pandemic diseases (Whitty 2018;

Parliamentary Papers 2021, paras. 20-2). This limitation was compounded – at least in the UK – by a scaling down of pandemic preparations in the years since 2016, when the last pandemic influenza simulation exercise – Operation Cygnus – occurred (Calvert and Arbuthnott 2021, 81-106). So, in early 2020, as news of the virus in the Wuhan region of China seeped out to the wider world, both governments watched but neither took any immediate action. On 23 January 2020, Wuhan province locked down to stop the spread of the virus and a week later, on 29 January, the first two COVID-19 cases in the UK were confirmed as Chinese nationals who were family members staying in a hotel in York (Calvert and Arbuthnott 2021, 64). In Ireland, the first diagnosed case of COVID-19 was that of a middle-aged woman who had returned from Northern Italy on 17 February 2020 (Perumal et al. 2020, 128). These cases heralded the beginning of the pandemic in both Ireland and the UK, but their governments were slow to respond to the threat of COVID-19.

There have been a number of important political changes in the UK and Ireland since 1918, not least the partition of Ireland in 1921 and creation of Northern Ireland (NI) and the Republic of Ireland (Ireland). Both countries introduced major health service reforms after the Second World War, with the passage of the National Health Service Acts in England and Wales and Scotland in 1946 and 1947, the Health Services (Northern Ireland) Act in 1948, and the introduction of the Irish Health Acts in 1947 and 1953 (Elder 1953; Webster 1988, 94-107; Considine and Dukelow 2009, 253-6). In recent years, there has been an enhanced level of national devolution within the UK with the establishment of the Welsh Assembly and the re-establishment of the Scottish Parliament, alongside the Northern Irish Assembly (Stewart 2004). This in itself has led to mixed messages on the restrictions for prevention of the spread of COVID-19 throughout the UK. The restrictions laid out by the British Prime Minister, Boris Johnson, only applied to England and were not necessarily the same as those issued by the First Ministers for Scotland, Wales, and NI (see, e.g., Parliamentary Papers 2021, para. 144). Each devolved government produced its own set of COVID-19 restrictions and lockdown plans, based on those for England but with differing timescales for going into and coming out of the first lockdown in 2020, as well as for reentering lockdowns in late 2020 and early 2021. On the island of Ireland, there are two jurisdictions of Ireland and NI. This created further confusion on rules around restrictions of movement during lockdowns and subsequent plans and timescales for lifting of these restrictions on the island of Ireland (see, e.g., McCormack 2020).

This is not to say that pandemic preparation plans focused exclusively on influenza. In February 2016, Public Health England carried out a simulation exercise in relation to a possible outbreak of MERS-CoV (Exercise Alice). A heavily-redacted copy of the ensuing report was finally released in October 2021 (McKee 2021b).

Unlike in 1918, central government rather than local authorities have been responsible for public health policy for the prevention of spread of COVID-19. The LAs in Scotland, Wales, and NI followed the rules and recommendations laid down by their respective executives. The overall message throughout Great Britain and NI especially during the first lockdown was "Stay Home - Protect the NHS - Save Lives" (Parliamentary Papers 2021, para. 144). In Ireland, there was a similar message: "Stay Home - Stay Safe - Protect each other" (Government of Ireland 2020). The main fear in the UK and Ireland was that their health services would be overwhelmed and unable to cope with the number of critical cases as had occurred in other European countries such as Spain, Italy, and France. In early March 2020, it was clear that the health services in these countries were struggling. Therefore, both the Irish and British publics were told to stay at home and only go out for essential purposes to protect their health services. In both Ireland and the UK, the first lockdown occurred towards the end of March 2020, During this lockdown, schools, universities, and businesses closed. Those who could work from home did so and those whose businesses closed were placed on furlough (UK Revenue and Customs 2020; Department of Social Protection 2020). All public gatherings were forbidden, cinemas and theatres were closed, sports events cancelled, church services were not allowed, and funerals took place but with minimal attendance (Parliamentary Papers 2021, paras. 75-162; Brennan 2021).

Public notices along with television and radio campaigns spread the public health message concerning COVID-19 to "Stay Home and Save Lives." These campaigns used concise, punchy language along with bright and eye-catching posters to spread the message to the public. The advice included keeping a social distance of two metres, not touching your face, coughing or sneezing into your elbow, washing your hands well and often, and using face coverings in enclosed spaces such as shops or on public transport (see, e.g., Government of Ireland 2020). As in 1918, these recommendations placed the responsibility firmly on the individual to keep themselves and more importantly others safe. The intention was to make the public aware of how the virus spread and what precautions they should take to avoid spreading or catching it.

The UK Government faced much criticism over its pandemic response. Early in the pandemic, the government was faced with a PPE crisis as there was an inadequate amount of PPE available to the NHS and social care providers. Pictures of NHS staff wearing bin bags as PPE appeared in the press and on social media, highlighting the urgent need for supplies (Press 2020). However, this was a global problem, so the race was on with other countries to buy sufficient supplies. The operation of the procurement process by the UK Government was astonishingly bad. Vast sums of money were spent buying supplies of PPE that were not fit for purpose. One of the main concerns was how that money was being spent. It appeared that some providers with political connections to the government but little or no experience of

supplying PPE were granted contracts (Calvert and Arbuthnott 2021, 288-9). Much of what was procured during 2020 was unusable and the government bought far more than was needed, without considering how it would be distributed (McKee 2021a).

Another failure by the government was the development of a test and trace service in the UK. Thirty-seven billion pounds of taxpayers' money was given to Serco and other private companies to run the test and trace service for England and Wales, which through a failure of design was unsuccessful (Parliamentary Papers 2021, paras. 163-245). Again, this was seen by many as "allocation of contracts to friends of the Conservative government" (Czauderna et al. 2021). Although each country eventually produced a "test and trace" app, there is no overall system for the four countries of the UK. The "NHS COVID-19" app eventually came into use in England and Wales on 24 September 2020, six months after the beginning of the first lockdown. The "Protect Scotland" app for Scotland was launched on 10 September 2020. In NI, the "StopCOVID NI" app was launched in July 2020 as was the Irish "COVID Tracker" app. The Scottish and Northern Irish apps were based on the same technology as that of the Irish app but were not initially compatible with the "NHS COVID-19" app (Digital Health 2021). This meant that the NI or Scottish apps were of no use in England and Wales and vice-versa.

Faced with these shortcomings, the UK Government has been anxious to refocus attention onto the early success of its COVID-19 vaccination programme (see, e.g., Topping 2021). In 2020-2021, several vaccines were developed. Pfizer/BioNTech, AstraZeneca, and Moderna vaccines were approved by the Medicines and Healthcare products Regulatory Agency for use in the UK between 2 December 2020 and 8 January 2021 (NHS 2021).8 Two doses of these vaccines were required to give a high level of efficacy of between 90 and 95 per cent. The rollout of the vaccination programme in the four UK Countries was achieved by using the organisational resources of the NHS rather than transferring this responsibility to the private sector as had been the case with the "Test and Trace" app. This enormous task has been delivered by NHS clinicians and administrators as well as many volunteers throughout the UK (Parliamentary Papers 2021, para. 372). By the end of September 2021, 85.5 per cent of people over the age of 12 had received a first vaccine dose and 78.6 per cent had been double-vaccinated (UK Health Security Agency 2021). Ireland's vaccine rollout was initially slower than that of the UK but, by 10 October 2021, 89.5 per cent of those aged 12 and over had received a first dose and 87.8 per cent had received a second dose (Health and Safety Executive 2021).

By the end of September 2021, the UK death toll was 136,399, including 119,187 deaths in England, 8,726 in Scotland, 5,923 in Wales, and 2,563 in Northern Ireland (UK Health Security Agency 2021). In Ireland, the death toll

The single-dose Janssen vaccine was approved for use on 28 May 2021 but has not yet been made available in the UK (19 October 2021).

was 5,249 (Health Protection Surveillance Centre 2021). The UK has one of the highest death rates in the world and Ireland had the highest rate of coronavirus infection in the week ending 10 January 2021 (O'Leary 2021). So why, with lockdowns in place and clear public information campaigns, was this the case? This could be due to a number of factors. Initial cases of COVID-19 in both Ireland and the UK were due to foreign travel. Despite this, both countries failed to impose (early) restrictions on foreign travel or to quarantine foreign nationals, either of which might otherwise have helped to curtail the spread of infection. There was also an unwillingness of central government in Ireland and the UK to lockdown sooner or more rigorously, while some think that restrictions may have been eased too soon. These factors, along with the UK Government initiative in August 2020 to encourage people to go back to work and "Eat out to Help Out" may have permitted the infection rates in both the UK and Ireland to continue to rise through late 2020 meaning that they had to introduce new lockdowns that started in December 2020 and continued through the first quarter of 2021 (Parliamentary Papers 2021, para.

During 2021, the rise of variants of the disease such as the Delta variant slowed down the various plans to come out of lockdowns but on 19 July 2021, England removed all lockdown restrictions to open up the country, in what became known as "freedom day." On the same day there was a surge of COVID-19 infections and both the Prime Minister, Boris Johnson, and the Chancellor of Exchequer, Rishi Sunak, had to self-isolate (James 2021). Although the majority of lockdown restrictions were subsequently lifted in Wales, Scotland, Northern Ireland, and Ireland as well, only time will tell if "freedom day" was a premature step or not.

Reconstruction

Outbreaks of epidemic disease have often been regarded as "shocks," which highlight limitations in existing social arrangements and prompt demands for far-reaching change. As James Kay (1832, 4) explained at the time of the UK's first cholera outbreak in 1832, "the introduction [...] of a singularly malignant contagious malady which [...] is chiefly propagated amongst those whose health is depressed by disease, mental anxiety or want of the comforts and conveniences of life has directed public attention to an investigation of the state of the poor." However, as this episode also demonstrated, there was no guarantee that reform would follow speedily. It took another 16 years for the UK Government to authorise the creation of a General Board of Health in England and Wales and a further 18 years before the "grammar of common sanitary legislation" acquired what the first Chief Medical Officer, Sir John Simon, called "an imperative mood" (Harris 2004, 104-13; Wohl 1983, 156).

In 1918/19, one of the most important ways in which the flu pandemic might have influenced subsequent events was through its impact on the struggle for Irish independence. Ida Milne (2018, 198-224) highlighted the ways in which Irish nationalists incorporated the pandemic into their campaigning activities by drawing public attention to the impact of influenza within nationalist communities, the treatment received by infected prisoners in Ireland, and the threat posed by influenza to the health of political leaders who had been interned in Great Britain. The inadequate response of the LGBI, which was "the most powerful organ of the British administration in Ireland" may have also helped to encourage nationalist sentiment (Milne 2018, 232). It is difficult to disentangle the impact of these factors from those of other historical events, but Milne's overall conclusion was that the incarceration of Irish nationalists came to symbolise "the bondage of their country" and, in that context, "the outbreaks of influenza among internees and political prisoners in British and Irish jails [...] enhanced the opportunity to publicise that bondage and to play on public opinion at a crucial time in Irish political history" (Milne 2018, 221).

The pandemic also raised questions about the adequacy of many of the UK's administrative structures and may therefore have contributed to processes of administrative reform at the end of the First World War. As Honigsbaum (1970, 50-1) showed, in England and Wales there was a longstanding campaign to replace the Local Government Board and the National Health Insurance Commission with a single Ministry of Health, and the flu pandemic may have provided an additional boost to this. The Irish Public Health Council published a damning critique of the LGBI in 1920. The report made no direct reference to the pandemic, but it highlighted many of the flaws which had also characterised the Board's response to the pandemic in the previous two years (Milne 2018, 233-6). The pandemic may also have contributed, either directly or indirectly, to the formation of the Scottish Board of Health in 1919, although this is an issue for further research.

The pandemic also prompted a number of broader reflections, although their impact on subsequent policy also requires further investigation. Although contemporary analysts failed to find any direct evidence of a correlation between economic or social conditions and the pattern of pandemic mortality, they had little doubt that pandemic influenza was, ultimately, a *social* disease. As two of the Ministry of Health's Medical Officers observed in 1920, "no technical device of the sanitarian, no resource of the laboratory can have

⁹ Hogarth (1987, 177) referred briefly to the fact that the demobilisation of Scottish GPs in November 1918 enabled them "to cope with the influenza pandemic that was sweeping the country" but made no reference to the pandemic as a factor in the formation of the Scottish Board of Health. Jenkinson (2002, 43) noted that "the path towards the creation of the Scottish Board of Health [...] was protracted" but made no reference to any role which the pandemic might have played in this.

any effect in the reduction of death and sickness from epidemic or even endemic disease at all commensurate with the consequences which must follow a *universal* improvement of the standard and conditions of life" (Ministry of Health 1920, 193; emphasis in original). They were also anxious to emphasise that this was an international as much as a national issue: "To realise that the material wellbeing of the inhabitants of a foreign – perhaps even a hostile – country is a pressing concern of ours […] is a hard truth. Any supranational organisation for the control of epidemics will need to face it" (Ministry of Health 1920, xix, 192).

The COVID-19 pandemic has also prompted a degree of soul-searching. During the early stages of the pandemic, several observers drew analogies with the sense of national emergency and solidarity associated with the Second World War. This was not only reflected in appeals to wartime songs, such as "We'll meet again" (BBC 2020a), but also to earlier proposals for social reform. In the first months of the pandemic, two social scientists, Richard Wilkinson and Kate Pickett (2020), cited Richard Titmuss's (1958) famous essay on war and social policy to show how great national emergencies could be a launching pad for more egalitarian policies. The social entrepreneur, Hilary Cottam (2020, 4), made repeated references to the wartime social reformer, William Beveridge, in her call for "the creation of a new social settlement one that can address the very different social, economic technological and ecological crises of today."10 The Leader of the Labour Party, Keir Starmer (2021, 5, 9), sought to invoke similar memories when he asserted that "modern Britain has always emerged from the most difficult periods [...] with a hunger to [...] create a better country" and that "it is impossible to live in this moment and not feel the winds of change blowing, just as they did in 1945 and

Many of these calls have been echoed in official statements and commitments. In April 2020, the First Minister of Scotland, Nicola Sturgeon, argued that "when things come apart, there is always the opportunity to put them back together differently" (Scottish Government 2020) and, in October 2020, the Welsh First Minister, Mark Drakeford, argued that "part of [our] response to the virus is the need to think and plan ahead" (Welsh Government 2020, 2). In March 2021, the UK Government issued its own plan to "build back better." The plan outlined a series of commitments to invest in infrastructure, skills, and innovation with a view to "level[ling] up the whole of the UK, support[ing] the transition to Net Zero [carbon emissions and] support[ing] our vision for Global Britain" (HM Treasury 2021, 13-4). The government also promised to devote particular attention to the reform of health and social care (HM Government 2021), although critics pointed out that the plan for social care

¹⁰ For references to Beveridge, see Cottam 2020, 5, 14, 23, 34, 37, 40.

seemed to be more concerned with capping the costs incurred by the better off than improving the service as a whole (Hansard 2021).

One of the main difficulties in assessing the impact of the flu pandemic on the development of social policy after 1918 is the fact that the pandemic occurred towards the end of the First World War and that, despite its enormous demographic impact, it may nevertheless have been overshadowed by the termination of hostilities (Johnson 2006, 180). Although there were many advocates for "reconstruction" in 1918, many others favoured a "return to normalcy," and this was reflected in the character of the government, which was returned to power after the 1918 General Election (Harris 2004, 180-1). The government's plans may also have been disrupted by the economic problems which affected many parts of the country from 1920 onwards, although its response to these problems might itself have been very different if the war had not occurred (Harris 2004, 202-3).

Although the coronavirus pandemic did not occur at a time when the UK was embroiled in a global military conflict, it did take place in the aftermath of a highly-bruising debate over the merits (or otherwise) of leaving the European Union (Sobolewska and Ford 2020), and many of the tensions that had been noted in 1918 between the advocates of change and the advocates of normality could also be recognised. Although the country's Prime Minister has often sought to distance himself from the austerity policies of the previous decade, his Chancellor is widely regarded as a strong advocate for fiscal orthodoxy (see, e.g., Bush 2021). One example of this has been provided by recent debates over the administration of universal credit and the provision of social security. As we have seen, one of the biggest risk factors associated with pandemic mortality has been deprivation but, in September 2021, the government confirmed that it intended to remove the additional funding offered to the poorest families during the pandemic, despite fears that this would exacerbate existing poverty levels (BBC 2021a).

The UK Government has also delivered mixed messages in its response to the need for international support. As we have already seen, the pace of vaccine roll-outs has varied enormously across the world. In 2021, the government sought to take a leading role in worldwide efforts to boost vaccine uptake in poorer countries (Johnson 2021). However, just over a month later, it confirmed its intention to renege on a previous manifesto commitment by reducing its commitment to foreign aid from 0.7 per cent of GDP to 0.5 per cent (Parkinson 2021). This was defended on the grounds that the pandemic had significantly reduced the size of the UK economy, even though that economy was still one of the largest in the world.

Conclusions 6.

The 1918/19 pandemic has now become famous as the "forgotten pandemic" (Crosby 1989). Laura Spinney (2018, 289-95) offered a number of explanations for this apparent act of collective (if not necessarily global) amnesia. 11 In the first instance, she suggested that major historical events only become "memorable" once a certain amount of time has passed. Secondly, most of those who contracted the disease experienced it in a relatively mild form and subsequently recovered (see also Honigsbaum 2014, 225-6). A third possibility was that many people wanted to forget the pandemic because they wanted to forget the powerlessness it had exposed. In contrast, Niall Johnson (2006, 180) argued that the pandemic was "forgotten" because of its scale. As Dr Rieux had suggested in Albert Camus's (2002, 31) famous novel, The plague, "a hundred million bodies spread through history are just a mist drifting through the imagination."

It is, of course, far too soon to say whether the coronavirus pandemic will be similarly forgotten. In contrast to the "Spanish lady," the measures taken to control the spread of infection have probably led to greater changes in people's lives and may therefore have a more lasting impact. However, as the experience of 1918/19 reminds us, many people have a strong desire to return to the comfort of familiar and well-trodden paths once the immediate danger has passed.

References

Bambra, Claire, Paul Norman, and Niall Johnson. 2021. Visualising regional inequalities in the 1918 Spanish flu pandemic in England and Wales. Environment and Planning A: Economy and Space 53 (4): 607-11. doi: 10.1177/ 0308518X20969420.

Bambra, Clare, Julia Lynch, and Katherine Smith. 2021. The unequal pandemic: Covid-19 and health inequalities. Bristol: Policy Press.

Barry, John. 2004. The Site of Origin of the 1918 Influenza Pandemic and Its Public Health Implications. Journal of Translational Medicine 2 (3). doi: 10.1186/1479-5876-2-3.

BBC. 2020a. The Queen's coronavirus address: 'We will meet again'. URL: https://www.bbc.co.uk/news/av/uk-52174772 (Accessed October 17, 2021).

Johnson (2006, 178) has argued that "the lack of collective cultural memory of the pandemic appears to be a particularly western phenonomen[on ...] in parts of Asia and Africa, there has been much greater retention of the pandemic in the collective consciousness [and] anecdotal evidence suggests that it is clearly in the public memory of Pacific island peoples, Indians, some African peoples and [...] some Canadian First Nations peoples.' He argued that "this is not so surprising when we recall that many of these areas endured massive mortality," even though he also suggested that the scale of mortality was one of the primary causes of western amnesia.

- BBC. 2021a. Covid-19: Universal credit £20 uplift ends, and 'Covid toe' explained. URL: https://www.bbc.co.uk/news/uk-58812609?at_medium=RSS&at_campai gn=KARANGA (Accessed October 17, 2021).
- Béland, Daniel, Bea Cantillon, Rod Hick, and Amílcar Moreira. 2021. Social Policy in the Face of a Global Pandemic: Policy Responses to the COVID-19 Crisis. Social Policy & Administration 55 (2): 249-260. doi: 10.1111/spol.12718
- Berridge, Virginia. 2020. History Does Have Something to Say. *History Workshop, Apocalypse Then and Now*, (May 20). https://www.historyworkshop.org.uk/history-does-have-something-to-say/.
- Brennan, Colin. 2021. A year with Covid in Ireland timeline of incredible lockdowns, cases and deaths, pub closures and disasters. *Irish Mirror*, March 1
- Bresalier, Michael. 2020. A Christmas Pandemic Like No Other? They Thought That In 1918. *Guardian*, December 18.
- Bristow, Nancy K. 2020. What the 1918 Flu Pandemic Tells Us About Whether Social Distancing Works. *Guardian*, April 29.
- Bush, Stephen. The growing gulf between Boris Johnson and Rishi Sunak should worry the Tories. *New Statesman*, 8-14 October 2021, 19.
- Calvert Jonathan, and George Arbuthnott. 2021. Failures of State The Inside Story of Britain's Battle with Coronavirus. London: Harper Collins.
- Camus, Albert. 2002. The plague. Harmondsworth: Penguin.
- Centers for Disease Control (CDC). 2021. Similarities and differences between flu and Covid-19. https://www.cdc.gov/flu/symptoms/flu-vs-covid19.htm# (Accessed October 17, 2021).
- Considine, Mairéad, and Fiona Dukelow. 2009. *Irish social policy: an introduction*. Dublin: Gill and Macmillan.
- Cottam, Hilary. 2020. Welfare 5.0: Why we need a social revolution and how to make it happen. UCL Institute for Innovation and Public Purpose
- Crosby, Alfred W. 1989. America's Forgotten Pandemic: The Influenza of 1918. Cambridge: Cambridge University Press.
- Cullen, Paul. 2020. Coronavirus: first death confirmed in Ireland as WHO declares a pandemic. *Irish Times*, March 11.
- Czauderna, Jack, Bing Jones, Shona Kelly, Nick Payne, Paul Redgrave, and Jenny Shepherd. 2021. Covid-19 test and trace scandal it's not too late to change the story. *British Medical Journal*, March 19.
- Department of Social Protection. 2020. COVID-19 Information for Employers and Employees. https://www.gov.ie/en/campaigns/4cf0e2-covid-19-coronavirus-information-for-employers-and-employees/?referrer=http://www.gov.ie/en/campaigns/4cf0e2-covid-19-coronavirus-information-for-employers-and-employees-test/ (Accessed October 17, 2021).
- Digital Health. 2021. NHS Covid-19 app compatible across Scotland along with others. https://www.digitalhealth.net/2020/11/nhs-covid-19-app-compatible-across-scotland-along-with-others/ (Accessed October 17, 2021).
- Eames, Margaret, Yoav Ben-Shlomo, and Michael Marmot. 1993. Social deprivation and premature mortality: regional comparison across England. British Medical Journal 307: 1097-1102. doi: 10.1136/bmj.308.6922.203c
- Echeverri, Beatriz. 2003. Spanish influenza seen from Spain. In *The Spanish influenza pandemic of 1918-19*, ed. Howard Phillips and David Killingray, 132-55. London: Routledge.

- Eyler, John. 1997. Sir Arthur Newsholme and state medicine, 1885-1935, Cambridge: Cambridge University Press.
- Eyler, John. 2009. The Fog of Research: Influenza Vaccine Trials During the 1918-19 Pandemic. *Journal of the History of Medicine and Allied Sciences* 64 (4): 401-428. doi: 10.1093/jhmas/jrp013.
- Elder, A.T. 1953. Health services of Northern Ireland. *British Journal of Preventive and Social Medicine*, 7 (3): 105-11. doi: 10.1136/jech.7.3.105.
- Fennell, James and Turtle Bunbury. 2006. *Vanishing Ireland*. Dublin: Hachette Books.
- Gagnon, Alain, Matthew Miller, Stacey Hallman, Robert Bourbeau, D. Ann Herring, David Earn, and Joaquin Madrenas. 2013. Age-specific Mortality During the 1918 Influenza Pandemic: Unravelling the Mystery of High Young Adult Mortality. Plos One 8 (8): e69586. doi: 10.1371/journal.pone.0069586
- Government of Ireland. 2020. Coronavirus COVID-19 Public Health Advice. https://www.hse.ie/eng/services/news/newsfeatures/covid19-updates/partner-resources/covid-19-stay-safe-protect-each-other.pdf (Accessed October 17, 2021).
- Greer, Scott L., Elizabeth J. King, Elize Massard da Fonseca, and Andre Peralta-Santos. 2020. The comparative politics of COVID-19: The need to understand government responses. *Global Public Health* 15 (9): 1413-1416. 10.1080/174416 92.2020.1783340
- Hansard. 2021. House of Commons Debates, series 6, vol. 700, 8 September 2021. https://hansard.parliament.uk/commons/2021-09-08/debates/E0259EE3-411F-4944-A3B6-B9AFF753B2AE/HealthAndSocialCareLevy (Accessed October 17, 2021).
- Harris, Bernard. 2004. The origins of the British welfare state: society, state and social welfare in England and Wales, 1800-1945. Basingstoke: Palgrave.
- Hawryluk, Iwona, Thomas Mellan, Henrique Hoeltgebaum, Swapnil Mishra, Ricardo Schnekenberg, Charles Whittaker, Harrison Zhu, et al. 2020. Inference of Covid-19 Epidemiological Distributions from Brazilian Hospital Data. *Journal of the Royal Society, Interface* 17 (172). doi: 10.1098/rsif.2020.0596.
- Health and Safety Executive. 2021. Vaccinations. https://covid19ireland-geohive.hub.arcgis.com/pages/vaccinations (Accessed October 17, 2021).
- Health Protection Surveillance Centre. 2021. National Statistics, Information & Data. https://covid-19.geohive.ie/ (Accessed October 17, 2021).
- HM Government. 2021. Build back better: our plan for health and social care, London: HMSO.
- HM Treasury. 2021. Build back better: our plan for growth. London: HMSO.
- Hogarth, James. 1987. General practice. In *Improving the common weal: aspects of Scottish health services, 1900-1984*, ed. Gordon McLachlan, 163-212. Edinburgh: Edinburgh University Press.
- Honigsbaum, Frank. 1970. The struggle for the Ministry of Health. *Occasional Papers in Social Administration* 37. London: G. Bell and Sons.
- Honigsbaum, Mark. 2009. Living with Enza. Basingstoke: Macmillan.
- Honigsbaum, Mark. 2014. A history of the great influenza pandemics: death, panic and hysteria, 1830-1920. London: Bloomsbury.
- Honigsbaum, Mark. 2020. 'A Once In a Century Pathogen': The 1918 Pandemic and This One. New York Review of Books, May 17.

- Humphreys, Margaret. 2018. The Influenza of 1918: Evolutionary Perspectives in a Historical Context. *Evolution, Medicine, and Public Health* 1: 219-229. doi: 10.1093/emph/eoy024
- Humphries, Mark Osborne. 2014. Paths of Infection: The First World War and the Origins of the 1918 Influenza Pandemic. *War in History* 21 (1): 55-81. doi: 10.1177/0968344513504525
- Institute for Government. 2021. Timeline of UK coronavirus lockdowns, March 2020 to March 2021. https://www.instituteforgovernment.org.uk/sites/default/files/timeline-lockdown-web.pdf (Accessed October 17, 2021).
- James, William. 2021. England's 'freedom day' marred by soaring cases and isolation chaos, *Reuters*. https://www.reuters.com/world/uk/pm-johnsonpleads-caution-freedom-day-arrives-england-2021-07-18/ (Accessed October 17, 2021).
- Jenkinson, Jacqueline. 2002. Scotland's health, 1919-48. Oxford: Peter Lang.
- JHU-CRC (Johns Hopkins University, Coronavirus Resource Center) Covid-19
 Dashboard. https://coronavirus.jhu.edu/map.html (Accessed October 17, 2021).
- Johnson, Boris. 2021. A billion vaccines, and education my agenda for a global recovery. https://www.gov.uk/government/speeches/boris-johnson-a-billionvaccines-and-education-my-agenda-for-a-global-recovery (Accessed October 17, 2021).
- Johnson, Niall. 2003. The overshadowed killer: influenza in Britain, 1918-19. In the Spanish influenza pandemic of 1918/19: new perspectives, eds. H. Phillips and D. Killingray, 132-55. London: Routledge.
- Johnson, Niall. 2004. Scottish flu: the Scottish experience of 'Spanish flu'. Scottish Historical Review 83 (2): 216-26. doi: 10.3366/shr.2004.83.2.216.
- Johnson, Niall. 2006. Britain and the 1918-19 influenza pandemic: a dark epilogue. London: Routledge.
- Johnson, Niall, and Juergen Mueller. 2002. Updating the Accounts: Global Mortality of the 1918-1920 "Spanish" Influenza Pandemic. *Bulletin of the History of Medicine* 76 (1): 105-115. doi: 10.1353/bhm.2002.0022.
- Joint WHO-China Study. 2021. WHO-convened Global Study of Origins of SARS-CoV-2: China Part. 14 January-10 February 2021.
- Jordan, Edwin. 1927. Epidemic influenza: a survey. Chicago: American Medical Association.
- Kay, James Phillips. 1832. The moral and physical condition of the working classes employed in the cotton manufacture in Manchester. London: James Ridgway.
- Lachenal, Guillaume, and Gaëtan Thomas. 2020. COVID-19: When history has no lessons. *History Workshop, Apocalypse Then and Now*, March 30, https://www.historyworkshop.org.uk/covid-19-when-history-has-no-lessons/
- Langford, Christopher. 2002. The Age Pattern of Mortality in the 1918-19 Influenza Pandemic: an Attempted Explanation Based on Data for England and Wales. *Medical History* 46 (1): 1-20. doi: 10.1017/S002572730006871X
- Mamelund, Svenn-Erik. 2006. A socially-neutral disease? Individual social class, household wealth and mortality from Spanish influenza in two socially-contrasting parishes in Kristiania, 1918-19. *Social Science and Medicine* 62: 923-40. doi: 10.1016/j.socscimed.2005.06.051.
- Markel, Howard. 2020. What History Revealed about Cities that Socially Distanced During a Pandemic. PBS News Hour, April 20 https://www.pbs.org/

- $new shour/health/what-history-can-teach-us-about-flattening-the-curve \ \ (Accessed July \, 8, \, 2021).$
- Marmot, Michael, Jessica Allen, Peter Goldblatt, Eleanor Herd, and Joana Morrison. 2020. Build Back Fairer: The COVID-19 Marmot Review. The Pandemic, Socioeconomic and Health Inequalities in England. London: Institute of Health Equity.
- Marsh, Patricia. 2011. "An enormous amount of distress among the poor": Aid for the Poor in Ulster during the Influenza Pandemic of 1918-19. In *Poverty and Welfare in Ireland*, 1838-1948, ed. Virginia Crossman and Peter Gray, 207-222. Dublin: Irish Academic Press.
- Marsh, Patricia. 2021. The Spanish flu in Ireland: a socio-economic shock to Ireland, 1918-1919. Basingstoke: Palgrave.
- McCormack, Jayne. 2020. Coronavirus: How lockdown rules differ in Northern Ireland. BBC News, 20 October 2020. URL: https://www.bbc.co.uk/news/uknorthern-ireland-52622127 (accessed 17 October 2021).
- McCracken, Kevin, and Peter Curson. 2003. Fly downunder: a demographic and geographic analysis of the 1919 epidemic in Sydney, Australia. In *The Spanish influenza pandemic of 1918-19*, ed. Howard Phillips and David Killingray, 110-31. London: Routledge.
- McKee, Martin. 2021a. The UK's PPE procurement scandal reminds us why we need ways to hold ministers to account. *British Medical Journal* 372: n639. doi: 10.1136/bmj.n639.
- McKee, Martin. 2021b. Exercise Alice: the UK government tested the response to a coronavirus, but why are we only discovering this now? *British Medical Journal*. https://blogs.bmj.com/bmj/2021/10/11/exercise-alice-the-uk-government-did-test-the-response-to-a-coronavirus-but-why-are-we-only-discovering-this-now/ (Accessed October 17, 2021).
- Mei, Ciqi. 2020. Policy style, consistency and the effectiveness of the policy mix in China's fight against COVID-19. *Policy and Society*. 39 (3): 309-325. doi: 10. 1080/14494035.2020.1787627
- Milne, Ida. 2018. Stacking the coffins: influenza, war and revolution in Ireland, 1918-19. Manchester: Manchester University Press.
- Ministry of Health. 1920. Report on the pandemic influenza 1918/19. Reports on Public Health and Medical Subjects 4. London: HMSO.
- Ministry of Housing, Communities and Local Government. 2019. English indices of deprivation 2019. https://www.gov.uk/government/statistics/english-indices-of-deprivation-2019 (Accessed October 17, 2021).
- Newsholme, Arthur. 1919. Discussion on influenza. *Journal of the Royal Society of Medicine* 12: 1-18. doi: 10.1177/003591571901200502.
- NHS. 2021. Coronavirus (COVID-19) vaccines. https://www.nhs.uk/conditions/coronavirus-covid-19/coronavirus-vaccination/coronavirus-vaccine/ (Accessed October 17, 2021).
- Nickol, Michaela, and Jason Kindrachuk. 2019. A Year of Terror and a Century of Reflection: Perspectives on the Great Influenza Pandemic of 1918-1919. *BMC Infectious Diseases* 19: 117. doi: 10.1186/s12879-019-3750-8
- O'Leary, Naomi. 2021. Covid-19 surge due to increased social mixing, says WHO's Mike Ryan. *Irish Times*, January 11.
- Organisation for Economic Co-operation and Development (OECD) 2020. Building back better: tackling coronavirus (Covid-19): contributing to a global

- effort. https://www.oecd.org/coronavirus/policy-responses/building-back-bet ter-a-sustainable-resilient-recovery-after-covid-19-52b869f5/.
- Office for National Statistics (ONS). 2020. Deaths involving COVID-19 by local area and socioeconomic deprivation: deaths occurring between 1 March 2020 and 31 July 2020. https://www.gov.uk/government/statistics/deaths-involvingcovid-19-by-local-area-and-socioeconomic-deprivation-deaths-occurringbetween-1-march-and-31-july-2020 (Accessed October 17, 2021).
- Office for National Statistics (ONS). 2021a. Coronavirus (COVID-19) related deaths by occupation, England and Wales. https://www.ons.gov.uk/peoplepop ulationandcommunity/healthandsocialcare/causesofdeath/datasets/coronavir uscovid19relateddeathsbyoccupationenglandandwales (Accessed October 17, 2021).
- Office for National Statistics (ONS), 2021b. Updating ethnic contrasts in Deaths involving the coronavirus (COVID-19), England: 24 January 2020 to 31 March 2021. https://www.gov.uk/government/statistics/updating-ethnic-contrasts-indeaths-involving-the-coronavirus-covid-19-england-deaths-occurring-24-janu ary-2020-to-31-march-2021 (Accessed October 17, 2021).
- Oxford, J. S., R. Lambkin, A. Sefton, R. Daniels, A. Elliot, R. Brown, and D. Gill. 2005. A Hypothesis: the Conjunction of Soldiers, Gas, Pigs, Ducks, Geese and Horses in Northern France During the Great War Provided the Conditions for the Emergence of the "Spanish" Influenza Pandemic of 1918-1919. Vaccine 23 (7): 940-945. doi: 10.1016/j.vaccine.2004.06.035.
- Parkinson, Justin. 2021. Government wins vote to lock in cuts to overseas aid. BBC News, 13 July 2021. https://www.bbc.co.uk/news/uk-politics-57826111 (Accessed October 17, 2021).
- Parliamentary Papers. 1919. PP 1919 x Cmd. 282 x, 1223. Report on the mortality from influenza in Scotland during the epidemic of 1918-19. London: HMSO.
- Parliamentary Papers. 1920a. PP 1920 Cmd. 608 x, 167. 81st Annual report of the Registrar-General of Births, Marriages and Deaths in England and Wales. London: HMSO.
- Parliamentary Papers. 1920b. PP 1920 Cmd. 700 x, 791. Supplement to the 81st Annual report of the Registrar-General of Births, Marriages and Deaths in England and Wales: Report on the mortality from influenza in England and Wales during the epidemic of 1918-19. London: HMSO.
- Parliamentary Papers. 1920c. PP 1920 Cmd. 578 xxi, 1. Annual Report of the Local Government Board for Ireland for the year ended 31 March 1919. London: HMSO.
- Parliamentary Papers. 2021. House of Commons Health and Social Care and Science and Technology Committees, Coronavirus: lessons learned to date, London: HMSO.
- Pearce, Dora, Paul K. Pallaghy, James M. McCaw, Jodie McVernon, and John D. Mathews. 2011. Understanding mortality in the 1918-19 influenza pandemic in England and Wales. Influenza and Other Respiratory Viruses 5: 89-98. doi: 10.1111/j.1750-2659.2010.00186.x.
- Perumal, Vi, T. Curran, and M. Hunter. 2020. First case of Covid-19 in Ireland. Ulster Medical Journal 89 (2): 128.
- Press, Claire. 2020. Coronavirus: The NHS workers wearing bin bags as protection. BBC News, April 5. https://www.bbc.co.uk/news/health-52145140 (Accessed October 17, 2021).

- Priestley, Alex. Health inequality and Covid-19 in Scotland. Scottish Government. https://www.gov.scot/publications/the-impacts-of-covid-19-on-equality-inscotland/ (Accessed October 17, 2021).
- Public Health England. 2021. COVID-19 mental health and wellbeing surveillance: report. https://www.gov.uk/government/publications/covid-19mental-health-and-wellbeing-surveillance-report (Accessed October 17, 2021).
- Rosenberg, Charles E. 1989. What Is an Epidemic? AIDS in Historical Perspective. Daedalus. 118 (2): 1-17. doi: 10.1353/bhm.2020.0082.
- Scotsman. 1919. Edinburgh Medical Officer and Masks: How and When to use them Scotsman
- Scottish Government. 2020. Covid-19: a framework for decision making. https://www.gov.scot/publications/coronavirus-covid-19-framework-decision -making/ (Accessed October 17, 2021).
- Shanks, G. Dennis, and John Brundage. 2012. Pathogenic Responses Among Young Adults During the 1918 Influenza Pandemic. Emerging Infectious Diseases 18 (2): 201-207. doi: 10.3201/eid1802.102042.
- Singer, Merrill, Nicola Bulled, Bayla Ostrach, and Emily Mendenhall. 2017. Syndemics and the biosocial conception of health. Lancet 389: 941-50. doi: 10.1016/S0140-6736(17)30003-X.
- Sobolewska, Maria, and Robert Ford. 2020. Brexitland: identity, diversity and the reshaping of British politics. Cambridge: Cambridge University Press.
- Spinney, Laura. 2018. Pale rider: the Spanish flu of 1918 and how it changed the world. London: Vintage.
- Spinney, Laura. 2020. The World Changed Its Approach to Health After the 1918 Flu. Will It After The COVID-19 Outbreak? Time, March 7.
- Starmer, Keir. 2021. The road ahead. Fabian Ideas 657.
- Stewart, John. 2004. Taking stock: Scottish social policy after devolution. Bristol: Policy Press.
- Sydenstricker, Edgar. 1931. The influence of influenza among persons of different economic status during the epidemic of 1918. Public Health Reports 46
- Tanner, Andrea. 2002. The Spanish lady comes to London: the influenza pandemic, 1918-19, London Journal 27 (2): 51-76. doi: 10.1179/ldn.2002.27.2.51
- Taubenberger, Jeffery K., and David M.Morens. 2006. 1918 Influenza: the Mother of All Pandemics. Emerging Infectious Diseases 12 (1): 15-22. doi: 10.3201/
- Taubenberger, Jeffery, Johan Hultin, and David Morens. 2007. Discovery and Characterization of the 1918 Pandemic Influenza Virus in Historical Context. Antiviral Therapy 12 (4): 581-91.
- Titmuss, Richard. 1958. War and social policy. In Essays on the 'welfare state', ed. Richard Titmuss, 75-87. London: George Allen and Unwin.
- Tomkins, Sandra. 1992. The failure of expertise: public health policy in Britain during the 1918-19 influenza epidemic. Social History of Medicine 5 (3): 435-54. doi: 10.1093/shm/5.3.435.
- Topping, Andrea. 2021. Cabinet minister refuses to apologise after report on UK Covid response. Guardian, October 12.
- UK Health Security Agency. 2021. Deaths in United Kingdom. https://corona virus.data.gov.uk/details/deaths (Accessed October 17, 2021).

- UK Revenue and Customs 2020. Claim for wages through the Coronavirus Job Retention Scheme. https://www.gov.uk/guidance/claim-for-wages-through-the-coronavirus-job-retention-scheme (Accessed October 17, 2021).
- Van Hartesveldt, Fred. 1992. Manchester. In *The 1918-1919 pandemic of influenza:* The urban impact in the Western World, ed. Fred van Hartesveldt, 91-103. Lampeter: Edward Mellen Press.
- Volpato, Gabriele, Michele F.Fontefrancesco, Paolo Gruppuso, Dauro M.Zocchi and Andrea Pieron. 2020. Baby Pangolins On My Plate: Possible Lessons To Learn From The COVID-19 Pandemic. *Journal of Ethnobiology and Ethnomedicine* 16 (19). doi: 10.1186/s13002-020-00366-4.
- Wade, Nicholas. 2021. The Origin of COVID: Did People or Nature Open Pandora's Box at Wuhan? *Bulletin of the Atomic Scientists*. May 5. https://the bulletin.org/2021/05/the-origin-of-covid-did-people-or-nature-open-pandoras-box-at-wuhan/ (Accessed July 8, 2021).
- Webster, Charles. 1988. The health services since the war. Vol.1. Problems of health care: the National Health Service before 1957. London: HMSO.
- Welsh Government. 2020. Covid-19 reconstruction: challenges and priorities. https://gov.wales/coronavirus-reconstruction-challenges-and-priorities (Accessed October 17, 2021).
- Whitty, Chris. 2018. Epidemics, pandemics and how to control them. London: Gresham College.
- Wilkinson, Lise. 1974. The Development of the Virus Concept As Reflected in Corpora of Studies on Individual Pathogens: Pt. 1. *Medical History*. 18 (3): 211-221. doi: 10.1017/s0025727300050997.
- Wilkinson, Richard, and Kate Pickett. 2020. Why coronavirus might just create a more equal society in Britain. *Guardian*, May 4.
- Wohl, Anthony. 1983. Endangered lives: public health in Victorian Britain. London: Methuen.
- World Health Organization (WHO). 2020. A coordinated global research roadmap. https://www.who.int/publications/m/item/a-coordinated-global-research-roadmap (Accessed November 30, 2021).
- World Health Organization (WHO). 2021 . History as a Partner in Public Health, Geneva: World Health Organization.
- Zhou, Fei, G Fan, Ting Liu, Ronghui Du, Guohui Fan, Ying Liu, Zhibo Liu, et al. 2020. Clinical Course and Risk Factors for Mortality of Adult Inpatients with COVID-19 in Wuhan, China: A Retrospective Cohort Study. *Lancet* 2020 (395): 1054–62.
- Zylberman, Patrick. 2003. A holocaust in a holocaust: the Great War and the 1918 'Spanish' influenza epidemic in Paris. In *The Spanish influenza pandemic of 1918-19*, ed. Howard Phillips and David Killingray, 191-201. London: Routledge.



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