Social Policies and Distributional Outcomes in a Changing Britain

What does Brexit mean for social policy in the UK?

An exploration of the potential consequences of the 2016 referendum for public services, inequalities and social rights

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The Social Policies and Distributional Outcomes in a Changing Britain research programme

The central objective of the SPDO research programme is to provide an authoritative, independent, rigorous and in-depth evidence base on social policies and distributional outcomes in 21st century Britain. The central question to be addressed is: What progress has been made in addressing social inequalities through social policies? The research programme is ambitious and comprehensive in scope, combining in-depth quantitative analysis of trends in social inequalities and social divides with detailed and systematic public expenditure and social policy analysis across ten major social policy areas over the period 2015-2020, together with broader reflection on the changing nature of social policies and distributional outcomes over the 21st century.

The programme of research adds to (and will reflect on) the previous Social Policies in a Cold Climate (SPCC) research programme covering the period 1997-2015. The SPDO programme will update, extend and broaden our analysis of public expenditure, social policies and distributional outcomes using the most recent datasets available, resulting in a unique evidence base on trends in social inequalities and social policies going back to 1997. Innovative extensions included within the SPDO research programme include: coverage of additional areas of social policy (e.g. physical safety/security and complex needs/homelessness); emphasis on the new context for social policy making (e.g. devolution and BREXIT); assessment of a broader range of multidimensional outcomes within our quantitative analysis; and the inclusion of additional breakdowns (e.g. migration status). This programme will also have a forward looking component, identifying the key challenges for social policy in the 2020s.

More information and other publications in the series are available at the project webpage: http://sticerd.lse.ac.uk/case/_new/research/spdo/default.asp

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Contents

Summary

On 23rd June 2016 the UK voted to leave the European Union. This paper explores the potential consequences of this decision for domestic social policy. Drawing on existing research and evidence, it sheds light on the many ways in which social policy in the UK has been affected by EU membership, and hence the likely implications and challenges arising from the decision to leave. We conceive social policy broadly, to encompass policies affecting employment, working conditions and living standards as well as the traditional pillars of the welfare state – health, education, housing.

The paper explores the consequences of Brexit understood in two ways – as the referendum result itself and as the eventual outcome of negotiations over the exit process and shape of future relations with Europe. Regardless of where the process ends up, the result changed British politics. The evidence the vote presented of deep disaffection with the status quo, the change of administration, and the time and resources focused on withdrawal negotiations and scenario planning have all had ongoing implications for social policymaking.

In terms of the eventual outcome, huge uncertainty remains and may well continue for years to come. Against this backdrop, the paper maps out the implications of likely alternatives, including a central scenario in which the UK leaves the single market and brings an end to the free movement of workers. We consider the implications under five broad headings i) the effects on the economy, with knock-on consequences for living standards and public spending; ii) withdrawal from European labour, social protection and human rights legislation; iii) the implications of an end to free movement for the social rights and entitlements of EU citizens in the UK and UK citizens in the EU; iv) implications of leaving the single market for public service delivery more widely; and v) implications of regaining control over resources and regulations, including those governing public procurement and industrial strategy.

We seek throughout to look for the opportunities as well as the risks of Brexit, and to highlight government action that could mitigate risks and allow opportunities to be maximised.

Our overarching conclusion is that Brexit poses major risks to social policy, and that these risks are larger the more distant the UK's future relationship with the EU. Social policy has been affected by the UK's membership of the EU in multiple ways – and hence will be deeply unsettled by leaving.

Evidence points towards lower economic growth under all Brexit scenarios, meaning lower living standards and less money for public services – the opposite of a 'Brexit dividend'. Slower growth could also result in downward pressure on workers' rights as the UK tries to find new ways to invite investment and boost employment. And a weaker economy will make the UK a less attractive place for the migrant workers we are likely to continue to need to keep our public services running.

Concerns about immigration were interpreted as being one of the key drivers of the referendum result, and ending the free movement of workers has been a red line for the UK government from early on. But a fall in EU migration also looks likely to have

significant negative consequences for social policy. EU migrants play an important role in the delivery of health and social care and in housing construction, so reduced migration will make it more difficult – and more expensive – to provide these services. The consequences for service delivery are likely to be much greater than any reduction in service demand. Aside from their role in delivering services, EU migrants are estimated to pay more into the exchequer in taxes than they take out in benefits and services, so reduced migration will have a negative effect on public finances. And evidence does not suggest there will be significant compensatory effects on the wages of UK-born workers as a result of reduced competition.

Wider losses associated with leaving the single market include, of course, the freedom to live and work in the EU with security of access to health and other social provisions, as well as access to healthcare in other Member States for UK citizens travelling as tourists or as patients looking for quicker or better treatment. The loss of the Charter of Fundamental Rights will weaken human rights protection, and leave rights protected in domestic law, such as those currently covered in the Equality Acts, at risk because they are not constitutionally protected. New lines of inclusion and exclusion are likely to emerge within as well as between the categories of the UK, EU and non-EU citizen, with inequalities not only in principle but also in practice in the reality of access to social provisions. Universities stand to lose access to funding and EU-wide collaborations, and will face a smaller pool of talent for research and teaching staff; between them these developments may damage the long-run reputation of higher education in the UK. And there are particular risks associated with a no-deal outcome, beyond those that will operate through the effects on the economy, including risks to food security and to access to medicines and medical treatment.

Some of these outcomes can be seen as the democratic effect of bringing decision-making back to Westminster: for example, the UK will no longer have employment protection legislation imposed by Brussels if this is not what the British electorate would vote for. But it is difficult to imagine that voters in the referendum had in mind the scale and breadth of some of the less direct effects.

On the positive side, Brexit may lead to a fall in the price of housing by reducing demand from overseas investors (there is some evidence that it has already done so), which could improve affordability and make home-ownership possible for more first-time buyers. A shrinking in the size of the financial sector could ultimately encourage a rebalancing towards other industries, via a lower value of sterling. There are some indications that we may end up a slightly less unequal country, albeit a poorer one, though in part these indications come from studies that predict the loss of higher paid and more secure jobs, including for men with specific skills but few formal qualifications working in manufacturing. There could be opportunities for more and better employment for UK-born youngsters, filling roles in health care, for example, currently done by migrant workers. But this will only be possible with the necessary investment in training.

While effects on relative poverty have been projected to be small for most Brexit scenarios, there are a number of ways in which the more vulnerable may be most affected. Groups at particular risk include those in receipt of frozen cash benefits as inflation rises; those with fewer skills, who are less able to navigate industrial restructuring; those working long hours or in precarious employment, who have been beneficiaries of EU employment legislation; those unable to afford private health or social care to allow them to avoid waiting lists and a poorer service if there are staff shortages; and EU migrants with a right to permanent residence but not the knowledge or evidence to complete the paperwork.

Some of the potential downsides of Brexit could be overcome with vigorous compensatory investment and redistribution by the UK government. Investment is needed in education and training to help UK youngsters fill roles in health care. More resources must be identified to pay for public services as costs rise; for example, wages in social care will need to rise to attract UK workers away from retail and other sectors. And a major strategy for regional and industrial investment is essential. In the immediate term, a small move that would have an important effect would be to end the freeze on working age benefits and return to uprating them with inflation, to ensure that those in receipt of benefits are not left in increasingly difficult circumstances as prices rise due to currency depreciation. The challenge, of course, is that all these actions will be made difficult by the constraints that Brexit will place on public finances as the economy slows.

The rest of this summary sets out the main conclusions from each section of the paper.

Political consequences

The referendum had clear and immediate consequences for British politics, leading to a change in Prime Minister and later the loss of the Conservative majority in Parliament. At least in part influenced by the message of disaffection seen to be contained in the high Leave vote, Theresa May brought a new rhetoric to the Premiership, with a focus on injustice and social mobility replacing the austerity agenda of the Cameron-Osborne era. In both housing and education the new leadership sought to mark a clear break with the policies of its predecessors. Yet overall substantive policy change was limited, no doubt in part because of the time and resources that Brexit has demanded of ministers and civil servants. Some policies in need of urgent attention and reform – notably Universal Credit – appear to have suffered from these constraints on capacity.

By refocusing attention on the extent of social and geographical inequalities and divisions, Brexit could yet have positive consequences for the politics of social policy in the longer-term. In principle, it could also allow space for devolved authorities to exercise more control and negotiate new powers. In practice, in the short-term, devolution appears to have stalled rather than moved forwards – also victim to the overwhelming focus on Brexit, and/or to the loss of George Osborne as champion. A plausible medium-term outcome is an increased divergence in social policy between England and Scotland, but the eventual break-up of the UK remains a serious possibility, especially under harder forms of Brexit.

Meanwhile, the referendum result may have changed national political environment for the worse, legitimating the expression of racial and ethnic tolerance. The result may also have lasting consequences for voting allegiances: support for remain and leave cuts across traditional party lines, perhaps heralding a long-term realignment in party loyalty, which could in turn affect party positions on social policy issues, though in ways that are difficult to predict. Tensions within the political parties could conceivably lead to splits in one or both of the main parties, presaging a shake-up in the party system.

Economic consequences

In the short term, Britain is already worse off in economic terms as a result of the referendum: growth has fallen relative to plausible counterfactuals, likely due to a combination of business uncertainty and the inflation caused by currency depreciation, which has squeezed consumer spending. Higher inflation has been particularly problematic for those in receipt of working-age benefits, because of the cash freeze on these benefits since 2015. However, unemployment has continued to fall.

Looking forward, there is a strong consensus among economists that Brexit will leave the UK poorer overall in the medium-term, with the size of the effect depending on the nature of future trading arrangements with the EU. If correct, the consequences will include lower average living standards and less money for public services, with the loss of tax revenue easily outweighing the gains from reduced contributions to the EU budget: there is no 'Brexit dividend'). A 'no deal' Brexit would be expected to have the most negative medium-term economic effects, and would also cause immediate disruption that is hard to assess. One anticipated effect of failure to reach a deal is on food security.

There are divided projections on which regions of the country will be most affected, but either way richer regions in the south are likely to be in a better position to shoulder the burden more easily, because they are starting from a stronger position and because the diversity and flexibility of the capital's economy should allow a quicker recovery, as happened after the 2008 financial crisis. More important than regional differences appear to be differences by gender and education level, with men, and especially lower-educated men, most exposed. Older men with specific skills working in relatively well-paid jobs in process, plant and machine operative occupations have been found to be at highest risk. There may be potential positives from a reduction in the size of the financial sector in London – less pressure on London's housing and a permanently weaker currency, which could encourage a rebalancing of the economy towards other industries in different parts of the country. Overall the UK will almost certainly end up poorer, though perhaps a little less unequal.

Consequences for human rights protection and workers' rights

When the UK leaves the EU it will no longer be subject to the Charter of Fundamental Rights enforced by the Court of Justice of the European Union. While the UK will still have certain rights protected in domestic law, i.e. the Equality Acts (2006 and 2010), there will be important gaps, such as the freestanding right to non-discrimination, the rights of the child and the right to dignity, which common law is unlikely to fill. Furthermore these laws can be amended; in the absence of a UK constitution they are not constitutionally protected.

After leaving the EU, the UK will still be subject to the European Social Charter (though in practice there are not strong mechanisms for enforcement) and the European Convention of Human Rights enforced by the European Court of Human Rights, though this only covers civil and political rights and offers weaker remedial mechanisms than was made available by the Charter of Fundamental Rights. As well as gaps in rights and weaker legal protection, UK citizens are at risk of missing out on any future progress made by the EU in relations to rights.

There is nothing inevitable about Brexit leading to fewer rights, and proposals have been put forward to try to ensure they are protected going forward, including writing the protection of workers' rights into trade deals; using a formulation of the mirror principle to ensure UK rights legislation keeps up with EU advances; and new legislation to protect existing rights from being easily amended. However, the political and economic context provide reasons for concern that in practice there will be downward pressure after Brexit, especially on workers' rights. In the past UK governments have pushed back against regulations on working time and the rights of part-time and agency workers. Taking back control may in this case mean diluting protection, especially given the need to attract inward investment once outside the EU. Workers' rights are also likely to be affected by trade agreements. Commitment to matching EU social and employment rights could very well be a condition of a close trade relationship with the EU. But if such an arrangement is not reached, rights might become vulnerable in attempts to secure trade deals with other countries.

Entitlements to settlement and social provisions

Post-Brexit entitlement to settlement and social provisions is likely to be complex for EU citizens in the UK and UK citizens in other EU countries. New lines of inclusion and exclusion may emerge. For example, UK nationals in the UK moving to another EU country after Brexit may find themselves no longer entitled to social security provision in that EU country, while UK nationals legally residing in an EU country before Brexit may retain entitlements even if they move to a different EU country. A potential positive consequence, at least for those EU/UK citizens residing in UK/EU countries prior to exit day, is that the process for applying for access to permanent residence and the social benefits that come with this has become less onerous. By facilitating access to permanent residence, EU nationals already in the UK will, in principle, be *less* likely to be excluded from social benefits and healthcare than without Brexit, especially given the increasingly restrictive approach that was in place prior to the referendum. However, migrants who do not know about the need to apply for residence, who consider themselves ineligible, who need others to apply on their behalf (e.g. because they are children), or who find it harder to compile the necessary evidence of living in the UK for the required period, may end up losing out. The recent experience of members of the Windrush generation of Caribbean migrants provides an illustration of the consequences this could have for individuals further down the line.

For EU/UK citizens moving after the Brexit transition period, there is continuing uncertainty and complexity regarding entitlements. But if post-Brexit migration policy for EEA migrants is based on existing policy for non-EEA migrants, as currently seems likely, it points up new divisions in security of status and social rights between higher-skilled and lower-skilled migrants.

Consequences for public services

While there is no certainty about what future immigration policy will look like after Brexit, migration from the EU is already falling, and it is widely accepted that numbers will fall further if and when the UK leaves the single market. Such a reduction is likely to have a much deeper impact on the delivery of high quality services than on the demand for them. Under a range of assumptions, EU migrants are found to make a net contribution to public finances, paying more in taxes than they take out in benefits or use in services. At the same time, EU migrants form a significant proportion of the workforce in health, social care and higher education, and also make up a large share of construction workers, with implications for house building.

Having fewer EU nationals to do these jobs could have positive consequences in opening up more opportunities for UK workers – more academic positions for UK PhDs, more chances for UK-born children to become doctors and nurses. But it would require increases in investment in training, especially for health professionals; currently the UK free-rides on human capital costs borne by other EU member states. It would also entail more generous funding to attract UK workers to lower-skilled jobs such as in social care. Existing shortages of health professionals alongside recent cuts in training budgets raise questions about the likelihood of this happening, especially given the greater fiscal pressures that would accompany a slower-growing economy and a drop in migrants as net contributors.

Beyond the loss of free movement, there are wider implications of leaving the single market, especially for the health and higher education sectors. For health, patients are likely to face poorer access to new medicines in the long-term if the UK fails to remain a member of the European Medicines Agency. Single market exit will also mean more limited access to healthcare for UK citizens in EU countries, whether they are there as overseas residents, tourists falling ill, or UK-based patients looking for the best treatment options. And there are immediate concerns about the impact of a 'no deal' Brexit on access to medicines and medical equipment.

For universities, Brexit could mean the loss of access to EU funds and cross-national collaborations, as well as a smaller pool of talent for research and teaching staff; between them these developments could damage the quality of research produced in UK universities and eventually the reputation of UK higher education.

Taking back control

The effects of Brexit on economic growth and therefore tax receipts are expected to more than cancel out UK net payments to the EU, and are likely to eat into gross payments, including resources currently returned from Brussels through European Structural and Investment (ESI) funds and agricultural subsidies. This point aside, gaining more control over these resources should in principle allow money to be better targeted to domestic priorities, with more regional control and less administrative red tape. In practice, however, withdrawal may end up meaning less money for regional development and a weaker focus on reducing inequalities. EU regional policy has been argued to have a stronger social justice focus than UK equivalents, while ESI funds have also had the benefit of being a long-term stable source of funding not subject to fluctuations in political interest in regional policy, or to domestic pressures on funding, as during the peak austerity years.

With regards to state intervention in the economy, some policies will in principle become possible which are currently outlawed – including full-scale nationalisation of the railways, some forms of targeted industrial subsidy, and some public procurement approaches, such as using only British steel or imposing pay ratios on contracted companies. Brexit may also offer an opportunity to limit the extent of competition involving private providers in the NHS in England.

However, a wide range of actions are allowed within the EU to support national industries and local suppliers, and to date the UK has made less use of these abilities than some other Member States, casting doubt about how different British policy will be on the outside. In some areas, such as the imposition of competitive tendering in the rail industry, and the insistence on competition between providers where there is a purchaser-provider split in health care, EU policy is adopting or reflecting practices that have been pursued unilaterally in the UK. Furthermore, it is not clear that the UK will in any case have full freedom to make its own decisions, even if the UK leaves the single market. Accepting EU competition laws may well be a condition of an EU-UK trade deal, and while the NHS secured exemptions from a further opening to competitive pressures in the EU-USA negotiations over the Transatlantic Trade and Investment Partnership, it may still find itself vulnerable in negotiations between the UK and the US.

Introduction

On June 23 2016 the UK held a referendum on its membership of the European Union. The resulting 52-48 majority in favour of leaving the EU came as a shock to bookmakers, political pollsters and to the government, who had made no contingency plans at all for the event of a Leave vote (House of Commons Foreign Affairs Committee, 2016). The aftermath of the referendum and the complexities of extricating Britain from membership while negotiating future trading and wider arrangements with the EU have dominated British politics ever since and have already had significant economic and social consequences. Looking ahead, the outcome of the negotiations is likely to shape many aspects of life in Britain for a generation to come.

This paper focuses on the consequences of the referendum result for social policy in the UK (see Hantrais, 2019 for analysis of what Brexit may mean for social policy in the EU). We conceive social policy broadly, to encompass policies affecting employment, working conditions and living standards as well as the traditional pillars of the welfare state – health, education, housing. Drawing on existing research and analysis, the paper seeks to map out the multiple ways in which these aspects of life in the UK are affected by EU membership, and hence the likely implications of the decision to leave.

The paper forms part of a much larger research programme, 'Social Policies and Distributional Outcomes in a Changing Britain' (SPDO), which will combine systematic public expenditure and social policy analysis across ten major social policy areas with quantitative analysis of trends in outcomes for different groups, resulting in a unique evidence base on trends in social policies and social inequalities in 21st century Britain. The current paper provides context for this programme by enhancing understanding of a key factor shaping the backdrop for social policy making in the coming years. At the same time, the paper seeks to contribute to wider public debate about the potential effects of Brexit.

We understand 'Brexit' in two ways, and seek to explore the implications of both – Brexit as the referendum result itself, and Brexit as the eventual outcome of negotiations over the exit process and the shape of future relations with Europe. Regardless of where the process ends up, the result changed British politics. The evidence the vote presented of deep disaffection with the status quo, the change of administration, and the time and resources focused on withdrawal negotiations and scenario planning have all had ongoing implications for social policymaking, and these are explored in the first part of the paper. We also consider the short-term economic consequences of the referendum.

The bulk of the paper is focused on the longer-term effects of life outside the European Union. Given the ongoing uncertainty about future UK-EU relations – uncertainty that may continue for years – we consider the implications of the most likely options, including a central scenario in which the UK leaves the Single Market and ends the free movement of workers. We organise this discussion into five broad areas: i) the effects on the economy, with knock-on consequences for living standards and public spending; ii) the implications of withdrawal from European labour, social protection and human rights legislation; iii) the implications of an end to free movement for the social rights and entitlements of EU citizens in the UK and UK citizens in the EU; iv) implications for public service delivery more widely; and v) implications of regaining control over resources and regulations, including those governing public procurement and industrial strategy.

We seek throughout to look for the opportunities as well as the risks of Brexit, and to highlight government action that could mitigate risks and allow opportunities to be maximised.

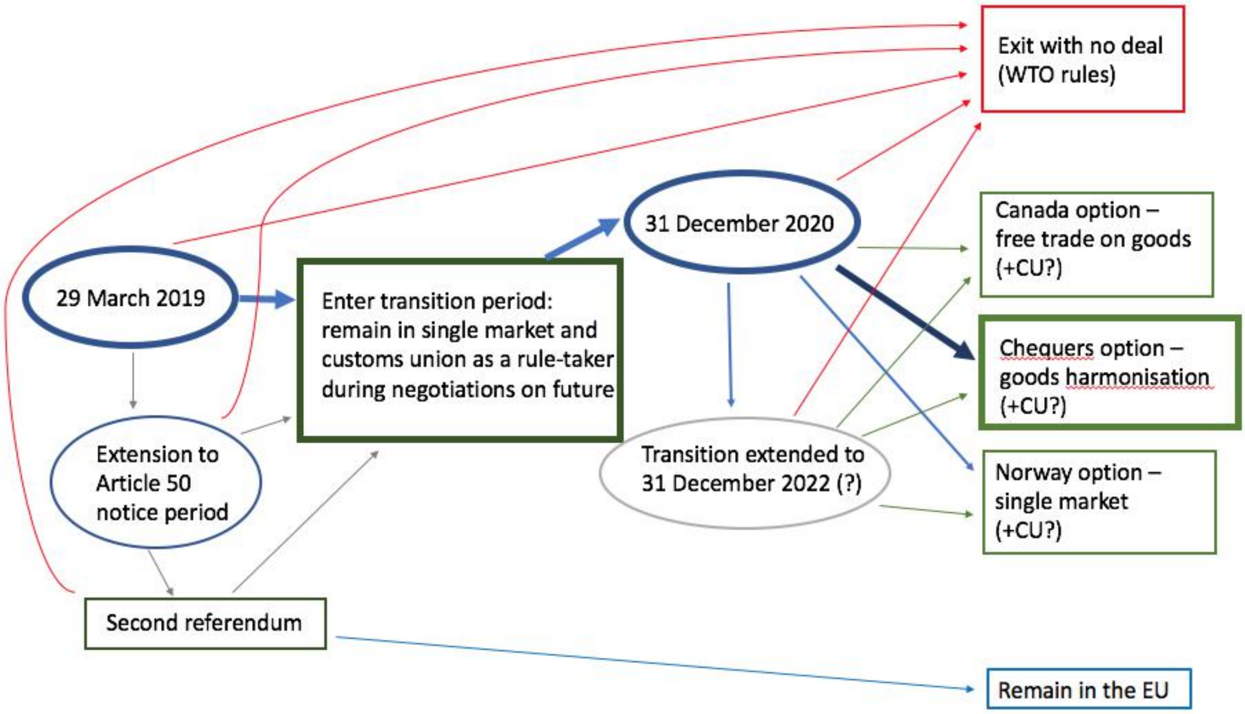
There are three main aspects to the uncertainty that provides the backdrop to the paper: the timescale on which Brexit will take place; the nature of post-Brexit trading and wider arrangements between Britain and the EU; and what this will ultimately mean for trade with countries elsewhere in the world. In terms of timing, Britain is due to leave the European Union on 29 March 2019, two years after Article 50 was triggered. The draft Withdrawal Agreement drawn up by UK and EU negotiators (but, crucially, not approved by the UK Parliament) would set up a 21 month 'transition' process which could be extended once (European Commission, 2018 Article 132). While the maximum length of the extension was left blank in the draft agreement, a two year period has been mooted by EU chief negotiator Michel Barnier.[1] During the transition, the UK would remain a member of the single market and customs union as a 'rule taker' with no seat at the decision-making table, and would be able to start trade negotiations with other countries while also negotiating future arrangements with the EU. Thus if all went reasonably smoothly the UK's life outside the EU would (probably) begin in earnest on either 1 January 2021 or 1 January 2023. But there are at least three possible points for a 'cliff edge' or 'no deal' Brexit: 29 March 2019 if no withdrawal agreement was signed; 1 January 2021 if the withdrawal agreement was signed but future trade terms were not reached in time; and 1 January 2023 if an extension to the transition was agreed but trade terms were still not reached.

A no-deal outcome would place the UK outside both the single market and the customs union. Assuming this outcome is avoided, what will Britain's relationship with the EU look like from early 2021 (or early 2023)? The possibilities appear to be as open at the time of writing as they were the day after the referendum: continued membership of the single market (the Norway model); outside the single market but with no tariffs on goods plus harmonised regulations and a commitment to collect tariffs on third-country goods for the EU (as set out by the Prime Minister at Chequers in July 2018); or free trade on goods without harmonisation or EU tariff collection (the Canada option). Membership of the Customs Union could end up being added to any of these scenarios, either by deliberate permanent agreement or by effect of the Irish 'back-stop' arrangement. The main possibilities are presented in Figure 1. The route the May administration has been pursuing is shown by bolder lines, but plenty of alternatives remain in play – including the possibility of a second referendum, which could conceivably result in Britain not leaving the EU at all. Not shown, but just as uncertain, are the future relationships to be negotiated with other countries, which will be influenced by the shape of the agreement with the EU.

[1] 'Michel Barnier proposes extending Brexit transition to 2022,' *Financial Times*, November 19 2018.

There is no easy way to handle this range of scenarios in this paper. Our main strategy is as follows. In discussing the effects on the economy in Part 1, we consider the differences between the range of possibilities shown on the right hand side of Figure 1. In the rest of the paper, we assume for the most part that Brexit will mean leaving the single market – that is, any other outcome but the Norway one (or not leaving at all) – as it is crossing this line that has the most significant consequences. We also highlight areas where there are differences between being in the single market and being a full EU member (e.g. in relation to budget contributions and access to regional funds), or differences between the Chequers and Canada scenarios (such as in relation to the jurisdiction of the Court of Human Rights). Finally, the 'no deal' scenario is likely to have some substantial effects of its own, certainly in the short term, so these are also considered where possible.

Figure 1: The main possibilities for the timing and outcome of Brexit negotiations



Part I: Politics, economics, and the knock-on effects on social policy

1.1 The political consequences of the referendum and their implications for social policy

We begin by identifying and briefly exploring four key ways in which the referendum result can be seen to have shaped the political context for social policy making in Britain, both in the immediate term and looking forward.

A new Prime Minister

First and most obvious, the referendum led directly to a change in Prime Minister and in the make-up of the Cabinet, followed a year later by a general election in which the Conservative Party lost their majority in Parliament. A detailed evaluation of what these changes in leadership have meant in practice for developments in social policy is beyond the scope of this paper: the wider SPDO programme will be better placed to compare the policies of the May and Cameron administrations. Our brief assessment is that the rhetoric certainly changed, and that there were one or two areas in which policy shifted substantively, although in other cases, such as benefit reforms and public spending limits, we see continuity rather than change, at least at first. The parliamentary arithmetic after the 2017 election did restrict the government's ability to carry through aspects of its social policy agenda, and from late 2017 on we also see moves to increase some aspects of public spending.

There is no question that Theresa May's premiership brought with it a change in rhetoric. The Conservative manifesto of 2015 had continued to emphasise the need to focus on deficit reduction, pledging to find an additional £30 billion in fiscal consolidation, including £12 billion in 'welfare savings'. May toned down the language of austerity and appeared keen to indicate a clear break between her administration and that of David Cameron. Her first speech as Prime Minister, on the steps of Downing Street, put inequality centre stage, promising to "make Britain a country that works, not for the privileged few, but for every one of us." The speech talked of the "burning injustice" of differences in outcomes by income level, race, class and gender. May also addressed families who are "just managing" and promised that "the government I lead will be driven not by the interests of the privileged few, but by yours" (HM Government, 2016). 'Just about managing' families would become – for a short time – a target group for government policy; the Department of Education, for example, consulted in early 2017 on how to identify children from JAM families, to add to the standard analysis on the progress of children eligible for Free School Meals.[2]

Meanwhile the new Chancellor Philip Hammond moved away from predecessor George Osborne's stated commitment to return government finances to surplus by 2020 in his 2016 Autumn Statement and declared "no plans" for further welfare cuts, beyond those already announced by Osborne.

[2] Email from Kelsey Wood, DfE, 16 January 2017.

In practice, there was little change to welfare reforms. On social security, the bulk of the £12 billion of welfare cuts had already been announced, including a four-year cash freeze on working-age benefits, cuts to Universal Credit work allowances, and the introduction of a two-child limit on tax credits; all three changes went ahead as planned (OBR, 2018a). Tax cuts pledged in 2015 were repeated in the 2017 manifesto, increasing the personal allowance to £12,500 and the threshold for the 40% tax rate to £50,000; both policies have been shown to be regressive, especially in combination with cuts to benefits (De Agostini, Hills and Sutherland, 2018). The 2017 manifesto did, however, contain a number of measures which can be seen as attempting to spread the burden of cuts more fairly across the population: it pledged to means-test the Winter Fuel Allowance, replace universal free school meals for under eights with targeted free breakfasts, and downgrade the pension 'triple lock' to a double lock; pensioners had been heavily protected under Cameron-Osborne, with the heaviest burden of cuts falling on working-age households with children. In the event, all these reforms, along with controversial proposals to reform funding for social care, were eventually abandoned, either during the course of the election itself or in the face of the parliamentary arithmetic that followed it.

There was also little or no initial change to education and health spending commitments, although in June 2018 new funding for the NHS was announced. Initially it was claimed that this could be funded by a 'Brexit dividend' (on which more below), but there was a subsequent indication that taxes would rise to pay for it ('Hammond: Taxes will rise to pay for NHS Boost,' BBC News, 20 June 2018). The policy of a 1% annual increase in public sector pay to 2019/20 was initially maintained, but relaxed in the Autumn 2017 budget (meaning it would end a year early and not apply in 2018/19) (Pyper, McGuinness and Brien, 2018).

A cap on energy tariffs was perhaps the main policy aimed directly at the JAMs; legislation was passed by Parliament in June 2018. After spring 2017 the Department for Education started to refer to Ordinary Working Families rather than JAMs, but later appeared to abandon this term too, and with it the focus on children in families below median income. Underlining the perceived gap between rhetoric and reality in relation to the goals set out in the Downing Street speech, in December 2017 all four members of the Social Mobility Commission resigned, citing "indecision, dysfunctionality and a lack of leadership" at the head of government ('Theresa May's Social Mobility Commission walks out,' *Financial Times*, December 3 2017).

However, significant shifts are discernible in relation to both housing and education policy. A number of elements in the 2016 Housing and Planning Act were never implemented by the May Government, including a mandatory 'pay to stay' policy which would have required social housing tenants on higher salaries to pay market or near-market rents; and a requirement for local authorities to offer new tenancies as fixed-term only (Wilson, Bellis and Garton Grimwood, 2018). Proposals announced by Cameron in 2014 to remove Housing Benefit from 18-21 year olds were also shelved by the May administration ('Housing benefit to be restored', *The Independent*, 29 March 2018).

In the foreword to the 2018 Green Paper on Social Housing, May pledged to build "a new generation of council homes to help fix our broken housing market" (MHCLG, 2018).

The paper withdrew plans to force local authorities to sell off vacant high-value homes, proceeds from which were to have been used to subsidise a Right to Buy scheme for Housing Association tenants, and proposed more flexibility in the use of proceeds from Right to Buy sales. It attracted some criticism for the limited scope of these changes and the lack of new funding ('Theresa May promises "new generation of council homes"', *Financial Times*, August 15 2018). Nonetheless the tone of the paper and the emphasis on a positive role for council housing marked a notable move away from the policies of the Cameron/Osborne period, which focused heavily on promoting home ownership through Right to Buy and Help to Buy schemes, seeking to transform "generation rent into generation buy" (Wilson et al, 2018). In her September 2018 Conference Speech May announced that councils would be able to borrow to build, removing one of the main constraints on local authorities' ability to replace properties sold to tenants.

In education May's agenda also marked a break with that of her predecessors. A White Paper in March 2016 had set out plans for all schools in England to be removed from local authority control and converted to academy status by 2022, carrying through on the Cameron/Osborne government's intention to "make local authorities running schools a thing of the past" (2015 Autumn Statement). In the face of widespread opposition, proposals were watered down prior to the change of government, but it was only in October 2016 that the White Paper was formally abandoned by new Education Secretary Justine Greening. Later, the government announced that academy conversion would only be enforced in the case of an Ofsted inadequate judgement (Andrews, 2018). Two-thirds of secondary schools and one quarter of primaries were already academies by 2016/17 (Andrews, 2018); nonetheless, the survival of *any* local authority role in education could be seen as an indirect consequence for domestic social policy of the referendum vote. Instead, May's focus in relation to education has been to pursue ways to expand academic selection, although evidence undermines the idea that this is an effective way to raise attainment overall or among disadvantaged pupil groups (Andrews, Hutchinson and Johnes, 2016; Burgess, Crawford and Macmillan, 2017). A 2017 manifesto pledge to lift the ban on new selective schools became a casualty of the hung parliament, but in May 2018 new funding was announced to allow existing grammar schools to expand.

A new focus on social, economic and geographical divides?

Aside from the change in personnel at the top, did the unexpected referendum result lead to a reassessment among policymakers of underlying social and economic divisions in British society, and hence affect the domestic policy agenda? Academic analysis of the Brexit vote has highlighted the role of social and economic exclusion in generating a coalition of voters feeling 'left behind' (or 'let down') by modern Britain, whether because of their education, age, economic situation or social and cultural values (Goodwin and Heath, 2016; Sampson, 2017; Social Mobility Commission, 2017; Watson 2018). May's first speech, though it did not mention Brexit by name, seemed rooted in a concern about these divisions, and her October 2016 party conference speech was more explicit, arguing that the referendum was not just a vote to withdraw from the EU but about "a sense – deep, profound and let's face it often justified – that many people have today that the world works well for a privileged few, but not for them" (May, 2016). She called the vote "a once-in-a-generation chance to change the direction of our nation for good. To step back and ask ourselves what kind of country we want to be." Among other action, the speech promised “an economic and cultural revival of all of our great regional cities” and a narrowing of the wealth gap between London and the rest of the country.

There is limited evidence to date of substantive new thinking on these issues despite some promising initiatives. A Race Disparity Audit was announced by the Prime Minister in August 2016, to collate data and outcomes by race and ethnicity across the public sector. The results of the audit were published in October 2017 but there does not appear to have been further action by government since. In June 2018 the House of Commons Women and Equalities Committee praised the audit but called for “clear and measurable plans... to improv[e] the consistency and robustness of the data and turn it into a set of cross-government priorities for action” (House of Commons Women and Equalities Committee, 2018).

An industrial strategy White Paper was published in late 2017, including the announcement of an Independent Industrial Strategy Council to assess government progress and make recommendations (HM Government, 2017). But in May 2018 the Council had still not been set up (‘Manufacturers’ concern grows over industrial strategy delay’, *Financial Times*, May 8 2018). The industrial strategy also attracted criticism for downplaying the role of place. Swiney (2017) argues that in initial plans for the industrial strategy, May promised a place-based approach to growth, but in practice the Green Paper largely took a sector-based approach. In the White Paper place became one of five ‘foundations of productivity’, but Fai (2018) argues that the place chapter largely summarised initiatives that were already happening. The main plan for place-based development is for Local Industrial Strategies; the government is currently working with Greater Manchester, the West Midlands and the Oxford-Milton Keynes-Cambridge corridor as ‘trailblazer’ areas. But questions have been raised about what happens to more peripheral areas like rural areas, coastal areas, and those without an identifiable sectoral or technological centre (Walker, 2018). Fai (2018) also points out that “critically, the White Paper makes almost no mention of the impact of Brexit on these units of ‘place’” (p.3).

At the same time, the government has backpedalled on a series of 2015 manifesto commitments to regional investment projects. In July 2017 three railway electrification projects in Wales, the Midlands and Cumbria were abandoned because of costs, two of them 2015 manifesto commitments (NAO, 2018). An additional £300 million was later pledged “to future-proof the railway network in the north”, but this roughly balanced the £337 million estimated savings from the cancelled projects, rather than indicating substantial new investment (‘Philip Hammond’s speech: what have we learned’, *The Guardian*, October 2 2017; NAO, 2018). In June 2018, another 2015 manifesto commitment to Wales, the Swansea Bay Tidal Lagoon project, was scrapped on cost grounds.

One small place-based initiative was the launch in October 2016 of six (later twelve) ‘Opportunity Areas’ – chosen as areas of entrenched educational disadvantage. A school in each of the areas would operate as an “excellence hub” for evidence-based practice, and there would be attempts to develop tailored interventions “to address stubborn local challenges and begin sustainable, long-term change” (DfE, 2017, p.35). But the funding for the project was small in scale – just £70 million in total.

In their fifth State of the Nation report at the end of 2017, the Social Mobility Commission called for a new level of effort to tackle “the phenomenon of left-behind Britain”, and questioned why there was no “overall national strategy to tackle the social, economic and geographical divide that the country faces” (SMC, 2017, pp.iv-viiii). The report identified the Northern Powerhouse, the Midlands Engine and HS2 as welcome steps towards bridging the geographical divide but called for a response more ambitious and larger in scale, with then Chair Alan Milburn underlining the urgency of doing so in order to tackle the “sense of political alienation and social resentment in so many parts of our country” (Press Conference, 28 November 2017). Whether the Brexit vote will mark a point at which these divisions began to be taken more seriously by policymakers remains an open question. It is certainly possible that messages about the extent of divisions are being internalised by future politicians and leaders, with consequences in the longer-term – though as we discuss below, the eventual outcome of Brexit negotiations will shape the capacity of the state to respond.

Brexit bandwidth

One obvious explanation for the limited developments in policy and thinking outlined so far is the extent to which the demands imposed by the Brexit process itself have soaked up government capacity and dominated other priorities. The lack of “bandwidth” among policymakers to concentrate on other areas because of Brexit has become something of a mantra, cited for example by Alan Milburn in his resignation letter from the Social Mobility Commission, and by manufacturers concerned about the lack of progress on the industrial strategy (Milburn, 2017; Financial Times, May 8 2018, ‘Manufacturers’ concern grows over industrial strategy delay’).

Bandwidth (in this sense) is hard to quantify. But Brexit has certainly used up a substantial chunk of parliamentary debating time, and required the redeployment or new hiring of a growing number of civil servants. The Institute for Government estimates that Parliament has spent at least 258 hours debating the EU Withdrawal Bill, as of June 19 2018.[3] Press Association analysis calculated House of Commons debates on Brexit at about one fifth of all time in the Commons in the year to March 2018 – 187 hours (around half on the Withdrawal Bill), compared to 36 hours on the NHS and Social Care.[4]

Within Whitehall, the task of managing Brexit was described by then cabinet secretary Jeremy Heywood as “the biggest, most complex challenge facing the civil service in our peacetime history” (Heywood, 2017). Across departments, civil servants face an exceptionally high level of uncertainty – they must plan for a wide range of possible scenarios, many of them unprecedented but likely to require new legislation and raise technological challenges, and they must do so against a clock that is ticking but at uncertain speed. To meet this challenge the civil service is expanding: by March 2019 an estimated 10,000 additional civil servants will have been taken on across the six main Brexit-affected Departments at a payroll cost of around £400 million (Owen, Lloyd

[3] https://www.instituteforgovernment.org.uk/explainers/eu-withdrawal-bill-amendments-and-debates
[4] https://www.belfasttelegraph.co.uk/news/uk/mps-spend-less-than-fifth-of-time-in-commons-debating-brexit-36756836.html

and Rutter, 2018; Owen and Lloyd, 2018). Growth in civil servant numbers in the Home Office, HMRC and Defra have largely reversed the reductions that took place in between 2010 and 2016 (Owen et al, 2018). In total, the Government reports that by 2019/20 it will have spent over £4 billion preparing for Brexit since 2016 (DexEU, 2018).

The implications for social policy departments are not just about the potential knock-on effects of tighter constraints elsewhere to compensate, but also greater instability of the workforce across Whitehall. In a civil service that incentivises regular internal moves for promotion, "rapid job creation in response to Brexit has meant more opportunities, and that means moves are becoming more frequent. In some instances, people are moving on after only six months in a new role and departments are being forced to promote less experienced staff to avoid losing them to other parts of government." (Owen et al, 2018, p.4) More positively, the same authors note that "there is a sense that fresh perspectives and new skills have been hugely valuable" and may "bring benefits beyond just the Brexit effort" (p.39).

Have we seen the effects of the Brexit process in reduced legislation or scrutiny of social policy areas? The March 2016 White Paper on schools was abandoned (as discussed) after the referendum and no new paper has yet been proposed. The National Funding Formula for schools was introduced, but in April 2018, a year behind schedule. The controversial Conservative manifesto proposals for social care funding seemed hastily constructed and were ditched after the election, while a promised green paper on social care from the rebranded Department of Health and Social Care is yet to emerge ('Long awaited social care green paper delayed again,' Nursing Times, 14 December 2018). However, the challenge of reforming social care has defeated successive governments entirely independently of Brexit. The roll-out of Universal Credit, the government's flagship social security reform, continues despite growing evidence of problems and resultant hardship, though there were signs of some movement on detail and timetable in October 2018. One might argue in this case that the demands of Brexit have left the government without the capacity to rethink a policy in the face of clear and significant flaws.

On the other hand, the May 2016 White Paper on higher education became the Higher Education and Research Act in April 2017, after extensive scrutiny in the Lords. There was some minor compromise in the legislation adopted, perhaps aided by pressure of timing ahead of the general election, but the main proposals were passed into law, including the establishment of an Office for Students, the ability to link tuition fees to performance in the Teaching Excellent Framework from 2020, and the introduction of shorter 'accelerated degrees' (Midgley, 2017). In housing, Brexit has indirectly resulted in rapid turnover of ministers – four in succession since the referendum. Yet despite this, there has been substantial focus on housing policy in the wake of the Grenfell Tower fire in June 2017, as outlined above. In sum, Brexit has not brought the rest of government to a standstill, but it is evident that it has reduced attention and slowed down policy action on other areas.

Is there an argument that this lack of immediate action could yield positive results in the longer run? Perhaps in the absence of direct pressure on social policy departments for quick new ideas, and with Downing Street attention firmly elsewhere, civil servants have had space to develop longer term solutions to some of the more intractable problems – much as social policy departments in the Second World War were left to develop policies on education, health and social security with little ministerial interference (see e.g. Gosden, 1976; Webster, 1988).[5] Gosden (1976) quotes a senior official in the Department of Education in 1940: "I find that some of my colleagues, besides myself, have been considering whether we should not, now that we are working without constant interruptions, be bending our minds to a study of the educational problems which will arise when the war is over" (p.238). A Committee of Senior Officials on Post War Reconstruction was subsequently set up and the first Green Paper and the 1944 Education Act eventually followed. Could there be a parallel with Brexit-era Whitehall, where – unlike in recent decades – the Prime Minister and senior cabinet figures have no time or "bandwidth" to get involved in the detail of social policy? It is perhaps wishful thinking. In any case, it will be some years before we can tell.

There is another angle to this argument in today's Britain: the focus on Brexit at national level may allow devolved governments and regional and city authorities to pursue their agendas with less interference than might otherwise have been the case. It could even result in increased formal powers (quite aside from the unsettled questions about where powers returned from Brussels will go, on which see Stephens with Fitzpatrick (2018) and Thimont Jack et al (2018)). Andy Burnham, Labour Mayor of Manchester, called for greater devolution as a result of Brexit, both on grounds that the referendum result indicated the failure of London to provide adequately for needs across the country, and because the Westminster system was 'grinding to a halt' due to the demands of Brexit (Menon, 2018a, see also Carter, 2018 in the same volume). Tony Travers has suggested that greater devolution may be attractive to Downing Street, freeing attention to focus on negotiating new relationships around the world (Travers, 'Power to the regions: why more devolution makes sense,' *The Guardian*, February 8 2017). Yet Lupton et al (2018) note that in practice city-region devolution has stalled since 2016, having accelerated under George Osborne's chancellorship. This would suggest that devolution has in fact been an indirect casualty of Brexit, either because of the bandwidth issue or the loss of a champion in Osborne.

Changes in the political environment

The implications of Brexit for nation state devolution may be more extensive than any bandwidth effects. In both Northern Ireland and Scotland a majority of voters in the referendum opted to remain in the European Union. One likely development, especially if the UK ends up outside the single market, is greater divergence in social policy, especially between England and Scotland. Scotland, with its smaller share of Leave voters and more left-leaning party political system (Stephens with Fitzpatrick, 2018) may well pursue continued alignment with the European social model while England takes a different path (see discussion in Section 2.1 below). More dramatically, any version of Brexit other than the Norway model could ultimately undermine the unity of the UK. A harder form of Brexit seems likely to increase demands for another Scottish independence vote, an issue thought to have been put to bed for a generation after the unsuccessful 2014 referendum. Gow (2018) argues that this is not only because of the majority Remain vote in Scotland but also because of the way the devolved

[5] Thanks to Howard Glennerster for this argument, and for discussion and references.

governments have been sidelined during negotiations, a process that has underlined the extent to which the devolved "parliaments and assemblies do not enjoy sovereignty or command and control. That resides at Westminster and will continue to do so up to and beyond Brexit" (Gow, 2018, p.4, cited by Hughes with Fitzpatrick, 2018). At the same time, the fragile settlement in Northern Ireland is threatened by any outcome other than continued membership of the single market and customs union, which could precipitate demands for change.

There are also other more subtle – yet potentially highly significant – ways in which the referendum may have affected the political environment in Britain with implications for inequalities and social rights. We highlight two; in both cases consequences are hard to quantify but may be significant long term. First, there have been suggestions that the result legitimated the expression of racist or xenophobic views that were previously hidden, making Britain a less openly tolerant place. After an 11 day mission to the UK in May 2018 the UN Special Rapporteur on racism Tendayi Achiume concluded that there had been a "Brexit-related" growth in the acceptability of "explicit racial, ethnic and religious intolerance" ('"Rotten" hostile environment policy "destroying lives" of ethnic minorities,' Financial Times, May 11 2018). There is as yet little academic evidence of the extent of this shift though there is evidence of a spike increase in hate crime following the EU referendum (O'Neill, 2017, p.7).

The second point regards the implications of the referendum for voting patterns and political allegiance. The referendum itself engaged the electorate more than any general election had in 25 years: turnout was 72% overall, including 64% of 18-24 year olds; the highest percentage for both categories than in any election since 1992 (Dempsey, 2017). But turnout has been rising steadily since record lows in 2001 (overall) and 2005 (for younger voters), and the 2017 general election continued that trend, reaching the highest share since 1992, though slightly down on the referendum (ibid). Curtice (2018a) notes that turnout for 18-24 year olds of 61% in 2017 does not look particularly remarkable compared to 56% in 2015, though it does represent a much bigger increase on 2001 or 2005 (when just 40% of young people voted) than for other age groups. The referendum certainly did no damage to a recovery in voter turnout, including among the young, but cannot be given a lot of credit for the rise.

But the referendum does seem to have had more complex effects on voters' political allegiances. Voting in the referendum cut across traditional party loyalty lines, with voters' identification with Leave or Remain strongly associated with age, education and social values and little associated with positioning on a left-right spectrum (Curtice, 2018b). Brexit allegiance subsequently appears to have fed through to influence the 2017 general election, with socially conservative (Leave) voters moving towards the Conservatives and socially liberal (Remain) voters towards Labour, while social class and attitudes to government intervention, redistribution or public spending became less important predictors of voting behaviour (Curtice, 2018b; Evans, 2018, in Menon 2018b). Hobolt, Leeper and Tilley (2018) (in Menon 2018b) argue that there is little sign to date of these new alignments dissipating: since the referendum, around 35% of people have identified consistently as Leavers and around 40% as Remainers. These shifts in allegiance are potentially disruptive to both main parties, as Curtice points out. Labour needs to seek to retain its newer voters (younger, socially liberal graduates) without alienating its traditional core support (older working class voters); while the

Conservatives face a tension between the demands of (formally Labour or UKIP) Leave voters for whom limiting immigration is a top priority, and the demands of big business, a crucial source of party finance as well as 'moral support' (Curtice, 2018b).

What would a long-term reshaping of British party politics mean from a social policy perspective? To speculate, one possibility could be a blurring of the boundaries between the parties in support for public spending and redistribution, creating more consensus and therefore more stability over time. But a realignment could also mean these issues become less important in electoral politics and therefore receive less attention and priority.[6] It is also conceivable that tensions between party politicians in how to respond to Brexit and to the contrasting demands of different groups of core voters ultimately result in a split in one or both of the main parties, and a reshaping of the party system.

Summary

The referendum had clear and immediate consequences for British politics, leading to a change in Prime Minister and subsequently the loss of the Conservative majority in Parliament. With the new leadership came a change in rhetoric – less austerity and more social mobility. We identify housing and education policy as two areas of social policy in which the new administration has sought to mark a clear break with its predecessor. But overall there has been fairly limited substantive policy change – and indeed limited attention to social policy in general – no doubt in part because the new administration has been steeped in the complexities of Brexit, which has soaked up ministers' attention, civil service capacity and parliamentary time.

There are arguments that Brexit could have positive consequences for the politics of social policy in the longer-term, in particular by refocusing attention on the extent of social and geographical inequalities and their consequences. The diverted attention of national policymakers might also allow for stronger policy options to be developed, and for devolved authorities to exercise more control and negotiate new powers, though in the short-term devolution appears to have stalled rather than moved forwards. A plausible medium-term consequence is an increased divergence in social policy between England and Scotland, while the eventual break-up of the UK remains a serious possibility, especially under harder forms of Brexit. There are also concerns that the referendum result may have changed the national political environment for the worse, legitimating the expression of racial and ethnic intolerance. Finally, the referendum may turn out to have lasting consequences for voting allegiances, which could in turn affect party positions on social policy issues, and could even result in a reshaping of the party system.

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[6] Curtice argues that there is "certainly little evidence that [Labour's] allegedly more left-wing outlook under Jeremy Corbyn played a decisive role in determining who did swing back to the party in 2017" (2018b, p.21), undermining the view that bigger tax-and-spend pledges are the route to a future Labour majority.

1.2 The economic consequences and their implications for social policy

Very considerable attention has been paid to the implications of Brexit for the UK economy. In this section we briefly review the conclusions of published literature on the topic, with an emphasis on the implications for social policy and distributional outcomes. There are several routes through which economic effects may be expected to feed through into the social policy context. First, economic growth drives employment and wage growth, affecting average living standards. Second, the rate of growth determines the level of tax revenues and hence the possibilities for public spending: faster growth expands the fiscal envelope and vice versa. Third, effects are likely to be felt differently across regions, sectors and skill-levels, depending on the extent of exposure to EU trade and the proportion of migrant workers, with implications for economic inequalities. There are also other relevant factors such as the inflationary effects of a depreciating currency, which may have both overall and distributional implications.

We begin by looking at short-term effects, post-referendum, and then turn to longer-term projections.

The short-term economic effects of the referendum result

The referendum result and the uncertainty it created appears to have resulted in slower economic growth and faster inflation, meaning lower living standards. However, unemployment has not risen, and there has been a smaller effect than expected on public finances.

Levell (2018) shows that economic growth in the UK, as measured by Gross Domestic Product (GDP), was slower in 2016 and 2017 than it had been pre-referendum, and also fell below the Office for Budget Responsibility's pre-referendum forecasts (OBR, 2018a). In contrast, growth in the Eurozone economies in 2017 comfortably exceeded the OBR's pre-referendum predictions. One factor contributing to the slowdown in GDP in both years was a slowing in growth of business investment (2.4% in 2017, compared to a pre-referendum forecast of 6.1%; see also OBR, 2018a). Levell notes that this cannot be definitively attributed to the Brexit result, but that it is consistent with expectations, given evidence that uncertainty over trade barriers affects firms' willingness to invest in export operations (see Crowley, Song and Meng, 2016). Higher inflation resulting from the depreciation in sterling has also contributed to lower growth: households initially responded to higher prices by running down savings, and then by reducing consumer spending (OBR, 2018a).

To establish the impact of reduced growth on total output, Chris Giles for the Financial Times surveys a number of economic models and finds estimates range between 1-2% of GDP (£20-£40 billion a year) (Giles, 2018). On average, the effect was 1.2%, or £24 billion (£450 million per week, or £870 per household per year – up from an estimated £350 million per week in a similar exercise carried out six months earlier). The Bank of England's estimates are very much in this range: in May 2018 Governor Mark Carney put the economy at 1% smaller than pre-election forecasts, which were based on the assumption of a vote to remain, and 1.75-2% smaller than calculations which factor in stronger-than-expected European and global growth (Carney, 2018).

Breinlich et al (2017) estimate the direct effect of inflation on real wage growth (that is, not including the effect via reduced output in the economy) at 1.7 percentage points in the year to June 2017, costing the average household £7.74 a week, or £404 per year. They find little difference in this effect across income deciles, because the importance of imports in household budgets does not differ much across the distribution (for different reasons; poorer households spend high proportions of income on food and drink but also on rent, while richer households spend more on fuels but also more on domestically produced items like hotels and restaurant meals). Analysis by the Institute for Fiscal Studies reaches very similar conclusions (Johnson, Levell and Waters, 2016). However, neither study considers the particular impact on households who are more highly dependent on benefit income, though this is likely to be significant given that most benefits for working age households have been frozen in cash terms since 2015. The study does point to stark differences across regions, with larger effects in Northern Ireland, Wales, Scotland, the North East and the West Midlands, reflecting higher expenditure shares in these regions on food and drink, clothing and fuel. London has been less affected than average because of a higher share of income on rent.

Inflation also has implications for the cost of delivering services: Levell and Stoye (2018) note that “the depreciation of sterling has increased the costs to the NHS of goods and supplies that are imported, and the resulting inflation has also eroded the real value of public-sector workers’ pay”. They calculate that compensating NHS staff for the increase in prices for the two years from November 2016 would in itself cost around £1 billion in additional salaries.

Less gloomily, unemployment seems to have been unaffected, continuing to fall to its lowest level since the 1970s in the quarter to April 2018 (4.2%, down from 4.9% in the quarter prior to the referendum) (Levell, 2018). And despite the fall in growth, public borrowing remained very close to the pre-referendum forecast at £39.5 billion in 2017-18. Levell (2018) puts this down to underspending in some departments, alongside better than expected tax receipts. This is not to say that had the vote gone the other way the public finances would not have been even stronger; indeed, it is almost certain that this would have been the case.

One positive consequence of the referendum has been a slowdown in house price growth in London: house prices have been slowing since mid-2016, and fell 0.7% in the year to March 2018, the second consecutive monthly fall and the largest since 2009 (ONS 2018). The Office for National Statistics attributed the dip predominantly to a steep fall in demand relative to supply, in part due to Brexit, and notes that it could balance out prices to make buying a home in the capital more affordable for those who want to live there: “With the referendum and subsequent uncertainty regarding Britain’s political and economic environment, perceptions of the future value of London property have been adversely affected. This is what you might call a fall in ‘speculative demand’” (ONS quoted in City AM, 6 June 2018). There is also wider evidence of reductions in overseas investment in London property, though at least in part this reflects increases in stamp duty under George Osborne, which affected all buy-to-let investors and purchasers of more expensive owner-occupied properties (‘Higher taxes drive away overseas buy-to-let investors,' The Telegraph, 17 July 2017). Given the rapid deterioration in affordability of London housing in recent years (ONS 2018), falls in house prices can be seen as a welcome development, though the scale of any Brexit effect in relation to the size of the problem remains to be seen.

The long-term: Poorer, no matter what?

The long-term economic consequences of the decision to leave the EU remain highly uncertain, because this is untested territory, because it is still not clear what form Brexit will take, and because the effects are so wide-ranging. As the editors of the *Oxford Review of Economic Policy* put it, "Brexit potentially involves simultaneous policy shocks on trade, migration, macroeconomic policy, financial services, education, productivity, regional aid, competition arrangements and market structure, industrial strategy, energy, agriculture, and climate change" (Oxrep, 2017, p. S2). The Oxrep editors also point to the long time lines of many of the effects, meaning it will be decades (if ever, given the interplay with other variables) before the full implications are clear.

Most analysts are clear that the scale of predicted effects depends heavily on the nature of Britain's future trading relationship with the EU. At the time of writing, despite the rapidly approaching exit date, a full range of options remain in play. Four scenarios are presented in Table 1; three "off-the-shelf" options and the UK government's "Chequers" proposal. None of these options include membership of the Customs Union, ruled out so far by the UK government as it would prevent the UK negotiating its own trade agreements with third countries (though the opposition Labour Party has declared itself committed to membership of *a* permanent customs union, if not *the* Customs Union). Outside the Customs Union serious challenges arise in relation to the Irish border, because checks on rules of origin for goods crossing the border would need to take place. Any visible border between Northern Ireland and the Republic of Ireland would challenge the principles behind the 1998 Good Friday Agreement and could undermine peace and stability on the island. The Chequers proposal goes furthest towards addressing this concern. The controversial Northern Irish 'back-stop', included in the Withdrawal Agreement, is designed to provide a safety net in which the UK would remain in the Customs Union until such time as other suitable arrangements to avoid a visible border had been agreed.

- **Membership of the European Economic Area (like Norway)** would secure the lowest level of disruption for the economy of the four options (though without solving the problem of border checks), but it would mean accepting rules over which the UK would have little influence and no vote, and it would require payments into the EU budget at close to the current level: Norway pays roughly 83% per capita of what the UK pays for full EU membership (House of Commons, 2013, cited by Sampson 2017). It would also require acceptance of the free movement of workers, a possibility that has been categorically dismissed by the UK government.
- **The Chequers option** favoured by Theresa May proxies aspects of the single market in adopting a common rulebook on goods and food, while going further than the Norway model in proposing to collect tariffs from third countries on behalf of the EU; if the EU reciprocated, these steps together would eliminate the need for checks at the Irish border. Critics inside the Conservative Party point

out that the common rulebook reduces flexibility to negotiate deals with other countries, and would mean accepting rules over which the UK has no say (Johnson, 2018). Critics in Brussels have made it clear they think the plan cherrypicks from the four freedoms (goods, services, capital and labour), something EU leaders have repeatedly ruled out ('Chequers plan is dead, says Tusk as Macron calls Brexiters liars', *The Guardian*, 20 September 2018). Chequers would also entail considerably less market access than the Norway option because the agreement would not cover services, including financial services – one of the UK's major exports to the EU.

- **Canada's agreement** with the EU, the Comprehensive Economic and Trade Agreement (CETA), removes nearly all customs duties on trade in goods, but does not require regulatory alignment. Divergence on regulations reduces trade because producers have to adapt products for different markets, and border checks on quality standards, especially for agricultural produce, are needed (Sampson, 2017). Border checks are also needed because of 'rules-of-origin': if the UK and Ireland have different tariff agreements with a third country, revenue authorities need to know whether a product crossing the UK border originated in Ireland or in the third country. Solutions using pre-registration, cameras, mobile technology and checks away from the border have been proposed to deal with the problem (Johnson, 2018; EFT, 2018), but the details of these remain vague. Champions of a Canada-style deal have proposed 'Canada+++' and 'SuperCanada' packages, indicating an intention for more extensive agreement on trade, internal security and foreign policy cooperation (Davis, 2018; Johnson, 2018; Singham and Tylecote, 2018). It is suggested that mutual recognition agreements could ensure conformity of goods with each other's standards, though the ability for the UK to have different regulations from the EU is considered key to maximising the benefits of Brexit (Johnson, 2018; Singham and Tylecote, 2018).
- **No deal** would mean a reversion to WTO rules, implying an increase in both border and behind-the-border non-tariff barriers. Tariffs on non-agricultural goods are generally low under WTO rules, but there has been much less progress in reducing non-tariff barriers, especially for services (Sampson, 2017). Unless and until the UK can reach trade deals with other countries, including agreements to replace the dozens it currently enjoys with third parties as a member of the EU, a no deal outcome would leave the UK in a unique position as the only member of the WTO trading on WTO terms only. Every other member has at least one trade deal with other countries and most have several (UK in a Changing Europe, 2018).

Table 1 Four options for the UK's future trading relationship with the EU

	Customs Union?	Single Market?	Tariffs with EU	Non-tariff barriers At the border	Behind border
Option 1: EEA (Norway-style)	No	Yes	None	Medium (rules-of-origin but no quality checks)	Low (regulatory convergence)
Option 2: Chequers	No, but UK to collect tariffs for EU	No	Low-medium	Low (no rules-of origin, no quality checks)	Low-medium (low for goods, higher for services)
Option 3: FTA (Canada-style)	No	No	Low-medium	High	Medium
Option 4: WTO (No deal)	No	No	High	High	High

Source: Adapted from House of Commons Exiting the European Union Committee (2018), slide 4, with addition of the Chequers option.

Given the range of possibilities, most forecasts model a number of options, and emphasise that even within these there is uncertainty, compounded by the lack of a precedent: with the exception of Greenland in 1985, no country has opted to leave a major trading bloc before (HMT, 2018).

A further dimension is added by the different routes that future migration policy could follow. Under the Chequers proposal EU citizens would retain their rights to free movement until the end of the transition period, at which point the government is committed to an end to free movement and to 'taking back control' of UK borders. Yet a series of options remain, as Portes and Forte (2017) point out. A new migration system could be relatively liberal – indeed it could continue to admit just as many migrants as before, with the main difference that there is some ability to control numbers coming from the EEA, as from outside it – or it could aim to reduce numbers significantly. A separate question is whether there will continue to be some preferential treatment for EEA citizens over those from outside the EEA (Portes and Forte, 2017). The government's White Paper on immigration, published in December 2018, proposes no cap on work visas, no preference for EEA citizens, and a skills-based approach, facilitating the migration of high and medium-skilled workers and restricting low-skilled workers (HM Government, 2018a). These proposals follow the recommendations of the government's Migration Advisory Committee, which suggested the restriction could be achieved by extending to EEA citizens the existing salary floor of £30,000 per year within Tier 2 of the immigration system (exceptions to be made for seasonal agricultural workers) (MAC, 2018a). The White Paper does not rule out adopting this floor, but suggests "some flexibility to allow migration at lower salary levels", such as temporary 12 month access for lower skilled workers to allow businesses to fill gaps while still giving them an incentive to train local workers (HM Government, 2018a, p.29). In any case, the shape of migration policy could very likely be influenced by negotiations over future trading relationships between the UK and the EU, as well as by changes in government preferences in the future. Decisions on these matters will affect growth and may also have distributional effects.

Despite the uncertainty, there appears to be strong consensus on two points: nearly all forecasters project a negative medium-term impact on GDP growth of any Brexit scenario compared to the status quo. And forecasts that model different scenarios project much bigger effects for ‘harder’ forms of Brexit, with ‘no deal’ and a reversion to WTO rules looking worse than an FTA, and an FTA worse than continued EEA membership (House of Commons Exiting the EU Committee, 2018). Given the exclusion of services, a Chequers agreement is likely to fall between EEA membership and an FTA.

Estimates from a cross-Whitehall study, leaked in early 2018, fall broadly in the middle of the range of external estimates, including those from LSE, the OECD, World Bank, Oxford Economics, Price Waterhouse Coopers as well as the Institute of Economic Affairs (IEA), Economists for Free Trade (EFT) and Open Europe (House of Commons Exiting the EU Committee, 2018). The Whitehall estimates project a reduction in GDP growth over 15 years of 1.6% for the EEA scenario, 4.8% for the FTA scenario and 7.7% for the WTO scenario. The main driver is a fall in trade due to non-tariff barriers: the loss of market access in certain sectors, such as the financial sector, which is set to lose its ‘passporting rights’ to operate across other Member States; regulatory divergence which will require producers to adapt production for different markets; and new customs and border checks and practices. There are also anticipated negative growth effects from a fall in immigration.

On the positive side, the ability to negotiate new trade deals with non-EU countries is projected by the Whitehall study to increase trade with these countries, and there is also an argument that “regulatory and other domestic policy optimisation” (i.e. a reduction in red tape) could improve competitiveness. But these are predicted to be very small in relation to the expected losses (0.2%- 0.7% for trade deals) and are already netted into the estimates reported above. The highest estimated gains based on a clear evidence base (0.7%, from Open Europe) rely on policy changes in areas like employment (e.g. abolishing the Working Time Directive), consumer protection and the environment (e.g. abolishing the Renewable Energy Strategy), and in areas where the government already exceeds EU requirements or has made a commitment to uphold standards (e.g. in the case of bank capital requirements) (House of Commons Exiting the EU Committee, 2018; Dhingra et al, 2016).

Aside from differing assumptions about regulation post Brexit, more positive outcomes from some forecasters are based on much more optimistic forecasts regarding non-tariff barriers and access to cheaper high quality inputs from outside the EU (EFT) and assume the maintenance of the existing Free Trade Arrangements (FTAs) the UK enjoys as part of the EU, plus new trade deals with a range of existing countries (IEA) (House of Commons Exiting the EU Committee, 2018). More negative projections are due to more pessimistic projections about EU trade (World Bank), loss of access to existing FTAs (PWC), reductions in inward Foreign Direct Investment or FDI (OECD), and projected effects on productivity of lower openness, less competition and lower R&D spending (Rabobank). Sampson (2017)’s extensive review of Brexit impacts notes that estimates incorporating the effects of trade barriers on FDI and productivity find costs 2-3 times larger than estimates from quantitative trade models that hold these technologies fixed.

Of course, as Singham and Tylecote (2018) point out, economic experts have been wrong before: the projections for the immediate economic impact of a vote to leave the EU were overly pessimistic. But forecasts of the impact through to the end of 2018 were very close to the mark; it appears that predicted effects just came later than anticipated (Schulz, 2018; Full Fact, 2018; Smith, 2018). Given this, the strength of the consensus on medium-term effects is striking.

In addition to the trade impacts, there are also questions about what the scale of the reduction in EU migration will be, and about the consequences. The Whitehall study projects falls in annual EU net migration of 90,000 (WTO, with restrictions imposed as for non-EU migrants) and 40,000 (FTA, modelled as midway between the WTO assumption and the status quo), with no effect of continued EEA membership. Portes and Forte's (2017) estimates are at the higher end of this – an annual reduction of 91,000 in their central scenario rising to 150,000 in the scenario of 'no-EU preference'. They also suggest that the effects on growth would be larger than in the Whitehall estimates because the latter factor in only the loss in employment, while Portes and Forte maintain that reductions in productivity would be likely, given that literature has found that increases in migration boosts productivity. Overall, Portes and Forte posit that losses from reduced migration may be as great as losses from reduced trade, whereas in the Whitehall estimates falling migration contributes at most around 15% of the total GDP effect.

Consequences for living standards

What do these losses mean for living standards in the UK? Focusing on static trade effects (i.e. not including potential knock-on effects on productivity or innovation, or effects via migration), Dhingra et al (2016) estimate a loss of 1.3% GDP for an EEA arrangement or 2.6% GDP for WTO rules. They translate this to an average loss per household of £850 and £1,700 respectively, though household income itself may be expected to fall by less, as some of the hit will be though lower spending on public services.[7] Factoring in effects of reduced trade on productivity (but not migration or FDI), increases the losses in the longer-run to 6.3% GDP for EEA (£4,200 per household) or 9.5% for WTO (£6,400). The authors underline that these estimations include the potential gains from reduced fiscal contributions to the EU budget, which are more than offset by trade losses.

The Joseph Rowntree Foundation explores potential impacts on living standards of people in low-income households specifically, by modelling how prices, wages and employment may be affected by changes in trade, immigration and FDI (Barnard, Heykoop and Kumar, 2018). The impact is projected to be felt across the whole income distribution, rather than disproportionately hitting those at the bottom, and therefore effects on relative poverty are small for most scenarios. But an increase in prices (expected to be larger in 'harder' forms of Brexit) would affect low-income households very differently depending on government decisions about the uprating of benefits and tax credits.

[7] These calculations do not take account of effects via migration: the per capita loss of a given GDP reduction could be lower if migration falls, but on the other hand lower migration is itself projected to mean lower GDP, as already discussed.

It is worth paying a little more attention to the possible implications for living standards of failure to reach a deal, either by the end of March 2019 or at the end of the transition period in December 2020. In this event, the Office for Budget Responsibility highlights the possibility of "severe short-term implications for economic activity, the exchange rate and asset prices" the impact of which are "very hard to calibrate… given the lack of meaningful precedent" (OBR, 2018b, p.12).

In terms of living standards, there are particular concerns in the short-term about food security. Analysis for the House of Lords suggests the imposition of tariffs in the case of no deal could result in a 22% average tariff on food, some of which would be passed on to the consumer, while there would also be substantial non-tariff barriers if customs and border checks start to be imposed (House of Lords, 2018; see also Lang et al, 2018). In response to concerns, the government has said it would allow EU imports through with no or very few checks, which the House of Lords says raises questions about safety as well as about how customs charges would be processed. Their report cites evidence from the Food Standards Agency that one in five households are already experiencing or on the margins of food insecurity, raising the stakes attached to any increase in food prices or reduction in availability. As some 40% of fresh fruit and vegetables sold in the UK comes from the EU, it is also likely that inequalities in access to fresh fruit and vegetables by income group would increase (House of Lords, 2018). Depreciations in the value of sterling would seem likely in the event of a no deal scenario, and this would have additional effects on the prices of imported food and other goods. Barnard et al (2018) note that poverty would be expected to rise in the case of no deal unless the government took action to ensure that benefits and tax credits were uprated at least in line with inflation. As things stand, most working-age benefits are frozen in cash terms.

The fiscal implications of lower growth

One of the more controversial aspects of the referendum campaign was the claim made in giant letters on the side of Vote Leave's touring bus: "We send the EU £350 million a week. Let's fund our NHS instead". The £350 million sum was roundly criticised as misleading, including by the Chair of the UK Statistics Authority, for representing a gross rather than net figure which did not account for funds returning to Britain through rebates and EU investment.[8] But Cabinet Ministers – and even the Prime Minister – have continued to claim that withdrawal from the EU will result in a 'Brexit dividend', albeit perhaps smaller than that implied on the bus.[9] In June 2018 Theresa May argued that Brexit would mean more money for health and other services: "At the moment, as a member of the European Union, every year we spend significant amounts of money on our subscription, if you like, to the EU. When we leave we won't be doing that. It's right

[8] https://www.statisticsauthority.gov.uk/wp-content/uploads/2016/04/Letter-from-Sir-Andrew-Dilnot-to-Norman-Lamb-MP-210416.pdf

[9] The Brexit dividend could be £5 billion a year according to Foreign Secretary Boris Johnson in January 2018, or £10 billion a year according to Leader of the Commons Andrea Leadsom in March 2018 https://www.ft.com/content/e7585cea-003e-11e8-9650-9c0ad2d7c5b5 https://www.lbc.co.uk/radio/presenters/andrew-castle/andrea-leadsom-says-britains-brexit-dividend-10bn/.

that we use that money to spend on our priorities, and the NHS is our number-one priority.[10]

In practice, the evidence appears unequivocal that – unless growth forecasts are very wide of the mark – there will be no Brexit dividend in either the short or the long-run, and indeed that Brexit will lead instead to increased pressure on public spending (Pope, 2018; see also 'Doubts cast on "Brexit dividend" for National Health Service,' *Financial Times*, June 15 2018). The UK's net contribution to the EU is about £8 billion, after taking into account the budget rebate and existing EU spending in the UK (Levell and Stoye, 2018). In the short run, the Brexit divorce bill has been agreed to be in the region of £35-40 billion, to be paid in instalments, which rules out any plausible savings from contributions before 2023 (OBR, 2018b, Box 4.1). On top of this, reductions in growth have more than cancelled out the size of the net contribution anyway. The average estimate for the impact of the referendum result on GDP so far is about 1.2%, as noted above (Giles, 2018). A reduction in GDP of 1% translates to a fall in tax revenue of more than £8 billion (Levell and Stoye, 2018).

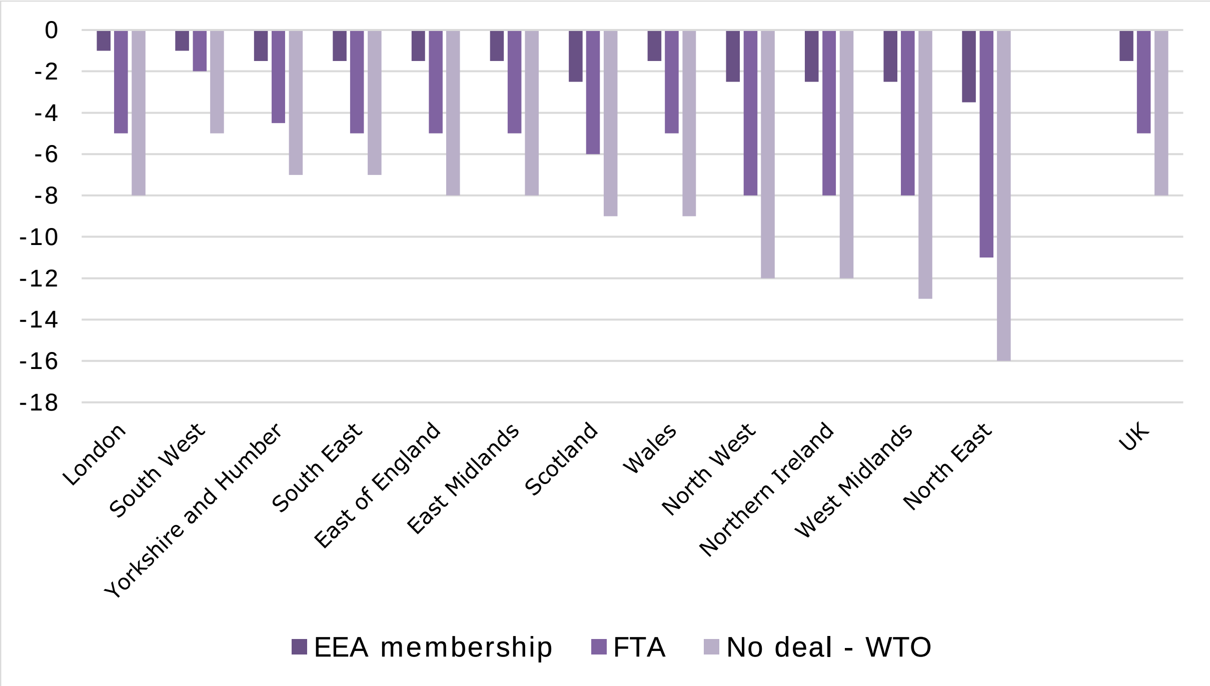
Looking ahead, the Office for Budget Responsibility (OBR) projections imply a hit to public revenue of about £15 billion a year by the early 2020s as a result of Brexit (Levell and Stoye, 2018). These projections use the average estimated growth effects from a number of studies, so effects can be expected to be smaller or larger depending on the actual trading arrangements agreed (or not agreed). Using the growth forecasts discussed above, the Whitehall study projects an increase in annual borrowing in 2033-34 relative to the status quo ranging from just under £20 billion for the Norway model, over £55 billion for the Canada model, and over £80 billion for 'no deal' (House of Commons Exiting the EU Committee, 2018, slide 25). These estimates take account of net budget savings from EU contributions as well as projected increases in customs revenue, but the savings are outweighed by lost revenue due to reductions in trade.

Distributional effects across region, sector, skill and earnings level

How are the effects of Brexit expected to fall across different groups in the population? With regard to differential regional impact, studies have reached some contrasting conclusions. Figure 2 presents Whitehall estimates of the effects of different Brexit scenarios by region. The North East, West Midlands, Northern Ireland and North West are projected to be hardest hit. There is a notable overlap with the regions where living standards are being most squeezed by inflation (Breinlich et al, 2017, reported above). Larger predicted effects on regional growth result from a higher dependence on exports in the regional economy and a greater exposure to a change in trade barriers due to the regional composition of goods and services for export. These are different mechanisms to those driving differential inflation, but if Whitehall projections are right some regions seem to be doubly exposed.

[10] Theresa May on BBC One's Andrew Marr show. https://www.theguardian.com/society/2018/jun/17/theresa-may-nhs-funding-budget-rise-brexit.

Figure 2: Provisional growth projections under three Brexit scenarios: Gross Value Added in 2033 compared to retaining status quo



Source: House of Commons Exiting the EU Committee (2018)

Los et al (2017) use historical data to calculate the share of local economic activity that is dependent on trade with the rest of the EU. Like the Treasury, they find that London and the South East stand to lose least from Brexit, while the North West loses more than 12%, and there are large losses also in Yorkshire and the Humber, the West Midlands and East Midlands and the South West. Notably, between 2000 and 2010 local dependence on EU demand was growing in almost all regions except London, where it was falling: London increasingly competes globally (helped by EU human capital) rather than on a European stage. This study also finds a clear positive correlation between the proportion of Leave voters in an area and the extent to which local employment is dependent on the EU, and the authors suggest that we will see a deepening of regional inequality after Brexit; areas already being left behind will be those most affected by the decision to leave.

The conclusions of Dhingra, Machin and Overman (2017) are rather different. They seek to adjust for the extent to which industries could substitute EU inputs from domestic or other sources, and for differences in the level of likely trade barriers in each sector, and conclude that London and the South East might in fact be the regions most negatively affected by Brexit. First, as the importance of EU trade declines, the South East will lose the advantage of geographical proximity to Europe, and other ports around the country will gain from a greater dispersion of trade. Second, trade barriers are generally higher for services, within and outside the EU, so areas specialising in services will be harder hit than those specialising in goods. This is especially true under a ‘hard’ Brexit scenario, as under WTO rules there has been much less progress in liberalising trade in services than goods. Financial services are at particular risk, because under all scenarios except the Single Market the UK financial sector is expected to lose the ‘passporting’ rights which enable it to operate in other Member States.

Thus in contrast to Los et al (2017), Dhingra et al project that the areas hit hardest will be those which had higher average wages to begin with. However, the authors underline that the differences in expected impacts remain swamped by existing disparities. Further, while the immediate negative impacts are predicted to be smaller in poorer regions, households in these regions may have more difficulty adjusting to those shocks as they start from a more vulnerable position. In addition, the bigger immediate shocks may not be the most negative in the longer run. The authors point to a parallel with the 2008 crisis, in which London and the South East were most sharply affected but recovered more strongly, the size and diversity of the regional economy easing the adjustment process.

In terms of effects on different sectors and groups of workers, Levell and Keiller (2018) estimate that the highest exposed industries are clothing and textiles, transport equipment (including car manufacturing), chemicals and pharmaceuticals, and finance: these export high shares of output to the EU, or purchase high levels of inputs from the EU (or both). The authors identify men as being more likely to be employed in these industries than women, and men with few formal qualifications most of all. The most highly exposed are workers in process, plant and machine operative occupations, who tend to be older men with specific skills: Levell and Keiller note that history suggests these workers may struggle to find equally well-paid work if their current employment were to disappear. The authors also look at regional differences, and argue that differential effects by gender and education level within regions are likely to be greater than average differences between regions, though there are regional differences in the share of low-educated workers employed in the most exposed industries: these industries employ 25% of low-educated men in Northern Ireland and 24% in the West Midlands, compared to 19% in the UK overall.

Note, however, that Levell and Keiller consider only the sectoral effects of new trade barriers with the EU. What happens to particular industries will be affected by other factors too, including what happens to trade barriers with other countries, and, for agriculture, what happens to farm subsidies. Complexity also arises from the fact that the propensity to trade with the EU within a given industry may vary geographically: firms in Northern Ireland may do more EU trade than firms in the same industry in Britain, leaving them more exposed. In short, a great deal of uncertainty remains about how the impacts will play out.

Could some of the negative effects of reduced trade on lower-educated workers be offset by reductions in migration? Migrants from the newer EU Member States, entering from 2004, are known to have moved primarily into low-skilled employment (even though often not low-skilled themselves) (Portes and Forte, 2017). An end to the free movement of labour might therefore be expected to reduce labour market competition faced by British lower-skilled workers, increasing job opportunities and pushing up wages. The Migration Advisory Committee, in its recent review of the evidence of the labour market impact of EU migration, finds that migrants have little or no impact on the employment and unemployment outcomes of the UK-born workforce (MAC, 2018a). Portes and Forte (2017) cite a 2014 review by the Home Office and Department for

Business and Skills which concluded that "to date there has been little evidence in the literature of a statistically significant impact from EU migration on native employment outcomes". This is also true of sub-groups who might be more likely to be affected, such as young people (see e.g. Wadsworth, 2014). Rather than replacing UK-born workers, migration appears to boost overall employment more or less one-for-one (Dustmann, Fabbri and Preston, 2005; MAC, 2018a). On wages, based on existing evidence and its own analyses, the MAC finds that migration is not a key determinate of the wages of the UK-born workforce (MAC, 2018a). Some evidence suggests higher skilled workers benefit in terms of the impact on wages, with small negative impacts on low-skilled workers. For example, Nickell and Salaheen (2015) find a 10 percentage point increase in the share of foreign-born workers in the regional semi-skilled/unskilled service sector leads to around a 2% reduction in wages for UK-born workers in that region and sector. A reduction in migrant workers competing for these jobs might therefore be expected to have similar small positive consequences. Still, these are *small* effects. The MAC report cites Breinlich et al's (2017) finding that the fall in the value of the pound after the referendum vote raised prices by 1.7%, and notes that this is almost certainly a larger impact than the effect on residents' wages and employment opportunities of all the EEA migration since 2004.

Finally, could it be that, via the reduction in the size of the City, Brexit might lead to a fall in very high incomes and therefore in some measures of income inequality? A substantially smaller financial services sector seems a highly plausible outcome of Brexit, though one that is likely to play out over the long-term. The Bank of England has revised downwards its estimates of the immediate "Day 1" impact on City of London jobs: the estimate remains 5-10,000 jobs, but is now at the lower end of that range.[11] Around 250,000 people work in financial services in Tower Hamlets and the City of London, according to statistics on the City of London website, so this a relatively small fraction of the total. Deputy Governor Sam Woods underlined that "the bigger question is where this goes longer term, and that fundamentally depends on what kind of deal is struck"; in particular whether a model of equivalence can be agreed, which would allow some of the benefits of passporting to be retained. Could a reduced financial services sector have positive effects for Britain? On the one hand, one must weigh up job losses, including those in supporting sectors (catering, cleaners, IT services) and lower average income for London; on the other, reduced pressure on London housing, less conspicuous wealth and inequality in the capital, and possibly a boost to other industries in other regions. This last could result from a reverse 'Dutch disease' effect due to a permanently weaker pound; the opposite of what can happen when the discovery of oil leads to an appreciation of the currency, making manufacturing less competitive (see e.g. Krugman, 2016). But there is no evidence that any such effect would outweigh the impact of new trade barriers.

Despite their conclusion that low-educated men are most exposed to new trade barriers, Levell and Keiller (2018) estimate that earnings inequality may fall after Brexit. This is not (solely) a financial services effect but results in part from the fact that men are more affected (and in general better paid) than women, and in part because men

[11] Evidence by Sam Woods, Head of the Prudential Regulation Authority at the BoE, to the Committee on Exiting the European Union, 19 April 2018. 'Bank of England more optimistic on risk of City exodus post Brexit,' FT Thursday 19 April 2018, Caroline Binham.

working in exposed industries tend to be the better paid employees within their education bracket. Thus among low-educated men, highly exposed workers are paid on average 24% more than other low-educated workers, with equivalent figures of 35% for mid-educated workers, and 24% for those with degrees. Brexit may reduce earnings inequality by removing the better-paid jobs for men within each bracket.

Summary

In the short-run, Britain is already worse off in economic terms as a result of the referendum: growth has fallen relative to plausible counterfactuals, likely due to a combination of business uncertainty and the inflation caused by currency depreciation, which has squeezed consumer spending. Inflation has been particularly problematic for those in receipt of working-age benefits, because of the cash freeze on these benefits since 2015. However, unemployment has continued to fall.

Looking forward, there is a strong consensus among economists that Brexit will leave the UK poorer overall in the medium-term, with the size of the effect depending on the nature of future trading arrangements with the EU. If the consensus is correct – and projections to date have been reasonably accurate, although effects have taken longer to show up than anticipated – the consequences will include lower average living standards and less money for public services. The loss of tax revenue is expected to far outweigh the gains from reduced contributions to the EU budget: there is no ‘Brexit dividend’. A ‘no deal’ Brexit remains a possibility at the time of writing; this would have the most negative medium-term economic effects, and would also cause immediate disruption which is hard to assess. One anticipated effect of failure to reach a deal is on food security.

There are divided projections on which regions of the country will be most affected, but either way richer regions in the south are likely to be in a better position to shoulder the burden more easily, because they are starting from a stronger position and because the diversity and flexibility of the capital’s economy should allow a quicker recovery, as happened after the 2008 financial crisis. More important than regional differences may be differences by gender and education level, with men, and especially lower-educated men, most exposed. Older men with specific skills working in relatively well-paid jobs in process, plant and machine operative occupations appear at highest risk. There may be some potential positives: less pressure on London’s housing from overseas investors could improve affordability, while a reduction in the size of the financial sector in London could mean a permanently weaker currency, encouraging a rebalancing of the economy towards other industries in different parts of the country. Together, a smaller financial sector, along with losses of better-paid male jobs, could mean that the UK becomes a little less unequal, but this outcome looks less certain than that the country will be poorer overall.

Part II: Direct implications of leaving the EU for social policy

In this part of the paper we turn to consider the more direct implications Brexit may have for social policy and social rights. We explore the implications first, of withdrawal from EU labour, social protection and human rights instruments (2.1); and second, of withdrawal from the single market, including its provisions for the free movement of workers. With respect to the latter, we consider the impact both on the rights of 'mobile citizens' in the UK and EU (2.2) and on public services (2.3). A final section examines new freedoms the UK may gain over regional economic policy and industrial strategy (2.4).

2.1 Withdrawing from European labour, social protection and human rights instruments: the implications for citizens' freedoms, rights and principles

The EU can make laws in the form of regulations and directives[12], both of which are legally binding (Albors-Llorens, 2016). The EU's authority to make laws comes from treaties which are agreed to by member countries (Wyatt, 2016), and the laws are enforced by the Court of Justice of the European Union (CJEU). Importantly EU law takes supremacy over any conflicting laws of member states and also confers rights to EU citizens, for example freedom of movement and non-discrimination (Albors-Llorens, 2016). EU citizens can use these laws in court against governments and others if they are in breach of them (ibid). More background detail on citizens' rights under EU law, and the freedoms, rights and principles brought together in the Charter of Fundamental Rights, is provided in Box 1.

The relationship between EU and UK law on rights has been dynamic and interactive: at times the UK has made more progressive changes that have then been incorporated in EU law; in other cases the EU has pushed the UK forward (Fredman, Young and Campbell, 2018; House of Commons Women and Equalities Committee, 2017). For example, the UK was ahead of the EU in terms of legislating against race discrimination and disability discrimination, but protections against sexual orientation-, religious- and age- discrimination were only introduced into UK law as a result of EU law (ibid). EU law has had greatest impact on UK law in relation to sex discrimination and work-life balance legislation, such as maternity and parental rights. There have also been important EU developments for the rights of precarious workers in the form of a number of directives: the Part-Time Workers Directive, the Fixed Term Workers Directive and the Agency Workers Directive, which commentators have argued were protections unlikely to be gained under UK law given the backdrop of zero hours contracts (Fredman et al, 2018).

Though quite separate from rights legislation, it is worth briefly mentioning the Open Method of Coordination (OMC). This is the EU's mechanism of using the regular publication of social indicators to try to secure progress in social rights and most recently to support the Europe 2020 targets for the reduction of the number of people living in

[12] There are differences between regulations and directives: regulations have to become part of national law as soon as they are passed while directives outline an objective but leave it to the individual member states to pass their own laws to achieve it (Albors-Llorens, 2016).

poverty, material deprivation or jobless households (Cantillon, Goedemé and Hills, 2018). Leaving the EU will mean the UK is no longer automatically included in tables and figures comparing Member States on social progress, which will certainly be a loss to researchers. In terms of outcomes, however, Cantillon et al (2018) argue that the approach has in practice failed to make real progress in reducing poverty, because the link between the indicators and policies has not been adequately articulated, and difficult trade-offs have not been made explicit. Thus the UK's withdrawal from the OMC may in practice make little difference to those it was designed to help.

Below we first consider what might happen to human rights protections in the UK after Brexit, before focusing on workers' rights in particular.

Box 1 What is the Charter of Fundamental Rights and how important is it?

EU citizens have gained rights in different ways and at different times. The European Union Charter of Fundamental Rights sought to bring these into one place whilst also updating rights and strengthening some rights by making them more explicit (European Commission[13]).

The Charter is based on the following (Equality and Human Rights Commission, 2016[14]):

- The European Convention on Human Rights (1950) which includes civil and political rights (this became part of UK law with the Human Rights Act 1998)
- The Council of Europe's Social Charter (1996) which includes social and economic rights
- The Community Charter of Fundamental Social Rights of Workers (1989) which focused on workers' rights and which was declaratory rather than binding but was instrumental in a number of directives including the Working Time Directive. (The UK was initially the only member state to refuse this charter but then agreed in 1997).
- Common law and constitutional law of EU member states
- Other international conventions to which the EU and member states are party.

The charter includes six chapters on freedoms, rights and principles: (see Bojarski, Hofbauer and Mileszyk (2014) pp.12-20 for a fuller summary of rights for each chapter):

1) **Dignity** (articles 1-5) including the right to life, prohibition of torture, slavery and the death penalty (mostly based on the European Convention of Human Rights)
2) **Freedoms** (articles 6-19) including freedom of expression, religion, information, right to privacy, protection of personal data, asylum for refugees
3) **Equality** (articles 20-26) including prohibition of all discrimination including disability, age, sexual orientation and the rights of children and the elderly
4) **Solidarity** (articles 27-38) covers social and workers' rights including the rights to fair working conditions, collective bargaining and action, protection against unjustified dismissal, maternal and paternal leave, access to healthcare, social and housing assistance
5) **Citizen's rights** (articles 39-46) including the right to move freely within the EU, the right to vote in an election of EU parliament, right to petition,
6) **Justice** (articles 47-50) including the right to a fair trial, effective remedy, to be advised and have legal aid, to defence, presumption of innocence

The charter became legally binding when EU member states entered the Treaty of Lisbon (2009) and it was given the same legal status as the treaties (Equality and Human Rights Commission, 2016). It applies to EU institutions and bodies as well as all 28 EU member states when they are acting 'within the scope of EU law' (Bojarski et al, 2014, p.8, 22; Barnard, 2008, pp.5-6).

There has been some debate about whether the charter applies to the UK or whether the UK, with Poland, opted out via a protocol inserted into the Charter to make more explicit that the Charter does not create any new rights or extend the powers of the Court of Justice of the European Union over UK and Polish law (O'Neill, 2011a). Contributing to this ambiguity it seems the effect of the protocol was exaggerated by the government to Eurosceptics whilst at the same time played down to other concerned audiences (Barnard, 2008). However, a government inquiry concluded that there "is in fact *no doubt* that the legal force of the Charter extends to UK law" (House of Commons European Scrutiny Committee, 2014, p.12). More significantly, in practice it has not been treated as an opt out: even before it was made legally binding the Charter has been relied upon in UK courts (O'Neill, 2011b) and whilst some have highlighted the limitations of the charter, it has influenced the rights of UK citizens in important ways (Fredman et al, 2018). A recent example of this can be found in the tobacco industry's unsuccessful challenge to the new rules on plain packaging of cigarettes; both the CJEU and the High Court in London used the right to health in article 35 of the charter in their successful counter-argument (Roderick and Pollock, 2017).

Protection of human rights in Britain after Brexit

When the UK exits the EU, the UK will still have the protections set out in the Human Rights Act (1998), which incorporates into UK law the human rights set out in the European Convention of Human Rights (Equality and Human Rights Commission, 2017). As the Convention is part of international (not EU) law, the resulting rights and obligations are enforced through the domestic courts and the European Court of Human Rights not the CJEU. Although the rights in the Convention will not be directly affected by Brexit, they do not provide a substitute for the Charter which has a wider scope incorporating social and economic rights as well as the civil and political rights provided by the Convention (O'Cinneide, 2018). The European Social Charter[15] (a Council of Europe treaty) will still apply, which does include social rights, but in practice this involves reporting to the Council of Europe and there is no judicial enforcement of these rights. Additionally, some rights will be protected by the UK Equality Acts (2006 and 2010) (Equality and Human Rights Commission, 2017), though similarly these are narrower in scope compared with the Charter, restricted to protection against non-discrimination (Fredman et al, 2018). Furthermore, in the absence of a UK written constitution[16] these rights are not constitutionally protected and so can be amended or repealed at any time; the EU law that may no longer apply to the UK has arguably operated as a 'constitutional protection of equality rights' and so provides stronger protection of rights (ibid, p.5).

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[13] https://ec.europa.eu/info/aid-development-cooperation-fundamental-rights/your-rights-eu/eu-charter-fundamental-rights/why-do-we-need-charter_en
[14] https://www.equalityhumanrights.com/en/what-are-human-rights/how-are-your-rights-protected/what-charter-fundamental-rights-european-union
[15] The UK has signed but not yet ratified the 1996 updated Social Charter.
[16] Many countries which do have a written constitution have a 'codified equality clause' and because most constitutions are difficult to amend this means 'equality as a free-standing principle is deeply embedded and protected' (House of Commons Women and Equalities Committee, 2017). Without such a constitution the UK does not have this level of protection.

A key issue in relation to UK rights after Brexit concerns whether or not the EU Charter of Fundamental Rights is retained in UK law. The government has proposed through the EU (Withdrawal) Bill that the Charter will *not* be retained, while other EU law and the general principles of EU law will be (Fredman et al, 2018). A number of organisations have lobbied for this decision to be reversed (Equality and Human Rights Commission, 2018) and an amendment to retain the Charter was debated in parliament but has since been rejected (Institute for Government, updated 21st June, 2018[17]).

The government's decision not to retain the Charter of Fundamental Rights poses a number of risks for human rights protection post-Brexit. Experts have argued that without the Charter there are important gaps in UK human rights legislation and a weakening of equality protection (House of Commons Women and Equalities Committee, 2017), including the free-standing right to non-discrimination[18] (the UK Equality Act 2010 covers specific anti-discrimination rights in specific contexts); the rights of the child; and the right to dignity (Coppel, 2018) as well as the right to health (Roderick and Pollock, 2017). The common law might help fill some gaps but is still limited in scope: it does not provide any explicit equality or non-discrimination protections, while "clear and specific wording in legislation will override the common law" (Fredman et al, 2018, p.5). It will also be harder for individuals to claim their rights and seek legal redress when rights are violated, as EU law played an important remedial role with strong mechanisms for enforcement (Coppel, 2018; Harvey, 2018) and ensured adequate levels of compensation to individuals (Fredman et al, 2018). Furthermore, the current proposal in the EU (Withdrawal) Bill, to retain the fundamental principles of EU law but not the Charter, is likely to cause legal confusion and uncertainty as the fundamental principles and the Charter are difficult to separate and often referred to 'in tandem' and so it is hard to determine which fundamental rights exist independently of the Charter (Fredman et al, 2018).

There is also concern that existing rights in UK law will be eroded. As noted above, the Equality Acts (2006 and 2010) are not protected in a written constitution (while EU law operates as a constitutional protection of rights) and so can be amended (Fredman et al, 2018). It is worth noting that even were the Charter to be retained into UK law, the same change in legal status would still apply as it would become domestic law, losing the protection it currently has as being enforceable by the CJEU and so rights would still be vulnerable to being watered down. There is also a serious risk that as EU law continues to develop in line with social progress UK law will fail to keep pace.

Withdrawal from the Charter could, in addition, pose a challenge to the terms of the Good Friday Agreement (GFA), which requires equivalence of rights between Northern Ireland and the Republic of Ireland. Any gap opening up between the UK and the EU, either as a result of the repeal of existing rights or failure to keep up with further progress in the EU, could undermine the GFA (Murray, O'Donoghue and Warwick, 2018).

Do we have cause to believe that, post-Brexit, rights would in fact be weakened? O'Cinneide argues it is unlikely that there would be an immediate "bonfire of rights-

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[17] https://www.instituteforgovernment.org.uk/explainers/eu-withdrawal-bill-amendments-and-debates

[18] It is often understood that Article 14 of the Human Rights Act only applies in relation to convention rights.

protective EU legislative instruments" (2018, p.5); just because laws can be amended it does not necessarily follow that they will be. However, there are reasons to believe that there is a real risk to rights after Brexit. UK governments have over the years had a record of opposition to the adoption of certain rights: for example, the UK was concerned about the introduction of social and economic rights in the Charter and wanted these downgraded to 'principles' rather than rights (Barnard, 2008). UK governments of both parties have also been reluctant to introduce a number of workers' rights, which may be particularly at risk, as discussed further below (Ford, 2016). As well as potentially losing existing rights, Brexit would almost certainly mean UK citizens miss out on EU progress on rights made post-Brexit (Coppel, 2018; Harrison et al, 2017), such as the work life balance initiative currently being developed (Fredman et al, 2018). This could be avoided if a modified form of the 'mirror principle' was developed, similar to the relationship between the Human Rights Act 1998 and decisions of the European Court of Human Rights, where the UK could keep pace with CJEU case law on equality as it evolves (Fredman et al, 2018). This would also help reduce uncertainty around the interpretation of retained EU law and the role of the CJEU after Brexit.

A focus on workers' rights

The EU has played an important role in the development of workers' rights in the UK, including a number of important directives such as the Working Time, Part Time Workers, Fixed Time Workers and Agency Workers Directives (Gumbrell-McCormick and Hyman, 2017; Ford, 2016). Prime Minister Theresa May has promised to protect workers' rights whilst she is in government, but there is no guarantee that these rights will be protected by future governments (Tudor, 2017). Indeed, they may be particularly vulnerable to being repealed post-Brexit. First, there may be pressure to create a "business friendly" environment with a low regulation economic model, in order to attract investment once the UK is outside the EU (O'Cinneaide, 2018). These pressures are likely to be higher in the scenarios with the most negative effects on GDP growth, thus in the 'harder' forms of Brexit discussed above.

Second, there is uncertainty about the impact of new trade deals. Certain rights are likely to be protected as a requirement of ongoing trade relations with the EU, creating another reason rights look to be less at risk if the future UK-EU trade relationship is closer (Harvey, 2018; O'Cinneide, 2018; Ford, 2016). For example the UK could end up signing an agreement to track improvements in EU law and translate these into UK law, as a condition of an EU trade deal. But in harder Brexit scenarios, or in the case of no deal, the UK may prioritise commercial interests and deregulation in attempts to secure trade deals with other countries (Harrison et al, 2017). Harrison et al (2017) propose a framework, 'Protect, Promote, Empower', which calls for trade agreements to ensure, as a minimum, the protection of existing rights; they suggest that trade negotiations could empower those who represent workers' rights by having trade union representatives involved in the negotiation of future trade deals (ibid, p.30). But note that the UK is expected to be in a weak bargaining position in terms of trade negotiations (Gumbrell-McCormick and Hyman, 2017); these can be complex and time consuming and the UK lacks expertise, having previously been part of EU trade teams (Mott et al, 2018). This could potentially make it more difficult to ensure employment rights are protected, even if the UK negotiators have this as a goal.

Finally, we know that earlier Conservative governments vetoed directives governing working regulations, and when they were implemented this was done only in line with minimum requirements (Ford, 2016). The Working Time Directive, which protects workers' rights to rest, maximum working hours, paid annual leave and protection for night workers, is a good example of likely targets for amendment. The UK initially tried to reject this Directive, implemented it two years after the deadline, tried to exploit loopholes, and ultimately implemented legislation to protect employers against financial liability (ibid). The government has faced numerous challenges from the CJEU due to the minimalist implementation (ibid). It seems reasonable, then, to see the Working Time Directive as vulnerable to dilution post-Brexit.

Fewer regulations, or some might say restrictions, based on the Working Time Directive might be in the interests of businesses, allowing greater flexibility to employers, and potentially boosting incomes. It has also been argued that it might be in the interests of some employees, allowing them to work longer hours thereby earning more through working overtime (Dobbins, 2017; Clift and Parker, 2018). But many employees are already able to voluntarily opt out of the Directive and work overtime (Dobbins, 2017). Without the directive there would be very limited legal protection against long working hours in the UK and no legal requirements for rest breaks, as common law offers little protection (Ford, 2016).

There are areas in which UK provision currently exceeds EU minimum standards, including entitlement to more generous annual leave, the right to flexible working and more generous maternity leave as well as paternity leave (Department for Exiting the European Union, no date given). But other aspects of working conditions could be more at risk, including those related to health and safety, protection of employees' terms and conditions when transferred to new companies (the TUPE Regulations), rights to payment when an employer becomes insolvent, collective rights and protection of pregnant workers (Ford, 2016). Women are particularly vulnerable to the loss of workers' rights as they are more likely to work part time and have temporary contracts, in addition to potentially losing out on rights gained for pregnant workers and any narrowing of sex discrimination law (TUC, 2016; Mott et al, 2018). Roache also raises particular concerns about the loss of protection of rights that were gained from the EU for LGBT+ workers and workers with disabilities (Roache, 2018a; 2018b).

A British Bill of Rights?

There is nothing inevitable about the erosion of rights after Brexit; leaving the EU could provide an opportunity for the UK to forge its own path, perhaps creating superior levels of protection for rights that extend beyond EU provisions, for example in the form of a comprehensive written bill of human rights. In reality, many EU directives explicitly provide a floor to rights rather than a ceiling; stronger protection is already possible (Ford, 2016). But the UK would be free from CJEU case law, which places restrictions on some methods of pursuing equality goals, for example through affirmative action (Fredman et al, 2018). And of course whatever path is taken, there is a good case that it will be more democratic: UK voters will have greater control over the level of protection offered, rather than having rights enforced from above by Brussels.

However, the regulation of rights cannot be considered in isolation from the social, political and economic context. O'Cinneaide (2018) highlights the relevance of the "divisive backdrop of acrimonious political debates about immigration, equality rights, devolution and the United Kingdom's continuing relationship with Europe" (p.7). He argues that there is a risk that new legal standards "will be framed with an eye on achieving short term political gains or to appease special interests or particular segments of the electorate" (ibid). The significance of the social and political context for the rights agenda is also highlighted by Harvey who observes that "this looks like a world that will not be friendly to an inclusive culture of respect for human rights and human dignity" (2018, p.4). Further, the possibility that workers' rights in particular may fall subject to pressures to attract investment and negotiate new trade deals has been noted. If workers' rights become a trade bargaining chip there is a weaker case that this is an area where UK voters will be gaining greater control.

There are things the UK government could do in principle to make a commitment to protection of rights. The Trade Unions Congress (TUC) supports the idea of ensuring ongoing commitment to "a level playing field between the UK and EU's social legislation, and enforcement with material consequences through independent arbitration" (Tudor, 2017). The TUC also calls for constraints to be placed on the Supreme Court's powers to change workers' rights and for any change to employment rights to require primary legislation as well as a non-regressive clause on workers' rights (ibid). But in the absence of a written constitution, such commitments would be subject to change by future governments – and may not survive the challenges of difficult trade negotiations.

Summary

There are some very real concerns about what will happen to the social and employment rights of UK citizens after Brexit. One key issue is the Charter of Fundamental Rights: this will not be incorporated into UK law, and will leave gaps in UK human rights legislation, including the free-standing right to non-discrimination, the rights of the child, and the right to dignity. In addition, after leaving the EU and no longer being subject to the CJEU other rights, currently covered in the Equality Acts of 2006 and 2010, will be at risk, as these are not constitutionally protected in the UK and so are open to amendment. Workers' rights are a particularly vulnerable area, as past UK Governments have tried to push back against EU directives on working time and the rights of part-time and agency workers and there may be pressure to create a business friendly, low regulation environment. More vulnerable groups of workers, including women, LGBT+ workers and those with disabilities, could be particularly at risk as a result. In addition to existing rights being vulnerable to erosion UK citizens will no longer benefit from future progress on rights in the EU.

There is nothing inevitable about the unravelling of rights after Brexit, and a number of proposals have been put forward to try to ensure they are protected going forward. Aside from the retention of the Charter (an amendment which has now been rejected), these suggestions include the adoption of a modified form of the 'mirror principle', similar to the relationship between the Human Rights Act 1998 and decisions of the European Court of Human Rights, where the UK could keep pace with CJEU case law on equality as it evolves; and constraints being placed on powers to change workers' rights, with any change to employment rights requiring primary legislation.

However, the extent to which rights are likely to be protected will depend on the form that Brexit eventually takes. For one thing, there will be greater pressure for deregulation in the case of a sizeable shock to the UK economy, and hence in the case of 'harder' forms of Brexit, and particularly a no deal scenario. Indeed, deregulation could be seen as a way to mitigate some of the economic effects discussed in Section 2.1. Second, commitment to matching EU social and employment rights could very well be a condition of a close trade relationship with the EU. If such an arrangement is not reached, rights might become vulnerable in attempts to secure trade deals with other countries.

In principle, Brexit will allow Westminster to 'take back control' over decision-making on rights legislation. If this means diluted protection compared to that imposed by Brussels this could be argued to be a democratic outcome, even if it is hard to imagine that voters had this in mind when they went to the polls in the referendum. At the same time, if workers' rights end up a bargaining chip in trade negotiations, it is less clear that UK voters will really be gaining greater control.

2.2 EU citizens in the UK and UK citizens in the EU: the implications of an end to free movement for the rights of mobile citizens

The implications of Brexit for the 'free movement' of people has been a critical issue in the negotiations on the UK's withdrawal from the EU. Those implications concern the status and the rights of EU citizens living in the UK (nationals of the 27 other EU member states, and also nationals of the other EEA states); the status and rights of UK citizens living in another EU country (or EEA state); and also the status and rights of EU/UK citizens who move to the UK/another EU country in the future, after the withdrawal of the UK from the EU.

All EU citizens have a right 'to move and reside freely within the territory of the Member States' (Article 21, Treaty on the Functioning of the European Union)[19]. However, their rights to reside in another EU country, beyond three months of entry, are subject to the conditions of residence set out in the EU Free Movement directive (Directive 2004/38/EC). EU citizens have rights of residence on the basis of being a worker/self-employed or (if not in work) being self-sufficient, having "sufficient resources for themselves not to become a burden on the social assistance system of the host Member State" and "comprehensive sickness insurance" (Article 7, Directive 2004/38/EC). Family members of the economically active/self-sufficient EU citizen also have rights relating to free movement, including family members who are non-EU nationals (so-called 'third country nationals'). After five years of continuous residence in a country as a person exercising free movement rights, the EU citizen and their family members are entitled to permanent residence.

The free movement of EU citizens has been accompanied by rights to social security provision across the EU. Although social security systems are national systems, a system of coordination at the EU level (Regulation 883/2004/EC; Regulation 987/2009/EC) has operated as a means of ensuring that social security entitlements are not an obstacle to free movement (Verschueren, 2017). This system of coordination operates on the principles of equal treatment (between national and non-national EU citizens of a country); one country only (into which contributions are paid and the system of coverage, at any given time); aggregation (of periods of insurance, work or residence for the provision of benefits); and exportability (of cash benefits to the country of residence) (Regulation 883/2004/EC). While all mobile EU citizens are entitled to social security in the member state in which they reside, only workers/those self-employed and their family members have *full* entitlement to social assistance on the same basis as nationals of that country, according to the residence requirements (Dougan, 2016). Thus, EU citizens' social rights are differentiated as "workers get the most rights, and non-economically active citizens the fewest" (Doherty, 2016, p.377). Permanent residence, after five years of residence, confers full access to social rights. The UK government, prior to the Brexit referendum, adopted an increasingly restrictive approach to interpreting the rights of EU citizens to claim income-related benefits in the UK on the basis of the residence conditions (O'Brien, 2015; Harris, 2016; Shutes, 2016).

[19] Those rights extend to nationals of other states within the European Economic Area.

Further tightening of access to those benefits (including for workers) was also a key element of the proposals for negotiating the terms under which the UK would have remained in the EU.

Rights to free movement have facilitated the mobility of people to the UK from other EU countries, and likewise the mobility of people from the UK to other EU countries. Since the early 1990s there has been an increase in the total number of EU-born people living in the UK[20] - from 1.1 million people in 1993 to 3.7 million in the first quarter of 2017 - with a marked increase since the early 2000s, reflecting the increase in the number of people from the EU accession states (states that joined the EU from 2004 onwards) (Vargas-Silva and Markaki, 2017, p.4). Work has been a key reason for people moving to the UK from other EU countries, both to take up a job or find work: among the EU-born population in the UK, 2.4 million were in work (employees and self-employed) in 2017 (Vargas-Silva and Markaki, 2017, p.4).

The UK-born population living in other EU countries has also shown an upward trend since the early 1990s, nearly doubling in size by 2015[21]. The number of UK-born people living in another EU country was estimated at 1,216,000 in 2015, with an additional 21,000 living in the wider EEA (Benton, 2017, p. 6). Reasons for migration to other EU countries are mixed, varying for different countries, including for work and study but also for quality of life. Relatively high levels of UK migrants to Spain compared to other countries, for example, report being economically inactive, including but not exclusively older people who have retired (Benton, 2017).

An end to free movement has implications for the rights of UK/EU nationals (and some non-EU nationals to whom the legislation applies) to move between, live, work and study in the UK/EU, and to access social provision within and across these countries (including social security benefits and pensions, healthcare and housing). These changes will thus also affect the decision-making of people with regard to their circumstances: whether they decide to leave the UK, or conversely stay, over the coming months and years because of Brexit; whether they decide to return to the UK from another EU country; whether they decide to take up work or study opportunities in another EU country instead of the UK.

Already, since the Brexit referendum, a decline in net migration of EU nationals to the UK has been noted (Portes, 2018; Vargas-Silva and Markaki, 2017). At the same time, there has been a marked increase in applications for UK citizenship by EU nationals in the UK (Home Office, 2018), potentially as a means to attain security of rights to remain in the UK. The evidence to date suggests significant concerns among both EU nationals in the UK and UK nationals in other EU countries as regards their status, rights and entitlements, including the terms and conditions for staying in the countries where they are currently living, the terms and conditions for moving between different countries, and their access to social provision (Benton et al, 2018). Further complexities have also been highlighted with respect to the circumstances of 'mixed status' families (Yeo,

[20] Overall stocks, rather than inflows, of people born in another EU member state who are living in the UK.
[21] See Benton (2017) p.7 for an overview of some of the difficulties of estimating the population of EU nationals/UK nationals in different countries.

2018): for example, a British national and their EU national partner; a British child and their non-EU national parent/primary carer.

An end to free movement has implications not simply for the rights and entitlements of people who have moved, or will move, between the UK-EU, but for a wide range of social policy related issues: for people's access to work and social provision; for family relations; for the provision of services that have relied upon intra-EU migrant workers (as discussed in the following section); and for inequalities, among other issues. Here, we focus on changes affecting the status and rights of EU citizens living in the UK and UK citizens living in another EU country, and reflect on the (more uncertain) status and rights of people who move between the UK/EU in the future.

The rights of EU citizens living in the UK and UK citizens living in another EU country

So far, the Brexit negotiations have focused on the rights of EU/UK citizens currently living in the UK/another EU country: those who have (or will have) moved prior to Brexit (and, as things stand, the subsequent two-year transition period). The draft Withdrawal Agreement provided greater clarity on these citizens rights after Brexit, outlining the rights of EU nationals living in the UK, and the rights of UK nationals living elsewhere in the EU (European Commission, 2018). Citizens groups have thus argued for the citizens' rights component of the Withdrawal Agreement to be ring-fenced, so that those rights are guaranteed irrespective of the outcomes of the withdrawal negotiations overall (House of Commons Library, 2018a). Indeed, in the event of a 'no deal' Brexit, and in the absence of any guarantee regarding existing rights, there would be considerable insecurity and uncertainty for people – both EU citizens in the UK and UK citizens in the EU – and their families.

Under the draft Withdrawal Agreement (WA), EU/UK citizens who are currently residing in the UK/another EU country, as well as those arriving during the two-year transition period following the UK's anticipated exit from the EU (from end of March 2019), will continue to have the same rights under EU law to reside in that country (WA, Article 9, 2)[22]. Their family members, including those who are non-EU nationals, will also continue to have those rights (WA, Article 12). This includes the right to acquire permanent residence after a period of five years of continuous legal residence – on the basis of time spent in the respective country prior to and after the Brexit transition period ends (so long as they arrive before that period ends)[23]. Once obtained, permanent residence can only be lost through absence from that country for a period of more than five consecutive years (WA, Article 14).

For EU nationals living in the UK (up to the end of the transition period), a system will be introduced for acquiring a new 'temporary status' and 'settled status', the latter conferring a right to permanent residence in the UK (Department for Exiting the European Union and Home Office, 2017). All EU nationals who wish to remain in the UK will be required to apply for settled status (irrespective of whether they already have

[22] Rights reflected in the Free Movement Directive (2004/38/EC).
[23] Existing family members (e.g. current partners) can still join them after the end of the transition period.

documentation of permanent residence rights), with a cut-off point for applications[24]. The UK government has, in principle, committed to a less restrictive process for obtaining the new settled status compared to the existing system for documenting permanent residence (which required evidence of five years continuous residence as a worker, self-sufficient person or family member). The proposed new system waives the requirement to have proof of 'comprehensive sickness insurance' as evidence of self-sufficiency. It also waives the test of 'genuine and effective work', to evidence being a worker, which included a minimum earnings threshold (Department for Exiting the European Union and Home Office, 2017).

While the application process for settled status is intended to be less onerous, issues remain concerning the potential exclusion of some groups. Those issues concern knowing about the system and the need to apply, the ability to navigate the system, and the ability to provide evidence of residence in the UK for five years (Sumption and Kone, 2018). Certain groups, such as people who have been in the UK for many years, children, and people who have previously (and potentially wrongly) been denied permanent residence under the more restrictive existing system, may not know about the need to apply, may consider themselves ineligible, or they may be dependent on the actions of others to apply on their behalf (ibid). Some migrants may be less able to apply for a variety of reasons, including language, age or disability related barriers. And some may have greater difficulty in providing evidence of living in the UK for the required period, including non-working partners, unpaid carers, and people working cash-in-hand, who do not have proof of address in their name or proof of employment in the UK (ibid; Shutes and Walker, 2018). The experience of members of the 'Windrush generation' of Caribbean migrants, whose rights as Commonwealth citizens to live in the UK were maintained in the 1971 Immigration Act, illustrates the way that legal rights in principle may be insufficient in the absence of documentation procured at a particular time. Decades after arrival, individuals lost employment, were denied access to healthcare, and in some cases were deported, because they or their parents had never applied for British citizenship (Gentleman, 2018).

In addition to changes affecting the status and rights of different groups to reside and move between the UK/another EU country, Brexit has implications for the associated social rights of those groups. Rights under EU law to free movement have been accompanied by a range of social rights to facilitate intra-EU mobility. These include rights to work, to equality of treatment in employment and self-employment, to social security, healthcare and higher education. The effects of Brexit on these social rights requires consideration of the past, present and future circumstances of people in relation to their place of work and residence. There will be differences between the rights of people currently living and/or working in the UK or another EU country (before the end of the transition period); the rights of people who have lived/worked in those countries in the past; and the rights of people who go to those countries in the future (after the transition period ends) to live/work (Verschueren, 2017).

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[24] The deadline for submitting the application should not be less than six months from the end of the transition period (WA, Article 17 b).

Under the terms of the draft Withdrawal Agreement, EU/UK citizens living in the UK/another EU country prior to the end of the transition period (who in the UK obtain 'temporary' or 'settled' status), will continue to have their social rights under EU law protected beyond Brexit (WA, Article 28). EU regulations on the coordination of member states' social security systems (Regulation 883/2004/EC; Regulation 987/2009/EC) will continue to apply, so that people will still be able to aggregate previous periods of insurance, work or residence[25] in other EU countries when claiming benefits and pensions. And they will continue to be able to export benefits (House of Commons Library, 2018a)[26]. For example, a German national living in the UK and retiring in 20 years time would still be entitled to a state pension based on time worked in Germany prior to coming to the UK (and paid by the pension authority in Germany), in addition to a state pension proportionate to time worked in the UK. The EU's reciprocal healthcare arrangements will also continue to apply for those who have moved prior to the end of the transition period. For example, a UK national living in Spain would still be entitled to healthcare in Spain (paid for by the UK) on the basis of EU reciprocal healthcare arrangements (House of Lords European Union Committee, 2018).

Under the terms of the draft Withdrawal Agreement, the coordination rules on social security would also continue to apply to people who had moved in the past (WA, Article 28). So, for example, a UK national who lived and worked in France in the past for a period of time, but has since returned to the UK, would still be covered by the rules with respect to claiming their pension.

The rights of EU citizens and UK citizens who move in the future

While the withdrawal negotiations have centred on the rights of EU/UK citizens who have exercised their rights to free movement (up until the end of the Brexit transition period), the status and rights of EU/UK citizens who move in the future are far less clear. Assuming that the UK leaves the single market and the corresponding system for the free movement of people, EU nationals coming to the UK after the transition period ends will be subject to UK immigration control. Various models of a post-Brexit immigration system have been debated. These include a variant of the current system for non-EU nationals, involving some form of work permit for EU nationals coming to the UK to work, and similar arrangements for those coming to study or as family members (Portes, 2017). Whether EU nationals in effect become like non-EU nationals – subject to the same regulations that exist for non-EU nationals migrating to the UK – is to be determined. As noted in section 1.2, this is the recommendation of the government's Migration Advisory Committee.

[25] Residence under the coordination of social security systems refers to 'habitual residence' in a country, which is distinct from rights of residence relating to the Free Movement directive.

[26] As the UK will need to continue to implement the social security coordination rules for the lifetime of those to whom they apply, the UK will continue to have observer status at the Administrative Commission for the Coordination of Social Security Systems. However, the UK may not be required to apply any changes to the rules after the transition period ends (e.g. changes affecting which cash benefits can be exported from one country to another) (House of Commons Library, 2018a).

As regards the social rights of EU nationals and their family members moving to the UK in the future, existing rights to social security and to healthcare in the UK will potentially end. And the existing rights of UK nationals and their families moving to EU countries after this period will also potentially end. The future social rights of EU/UK nationals who wish to move to the UK/an EU country remain to be negotiated under the terms of any future relationship between the UK and the EU. That relationship could potentially include some form of continuation of rights to social security for people coming to work in the UK from other EU countries and vice versa. And it could include a continuation of reciprocal healthcare arrangements, as advocated by the House of Lords European Union Committee (2018). In its White Paper on the future relationship between the UK and the EU, published in July, the Government outlined its intention to retain cross-border social rights for people moving in the future:

> "The UK will seek reciprocal arrangements on the future rules around some defined elements of social security coordination. This will be important for UK nationals who want to live, work or retire in the EU in the future, as part of our new arrangements. This could cover provisions for the uprating of state pensions, including export rules and accompanying aggregation principles for people who have contributed into multiple countries' systems. It would also ensure workers only pay social security contributions in one state at a time. There should be reciprocal healthcare cover for state pensioners retiring to the EU or the UK, continued participation in the EHIC scheme and cooperation on planned medical treatment. This would be supported by any necessary administrative cooperation and data-sharing requirements." (HM Government, 2018b, pp.34-35)

Given the centrality of mobility and migration – to business, the labour market, public services, and people's lives – these issues are of critical importance in thinking about both formal and informal arrangements for social protection in the future.

Summary

A post-Brexit UK and Europe is likely to entail considerable complexity around the social rights of different groups of people and their family members. New lines of inclusion and exclusion may emerge within as well as between the categories of the UK, EU and non-EU citizen. For example, UK nationals in the UK who move to another EU country after Brexit may find themselves no longer entitled to social security provision in that EU country, or with more limited entitlements, compared to UK nationals who moved to that country as EU citizens before Brexit. By contrast, UK nationals legally residing in an EU country before Brexit who then move to another EU country may be entitled to social security provision in that country as a non-EU/'third country national' legally resident in an EU state who moves (for whom social security rights apply under the current EU regulations). Within this context, inequalities in mobility and social rights are likely to emerge not only in principle but also in practice, on the ground, in the delivery of social provision, in experiences and outcomes.

More positively, facilitating access to permanent residence (settled status in the UK) for EU/UK nationals living in the UK/another EU country over the transition period may potentially enhance access to social rights for some groups already living in those countries – providing they go through the procedure for acquiring settled status at the correct time. Prior to the Brexit referendum, an increasingly restrictive approach was in place in the UK in determining EU nationals' access to social benefits on the basis of the residence criteria. And the Government's previous proposals for the UK remaining in the EU, if realised, would actually have placed *greater* restrictions on the social rights of EU citizens in the UK than what has been negotiated under the draft Withdrawal Agreement – though, of course, what has been negotiated so far only extends to EU citizens currently living in the UK. By facilitating access to permanent residence, EU nationals in the UK will, in principle, be less likely to be excluded from access to social benefits and other types of provision, including healthcare. However, those who do not obtain settled status may be entirely excluded from or subject to greater restrictions on access to provision. Divisions between those in higher-skilled and higher-paid jobs and those in low-paid work are also likely to affect security of status and social rights. For EU citizens coming to the UK in the years beyond Brexit, and UK citizens moving to the EU, the negotiations of the future UK-EU relationship will be key to determining those rights. But there seems a high risk that the most vulnerable will be those most likely to lose entitlements.

2.3 Withdrawing from the single market and free movement of workers: the implications for public services

This section evaluates what leaving the single market, and in particular an end to the free movement of persons between the UK/EU, might mean for public services. There has already been a sharp fall in net migration from the EU since the referendum (Portes, 2018), and while there is considerable uncertainty about the post-Brexit immigration system, tighter restrictions on EU migrants look highly likely. We consider what existing evidence tells us about the implications for public finances and for the delivery of health services, social housing and education.

Net contributors or net beneficiaries?

One of the key issues prevalent in anti-immigration arguments is the perception that EU migrants move to the UK to take advantage of the social security system or of wider public services, so-called 'benefit tourism' or 'welfare tourism' (UK in a Changing Europe, 2016). In reality, EU citizens have only ever had full access to social security provision in other member states if they are workers or self-employed, or are family members of workers (as discussed in section 2.2). Do they make a net contribution, or are they net beneficiaries?

Estimating how much EU migrants receive in UK benefits and services compared to how much they pay in is not straightforward – even setting aside the role migrants play in *delivering* services, which is discussed in the following sections. Information on migration status is not systematically collected when services are accessed, making it difficult to estimate migrants' use of public services and take up of benefits relative to non-migrants. Extrapolation on the basis of other characteristics may be misleading as migrants may use services differently, for example making use of translation services (Migration Observatory, 2018). The lack of data means a number of assumptions have to be made which influences the results and leads to variation in estimates.

An influential paper by Dustmann and Frattini (2014) calculates EEA migrants' fiscal contribution based on what is paid in taxes net of what they are estimated to have received in benefits, social housing, health, education and public goods. The authors discuss in detail the assumptions made, some of which are likely to produce more conservative estimates of migrants' contributions, for example assigning the cost of educating children of migrants to the migrant population, but assigning any contributions made by children of migrants to the UK-born population (ibid, p.24). They estimate that between 1995 and 2011 EEA migrants (those born in another EEA country) made a positive contribution to public finances (on average 10% more than the UK born population) whilst non-EEA migrants made a negative contribution (around 9% lower than the UK-born). They also find that migrants arriving more recently (post 2000) made more positive net contributions regardless of country of origin.

Migration Watch, an independent think tank which believes current levels of immigration are not sustainable, has challenged some of the assumptions in Dustmann and Frattini's paper, arguing that they overstate revenues and understate expenditure for more recent migrants (Migration Watch, 2014). One particular issue of contention regards the allocation of a zero cost to migrants for 'purely public goods', meaning expenditure on goods that do not depend on the size of the population and are therefore not influenced by immigration. Migration Watch contest Dustmann and Frattini's categorisation of some of these goods, for example transport, communication, energy, construction and public debt. In a separate paper, Rowthorn (2014) agrees that Dustmann and Frattini's categorisation is biased in favour of migrants, though contests the idea that debt interest should be attributed to migrants, as migrants are not responsible for debt incurred before they arrived. Nonetheless, even after making Migration Watch's recommended adjustments, Rowthorn finds that recent migrants generated a small fiscal surplus and so national debt and interest payments grew more slowly, which "should be registered as a credit on the migrant account".

Rowthorn has his own criticisms to make of Dustmann and Frattini's paper: he argues that they do not take into account labour displacement, which would be an indirect cost of migrants if UK-born workers are displaced from the labour market and pay less in taxes and receive more in social security benefits as a result – although Rowthorn acknowledges that "robust evidence on the topic of labour displacement in the UK is hard to come by" (p.7). Adjusting for labour displacement under certain assumptions in fact makes no great difference to results. Rowthorn provides a number of different estimates based on different methods but overall finds that after various adjustments "recent EEA migrants have either paid their way or generated a modest fiscal surplus" (p.11). Rowthorn's conclusion is that the surplus is not as large as Dustmann and Frattini suggest, but neither are migrants a drain on the economy as suggested by Migration Watch. He argues that to have a fuller picture of the relative cost and contributions of migrants, the future life trajectories of migrants and their children need to be taken into account, and posits that when retirement age is reached EEA migrants are more likely to return to their home countries, whilst migrants from poorer and non-EEA countries are more likely to stay permanently

Moving away from estimates based on assumptions, there is some official data from DWP and HMRC on amounts actually paid and received by foreign nationals, though these do not take into account the cost of providing public services to migrants. Nevertheless they provide a partial picture: a HMRC report from May 2016 found that recent EEA migrants made a net fiscal contribution, though a more recent 2016 report found that this varied by country of origin with some migrants paying in much more than the average tax payer but others paying much less (Migration Observatory, 2018). The Office for Budget Responsibility predicts that a higher migration scenario would have a more positive long term impact on public finances than a lower migration scenario, largely because migrants tend to be younger and more likely to be working than the UK-born population (OBR, 2017). Using official data from DWP records, researchers in the House of Commons library estimate that in February 2016 EU nationals made up 2.1% of all working age claimants of DWP benefits in the UK; and that non-UK nationals as a whole are less likely to be receiving out-of-work benefits than UK nationals, though this does not include housing benefits or tax credits (Keen and Apostolova, 2017). A multiple country study by the European Citizen Action Service (2014) also found that EU migrants had a positive impact on the UK government budget. In addition to evidence on tax contributions and government transfers, Wadsworth et al. (2016) highlight that not only are EU migrants more likely to be younger, more likely to work and less likely to claim benefits compared with the UK-born, but for those that have migrated as adults the UK is free-riding on schooling and childhood healthcare costs covered in their country of origin. Dustmann and Frattini (2014) make the same point: migrants save the taxpayer money by bringing their human capital with them from their home country. They estimate that between 1995 and 2011 EU migrants brought with them human capital that would have cost £14 billion if produced in the British education system. We return to this below.

For the most recent report of the Migration Advisory Committee (MAC), Oxford Economics estimate both a static model of the impact of immigration on public finances in 2016/17 and a dynamic model for the 2016 cohort of migrants, estimating expected costs and benefits over the lifecycle (MAC, 2018a). The static model is based on the following assumptions: firstly, the costs of dependent children are assigned to their parents (therefore the expenditure on UK-born children of migrants is assigned to the migrant group). Secondly, public goods including debt interest are allocated across the whole population including migrants (even though the public debt would still exist regardless of migrants being in the UK). They estimate that in 2016/17 EEA migrants paid £4.7bn more in taxes than they received in benefits or services, compared with the UK born population's *deficit* of £41.4bn. They also consider what the per capita contributions are, finding that the average EEA migrant contributed around £2,300 more to UK public finances than the average adult resident in the UK (both UK born and non-UK born). The differences in fiscal contributions are largely due to the high employment rates of EEA migrants as well as their relatively high earnings, resulting in relatively large amounts paid in income tax and national insurance. Health and pensions expenditure on EEA migrants also tends to be lower as they are on average younger.

To assess the longer-term fiscal impact, the lifecycle is taken into account in the dynamic analysis, accounting for the changes in fiscal contributions at different ages. From this analysis the 515,000 migrants who arrived in 2016 are estimated to make a discounted net contribution of £26.9bn over their lifetime. Per capita this equates to each additional migrant from the EEA making a total discounted fiscal contribution of around £78,000 over his or her lifetime (in 2017 prices).

Overall, whilst it is difficult to precisely estimate the net fiscal contribution of immigration to the UK, and much depends on the assumptions made, the weight of evidence strongly suggests that EEA migrants pay more in taxes than they receive in benefits (MAC, 2018a).

Health and social care

Overall the studies above suggest a positive net fiscal contribution of EU migrants. Here we consider studies focusing on the extent of use of health services by EU migrants, before looking at the contribution EU migrants make in *delivering* these services.

In terms of EU migrants' *use* of healthcare, Wadsworth (2012) found no significant difference in use of hospital services between migrants (not specifically EU) and the UK-born, but a small significant difference in the use of GP services: migrants who arrived as adults made slightly more use of GP services than the UK-born. Another way to measure the impact of immigration on healthcare is through waiting times. There is evidence that immigration in general (again not specifically EU immigration) has no significant effect on waiting times in accident and emergency or elective care and actually reduces NHS waiting times for outpatient referrals, partly due to the 'healthy immigrant effect': migrants tend to be young and healthy upon arrival in the UK (Guintella, Nicodemo and Silva, 2015). A ten percentage point increase in the share of migrants living in a local authority is estimated by Guintella and colleagues to reduce waiting times by an average of nine days. The recent MAC report draws on additional research that finds migrants were around half as likely to have a hospital admission as the general population, although maternity services provide an exception: there has been a decline in the proportion of live births to UK-born mothers alongside an increase in births to EU migrants (Steventon and Bardsley, 2011 in MAC, 2018a).

In terms of *spending* on healthcare, the Migration Advisory Committee use Office for Budget Responsibility (OBR) estimates of healthcare expenditure for different age groups and age demographics from the Annual Population Survey (APS) to calculate expenditure shares for different migrant groups (MAC, 2018a, p.85). They find that roughly 89% of health spending goes on those born in the UK and Ireland (more than their 86% share in the population as they are on average older), with EU13+[27] and New Member State (NMS) migrants receiving a 2% share. They also refer to evidence that the weighted average cost to the NHS per head of EEA migrants was £588, compared with £736 average expenditure on non-EEA migrants (ibid, p. 86). The MAC also analyse the relationship between migrant share and GP satisfaction, using NHS England data from 2009-2017, finding little evidence of any relationship between migrant share and GP satisfaction, apart from a positive impact of EU13+ migrants (MAC, 2018a, p.87).

Even if on the whole migrants tend to use healthcare services less frequently than those born in the UK, they do nonetheless place some demand on the NHS, and therefore lower migration would lead to some reduction in demand. There are also likely to be differences across areas in the way this reduction is felt. Guintella et al (2015) find that a higher share of migrants is associated with the largest reductions in waiting times in the least deprived areas, and the authors also identify a short-run negative impact following the 2004 EU enlargement, when immigration increased the average waiting time in deprived areas outside London. Particularly in the context of the squeeze in health expenditure relative to need since 2010 (Vizard and Obolenskaya, 2015), migrant populations may thus be felt in some deprived areas as contributing to excess pressure on services, and lower immigration could make a marginal difference.

However, the expected impact of immigration on *delivering* healthcare is much clearer and more dramatic than that expected for service use, with serious concern that reductions in EU migration will exacerbate existing staff shortages in the NHS. Whilst the NHS is facing increasing demand for its services, partly due to an ageing population, it also lacks the staff needed. Compared to the EU average of 347 doctors per 100,000 people the UK has just 278 doctors per 100,000, while seven out of ten doctors in training report working on a rota with a permanent gap (Simpkin and Mossialos, 2017). There are also fewer nurses being trained at UK universities following cuts to funding for Continuing Professional Development from Health Education England, which affected nurses and midwives (Simpkin and Mossialos, 2017; Greatbatch, 2016). Nearly one in

[27] The MAC distinguish the EU13+ as the 13 pre-2004 members (excluding the UK and Ireland) plus the members of the EEA (Norway, Iceland and Lichtenstein) plus Switzerland.

ten nursing posts are estimated to be unfilled (Dayan, 2017a). In 2016 the National Audit Office found 50,000 clinical roles in England remained empty (NAO, 2016).

In a workforce that is already too small, EU nationals make up a significant proportion of healthcare workers: currently 5% of the total NHS work force and around 10% of doctors in NHS England are EU nationals (Hervey and McCloskley, 2018a); the percentages are higher for some specialized consultants (Costa-i-Font, 2017). In 2015 almost a third of newly registered nurses had trained in the EEA (Dayan, 2017a). The proportion of the workforce who are migrants from all countries is substantially larger – in total, 16% of nurses and 26% of doctors, rising to 45% in some key specialisms, are from overseas (Global Future study, cited in *The Guardian*[28]). However, growing restrictions on immigration from non-EU countries have made it increasingly difficult to get health professionals from elsewhere (Portes, 2018).

Even if immigration were to continue at the current rate there would still be a shortfall, so any reduction in EU workers is predicted to exacerbate this problem further. The anticipated fall in EU health professionals has already started: according to the Royal College of Nursing there was a 92% drop in registrations of nurses from the EU27 in England between the referendum and March 2017, which they suggest is partly due to the continuing uncertainty about the status of EU nationals post-Brexit (Hervey and McCloskley, 2018b). There has also been an increase in the number of nurses who have decided to stop working in the UK (Simpkin and Mossialos, 2017). Department of Health modelling estimates that there will be a shortfall of 20,000 nurses by 2025/26 if EEA migration is stopped, while analysis by the Nuffield Trust increases this estimate to 50,000 (Dayan, 2017a). As well as EU doctors and nurses there are a number of other jobs in the NHS which may experience a shortfall, depending on how the proposed excluded category of 'low-skilled migrants' is defined, such as care workers, nursing assistants, launderers and security guards (Hervey and McCloskley, 2018a).

There are two possible solutions to avoid an increase in staff shortages. One is to place health workers in a special category within the post-Brexit immigration system (Hervey and McCloskley, 2018b). Healthcare workers could be exempted from immigration restrictions such as the MAC's proposed £30,000 minimum salary threshold, through use of a work permit system with a specified number of permits allocated to the NHS, or alternatively through a 'shortage occupation' system like the one the UK already has for non-EEA migrants (Dayan, 2017a). Nurses were added to this list in 2016. Since 2011 numbers have been restricted by an overall immigration cap, but in June 2018 the Home Office responded to pressure to exclude non-EEA medics from the cap on skilled migration (BBC June 14 2018, 'NHS groups welcome immigration change for doctors and nurses'). Taking this route would mean the NHS continued to depend on migrant workers, but the balance within the migrant workforce might be expected to shift further towards non-EEA workers.

[28] https://www.theguardian.com/society/2018/jun/05/nhs-faces-brexit-staffing-crisis-unless-visa-caps-lifted-report. N.B. Global Future is a think tank with an agenda in favour of free movement, but these figures come from NHS statistics: https://digital.nhs.uk/data-and-information/find-data-and-publications/supplementary-information/2018-supplementary-information-files/staff-by-nationality-and-staff-group-september-2010-to-2017.

Another potential solution is to train more UK doctors and nurses (Dayan, 2017a). This could be a long-term solution of benefit to young British citizens. However, there would be a time lag between increasing the intake of medical students and having more trained health professionals because of the lengthy training period required (Dayan, 2017a; Simpkin and Mossialos, 2017). In addition, it would require government commitment and substantial investment: it costs an estimated £200,000 to train a doctor in the UK (Simpkin and Mossialos, 2017). Currently the NHS reaps the benefits of the training migrant workers have received in their home country.

There is also a shortfall in social care workers that is predicted to reach 70,000 by 2025/26 if EU migration is reduced after Brexit (Dayan, 2017a). Increasingly EU nationals make up a significant proportion of the care workforce: in 2016/17 there were 95,000 EEA nationals working in care which equates to 7% of the total care workforce, though this varies across regions with the figure rising to 13% in London (DoH, 2017). Unlike doctors and nurses, those who work in social care do not require degree qualifications and therefore would be unlikely to be able to enter under a skills-based immigration system (Simpkin and Mossialos, 2017). Again, a work permit or work shortage immigration system could be designed to reduce the shortfall (Dayan, 2017a). But the Migration Advisory Committee conclude that a scheme to make it easier to hire migrants into social care would not necessarily make it easier to retain them in the sector. They propose instead a sustainable funding model to enable competitive wages to attract and retain UK-born workers into social care (MAC, 2018a).

This would not require the same time investment as for medical staff, or entail the same burden of training costs for the tax payer. But social care faces competition from other low skilled sectors such as retail and therefore it is likely that a wage increase, beyond the National Living Wage, might be required to incentivise UK born workers into social care over other occupations. The increase in wages would be a positive outcome for workers, but would have substantial effects on social care funding: currently just under 50% of social care funding is spent on wages (Dayan, 2017a). Without adequate funding, employment could fall, damaging service delivery. Social care has been found to be a rare sector in which the introduction of the National Minimum Wage in 1999 had negative employment costs, because it was not accompanied by the necessary increase in funding for the service and higher costs could not easily be passed onto consumers (Manning, Machin and Rahman, 2003).

The end of Free Movement also brings uncertainty as to whether UK citizens will continue to enjoy access to healthcare in other EU member states, as is currently the case (Hervey, McCloskey and Flear, 2018). The current EU system based on free movement and reciprocal rights seeks to remove barriers to accessing healthcare for all EU citizens visiting or living in another member state; this is achieved with the European Health Insurance Card which allows all EU citizens, including those with disruptive chronic conditions[29], to access healthcare in EU countries they visit. In addition the S1 scheme allows pensioners living abroad in EU countries to access healthcare, the cost of which is reimbursed by their home country (Dayan, 2017a). It is estimated that there are currently around 190,000 UK pensioners using this scheme. Should they need to

[29] For example, dialysis patients in the UK can arrange in advance to have treatment in any EU or EEA country (ibid).

return to the UK the cost to the government would be double the current cost and around 900 more beds and 1,600 more health professionals would be required (Dayan, 2017a). There is therefore a clear interest for the UK in continuing both schemes. So far agreement has been reached on the S1 scheme continuing to cover pensioners already in other EU countries on the day of exit, though what happens next depends on the wider deal reached, and the agreement does not, of course, cover future generations of pensioners (Dayan, 2017b). As discussed (in section 2.2) there is a possibility of continued participation in the EHIC scheme, as advocated in the Government's White Paper on the future relationship between the UK and the EU, but as of yet agreement on this has not been reached. In the event that we lose access to the EHIC scheme this is likely to transfer the cost of healthcare or health insurance to individual UK citizens travelling abroad, unless a basic healthcare package for travel insurance is funded by the UK government, though this would be unlikely to cover complex health conditions (Hervey et al, 2018). In either case, the most vulnerable, i.e. those who are older and have chronic health conditions, will end up being worst affected and having to pay more. Further, the EHIC scheme is likely to mean a financial loss to the UK: Costa-i-Font (2017) reports that the costs to the UK of meeting the needs of European visitors using the NHS is less than one-fifth of the cost other Member States pay to treat ill British tourists.

Leaving the EU is also likely to remove the possibility for UK citizens to opt for treatment in other Member States (Costa-i-Font, 2017). This is an option that has so far been used to only a limited extent, but in principle allows patients to avoid bottlenecks or take advantage of treatments not available in Britain. In the future, Costa-i-Font argues, UK citizens will face a more restricted set of choices over treatments.

Finally, while we have focused in this section on the implications of an end to free movement, leaving the single market may have wider effects on healthcare provision. In July 2018 the House of Commons narrowly voted for an amendment to keep the UK part of the European Medicines Agency (although it will no longer host the EMA headquarters, which is moving from London to Amsterdam). But continued membership depends on negotiation with the EU. If the UK ends up outside of EU medicine regulation, drugs will take longer to be approved in the UK: the UK regulator would need to assess each drug itself, and pharmaceutical companies tend to prioritise applications to larger markets like the US and EU ('UK in push to remain part of EU medicines agency after Brexit', *Financial Times*, January 7 2018). There are specific concerns that arise in the case of a no-deal Brexit. If a deal is reached, Britain would remain covered by the EMA until December 2020; if not, the UK would become a standalone regulator on 30 March 2019 ('Drugs regulator warns on no-deal Brexit access to new medicines,' *Financial Times*, October 4 2018). In addition to delays in approving new medicines, border delays in the event of no-deal could mean shortages of medicines and medical devices ('Health groups warn Brexit drugs supply risk at code "red"', *Politico*, 7 November 2018). Concerns have also been raised about the quality of food in hospitals in the event of no deal: the Department of Health and Social Care has written to all NHS trusts promising guidance on "substitute foodstuffs to maintain nutritional balance of patient menu/meal offerings" in a no deal scenario ('Hospital food at risk from no-deal Brexit,' *The Guardian*, 10 November 2018). About 40% of food provided to in-patients is reported to be imported from the EU (ibid).

Overall, then, the end of Free Movement after Brexit looks unlikely to lead to large gains in terms of reduced pressure on health services but is very likely to exacerbate the current staffing shortage in both health and social care, which rely on significant numbers of EU workers. It may also pose risks in relation to medicine regulation and access to medicines, particularly in the case of a no-deal Brexit. In addition, UK citizens may lose access to healthcare in EU countries via the EHIC, and the ability to travel to obtain NHS-funded treatment in other parts of Europe, while it remains unclear (and unlikely) whether future generations of pensioners living abroad will be able to receive healthcare reimbursed by the UK under the current S1 agreement. On the positive side, Brexit could push the government to invest in more training for UK health workers, and to make lower-skilled jobs in social care more financially attractive. But this will require funding; currently Britain benefits from investments in human capital made by other Member States. One issue we have not considered in this section is the way Brexit may affect requirements on competitive tendering in the NHS; we consider this in Section 2.4 on “taking back control”.

Social housing

Social housing is another public service where there is a perception that EU migrants are placing additional pressure on scarce resources, or even being given priority over UK citizens. Social housing tends to cost much less than privately rented housing and has more stable tenures, making it a valuable and highly rationed good (Battison et al., 2014). Whilst a significant proportion of white British people report feeling discriminated against by social landlords compared to other ethnic groups (ibid), several studies that have looked into this have found no evidence of migrants being given priority (Vargas-Silva, 2017). The issue is complicated, however, as different rules apply in different areas and are not always transparent (Rutter and Latorre, 2009). Further, some groups of migrants may be more likely to have characteristics that confer priority for social housing, which could feed misperceptions (ibid). The prevalence of former council properties that have been sold and are rented out privately, in some cases to migrants, may add to false impressions if people believe the housing is still owned by the council (Rutter and Latorre, 2009). Additionally, analysis has shown that whilst migrants (not solely from the EU) previously had less access to social housing than UK-born tenants, access has improved over time, while at the same time construction of social housing has declined: increased access for migrants alongside falling access for the UK-born may have contributed to a perception of preferential treatment of migrants (Battison et al, 2014). Whilst the studies cited above refer to migrants as a whole, there are important differences between groups of migrants in terms of eligibility: migrants need settled status to be eligible for social housing or must be an EEA migrant worker. Most new migrants are not entitled to social housing, including asylum seekers and students (Rutter and Latorre, 2009), though the MAC (2018a) point out that some migrants who are not eligible to apply as individuals may have access to social housing via someone in their household who is eligible.

Even without discrimination in favour of migrants, migration could reduce access to social housing for the UK-born simply by increasing demand in a context in which supply is inflexible. In practice, migrants make up a small proportion of all those in social housing, due to their small share in the population as a whole (MAC, 2018a). Proportionately, roughly the same share of UK-born and foreign-born people live in social housing – around 16% and 17% respectively – although once demographic characteristics are controlled for foreign-born households are less likely to do so than the UK-born (Vargas-Silva, 2017). There are some differences between migrant groups: between 2011 and 2017 the proportion of EU13+ migrants in social housing declined by 5.6 percentage points, whilst the proportion of migrants from New Member States in social housing increased by 3.6 percentage points over a slightly longer period (2005 – 2017) (MAC, 2018a). However, EEA migrants still comprise only 3.4% of all social housing residents in social housing in 2017 (with the UK-born making up 86.1 per cent) (ibid).

Looking at the flow of new lettings each year suggests things may be changing slowly over time: the MAC finds that the proportion going to UK-born tenants has declined from 94.5% in 2007 to 91.5% in 2016 whilst a rising share has gone to EU migrants (MAC, 2018a).

A reduction in immigration seems therefore unlikely to make a noticeable difference to pressures on social housing overall (Chartered Institute for Housing, 2016), but it would reduce one source of rising demand. Particularly in areas where EU immigration is very concentrated, this may mean a slightly higher likelihood of a tenancy for UK-born families on the housing waiting list. However, it is clear that the main reason for the falling probability of living in social housing for UK-born households is not immigration but the declining stock of social housing, driven by sales of existing stock and a lack of new construction (Vargas-Silva, Markaki and Sumption, 2016). Battison et al (2014) estimate that immigration accounts for one third of the reduction in the probability of UK-born tenants receiving social housing, with the remaining two thirds explained by the declining stock of social housing.

Further, falling EU migration could itself affect the supply of housing in negative ways. First, as discussed earlier, the MAC highlight the positive fiscal impact of migration, which could enable more investment in the supply of social housing if the government chose to spend the additional revenue in this way. Indeed, while the social housing supply has fallen, it is possible that it would have fallen further in the absence of EEA migrants' positive net fiscal impact. It follows that lower migration in the future could further constrain housing budgets.

Second, a reduction in EU migrants is likely to mean a reduction in EU construction workers to build houses (Shipman, 2016). A report by the Home Building Federation (2017) argues that having access to skilled EU workers post-Brexit is vital if government housing targets are to be met. The report finds that 18% of the home building workforce overall is from a European Union country, including a massive 50% of the workforce in London (ibid, p.7, p.20). Lower EU immigration could therefore mean longer delays and higher costs of construction.

Education

Primary and secondary education

Around 8 per cent of school aged children in the UK come from a household with at least one EEA-born parent, whilst EEA born teachers make up just 2.6 per cent of primary and 3 per cent of secondary school teachers, so EEA migration has increased the demand for school places more than it has affected the workforce (MAC, 2018a). Looking ahead, the proportion of migrant children in schools is likely to rise given the higher birth rate of migrants (ibid, p.90). A reduction in EEA migration may therefore be expected to reduce pressure on school places without noticeable effects on staffing.

However, there is little evidence of migrant pupils impeding either the options for UK-born children or their progress in school; indeed, if anything there may be positive effects on progress. Analysing a panel of English Local Education Authorities between 2006-2017 the MAC found no statistically significant relationship between higher migrant share and percentage of parents getting their first preference of school (2018a, p. 93). Geay, McNally and Telhaj (2013, cited in MAC, 2018a) find no effect of the number of children with English as an additional language (EAL) on educational outcomes for UK-born pupils. Other research has identified a positive association between an increase in the ratio of EAL pupils and improvements in education outcomes of non-EAL pupils: a one percentage point rise in the EAL to non-EAL ratio is associated with a 5.8 percentage point increase of non-EAL students achieving their SATS scores, while a similar increase in the ratio at GCSE level is associated with a 3.8 percentage point increase in the percentage of non-EAL students achieving at least five A*- C grades (MAC, 2018a, p.93). There is thus no good reason to expect a reduction in EEA migration to bring improvements in outcomes for UK-born school children.

Higher education

Lower EU migration is likely to be felt more keenly in the higher education sector. In UK universities one in six of all staff are from the EU (Portes, 2018). As discussed above, the draft Withdrawal Agreement gives EU citizens currently in the EU the right to remain here; nonetheless, a 2017 survey by the University and College Union found that 76% of EU academics at UK universities said they were more likely to consider leaving UK higher education because of the referendum result (House of Commons Education Committee, 2017a, p.14). Looking ahead, a post-Brexit migration system is likely to present barriers to entry for EU academics. A Tier 2 system would create a bureaucratic burden for universities: Professor Catherine Barnard argues that it would be “extremely cumbersome” and “highly labour intensive for universities and colleges that have to administer it” (ibid). The House of Commons Education Committee recommends that a new visa for academics be created, with a lower salary threshold and separate higher cap than the Tier 2 route, but the MAC report advises against sector-based routes (with the possible exception of seasonal agriculture), reasoning that employers should set wages and conditions competitively to make jobs attractive, and that sectoral schemes interfere with this (MAC, 2018a, p.118).

Certainly, a reduction in EU staff in higher education could have positive consequences for qualified UK nationals by reducing competition, providing student numbers remain healthy: the number of completing PhD students each year in the UK in many disciplines vastly outnumbers the number of available jobs in higher education (e.g. Rocks-Macqueen, 2016). On the other hand, a decline in the EU academic workforce might negatively affect the quality of teaching and research in UK universities – it would mean a smaller market for universities to select staff from (Highman et al, 2018). Along with reductions in access to EU funding (see below), it is also likely to mean reduced collaborative work across European institutions. Almost half of the academic papers currently produced by the UK are co-authored with mostly European partners (Horvath and Courtois, 2018). A decline in such collaborations is likely to be damaging to the quality of research and have longer-term effects on the reputation of UK universities.

Would Brexit affect the number of EU students in UK universities, and if so to what consequence? In 2015-16 EU nationals comprised 5.6% of students at UK universities (House of Commons Education Committee, 2017a). Currently, EU nationals do not need a visa to study in the UK and have the same rights as home students; they pay the same tuition fees and are eligible for student loans (House of Commons Education Committee, 2017a). The Government has guaranteed that EU nationals starting courses in the 2018/19 academic year will continue to be eligible for home fee status and for financial support for undergraduates, masters and PhD students, as well as having a right to remain in the UK to complete their course (House of Commons Education Committee, 2017b). But uncertainty remains about what will happen next. An exit from the Single Market is likely to mean EU students studying in the UK (and vice versa) will be required to pay overseas rather than home fees, though is not yet fully clear. If this happens, it would be expected to lead to a fall in EU student numbers. In this context of uncertainty, and perhaps influenced by the unwelcoming signals sent by the referendum result, UCAS data on university places in February 2017 showed a 7.4% decline in EU undergraduate applications (House of Commons Education Committee, 2017a), though admissions data for 2018 show a subsequent 3% rise. It is suggested that students may be making use of their last chance to study in the UK on the same terms as UK students, following government assurances about eligibility for funding in the 2018-19 academic year ('UK universities report rise in applications from EU students' *The Guardian*, 5 February 2018).

What would be the effect of lower EU student numbers? The Migration Advisory Committee found that all studies estimating the economic impact of international students identified economic benefits that outweighed the economic costs (MAC, 2018b). Because international students' income originates from outside the UK but is spent on UK goods and services it can be thought of as export earnings. In 2018 the total benefit to the UK economy associated with a typical EU undergraduate has been estimated at around £87,000 (ibid, p.55). At the same time, international students tend to place little pressure on public services as they are usually young and without dependents (MAC, 2018b). The MAC found no evidence of a negative impact on domestic students in the form of crowding out of domestic students, and some evidence even of *crowding in* at post-graduate level – where there are fewer restrictions on overall numbers – particularly at Russell Group universities (Machin and Murphy, 2017 cited in MAC, 2018b).

Of course, a fall in demand from EU students could be offset by more students from beyond the EU; this would have positive implications for university funding compared to the status quo given the higher fees paid by non-EU international students, which arguably subsidise home students and allow for wider availability of courses and improved facilities (MAC, 2018b). Whilst the UK is currently the most popular destination for EEA students wanting to study abroad (House of Commons Education Committee, 2017a), the majority of international students already come from beyond Europe: in 2016/17 73% of international students were non-EU, with more students from China than from all EU countries combined (MAC, 2018b, p.22). On the other hand, UK universities have competition from institutions in the US and Australia for students wanting courses taught in English, and these countries are closer to some of the large target markets. The UK's share in the global higher education market has been in decline in recent years: replacing students from across the Channel with those from further afield may be a challenge (MAC, 2018b, p.31).

Given the importance of international students to the UK Higher Education sector, the House of Commons Education Committee has recommended that the UK retain "a reciprocal open approach with light touch controls, such as visa-free access, which would enable preservation of a system closely resembling free movement" and that international students be removed from the net migration target (House of Commons Education Committee, 2017a, pp.11-13). The MAC also argue for a loosening of regulations and visa requirements, concluding that "anything that imposes more barriers to student mobility, as leaving the EU may do, is likely to have a negative impact on the sector" (MAC 2018b, p.111). The Government has made it clear that they have no plans to remove international students from the net migration target, on the grounds that local authorities need to know numbers in order to plan their resources (House of Commons Education Committee, 2017b, p.6).

As well as staff and student numbers, the end of free movement also has implications for Erasmus+, a scheme that supports the mobility of EU students and staff to study and work abroad. There is uncertainty around whether the EU will allow continued participation in Erasmus+ without free movement; Switzerland lost access after changing its free movement rules, although there are other countries that do not have full free movement and yet still have access to Erasmus+, such as Turkey and the former Yugoslav Republic of Macedonia (House of Commons Education Committee, 2017a). One alternative is a partner country arrangement, allowing the UK to participate in some but not all elements (ibid). Funding a replacement of Erasmus+ would be expensive but could be seen as an opportunity to create a wider reaching programme.

Beyond the implications of the end of free movement further implications of leaving the single market include potentially losing access to important EU funding and research programmes. Between 2007 and 2013 the UK contributed 5.4 billion euros to the EU for research, development and innovation but received 8.8 billion euros over the same period, the majority of which was though the Framework 7 programme (which is the predecessor to the Horizon 2020 programme) (House of Commons Education Committee, 2017a, p.18). This funding is of considerable importance for university research, with UK universities being the most successful candidates for this funding, winning a 71% share (ibid). After exit day the UK could possibly continue to have access to Horizon 2020 through associated status, but this would involve having less say in the strategic directions of the research programmes, compared with the significant influence the UK currently holds (ibid, p.20). In addition to funding, the EU also provides networks and facilities for EU researchers; this is likely to change post-Brexit, with for example, UK scientists and researchers being unlikely to continue to enjoy free access to European facilities they are no longer paying for (ibid), and collaborations with EU partners will potentially become more difficult.

Summary

While it is difficult to make strong predictions without certainty about what the post-Brexit immigration system in the UK will look like, there is consensus that leaving the single market will mean a reduction in EU migration to the UK. The effects of such a reduction are likely to be more significant in terms of the delivery of high quality services than in relieving pressure on these services. Lower migration may reduce demand for school places and social housing, with non-negligible effects in areas of high concentration of EU migrants. But having pupils in class with English as an Additional Language has been found to have (if anything) positive effects on other pupils, while the main issue constraining access to social housing for the UK-born is not immigration but sales of existing stock alongside insufficient building. Given that on a range of assumptions, EU migrants make a net contribution to public finances, paying in more in taxes than they take out in benefits and service use, their presence could be seen as an opportunity to boost investment in services such as social housing – and their loss, conversely, will be a loss.

At the same time, EU migrants form a significant proportion of the workforce delivering public services, and a reduction in their number is expected to make a noticeable difference among health and social care workers, university staff (both academic and professional), and in the construction industry, with implications for house building. Current post-Brexit immigration plans are not clear, but the MAC proposal of a Tier 2 visa system for skilled workers with a £30,000 minimum salary and no sectoral schemes will make it difficult for many migrants in these categories. This could have positive consequences in opening up more opportunities for UK workers, but it requires increases in investment in medical training, alongside more generous funding to attract UK workers to lower-skilled jobs such as in social care. Existing shortages of health professionals alongside cuts in training budgets for nurses and midwives raise questions about the likelihood of this happening. Further, as discussed in Section 1.2, the economy is projected to grow more slowly under all Brexit scenarios than the counterfactual of remaining in the EU, creating fiscal constraints.

The relationship between the economic impact of Brexit and the effect on public services is worth underlining further. The greater the hit for the economy, the more difficult it will be for public investment to develop and sustain strategies to compensate for lost migrant workers. At the same time, a weaker economy will mean immigration falls more quickly: if wages are lower the UK will be a less attractive place to come and work, whatever the immigration rules, and the problems facing public service delivery will be worse.

Beyond the loss of free movement, there are wider implications of leaving the single market, especially for the health and higher education sectors. For health, patients are likely to face poorer access to new medicines in the long-run if the UK fails to remain a member of the European Medicines Agency. And single market exit will also mean more limited access to healthcare for UK citizens in EU countries, whether they are there as overseas residents, tourists or UK-based patients looking for the best treatment options.

There are also immediate concerns about the impact of a ‘no deal’ Brexit on access to medicines and medical equipment. For universities, Brexit could mean the loss of access to EU funds and collaboration, as well as a smaller pool of talent for research and teaching staff; between them these developments may damage the long-run reputation of higher education in the UK.

2.4 Taking back control: new powers over resources and procurement rules

In this final section, we turn to consider some of the implications of Britain "taking back control" of resources and regulations after Brexit. A number of aspects of the repatriation of powers have already been discussed: in particular, the withdrawal from the Charter of Fundamental Rights and from EU employment directives. In this section we focus primarily on two areas that have not yet been covered but that have particular relevance for social policy and distributional outcomes: first, the control gained over contributions to the EU which currently come back to Britain as tied funds for investment in reducing inequalities; and second, the regaining of freedoms regarding state intervention in the economy – public ownership, industrial strategy and procurement.

There are a number of other ways in which Brexit may provide greater control over both resources and regulations in ways that affect social policy. We cannot do justice to all possibilities in this paper but we briefly highlight two points. First, the UK could ultimately divert funding for agricultural subsidies (more than £2 billion annually) towards other ends, such as the NHS. The government has pledged to match EU subsidies to farmers until the next election, but after that the future is unclear ('Post-Brexit farming funding set out by Michael Gove, *BBC News*, 4 January 2018). In principle these funds could be better targeted to national priorities.

Second, post-Brexit the UK will have greater freedom over rates of Value Added Tax, regaining the ability to lower the rate of VAT below the standard EU rate of 15% or the current UK rate of 5% on fuel[30]. In practice, with UK VAT currently at 20% this freedom seems unlikely to have immediate impact on rates of VAT, and there are indications that the government will in any case seek to remain in the EU VAT area ('UK hints at staying in European VAT area after Brexit,' *The Financial Times*, 4 June 2018). But staying in would come with considerable loss of sovereignty, accepting rules that the UK would have no say over. On the other hand, leaving would have major consequences for border infrastructure and delays, while if the border is not effectively controlled the risk of fraud rises considerably, meaning revenue losses as well as unfair competition for legitimate businesses ('VAT: Brexit's hidden border dilemma,' *The Financial Times*, 30 May 2018). Note that the EU is in the process of overhauling its rules on VAT rates to allow a greater range of exemptions, including a zero rate. This would (among other things) enable the UK to achieve its goal of removing VAT from sanitary products, even were it to remain in the VAT area (House of Commons Library, 2018b). But there is no date yet for the implementation of the new rules.

EU Structural and Investment Funds and other funding to reduce inequalities

The EU Structural and Investment (ESI) funds are the EU's instrument for reducing economic disparities between regions and social groups, and are made

[30] Under current EU rules, countries must apply a minimum standard VAT rate of 15%, other than for goods on a pre-approved list (for which VAT must still be at least 5%), or goods which were taxed at a lower rate before 1991 and have continued to be so since then, for which lower rates – including zero – are allowed. This enables the UK to continue charging 5% on domestic fuel, and zero on books and children's clothing.

up of five component funds, of which the most significant for Britain are the European Regional Development Fund (ERDF), aimed at strengthening economic and social cohesion by reducing imbalances between regions, and the European Social Fund (ESF), which promotes the EU's employment objectives. The ERDF is focused on a small number of key priority areas, currently innovation and research, the digital agenda, support for small and medium-sized enterprises and the low-carbon economy. A certain percentage of allocated funds must be spent on these priorities, with tighter restrictions in more developed regions (80%) than regions that are less developed (50%) (Ayres and Brien, 2018). For ESF funding, Member States can choose their priorities from a list of options; in the current round the UK chose inclusive labour markets and skills for growth, targeting groups at a disadvantage in the labour market – lone parents, older workers, women from some ethnic minority groups and young people not in education, employment or training (NEETs) (Bachtler and Begg, 2017; EDF, 2018). There are also some much smaller programmes including the Rights Equality and Citizenship (REC) programme, which supports initiatives and frontline services helping people experiencing domestic violence, hate crime, discrimination and labour exploitation (EDF, 2018).

After Brexit, the UK will cease to be eligible for these funds, even if it opts to remain part of the EEA; in this case it would be expected to contribute towards grants to poorer regions, and would be eligible for some relatively minor forms of support, such as the small INTERREG fund, but not for the most significant ESI funds (see Ayres and Brien, 2018). However, as Britain makes a positive net contribution to the EU, it makes sense to see this not as the "loss" of these resources but as the gaining of full control over how they are spent. (If economic growth shrinks as economists have projected, this money would indeed be lost, but we set this argument aside for the purposes of this section.)

In the 2014-20 allocation, the UK's ESI allocation was a total of £10.3 billion, roughly £1.7 billion per year. Having been a major beneficiary in the 1970s and 1980s because of the scale of Britain's industrial problems (until 1988 20-25% of EU structural funds went to the UK), the amount has shrunk steadily since 2004, and now represents just 0.1% of UK GDP (Bachtler and Begg, 2017). However, Bachtler (2017) notes that, if the UK had voted to stay in the EU, the UK might have claimed a larger proportion of the budget after 2020 because of the relatively poorer performance of UK regions in recent years: regional GDP as a share of the EU average declined between 2008 and 2015 in nearly every region in the UK; only Inner and Outer London increased.

Because some of the funding is allocated according to regional development, some areas receive more than others: Wales receives on average €142 per person per year in ESI funds, compared to €57 in Northern Ireland, €42 in Scotland and €28 in England, where Cornwall and the Isles of Scilly is the main beneficiary, followed by the North East and North West (Ayres and Brien, 2018; Bachtler and Begg, 2017). Bachtler and Begg argue that while not large in financial terms, the funds have generated "important achievements and genuine additionality" (p.750) and suggest that projects and areas that have come to rely on the funding will feel its loss. EDF (2018) highlights concerns among the voluntary and community sector about the impact of the loss of resources that, while relatively small in scale, are very significant to the charities relying on it. Polverari and Bachtler (2014) note that EU programmes entail considerable leverage of other funding sources, from both public and private sector funds. Because of the multi-annual financial planning required for the ESI funds, this effectively ring-fenced support from government departments at different levels even during the period of austerity post 2010 (Bachtler and Begg, 2017).

There have been questions about the benefits of EU cohesion policy (see Davies, 2017), but Bachtler and Begg argue that verdicts have become more positive in recent years, though there is still a wide variation in results. The most recent evaluation of the ERDF, by Applica and Ismeri Europa (2016), estimates that 152,000 jobs were created directly by EU funded interventions between 2007 and 2013, and that the additional investment increased UK GDP in 2015 by 0.1% compared to what it would have been without the policy, with GDP in 2023 projected to be 0.2% higher than it would have been. The ESF is also found to have had positive results on employability and on reducing regional differences in employment rates and skill levels (see review in Bachtler and Begg, 2017). The evaluation of the 2007-13 Daphne Programme (which in the subsequent round became the REC programme) concluded that most measures taken "helped improve protection for victims of violence or groups at risk, and a significant number contributed to policymaking and lawmaking at EU or national level" (European Commission, 2017; see also EDF, 2018).

Of course, the counterfactual is important here. The creation of jobs has been achieved by investment, with the median cost per job calculated as £23,000 for jobs created and £15,000 for jobs safeguarded (with wide variation across programmes and projects) (Bachtler, 2017). Post-Brexit the UK could choose to continue with the investment, with the benefit of no longer being subject to the complex EU regulations that prescribe almost every aspect of administration of the funds (Bachtler and Begg, 2017; Ayres and Brien 2018). In practice, is the same level of spending likely, and what is the evidence that resources would be spent more effectively than they are currently to reduce regional and other social disparities in Britain?

UK and EU negotiators agreed in December 2017 that the 2014-20 ESI funds would be allocated as anticipated for the lifetime of current projects (Ayres and Brien, 2018); though the government has also suggested that this would only be as long as the projects represent value for money and align with domestic priorities (House of Commons Education Committee, 2017a, p.11; EDF, 2018). Beyond 2020, there has been some commitment in principle to maintaining funds for regional investment. The 2017 Conservative Manifesto pledged to "use the structural fund money that comes back to the UK following Brexit to create a United Kingdom Shared Prosperity Fund, specifically designed to reduce inequalities between communities across our four nations" (Conservative and Unionist Party, 2017). Answering questions in the House of Lords in December 2017 Lord Henley confirmed that there would be a Shared Prosperity Fund "in the long run" but would not give details on the level of funding or how it would work (Ayres and Brien, 2018). Questions about funding concern not only whether EU funds will be replaced, but also what will happen to domestic co-funding.

Past history raises some doubts about whether the same level of resources would be dedicated to regional policy without the ESI funds. In a literature review for the Department of Business, Innovation and Skills, Polverari and Bachtler (2014) conclude that economic development spending in Britain would be lower in the absence of EU funding, highlighting that the EU programmes have entailed considerable leverage of other funding sources, especially private funds (p.8). Bachtler and Begg suggest that the UK has been "inconsistent in its commitment to regional policy, with fluctuating political interest and resources" (p. 757). The loss of EU funding could also mean the end of the security of multi-annual programmes, and more exposure to changes in the political environment.

If funding does continue to be committed, could it be spent more effectively under national control? Bachtler and Begg (2017) cite the Welsh Government as arguing that certain EU initiatives were ill conceived and would be better under regional control, while Polverari and Bachtler (2014) state that there are "strong arguments for reconsidering the targeting of Cohesion policy on the grounds of economic efficiency and budgetary added value" (p.9). Especially in the more developed regions, there are tight restrictions on priorities, and these might not fit with domestic goals. Further, Bachtler and Begg note that there could be gains from simplifying administratively complicated EU rules on financial management, control and audit.

However, they also argue that UK regional and local economic development policy has been largely aimed at improving national economic performance, and has focused on economic objectives like productivity, innovation and entrepreneurship, without the same interconnection between economic and social cohesion that characterises the EU Structural Funds, and without the commitment to social equity seen in regional policies in many Continental European countries. They note that only Scotland recognises social inclusion more broadly as an explicit driver of stronger economic performance and integrates it into development strategies. Thus while there might be benefits to having more ability to target the money on domestic priorities, this could mean regional policy and investments after Brexit take on a different flavour, one potentially oriented towards the reduction of some inequalities but not others.

The Equality and Diversity Forum (EDF) (2018) echoes these concerns, warning that the Shared Prosperity Fund could focus on economic inequalities based on geography alone, or on economic performance overall rather than inequalities. Groups and communities currently targeted by EU programmes could lose out, including many who face multiple or complex barriers, among them discrimination. The report highlights as a positive development the government's Industrial Strategy, published in November 2017, which makes a strong case for an inclusive workforce, and references a series of initiatives already underway: targets for disabled and Black and Minority Ethnic apprentices, the introduction of gender pay gap reporting, the Race Disparity Audit, promotion of flexible working, and a strategy for improving one million disabled people into work in ten years. But EDF also underlines that funding commitments to deliver significant change in these areas are largely missing. It adds that the disability strategy of November 2017 (DWP and DoH, 2017) contains no significant investment plans to help increase employment among disabled people. The EDF also raises concerns about the loss of support from EU funding to the voluntary and community sector (EDF, 2018). They argue that this enables work on difficult issues and with groups for whom it is hard to find alternative sources of funding, including workers at risk of exploitation and women with complex needs including addiction, homelessness, contact with the criminal justice system and poor mental health.

Contributors to the House of Commons Education Committee also raised concerns about whether a Shared Prosperity Fund would effectively replace EU funding to the higher education sector. Currently the ERDF and the ESF provide around £100 million to the UK higher education sector for projects that benefit local areas and innovation (House of Commons Education Committee, 2017a). Expert witnesses called to give evidence to the committee suggested that the EU is more effective in distributing funds across different universities. They argued that there is a tension between a focus on excellence and a focus on place and fair distribution across the country, with the government tending to concentrate funding on the former priority, meaning fewer institutions benefit (House of Commons Education Committee, 2017a, p.26).

State intervention in the economy

A series of EU regulations restrict state intervention in the economy in EU member states, including complex state aid rules aimed at promoting competition. The original aim of these rules was to stop countries subsidising domestic businesses to outcompete those in other member states. They also serve to prevent multinational corporations from touring Member States in search of subsidies or favourable tax treatment in return for investment; for example, the European Commission ruled against tax rulings given by Ireland to Apple and by Luxembourg to Amazon (Biondi and Tarrant, 2017). But critics have argued that the rules restrict Member States from more interventionist economic strategies, meaning Brexit offers the opportunity to run the economy differently (e.g. Guinan and Hanna, 2017). Here we briefly discuss four main issues with relevance to social policy – nationalisation and public ownership in relation to the railways; competitive tendering of healthcare services; public procurement rules more generally; and industrial strategy.

Guinan and Hanna (2017) argue that the Labour Party’s manifesto pledge to take the railways back into public hands would be virtually impossible within the EU. Mor et al (2017) agree that bringing the management of rail infrastructure together with the provision of services as a fully integrated entity is not possible under EU rules. The state can own and manage the rail infrastructure, but this needs to be separate from the provision of services. Services themselves can be provided by state-owned operators, but normally these operators would be expected to win contracts competitively. It should be underlined, though, that in this regard the EU is following the lead set by the UK. There is an obvious irony in the fact that leaving the EU would offer the UK the freedom to abandon an approach that it has been pursuing unilaterally for many years. Further, the extent to which competition is enforced remains lower under new EU rules than the UK’s current set-up. The Commission was pushed back by Member States from their original proposals, which would have introduced mandatory competitive tendering for all rail contracts – as happens in Britain. Currently, most domestic rail lines across the EU are operated under public service contracts, with countries often directly awarding contracts to the local incumbent (Mor et al, 2017). The wording in the agreement reached by the European Parliament in December 2016, after five years of negotiations, will allow any company to bid to compete on a commercially viable EU network from 2020, and from 2026 for contracts on lines that are not as profitable. But governments *will* still be able to award contracts directly where they can make a case that this would mean better quality of service or cost efficiency, on condition that contracts include performance and quality targets (European Council, 2016).

The second issue concerns the application of EU competition law to healthcare services. A 2017 briefing from the British Medical Association, which has long-standing concerns about the increasing role of private sector providers in publicly funded healthcare, argues that Brexit presents an opportunity for the UK to extricate itself from EU competition rules as they apply to the health sector (BMA, 2017). Under these rules, where there is a purchaser-provider split, providers must be allowed to compete on an equal footing, and co-operation between providers and commissioners of services that might limit competition is ruled out. However, as the briefing points out, existing domestic legislation, including the English Health and Social Care Act 2012, enforces competition within healthcare services entirely separately to EU law. Further, the EU rules apply only where there is a purchaser-provider split, as in the English NHS, but not where the purchaser-provider split does not apply, as in the Welsh and Scottish NHS, which have restricted the extent of competition.

The BMA's argument is that *were there to be* domestic movement away from a preference for competition between providers in England – and they note that the 2017 Conservative Party manifesto included a commitment to review the operation of the internal market – EU regulations would make it more difficult for the UK to repeal its own legislation protecting competition. As with rail nationalisation, leaving the EU may now be the only way to roll back legislation that the UK pursued unilaterally. The UK would need to leave the EEA in order to gain the possibility of protecting the NHS from EU competition laws. Even then there are questions about whether any EU trade deal would be conditional on Britain remaining subject to rules on procurement and competition (see below). Further, the UK might also find the NHS vulnerable in wider trade negotiations. There was widespread concern that the Transatlantic Trade and Investment Partnership (TTIP) deal between the EU and the USA would further open up publicly funded healthcare to market forces, but an exemption for the NHS was assured. Moving forwards, it is not guaranteed that the UK would be able to secure a similar exemption in a UK-US trade deal (BMA, 2016).

Third, we consider public procurement more generally. Guinan and Hanna (2017) highlight that all procurement contracts must be open to all bidders across the EU, that public authorities must advertise contracts widely to bidders in other EU countries, and that among the key criteria for awarding work are "lowest price" and "most economically advantageous tender", which takes into account quality and reliability as well as cost (MEAT). Their concern about this is that it reduces the ability of local governments to use their significant spending power to meet local and social needs, for example by awarding contracts to local companies or to small businesses, and they suggest that Brexit could offer opportunities to use large-scale public procurement "to rebuild and transform communities, cities and regions… In this way, public funds can be made to do 'double duty'; anchoring jobs and building community wealth, reversing long-term economic decline" (p.23). The decision to award the contract for the post-Brexit blue British passports to a French company is an example: this decision would have been made on a MEAT basis, while outside the EU's rules, the government could have decided to use non-economic criteria to make such an award, perhaps balancing cost against other goals like protecting British jobs. As the preferred passport supply bid is reported to represent a saving of £120 million to the taxpayer during the contract's lifetime (Allen Green, 2018), there might of course be other effective ways to use the money to achieve these goals, but this would have been a decision the Home Office was free to make.

There are two reservations about the extent to which Brexit will create new freedoms to use public money to do 'double duty'. First, the restrictions imposed by procurement law can be exaggerated. For one thing, as Allen Green (2018) points out, there is no requirement to put passport production (or anything else) out to tender; passports can be produced in-house, as is done in France, and cleaning, catering and other services can also be done in-house, allowing local governments to use their spending power directly. (Similarly, there is no requirement to separate health providers from purchasers, as discussed above.) EU public procurement law provides for what happens when things are put out to tender; it does not force tendering to take place (Allen Green 2018). Second, tenders can be designed in ways that make it easier for small businesses or those with good employment practices to participate. For example, in Germany procurement law requires large contracts to be divided into smaller lots, while energy efficiency is one of the mandatory criteria under which contracts are awarded (Mor et al, 2017). Sweden has recently introduced labour requirements to procurement policy, to prevent public contracts being awarded to companies where workers do not have reasonable working conditions (ibid). However, there are restrictions. Labour's manifesto pledge that government suppliers would be expected to reduce pay inequalities by moving towards a 20:1 ratio between the highest and lowest paid would not be allowed under current EU rules (ibid).

Second, it is very possible that in order to gain access to EU markets after Brexit, the UK would be required to sign up to both EU procurement and state aid rules (Allen Green, 2018). These rules are integral to the functioning of the single market, and a trade deal on goods would almost certainly be conditional on the UK agreeing to continue to abide by them.

A final area of concern is the restriction that state aid rules place on Member States' ability to support struggling industries through difficult times. Guinan and Hanna (2017) argue that these restrictions rule out a proactive industrial strategy – "the deliberate direction of capital to sectors, localities, and regions, so as to balance out market trends and prevent communities from falling into decay" (p.22). The UK government was not able to decide to subsidise the steel industry, for example, to protect jobs in Port Talbot. State aid is generally prohibited in the Single Market so as to ensure a level playing field for firms from different countries (Mor et al, 2017). However, there are a series of exceptions and exemptions. Countries can notify the Commission that they seek an exemption and the case is then assessed. There are a series of 'block exempted' areas, including innovation and research, regional aid, broadband, aviation, energy and the environment (Biondi and Tarrant, 2017). There are also forms of aid which do not need to be notified if they meet certain criteria: national public investment in roads, waterways, rail, water distribution, hospitals, old age homes, culture and heritage organisations fall under this heading (Biondi and Tarrant, 2017). If notification is required, Member States must demonstrate that state aid is aimed at an improvement that the market alone would not deliver, is limited to the minimum action required to achieve the outcome, and that the benefits outweigh the costs in terms of damage to trade (i.e. that it will not distort competition, damaging producers in other member states).

Biondi and Tarrant argue that in general the state aid rules have meant ‘horizontal’ rather than ‘vertical’ industrial policy, but not a withdrawal of the state from support for industry. The state is not able to pick particular winners but is able to provide more general support to all applicants, such as through R&D subsidies or support to help firms meet environmental standards. As things stand, the UK spends considerably less on state aid than most other EU countries. In 2015 the UK spent 0.35% of GDP on state aid excluding railways compared to 0.62% in France and 1.22% in Germany. Only four countries spent less (Mor et al, 2017).

Summary

Setting aside arguments about the likely state of public finances after Brexit, more control over resources currently paid to Brussels and returned through European Structural and Investment funds – and over wider agricultural subsidies too – should allow money to be better targeted to domestic priorities, with more regional control and less administrative red tape. In practice, however, there is reason for concern that withdrawal will mean less money for regional development and, perhaps, a weaker focus on reducing inequalities. EU regional policy has been argued to have a stronger social justice focus than UK equivalents, while EU funds are said to play an important role in supporting voluntary sector organisations working with especially marginalised groups, who may find it hard to attract alternative funding sources. The ESI funds have also had the benefit of being a long-term stable source of funding not subject to fluctuations in political interest in regional policy, or to domestic pressures on funding, as during the peak austerity years.

This section also considered arguments about the implications of Brexit for state intervention in the economy. Some approaches may in principle become possible which are currently outlawed – including full-scale nationalisation of the railways, some forms of targeted industrial subsidy, and some public procurement approaches, such as using only British steel or imposing pay ratios on contracted companies. There is also an argument that Brexit may offer an opportunity to limit the extent of competition involving private providers in the NHS in England, which is protected under EU rules. However, there are a wide range of actions that are currently possible to support national industries and local suppliers within the EU. To date the UK has used these abilities to a lesser extent than other countries, such as Germany, which raises questions about how different British policy will be on the outside. In some areas, such as the imposition of competitive tendering in the rail industry, and the insistence on competition between providers where there is a purchaser-provider split in health care, EU policy is adopting or reflecting practices that have been pursued unilaterally in the UK. Again, this leads to questions about the likelihood of Britain unrolling these policies in practice after Brexit. Furthermore, it is not clear that the UK will in any case have full freedom to make its own decisions, even if the UK leaves the EEA. Accepting EU competition laws may well be a condition of an EU-UK trade deal, and while the NHS secured exemptions from a further opening to competitive pressures in the EU-USA negotiations over the TTIP, it may still find itself vulnerable in negotiations between the UK and the US.

3. Conclusions

The EU referendum in June 2016 brought a higher share of the electorate to the polls than any other public vote in the UK since 1992. More than 17 million people – 52% of those who cast a vote – opted to leave the EU. Since that date, there has been considerable debate about what the 17 million were voting for, and whether Brexit can deliver it. This paper focused on the consequences for social policy and distributional outcomes, covering many of the things that are most important in people's lives day-to-day – their jobs, their living standards, and the quality of education, health and social care that they can access.

We have looked for the opportunities as well as the risks of Brexit, and attempted to think through how implications may differ depending on the form that Brexit takes. Our overarching conclusion is that Brexit poses major risks to social policy, and these risks are larger the more distant the UK's future relationship with the EU. Social policy has been affected by European integration in multiple ways – and hence will be deeply unsettled by the UK's exit.

One crucial mechanism through which Brexit will have an influence is via its effects on the UK economy. There is a strong consensus that economic growth will be negatively affected in the medium-term, particularly under 'harder' Brexit scenarios, and that this in turn will affect many of the areas covered in this paper. Slower growth will mean lower living standards and also less money for public services – the opposite of a 'Brexit dividend'. It may result in downward pressure on workers' rights as the UK tries to find new ways to invite investment and boost employment, and once we are no longer subject to the EU's Charter of Fundamental Rights. And a weaker economy will make the UK a less attractive place for the migrant workers we are likely to continue to need to keep our public services running.

Concerns about immigration were interpreted as being one of the drivers of the referendum result, and ending the free movement of workers became a red line for the May administration early on. But a fall in EU migration also looks likely to have significant negative consequences for social policy. EU migrants play an important role in the delivery of health and social care and in housing construction, so reduced migration will make it more difficult – and more expensive – to provide these services. The consequences for service delivery are likely to be much greater than any reduction in service demand: EU migrants do use public services like health and social housing, but no more (indeed if anything rather less) than UK-born citizens. And overall they pay more into the exchequer in taxes than they take out in benefits and services, so reduced migration will also have a negative effect on public finances. Further, there are unlikely to be major compensatory consequences for the wages of UK-born workers as a result of reduced competition. Small negative effects of EU expansion on the wages of some lower-paid workers in the UK have been identified. But these are estimated to have had a smaller impact on living standards over the course of a decade than the inflation caused by currency depreciation has had in the two years since the referendum.

Wider losses associated with leaving the single market include, of course, the freedom to live and work in the EU with security of access to health and other social provisions, as well as access to healthcare in other Member States for UK citizens travelling as tourists or as patients looking for quicker or better treatment. The loss of the Charter of Fundamental Rights will leave gaps in UK human rights protection, and leave other rights, such as those currently covered in the Equality Acts, at risk because they are not constitutionally protected. There is also serious risk that as EU rights protection continues to progress the UK will be left behind. New lines of inclusion and exclusion are likely to emerge within as well as between the categories of the UK, EU and non-EU citizen, with inequalities not only in principle but also in practice in the reality of access to social provisions. Universities stand to lose access to funding and EU-wide collaborations, and will face a smaller pool of talent for research and teaching staff; between them these developments may damage the long-run reputation of higher education in the UK. And there are particular risks associated with a no-deal outcome, beyond those that will operate through the effects on the economy, including risks to food security and to access to medicines and medical treatment.

Some of these outcomes can be seen as the democratic effect of bringing decision-making back to Westminster: for example, the UK will no longer have employment protection legislation imposed by Brussels if this is not what British voters would vote for. But it is difficult to imagine that voters had in mind the scale and breadth of some of the effects outlined here.

On the positive side, Brexit may reduce the price of housing by reducing demand from overseas investors (there is some evidence that it has already done so), which could improve affordability and make home-ownership possible for more first-time buyers. A shrinking in the size of the financial sector could encourage a rebalancing towards other industries, via a lower value of sterling. However, evidence that suggests inequality will fall comes in part from studies that predict the loss of higher paid and more secure jobs, including for men with specific skills but few formal qualifications working in manufacturing.

While effects on relative poverty have been projected to be small for most scenarios, there are a number of ways in which the more vulnerable may be most affected by Brexit. Groups at particular risk include those in receipt of frozen cash benefits as inflation rises; those with fewer skills, who are less well-placed to navigate industrial restructuring; those working long hours or in precarious employment, who have been beneficiaries of EU employment legislation; those who are EU migrants with a right to permanent residence but not the knowledge or evidence to complete the paperwork; and those unable to afford private health care and social care to allow them to avoid waiting lists and a poorer service if there are staff shortages.

Aside from pursuing a close relationship with the EU, what can the UK government do to mitigate the risks of Brexit for social policy and distributional outcomes? Some of the potential negatives could be overcome with vigorous compensatory investment and redistribution. First, serious investment is needed in education and training, with a strategy designed to ensure that UK-born youngsters can move into the jobs in health and social care that will be left empty as immigration falls. Second, more resources must be identified to pay for these services as costs rise; for example, wages in social care will need to rise to attract UK workers away from retail and other sectors. Third, a significant strategy for regional and industrial investment needs to be developed, perhaps building on the promised Shared Prosperity Fund as a starting point. Fourth, a modified form of the 'mirror principle' should be adopted to ensure that UK rights legislation not only does not regress but also keeps pace with EU law as it continues to develop in line with social progress. Finally, a relatively small move that would have an important impact would be to restore the link between benefits and inflation, to ensure that those in receipt of benefits are not left in increasingly difficult circumstances as prices rise.

There are concerns about the government's willingness and ability to act on a large enough scale. No doubt in part because of the way that the Brexit process has soaked up the time and resources of policymakers and civil servants, the proposed new industrial strategy seems to have stalled, while training budgets for health professionals have been cut rather than expanded in recent years. More significantly looking forward, all of these actions will become more difficult because of the constraints that Brexit will place on public finances as the economy slows.

Arguments have been made that being outside the EU will at least allow future governments greater freedom of state intervention, liberated from EU rules governing state aid and procurement. It is true that there are ways in which EU regulations limit some potential government policies – for example on renationalising the railways, on restricting pay ratios in companies providing services to government, and on privileging public health providers where there is a purchaser-provider split. But – even if future trade deals do not hem the options in again – these possibilities appear severely limited in their ability to compensate for the scale of the losses and challenges outlined here.

References

Albors-Llorens, A. (2016) 'How the EU works EU law and the UK,' Full Fact website, available at https://fullfact.org/europe/eu-law-and-uk/ accessed on 4/5/18.

Allen Green, D. (2018) 'Blue passports and public procurement,' *The Financial Times*, 22 March 2018.

Andrews, J., J. Hutchinson and R. Johnes (2016) *Grammar Schools and Social Mobility*, London: Education Policy Institute.

Andrews, J. (2018) *School performance in academy chains and local authorities – 2017*. London: Education Policy Institute.

Applica and Ismeri Europa (2016) *WP1: Synthesis report Ex post evaluation of Cohesion Policy programmes 2007-2013, focusing on the European Regional Development Fund (ERDF) and the Cohesion Fund (CF),* Luxembourg: Publications Office of the European Union.

Ayres, S. and Brien, P. (2018) *UK Funding from the EU*, House of Commons Library Briefing Paper, No 7847, 10 January 2018.

Barnard, C. (2008) 'The 'Opt-Out' for the UK and Poland from the Charter of Fundamental Rights: Triumph of Rhetoric over Reality?' in Griller, S. and Ziller, J (eds) *The Lisbon Treaty: EU Constitutionalism without a Constitutional Treaty?* Vienna: Springer Vienna

Barnard, H., L. Heykoop and A. Kumar (2018) *How could Brexit affect poverty in the UK?* Briefing, September 2018. York: Joseph Rowntree Foundation.

Bachtler J. (2017) 'Brexit and regional development in the UK: What future for regional policy after Structural Funds?' in Bailey D and Budd L (eds) *The Political Economy of Brexit*, Agenda Publishing.

Bachtler, J. and I. Begg (2017) 'Cohesion policy after Brexit: the economic, social and institutional challenges,' *Journal of Social Policy*, 46(4):745-63.

Battiston, D., Dickens, R., Manning, A., and Wadsworth, J. (2014). 'Immigration and the Access to Social Housing in the UK' *CEP Discussion Paper No 1264*, London: Centre for Economic Performance

Benton, M. (2017) Safe or Sorry? Prospects for Britons in the European Union after Brexit, Brussels: Migration Policy Institute Europe. https://www.gov.uk/government/publications/citizens-rights-administrative-procedures-in-the-uk/technical-note-citizens-rights-administrative-procedures-in-the-uk

Benton, M., Ahad, A., Benson, M., Collins, K., McCarthy, H. and O'Reilly, K. (2018) *Next Steps. Implementing a Brexit Deal for UK Citizens living in the EU-27*, Migration Policy Institute Europe and Goldsmiths, University of London.

Biondi, A and A Tarrant (2017) 'EU State Aid Law and British Assumptions: A Reality Check', Renewal, 24 September 2017.

Bojarski, L., Hofbauer, J. and Mileszyk, N. (eds) (2014) The European Charter of Fundamental Rights as a Living Instrument: Guidelines for Civil Society,

Breinlich, H., Leromain, E, Novy, D. and Sampson, T. (2017) *The Brexit vote, inflation and UK living standards*, CEP Brexit Analysis Number 11, London: Centre for Economic Performance.

British Medical Association (2016) *Competition law and the NHS*. August 2016. Available at www.bma.org.uk

British Medical Association (2017) *Competition and procurement in the healthcare system*, BMA Brexit Briefing.

Burgess, S., C. Crawford and L. Macmillan (2017) 'Assessing the role of grammar schools in promoting social mobility,' Department of Quantitative Social Science Working Paper 17-09, May 2017. London: Institute of Education

Cantillon, B., T. Goedemé and J. Hills (2018) 'Introduction, ' in *Decent Incomes for All: Improving Policies in Europe*, Oxford: Oxford University Press.
Carney, M. (2018) 'Guidance, Contingencies and Brexit,' Speech to the Society of Professional Economists by Mark Carney, Governor of the Bank of England, 24 May 2018.
Carter, A. (2018) 'The case for city devolution post-Brexit,' in Menon, A. (ed) *Brexit: Local and Devolved Government*. London: The UK in a Changing Europe.
Chartered Institute for Housing (2016) 'What does Brexit mean for migration and housing demand?' available at http://www.cih.org/news-article/display/vpathDCR/templatedata/cih/ news-article/data/What_does_Brexit_mean_for_migration_ and_housing_demand
Clift, W. and Parker, D (2018) 'The Working Time Directive- an opportunity for reform?' *Employee Benefits https://www.employeebenefits.co.uk/william-clift-brexit-working-time/ accessed 11th February 2019*
Coppel, J. QC (2018) Legal opinion on European Union (Withdrawal) Bill – E.U. Charter of Fundamental Rights, commissioned by the Equality and Human Rights Commission, available at https://www.equalityhumanrights.com/sites/default/files/eu-withdrawal-bill-legal-advice-jason-coppel-qc.pdf accessed on 23/5/18
Conservative and Unionist Party (2017) *Forward Together: Our Plan for a Stronger Britain and a Prosperous Future*. The Conservative and Unionist Party Manifesto 2017.
Costa-i-Font, J. (2017) 'The National Health Service at a Critical Moment: when Brexit means Hectic,' *Journal of Social Policy*, 46(4), 783-795.
Crowley, M. Song, H. and Meng, N. (2016), 'Tariff Scares: Trade policy uncertainty and foreign market entry by Chinese firms,' CEPR Discussion Paper no. 11722.
Curtice, J. (2018a) 'There's little evidence of a pro-Labour youth-quake in the 2017 General Election,' NatCen blog, 22 March 2018, also published in *The Times*.
Curtice, J. (2018b) *Has Brexit reshaped British Politics?* UK in a Changing Europe. https://whatukthinks.org/eu/wp-content/uploads/2017/12/EU-Briefing-Paper-12-Brexit-and-the-election_V2.pdf
Davis, D. (2018) 'We can easily switch to a Canada plus,' *Daily Express*, October 7 2018.
Davies, S. (2017) *Does Cohesion Policy Work? Meta-Review of Research on Effectiveness of Cohesion Policy*. European Policy Research Paper No. 99. University of Strathclyde. Strathclyde: European Policies Research Centre.
Dayan, M. (2017a) 'General Election 2017: Getting a Brexit deal that works for the NHS,' Nuffield Trust, Nuffield Trust Briefing
Dayan, M. (2017b) 'How will our future relationship with the EU shape the NHS?' Nuffield Trust, Nuffield Trust Briefing.
De Agostini, P., J. Hills and H. Sutherland (2018) 'Were we really all in it together? The distributional effects of the 2010-15 Coalition Government's tax-benefit policy changes,' *Social Policy and Administration*. 52(5): 929-49.
Dempsey, N. (2017) *Turnout at elections*, House of Comons Library Briefing Paper Number CBP 8060, 26 July 2017.
Department for Education [DfE] (2017) *Unlocking Talent, Fulfilling Potential: A plan for improving social mobility through education*. London: Department for Education.
Department for Exiting the European Union [DexEU] and Home Office (2017), 'Technical Note: Citizens' Rights, Administrative Procedures in the UK,' https://www.gov.uk/government/publications/citizens-rights-administrative-

procedures-in-the-uk/technical-note-citizens-rights-administrative-procedures-in-the-uk.
Department for Exiting the European Union (2018) 'UK government's preparations for a 'no deal' scenario: Guidance,' updated 24 August 2018.
Department for Exiting the European Union (no date given) 'EU (Withdrawal) Bill Factsheet 7: Worker's rights,' accessed on 13th February 2019 at https://www.gov.uk/government/uploads/system/uploads/attachment_data/file/714378/7.pdf
Department for Work and Pensions [DWP] and Department of Health [DoH] (2017) *Improving Lives: The Future of Work, Health and Disability*. Cm 9526. November 2017.
Department of Health [DoH] (2017) *Evidence on EEA nationals working within the health and care system, focusing on England*. Written response to call for evidence by the Migration Advisory Committee. November 2017.
Dhingra, S., Ottaviano, G., Sampson, T. and Van Reenen, J. (2016) 'The consequences of Brexit for UK trade and living standards,' CEP Brexit Analysis No 2, CEPBREXIT02. LSE.
Dhingra, S., Machin, S. and Overman, H. (2017) 'Local economic effects of Brexit,' *National Institute Economic Review*, No 242, November 2017.
Dobbins, T. (2017) 'Tory attack on Working Time Directive signals a post-Brexit race to the bottom', *The Conversation.* 20 December 2017.
Doherty, M. (2016) "Through the Looking Glass: Brexit, Free Movement and the Future", *King's Law Journal*, 27:3, 375-386.
Dougan, M. (2016) 'National Welfare Systems, Residency Requirements and EU Law: Some Brief Comments,' *European Journal of Social Security* 18 (2):101-105.
Dustmann, C. and Frattini, T. (2014) 'The fiscal effects if immigration to the UK', *The Economic Journal* 124 (November), F593–F643. Doi: 10.1111/ecoj.12181
Dustmann, C, Fabbri, F. and Preston, I. (2005) 'The impact of immigration on the British Labour Market,' *The Economic Journal*, 115(507), pp. F324-F341.
EFT [Economists for Free Trade] (2018) *A World Trade Deal: The Complete Guide.* London: Economists for Free Trade.
Equality and Diversity Forum [EDF] (2018) *Shared Prosperity, Shared Rights: replacing EU funding for equality and human rights after Brexit*. London: Equality and Diversity Forum.
Equality and Human Rights Commission (2016) 'What is the Charter of Fundamental Rights of the European Union?' Equality and Human Rights Commission Webpage accessed at https://www.equalityhumanrights.com/en/what-are-human-rights/how-are-your-rights-protected/what-charter-fundamental-rights-european-union.
Equality and Human Rights Commission (2017) 'What does Brexit mean for equality and human rights in the UK?' available at https://www.equalityhumanrights.com/en/our-human-rights-work/what-does-brexit-mean-equality-and-human-rights-uk accessed 24/4/18 last updated 20th July 2017.
Equality and Human Rights Commission (2018) 'EU Withdrawal Bill will not protect UK rights: open letter,' available at https://www.equalityhumanrights.com/en/our-work/news/eu-withdrawal-bill-will-not-protect-uk-rights-open-letter accessed on 23/5/18.
European Citizen Action Service (2014) *Fiscal impact of EU migrants in Austria, Germant, the Netherlands and the UK*, Brussels

European Commission (2017) *Ex post evaluation report on the Daphne Programme (2007-2013)* Report from the Commission to the Council and the European Parliament. COM(2017) 55 final.
European Commission (2018) Draft Agreement on the withdrawal of the United Kingdom of Great Britain and Northern Ireland from the European Union and the European Atomic Energy Community. 19 March 2018.
European Council (2016) 'Better rail services: Council adopts 4th railway package market pillar,' Press Release 17 October 2016.
Evans, G. (2018) 'Voting in the 2017 General Election: A Brexit Election?' in A. Menon (ed), *Brexit and Public Opinion*. London: The UK in a Changing Europe.
Fai, F. (2018) *Place-based perspectives on the UK Industrial Strategy*. IPR Policy Brief, March 2018. Bath: Institute for Policy Research.
Ford, M. QC (2016) 'Workers' rights from Europe: the impact of Brexit, independent legal opinion commissioned by the Trades Union Congress,' available at https://www.tuc.org.uk/research-analysis/reports/workers%E2%80%99-rights-europe-impact-brexit accessed on 14/5/18
Fredman, S., Young, A. and Campbell, M. (2018) 'The Continuing Impact of Brexit on Equality Rights,' The UK in a Changing Europe available at http://ukandeu.ac.uk/research-papers/the-continuing-impact-of-brexit-on-equality-rights/ accessed 4/5/2018.
Full Fact (2018) 'How accurate have Brexit forecasts been since the referendum?', 17 December 2018, https://fullfact.org/economy/how-accurate-have-brexit-forecasts-been-referendum/
Geay, C., McNally, S and Telhaj, S. (2013) 'Non-native speakers of English in the classroom: what are the effects on pupil performance?' *Economic Journal*, 123 (570). F281-F307.
Gentleman, A. (2018) 'Perspectives on the Windrush Generation scandal,' https://www.bl.uk/windrush/articles/perspectives-on-the-windrush-generation-scandal-an-account-by-amelia-gentleman
Giles, C. (2018) 'What are the economic effects of Brexit so far?,' *Financial Times*, June 24 2018.
Goodwin, M. and O. Heath (2016) 'The 2016 referendum, Brexit and the left behind: An aggregate level analysis of the result,' *The Political Quarterly*.
Gosden, P. (1976) *Education in the Second World War: A study in policy and administration*.
Gow, D. (2018) 'Brexit and Devolution: A New UK Settlement or the Break-Up of Britain,' Social Europe Brexit Paper Series. No 1, May 2018.
Greatbatch, D. (2016) *A false economy: Cuts to Continuing Professional Development funding for nursing, midwifery and the Allied Health Professions in England*. Council of Deans of Health. September 2016.
Guinan, J and T Hanna (2017) 'Forbidden fruit: The neglected political economy of Lexit', IPPR Progressive Review.
Guintella, O., Nicodemo, C. and Silva, C. (2015) 'The effects of immigration on NHS waiting times', IZA Discussion Paper No. 9351
Gumbrell-McCormick, R. and Hyman, R. (2017) 'What about the workers? The implications of Brexit for British and European labour', Competition and Change, Vol. 21(3) pp169-184
Harris, N. (2016) "Demagnetisation of Social Security and Health Care for Migrants to the UK", *European Journal of Social Security*, *18*(2), 130–163.
Harrison, J., Campling, L., Richardson, B., Smith, A. and Barbu, M. (2017) 'Taking labour rights seriously in post-Brexit UK trade agreements: protect, promote,

empower', CSGR Working Paper (284/17), Coventry: University of Warwick. Centre for the Study of Globalisation and Regionalisation

Hantrais, L (2019) *What Brexit Means for EU and UK Social Policy*, Policy Press Shorts, Bristol: The Policy Press.

Harvey, C. (2018) 'Thinking about human rights and Brexit', *?UK in a Changing Europe*, accessed on 13th February 2019 at https://ukandeu.ac.uk/thinking-about-human-rights-and-brexit/

Hervey, T. and McCloskley, S. (2018a) 'Staff', chapter in Barnard, C., Bevington, M., Fahy, N., Flear, M., Hayward, K., Hervey, T., Levell, P., McCloskey, S., McHale, J., McKee, M., Portes, J. and Stoye, G. (2018) Brexit and the NHS, UK in a Changing Europe, available at http://ukandeu.ac.uk/research-papers/brexit-and-the-nhs/

Hervey, T. and McCloskey, S. (2018b) 'Brexit and Health, Science and Society: Securing the "least worst" outcome', Public Sector Focus, May/June 2018, available at: http://flickread.com/edition/html/index.php?pdf=5b3294f2a91dc#54. [Previously appeared in blog series: 'Brexit, Regulation and Society at ManReg on 30 April 2018: http://blog.policy.manchester.ac.uk/posts/2018/04/brexit-and-health-science-and-society/]

Hervey, T. and McCloskey, S. (2018c) 'Health and the NHS' in Article 50 one year on, The UK in a Changing Europe

Hervey, T., McCloskey, S. and Flear, M. (2018), 'Patients,' in Barnard, C., Bevington, M., Fahy, N., Flear, M., Hayward, K., Hervey, T., Levell, P., McCloskey, S., McHale, J., McKee, M., Portes, J. and Stoye, G. (2018) *Brexit and the NHS*, UK in a Changing Europe, available at http://ukandeu.ac.uk/research-papers/brexit-and-the-nhs/

Heywood J. (2017) 'How the Civil Service is preparing for Brexit', blog, Civil Service, 11 July 2017, https://civilservice.blog.gov.uk/2017/07/11/how-the-civil-service-is-preparing-for-brexit.

Highman, L., Marginson, S., Locke, W. and Papatsiba, V. (2018) 'Higher Education' chapter in Article 50 one year on, The UK in a Changing Europe

HM Government (2016) 'Statement from the new Prime Minister Theresa May,' published 13 July 2016. https://www.gov.uk/government/speeches/statement-from-the-new-prime-minister-theresa-may

HM Government (2018a) *The UK's future skills-based immigration system*, December 2018. Cm9722

HM Government (2018b) The Future Relationship between the United Kingdom and the European Union.

Hobolt, S. Leeper, T. and Tilley, J. (2018) 'Emerging Brexit identities,' in Menon, A. (ed) *Brexit and Public Opinion*. The UK in a Changing Europe.

Home Building Federation (2017) *Home Building Workforce Census 2017*, London: Home Building Federation

Home Office, (2018) *Immigration Statistics*. Year Ending March 2018.

Horvath, A. and Courtois A. (2018) 'The impact of Brexit on UK higher education and collaboration with Europe,' in A. Courtois (ed) (February 2018) *Higher education and Brexit: current European perspectives*, Special Report, London: Centre for Global Higher Education.

House of Commons (2013) 'Leaving the EU,' Commons Briefing Papers RP 13/42, July 1.

House of Commons Education Committee (2017a) *Exiting the EU: challenges and opportunities for higher education, Ninth Report of Session 2016-17*, London: House of Commons.

House of Commons Education Committee (2017b) *Exiting the EU: challenges and opportunities for higher education: Government Response to the Committee's Ninth Report of Session 2016-17*, London: House of Commons.
House of Commons European Scrutiny Committee (2014) *The application of the EU Charter of Fundamental Rights in the UK: a state of confusion*, Forty-third Report of Session 2013 – 2014 available at https://publications.parliament.uk /pa/cm201314/cmselect/cmeuleg/979/979.pdf
House of Commons Exiting the European Union Committee (2018) *EU Exit Analysis Cross Whitehall Briefing*. January 2018.
House of Commons Foreign Affairs Committee (2016) *Equipping the Government for Brexit*, Second Report of Session 2016-17, House of Commons Paper HC 431. 20 July 2016. https://publications.parliament.uk/pa/cm201617/cmselect/ cmfaff/431/43106.htm
House of Commons Library (2018a) *Brexit: the Draft Withdrawal Agreement*, Briefing Paper No. 8269.
House of Commons Library (2018b) *VAT on sanitary protection*, Briefing Paper No. 1128, 14 May 2018.
House of Commons Women and Equalities Committee (2017) *Ensuring strong equalities legislation after the EU exit*, Seventh Report of Session 2016-17, Report, together with formal minutes relating to the report, London: House of Commons
House of Lords (2018) *Brexit: food prices and availability*, European Union Committee, 14th Report of Session 2017-19. HL Paper 129. 10 May 2018.
House of Lords, European Union Committee (2018) *Brexit: Reciprocal Healthcare*, London: Authority of the House of Lords.
Institute for Government (2018) 'EU Withdrawal Bill: amendments and debates,' available at https://www.instituteforgovernment.org.uk/explainers/eu-withdrawal-bill-amendments-and-debates accessed on 23/5/18
Johnson, B. (2018) 'My plan for a better Brexit,' *The Telegraph*, 27 September 2018.
Johnson, P, P Levell and T Waters (2016) 'The fall in sterling: who is hit by the rise in inflation,' Observation 8730. London: Institute for Fiscal Studies. https://www.ifs.org.uk/publications/8730
Keen, R. and Apostolova, V. (2017) 'Statistics on migrants and benefits', House of Commons Library Briefing paper Number CBP 7445,
Krugman, P. (2016) 'Notes on Brexit and the pound,' https://krugman.blogs.nytimes.com/2016/10/11/notes-on-brexit-and-the-pound/
Lang, T., Lewis, T., Marsden, T. and Millstone, E. (2018) *Feeding Britain: Food security after Brexit*, London: Food Research Collaboration.
Levell, P. (2018) 'Quids in or counting our losses? The economic impact of the leave vote two years on,' The UK in a Changing Europe, 26 June 2018. http://ukandeu.ac.uk/quids-in-or-counting-our-losses-the-economic-impacts-of-the-leave-vote-two-years-on/
Levell, P. and Keiller, A. N. (2018) 'The exposure of different workers to potential trade barriers between the UK and the EU,' in *The IFS Green Budget,* October 2018. London: Institute for Fiscal Studies.
Levell, P. and Stoye, G. (2018) 'A 'Brexit dividend' to spend on the NHS?' IFS Observations, https://www.ifs.org.uk/publications/10354
Los, B., McCann, B., Springford, J. and Thissen, M. (2017) 'The mismatch between local voting and the local economic consequences of Brexit,' *Regional Studies*, 51(1): 786-799.

Lupton, R., Hughes, C., Peake-Jones, S. and Cooper, K. (2018) 'City-region devolution in England,' SPDO Research Paper 2, July 2018. London: Centre for Analysis of Social Exclusion.
Machin, S., and Murphy, R. (2017) 'Paying out and crowding out? The globalisation of higher education,' *Journal of Economic Geography*, 17, pp.1075–1110.
Manning, Alan, Stephen Machin and Lupin Rahman (2003) "Where the Minimum Wage Bites Hard: The Introduction of the UK National Minimum Wage to a Low Wage Sector", *Journal of the European Economic Association*, 1, 154-180.
May, T. (2016) 'Britain after Brexit: A vision of a global Britain,' Conservative Party Conference Speech, October 2016.
Menon, A. (2018a) 'Introduction,' in *Brexit: Local and Devolved Government*. London: The UK in a Changing Europe.
Menon, A. (2018b) 'Introduction,' in *Brexit and Public Opinion*. London: The UK in a Changing Europe.
Midgley, D. (2017) 'What will change under the Higher Education and Research Act,' *Prospect Magazine*, May 17 2017.
Migration Advisory Committee (2018a) *EEA Migration in the UK: Final report*, London: Migration Advisory Committee
Migration Advisory Committee, (2018b), *Impact of international students in the UK*, London: Migration Advisory Committee
Migration Observatory (2018) 'Briefing: The Fiscal Impact of Immigration in the UK,' University of Oxford, available at http://www.migrationobservatory.ox.ac.uk/resources/briefings/the-fiscal-impact-of-immigration-in-the-uk/
Migration Watch UK (2014) 'An assessment of the fiscal effects of immigration to the UK,' London: Migration Watch.
Milburn, A. (2017) 'Resignation letter as Chair of the Social Mobility Commission,' Saturday 2 December 2017.
Ministry of Housing, Communities and Local Government [MHCLG] (2018) *A new deal for social housing*. London: MHCLG.
Mor, F., Butcher, L., Seely, A., Webb, D., Booth, L. and Harari, D. (2017) 'EU constraints on economic/industrial policy,' House of Commons Library. September 2017.
Mott, H., Fontana, M., Sephenson, M. and De Henau, J. (2018) 'Exploring the Economic Impact of Brexit on Women', jointly published by the Women's Budget Group and the Fawcett Society, available at https://wbg.org.uk/wp-content/uploads/2018/03/Economic-Impact-of-Brexit-on-women-briefing-FINAL-1.pdf
Murray, C., O'Donoghue, A. and Warwick, B. (2018) *Discussion Paper on Brexit*, Dublin: Irish Human Rights and Equality Commission.
National Audit Office [NAO] (2016) *Managing the supply of NHS clinical staff in England,* HC736, Session 2015-16.
National Audit Office [NAO] 2018 *Investigation in the Department of Transport's decision to cancel three rail electification projects*. HC835, Session 2018-19.
Nickell, S., and Salaheen, J. (2015) 'The impact of immigration on occupational wages: Evidence from Britain,' Bank of England Working Paper No 574.
O'Brien, C. (2015) "The Pillory, the Precipice and the Slippery Slope: the Profound Effects of the UK's Legal Reform Programme Targeting EU Migrants." *Journal of Social Welfare and Family Law* 37 (1):111-136.

O'Cinneide, C. (2018), 'Brexit and Human Rights', Brexit: The International Legal Implications, Paper No. 16, Canada: Centre for International Governance Innovation and London: British Institute of International and Comparative Law

O'Neill, A. (2011a) 'Is the UK's 'opt-out' from the EU Charter of Fundamental Rights worth the paper it is written on? Part 1,' eutopia law available at https://eutopialaw.com/2011/09/15/is-the-uk%E2%80%99s-%E2%80%9Copt-out%E2%80%9D-from-the-eu-charter-of-fundamental-rights-worth-the-paper-it-is-written-on/ accessed on 22/5/18

O'Neill, A. (2011b) 'Is the UK's 'opt-out' from the EU Charter of Fundamental Rights worth the paper it is written on? Part 2,' eutopia law available at https://eutopialaw.com/2011/09/20/is-the-uk%E2%80%99s-%E2%80%98opt-out%E2%80%99-from-the-eu-charter-of-fundamental-rights-worth-the-paper-it-is-written-on-part-2/ accessed on 22/5/18

O'Neill, A. (2017) *Hate Crime, England and Wales*. 2016/17, Statistical Bulletin 17/17, London: Home Office

Office for Budget Responsibility [OBR] (2018a) *Economic and Fiscal Outlook*, March 2018. London: Office of Budget Responsibility, London.

Office for Budget Responsibility [OBR] (2018b) *Economic and Fiscal Outlook*, October 2018. London: Office of Budget Responsibility, London.

Office for National Statistics [ONS] (2018) *Housing Affordability in England and Wales: 2017*.

Owen, J. and Lloyd, L. (2018) 'Costing Brexit: what is Whitehall spending on exiting the EU?' IfG Insight, March 2018. London: Institute for Government.

Owen, J., Lloyd, L. and Rutter, J. (2018) 'Preparing Brexit: How ready is Whitehall?' London: Institute for Government.

Oxrep (2017) 'The economics of Brexit: what is at stake?' Editorial, *Oxford Review of Economic Policy*, 33(S1):S1-S3.

Polverari, L. and Bachtler, J. with Davies, S., Kah, S., Mendez, C., Michie, R. and Vironen, H. (2014) *Balance of Competences Cohesion Review: Literature Review on EU Cohesion Policy*, Final Report to the Department for Business, Innovation and Skills, February 2014.

Pope, T. (2018) 'The Brexit dividend debunked: Why Theresa May's claims on NHS funding are misleading,' Institute for Fiscal Studies, 19 June 2018, https://www.ifs.org.uk/publications/13086

Portes, J. (2017), 'Free Movement after Brexit: Policy Options,' The UK in a Changing Europe.

Portes, J (2018) 'Immigration after Brexit. In The UK in a Changing Europe,' *Article 50 One Year On*.

Portes, J. and Forte, G. (2017) 'The economic impact of Brexit-induced reductions in migration,' *Oxford Review of Economic Policy*, 33 (S1), pp.S31-S44.

Pyper, D. McGuinness, F. and Brien, P. (2018) *Public Sector Pay*, House of Commons Library Briefing 8037, 3 May 2018.

Roache, Q. (2018a) 'Brexit and LGBT+ Rights,' Trades Union Congress, available at https://www.tuc.org.uk/research-analysis/reports/brexit-and-lgbt-rights

Roache, Q. (2018b) 'Brexit and Disability Rights,' Trades Union Congress, available at https://www.tuc.org.uk/research-analysis/reports/brexit-and-disability-rights

Rocks-Macqueen, D. (2016) 'When You are more Likely to Die of Cancer than Become an Academic: What is the Role of PhD students?' *Papers from the Institute of Archaeology*, 25(2).

Roderick, P and Pollock, A. (2017) 'Brexit's Great Repeal Bill will ace the right to health', *The British Medical Journal*, BMJ 2017 (357): j2013 available at https://www.bmj.com/content/357/bmj.j2013

Rowthorn, R. (2014) 'A note on Dustmann and Frattini's estimates of the fiscal impact of UK immigration,' http://www.civitas.org.uk/pdf/rowthorndustmannfrattini.pdf
Rutter, J. and Latorre, M. (2009) 'Social housing allocation and immigrant communities', Manchester: Equality and Human Rights Commission
Sampson, T. (2017) 'Brexit: The Economics of International Disintegration,' *Journal of Economic Perspectives*, 31 (4), pp.163-184.
Schulz, C. (2018) 'UK Outlook,' Chapter 2 in *The IFS Green Budget*, October 2018, London: Institute for Fiscal Studies.
Shipman, A. (2016) 'What does Brexit mean for UK housing?' The Conversation, http://theconversation.com/what-does-brexit-mean-for-uk-housing-61781
Shutes, I. (2016) 'Work-related Conditionality and the Access to Social Benefits of National Citizens, EU and Non-EU Citizens,' *Journal of Social Policy* 45: 4, 691-707.
Shutes, I. and Walker, S. (2018) 'Gender and Free Movement: EU Migrant Women's Access to Residence and Social Rights in the UK,' *Journal of Ethnic and Migration Studies*, 44: 1, 137-153.
Simpkin, V. and Mossialos, E. (2017) 'Brexit and the NHS: challenges, uncertainties and opportunities', Health Policy
Singham, S. and Tylecote, R. (2018) *Plan A+: Creating a prosperous post-Brexit UK*. London: Institute of Economic Affairs.
Smith, D. (2018) 'A good year for the forecasters,' David Smith's EconomicsUK.com, 30 December 2018, http://www.economicsuk.com/blog/002294.html
Social Mobility Commission (2017) *State of the Nation 2017: Social Mobility in Great Britain*. London: HMSO.
Stephens, M. with Fitzpatrick, S. (2018) 'Country level devolution: Scotland,' SPDO Research Paper 1, November 2018. London: Centre for Analysis of Social Exclusion.
Steventon, A. and Bardsley, M. (2011) 'Use of secondary care in England by international immigrants'.
Sumption, M. and Kone, Z. (2018), *Unsettled Status? Which EU Citizens are at Risk of Failing to Secure their Rights after Brexit?*, Oxford: Migration Observatory, University of Oxford.
Swiney, P. (2018) 'A strategic oversight? Why the Industrial Strategy will struggle to address the UK's productivity problem,' Centre for Cities blogpost, 28 November 2017.
Thimont Jack, M., Owen, J., Kellam, J. and Paun, A. (2018) *Devolution after Brexit*, London: Institute for Government.
Trades Union Congress (2016) 'Women workers' rights and the risks of Brexit,' available at https://www.tuc.org.uk/research-analysis/reports/women-workers%E2%80%99-rights-and-risks-brexit
Tudor, O. (2017) 'Brexit: Workers' rights and how to protect them,' The UK in a Changing Europe, https://ukandeu.ac.uk/brexit-workers-rights-and-how-to-protect-them/
UK in a Changing Europe (18 May 2016) 'Benefit tourism and Britain's new deal: will the renegotiation stop EU migrants coming to the UK?' Public Policy Analysis, available at http://ukandeu.ac.uk/benefit-tourism-and-britains-new-deal-will-the-renegotiation-stop-eu-migrants-coming-to-the-uk/ accessed on 6/6/18
UK in a Changing Europe (2018) *What would 'trading' on WTO terms mean?* London: The UK in a Changing Europe. https://ukandeu.ac.uk/wp-content/uploads/2018/12/What-would-trading-on-WTO-terms-mean.pdf
Vargas-Silva, C. (2017) Briefing: Migrants and Housing in the UK: Experiences and Impacts, University of Oxford: The Migration Observatory

Vargas-Silva, C. and Markaki, Y. (2017) *EU Migration to and from the UK*, Oxford: Migration Observatory, University of Oxford.
Vargas-Silva, C., Markaki, Y. and Sumption, M. (2016) *The impacts of international migration on poverty in the UK*, York: Joseph Rowntree Foundation.
Verschueren, H. (2017) 'Scenarios for Brexit and Social Security,' *Maastricht Journal of European and Comparative Law*, Vol. 24(3) 367–381.
Vizard, P and Obolenskaya, P. (2015) 'The Coalition's Record on Health: Policy, Spending and Outcomes 2010-2015,' Social Policy in a Cold Climate Working paper 16
Wadsworth, J. (2012) 'Musn't Grumble. Immigration, Health and Health Service Use in the UK and Germany,' CEP Discussion Paper No1166, LSE Centre for Economic Performance
Wadsworth (2014) 'Immigration, the European Union and the UK Labour Market,' CEP Policy Aanalysis, CEPPA015, London: Centre for Economic Performance, LSE.
Wadsworth, J., Dhingra, S., Gianmarco, O. and Van Reenen, J. (June 2016) 'Brexit and the impact of immigration on the UK' in Brexit 2016: Policy analysis from the Centre for Economic Performance, London: CEP
Walker, T. (2018) 'The Industrial Strategy's Approach to Place,' New Local Government Network blogpost, 16 July 2016.
Watson, M. (2018) 'Brexit, the left behind and the let down: the political abstraction of "the economy" and the UK's EU referendum,' British *Politics*, 13(1): 17-30.
Webster, C. (1988) *The Health Services since the War* Volume 1.
Wilson, W., Bellis, A. and Garton Grimwood, G. (2018) *Implementation of the Housing and Planning Act 2016*. House of Commons Library, Briefing Paper, No. 8229, 27 September 2018.
Wyatt, D. (2016) 'How the EU works: the EU's powers,' Full Fact website available at https://fullfact.org/europe/eus-powers/ accessed on 4/5/18
Yeo, C. (2018) *The Impact of the UK-EU Agreement on Residence Rights for EU Families*, Birmingham: University of Birmingham.