



Closing the Finance Gap

How a national investment bank could support
enterprise and raise productivity

Justin Prottis

CIVITAS

in association with

The ERA
Foundation

Closing the Finance Gap

Closing the Finance Gap

How a national investment bank
could support enterprise and raise
productivity

Justin Protts

CIVITAS

in association with

The ERA
Foundation

First Published February 2018

© Civitas 2018
55 Tufton Street
London SW1P 3QL

email: books@civitas.org.uk

All rights reserved

ISBN 978-1-906837-95-2

Independence: Civitas: Institute for the Study of Civil Society is a registered educational charity (No. 1085494) and a company limited by guarantee (No. 04023541). Civitas is financed from a variety of private sources to avoid over-reliance on any single or small group of donors.

All the Institute's publications seek to further its objective of promoting the advancement of learning. The views expressed are those of the authors, not of the Institute.

Typeset by
Typetechnique

Printed in Great Britain by
4edge Limited, Essex

Contents

Author	vii
Summary	1
1. The investment problem	8
2. How could a national investment bank help?	20
3. Designing an investment bank for the UK	40
Conclusion and proposals	49
Case Study I: The Industrial and Commercial Finance Corporation	53
Case Study II: Kreditanstalt für Wiederaufbau	60
Case Study III: The Small Business Administration	73
Case Study IV: The European Investment Bank	80
Case Study V: The British Business Bank	88
Bibliography	97
Notes	99

Author

Justin Protts is Chief Economist at Civitas, where he has worked since 2016. His previous work includes *Supporting Industry Post-Brexit: Supply chains and the automotive industry* (2017), *UK-EU trade and jobs linked to exports* (2016) and *Potential post-Brexit tariff costs for EU-UK trade* (2016).

Summary

The UK economy is suffering from low productivity and poor investment. This has weighed heavily on GDP growth since the 2008 financial crisis, with output per worker stagnating and productivity remaining among the lowest of any advanced economy.

Increasing productivity requires investment in productive enterprise. However, investment in the UK, as a proportion of domestic output, has fallen from about a quarter of GDP in 1990, when it was broadly in line with that of other developed economies, to just over 16 per cent. It is now well below that of most advanced economies.

One significant cause of this is that lending to business by banks, as a proportion of UK domestic lending, has declined from 31 per cent in 1988, to eight per cent in 2016. As the proportion of lending to business has decreased, lending to individuals and real estate lending – neither of which are a type of investment which will help to boost long-term productivity – have increased. Lending to business accounts for only five per cent of UK banking assets compared with 14 per cent of eurozone banking assets.

This means that despite the UK having the highest business start-up rate in Europe and world-leading research, it has performed badly when it comes to growing and developing businesses. In the UK only three per cent of start-ups grow to over 10 employees over a three-year period, putting it among the worst performers in the OECD.

This is in part driven by the market failure described as the patient capital gap, or finance gap, which sees banks failing to invest in small and medium-sized enterprises (SMEs), even when there is demand from creditworthy businesses, due to access to easier returns from alternative investments. This has meant that, despite a recovery which has seen net lending to SMEs increase each quarter since the end of 2014, net lending to small- rather than medium- sized enterprises has continued to decline. Even in 2015/16 some 19 per cent of SMEs seeking investments were unable to access suitable finance.

The government has recognised the lack of financing and its impacts in its industrial strategy and has called for 'a review of what actions could be most effective in improving productivity and growth in SMEs'. The Treasury has also been looking at how to increase the supply of capital available to help grow innovative firms, as part of its 2017 Patient Capital Review; the consultation paper for this notes that 'a lack of supply of appropriate capital appears to be one important factor that contributes to fewer firms scaling up'.

The problems the UK faces now are not unique to our economy or our generation. Several countries, including the UK, have or have had institutions – national development, promotional and investment banks and agencies – which have been set up to address these issues. Such institutions have been mandated to provide finance directly or indirectly to SMEs to ensure that where markets have failed there is still investment in creditworthy SMEs. Though primarily owned by governments, these institutions are operationally independent and are either profitable or operate at a very low cost to the taxpayer.

The experiences of these institutions, which have been created with the express purpose of providing the long-term finance necessary for the growth and development of enterprise, provide potential lessons for the UK to draw on today. The following six institutions are reviewed here:

- I. The Industrial and Commercial Finance Corporation (ICFC), a UK institution founded in 1945 but which no longer exists as it was created. The ICFC was initially effective at providing finance to grow British enterprises. It made profitable investments through a series of regional offices using local economic knowledge to gain a competitive advantage. However, having been initially set up with banks as shareholders, in an effort to avoid government involvement in financing business, the ICFC ownership model

proved ineffective at ensuring the corporation continued to target the patient capital gap, then known as the ‘Macmillan gap’.

- II. Germany’s Kreditanstalt für Wiederaufbau (KfW) is a government-owned promotional or development bank which in 2016 had a financing volume of €81 billion, of which €21.4 billion of financing was for the promotion of SMEs, business founders and start-ups. KfW has provided financing for German enterprise for almost 60 years and has almost consistently returned a profit. It provides financing by on-lending through products offered by local banks across Germany. It is one of the safest banks in the world and has benefitted from a legally defined mandate and a federal government guarantee. It is primarily funded through bond issues and so is able to raise funds without having to issue shares.
- III. The US Small Business Administration (SBA) is an independent agency of the federal government. During the 2016 financial year, the SBA approved lending to small businesses of almost \$29 billion. The SBA benefits from having a nationwide structure. However, it does not return a profit and has to seek funds from congress each year. This is likely because of two things. One, it is a government agency driven by policy objectives which are subject to political debate in the US Congress. Two, a proportion of financing is in the

form of guarantees for national banks which have no ties to local economies.

- IV. The European Investment Bank (EIB) is a multilateral development bank. The EIB's investments in the UK economy came to EUR 6.9 billion in 2016. Innovation and support to smaller businesses in the UK claimed 14 per cent and 3 per cent of those investments, respectively. The example of the EIB illustrates how the combination of a clear public policy mandate and support offered through partners with knowledge of local economies can allow a government-backed institution to successfully invest in the UK economy.
- V. The British Business Bank (BBB) was created in 2012 to support SMEs in the UK. It provided only £717 million in new commitments in 2016/2017. The BBB does show that a government-owned but independent institution can operate profitably in the UK. However, it still relies on government investments to fund new programmes, which themselves are driven by government policy. This limits the volume of lending that the institution can provide and encourages political interference in programmes which undermines the long-term sustainability of the institution.

The Scottish National Investment Bank (SNIB), the creation of which was announced in 2017, shows that

there is some support for a new government-owned, self-financing, investor in business in the UK. The proposal for the SNIB also highlights how a new UK bank could expect to raise the capital required to invest in business at minimal cost to the taxpayer.

Drawing on these case studies and given the challenges facing the UK economy, it is recommended that a national investment bank be created to provide support for enterprise, by helping to provide a sustainable source of patient capital and in doing so helping to tackle the UK's underlying productivity and investment problems. To this end, it is proposed that:

- A new UK Investment Bank (UKIB) is created, in law, which is fully owned by the UK, devolved and local governments.
- The UKIB would have offices in all regions of the UK. However, there should be scope for a different arrangement for devolved governments already in the process of developing financing institutions.
- The UKIB would be legally mandated to provide loans both directly to SMEs and by on-lending to SMEs through local banks. Loans and loan guarantees should only be provided on the basis of a direct assessment of the business looking to borrow by analysts with knowledge of the local or regional economy.
- The UKIB would be expected to provide lending at a competitive market rate, for loan terms between

three and 25 years. Lending should either be fixed-rate or variable within set limits. There should be provisions to provide payment-free periods of one to three years for businesses that will require a period of adjustment before being expected to return a profit.

- UKIB should offer business and management advice to businesses which receive funding or loan guarantees from the bank, and should work with businesses to maximise the chances of success.
- The institution must be operationally independent from government, with an independent Executive Board. Though governments may work with UKIB to implement programmes aimed at supporting business, this must be a secondary function. The primary function of the UKIB should be the general provision of long-term loans to creditworthy SMEs and start-ups.
- The UKIB should have a full government guarantee, but beyond the initial start-up funding should raise all necessary capital from markets. As with KfW in Germany, the guarantee would result in contingent liabilities but these would not be considered part of the public debt.
- The UKIB could operate an infrastructure investment arm which would invest in national, regional and local infrastructure projects through the provision of finance to local, devolved and/or the UK government.

1

The investment problem

Efforts made since the financial crisis to help grow the UK economy have, despite raising employment rates, failed to address the underlying problems of low productivity and low investment. As a result economic growth rates have remained below the pre-crisis trends and real incomes have stagnated.

It is against this backdrop that the government has put together an Industrial Strategy. The strategy recognises that the failure of the UK to raise productivity, particularly among SMEs, is hampering economic growth and, as a solution, the government aims to invest in what it has described as the ‘five foundations of productivity: innovation, people, infrastructure, places and the business environment’.

Though the strategy’s focus on investment is welcome, it does not provide the UK with a long-term sustainable solution to the UK’s investment problem – a lack of patient capital.

This study outlines the problems facing the UK’s economy and highlights how a lack of suitable finance for enterprise, namely patient capital, is holding back

productivity and damaging the UK's growth prospects. This is followed by an examination of five investment institutions which could help address these problems. Each of the institutions considered, from a number of countries, was created to help address the failure of markets to provide long-term finance or 'patient capital' for SMEs.

The successes and limitations of these institutions, their structures, mandates and funding models, are then considered in the context of the UK economic and political environments. In concluding the study it is then proposed that the government go further with its industrial strategy and create a UK Investment Bank (UKIB), either as a new institution or through a substantial reform of the British Business Bank, which would be mandated to provide the longer-term finance needed by enterprise to invest, grow and increase the UK's productivity. The UKIB should be operationally independent, self-funding, regionally structured and clearly mandated to provide suitable finance to support innovation and development in UK enterprise.

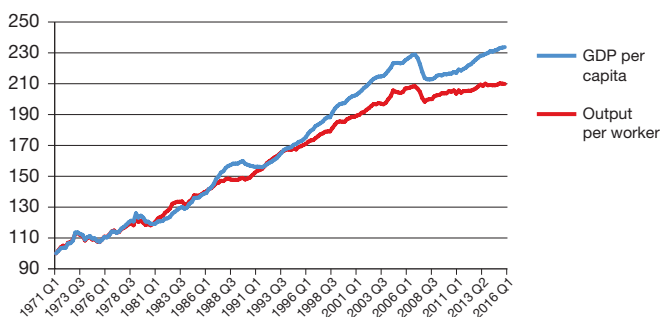
The state of the economy

The underlying challenges of low productivity levels and poor investment are hampering economic development in the UK. Though the economy appears to have recovered since the 2008 crisis, the evidence below shows the economy is far from back to normal. Despite GDP per capita having risen above the pre-recession peak, output per worker has stagnated at

around the same level since 2015, and seems unable to increase beyond the level first seen in 2007.

In short this means the economy has primarily grown because the size of the work force relative to the population has increased and not as a result of innovation or new technologies. In fact, productivity (or GDP per hour) in the UK has also barely risen last 10 years and the UK now has productivity levels which are among the lowest of advanced economies.

Figure 1.1: Indices of GDP per capita and output per worker (1971 Q1=100)

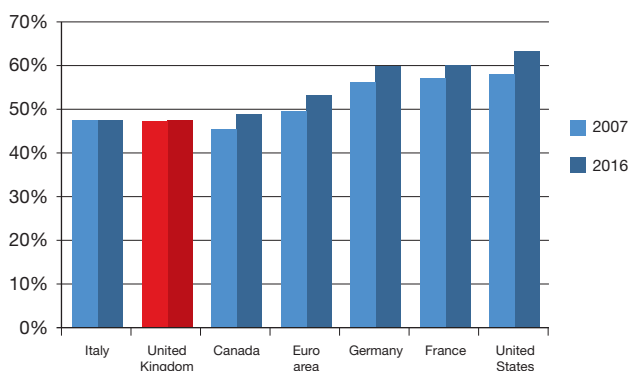


Source: ONS 2017¹

Investment

One key reason for the UK's failure in raising productivity is that, despite hosting the world's leading financial centre in London, investment is significantly below that of other developed economies and, worse still, what investment there is often does not go towards productive enterprise.

Figure 1.2: Change in productivity since the financial crisis (GDP per hour worked, constant 2010 USD PPP)

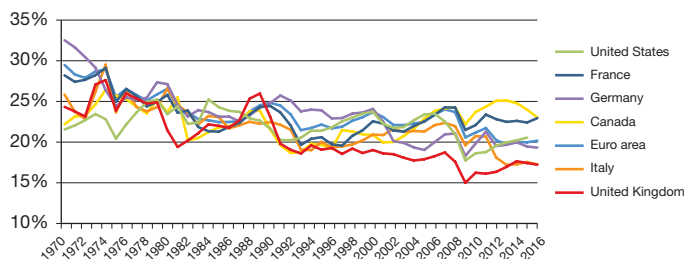


Source: OECD 2017²

Investment in the UK, as a proportion of our domestic output, was broadly in line with that of other developed economies until 1990. Since then it has fallen from around a quarter of GDP to just over 16 per cent and is now well below that of most advanced economies, with the exception of Italy, which is suffering from similarly low levels of productivity as the UK (see Figure 1.2). This level of investment is not even enough to maintain the current volume of capital stock per worker, which has declined each year since 2012.³

The low overall level of investment in the economy shown in Figure 1.3 is in part due to an even more serious problem. The proportion of bank lending going to business, the essential driver of productivity, has declined dramatically since the 1980s. Figure 1.4 shows

**Figure 1.3: Investment as a percentage of GDP
(gross fixed capital formation)**



Source: World Bank 2017⁴

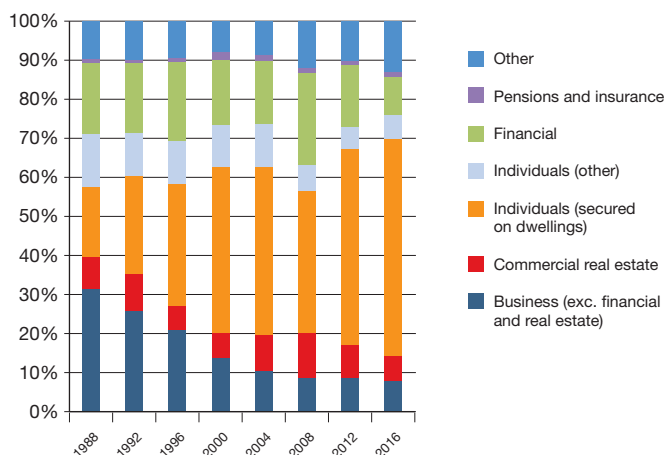
that lending to businesses by financial institutions, as a proportion of UK domestic total lending, has declined from 31 per cent in 1986, to below 8 per cent in 2016. As the proportion of lending to business has decreased, personally secured lending and real estate lending have increased, neither of which is likely to help boost long-term productivity.

Figure 1.5 shows how low the UK's proportion of business lending is in comparison to real estate lending when compared to the Euro area. This low level of business lending by banks, when compared to the Euro area, points to a serious problem for UK businesses and especially SMEs as, unlike larger companies, they are heavily reliant on loans for development financing.

The importance of growing SMEs

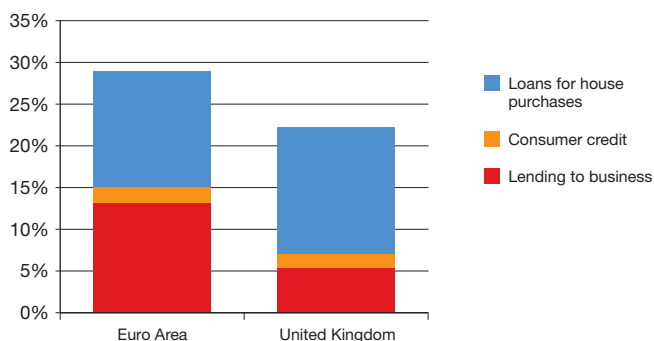
The importance of SMEs to the UK economy cannot be overstated. For context, SMEs make up 99.9 per cent

Figure 1.4: Distribution of net lending by financial institutions in the UK, by sector



Source: Calculated from Bank of England data⁵

Figure 1.5: Business lending and loans for house purchases as a proportion of 2016 banking assets



Source: Calculated from ECB MFI Balance Sheets Online 2017⁶

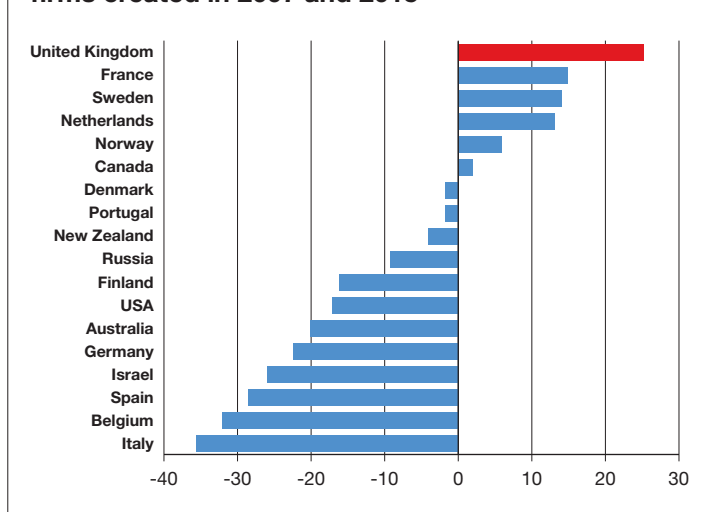
of UK private sector businesses, 60 per cent of private sector employment, 47 per cent of private sector turnover and over 40 per cent of UK exports.⁷ As such, any efforts to stimulate growth in the UK economy must take into account the needs of SMEs, both as start-ups and as businesses looking to expand, including those looking to increase their export potential.

As such a significant constituent of the UK economy, SMEs are essential drivers of real economic growth and productivity. Investment in SMEs is key to ensuring the development and adoption of new technology across the whole economy.

The business environment in the UK could hardly, on the face of it, be better. The UK excels at producing new ideas and new businesses. The UK has world-leading research, ranked first globally for citation impact and accounting for 15.9 per cent of the world's most cited research articles.⁸ Further still, the UK has been ranked among the best places to start a business globally, which is reflected in the fact it has one of the highest enterprise birth rates in the EU, ahead of both Germany and France.⁹ Figure 1.6 shows how the UK has seen a significantly higher percentage increase in the number of new enterprises between 2007 and 2015, when compared to other developed economies.

In addition to this, analysis by the *Financial Times* found that the UK has 24 per cent of Europe's top 1,000 fastest growing firms, the same proportion as Germany.¹¹ The combination of strong research, a good environment to start a business, and a high

Figure 1.6: Percentage change in number of new firms created in 2007 and 2015



Source: OECD 2016¹⁰

proportion of fast-growing firms should be helping to ensure new technologies are developed and introduced to businesses, resulting in an increase for UK productivity.

Yet, even with a relatively high proportion of Europe's fastest growing firms, the UK saw only three per cent of start-ups grow to over 10 employees in a three-year period, putting it among the worst performers in the OECD. This compares to over four per cent in France, 5.5 per cent in the US and 6.5 per cent in Norway.¹² The UK is failing to grow new enterprises, which account for a fifth of all firms in the UK, and is therefore not maximising the economic potential.

This is likely to be the result of certain problems in the UK economy. Recent research shows that firms in the UK are more likely to have over qualified workers than firms than in other economies, and that UK businesses are relatively slow to adopt and bring in new technologies.¹³ Though these are no doubt problems that need addressing through improved management – a challenge we will see later being addressed in other countries by the very type of institution that are examined in this study – it is also part of a far greater problem, that of low investment.

The patient capital gap

The low level of business lending by banks has a disproportionate impact on smaller businesses, which are less likely to be able to, or want to, raise funds through equity financing or through public bond markets and are less likely to have significant retained earnings to invest.

The proportion of business lending has declined particularly due to banks preference for mortgages and personally secured lending which reflects a preference for collateralised debt. Something which is more the case now following the financial crisis and the introduction of the Basel III Accords which tightened lending security requirements and precluded large volumes of unsecured lending. Further still, the relative cost of financing smaller businesses means that banks are less inclined to invest in smaller businesses, favouring personally secured and real estate lending.

Though this has been done to reduce the risk of financial crisis in the future and to maximise short-term returns for banks it is an issue as it means small business, especially those that do not have sufficient capital or credit history, are often unable to secure suitable loans from banks. The lack of suitable investments going to businesses, particularly SMEs, is therefore a result of banks being unwilling to lend even though there is demand from potentially creditworthy firms. This lack of financing for small firms is nothing new and was first recognised in the UK as the 'Macmillan gap' in 1931, and subsequently as the finance gap or patient capital gap.

The current low level of investment in SMEs is undoubtedly causing a drag on the UK economy. High-growth small businesses and start-ups are significant drivers of productivity and are responsible for a disproportionately high number of newly created jobs.¹⁴

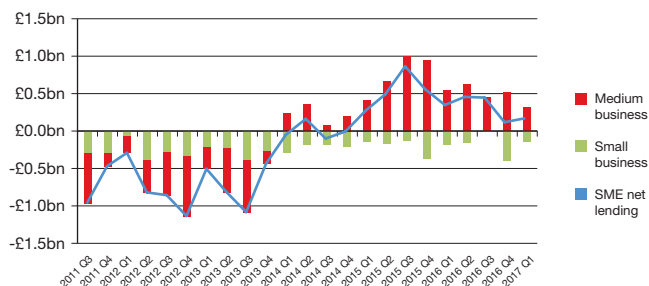
The lack of investment has also likely exacerbated regional economic disparity, with London, Scotland, the South East and the North East the only regions with higher productivity in 2015 than in 2007.¹⁵ Poor performance in most regions is putting downward pressure on overall UK productivity, which ten years on is only just reaching pre-crisis levels, and means economic disparity between the country's regions is still growing.

The government has recognised the lack of financing and its impacts in its industrial strategy and has called for 'a review of what actions could be most effective in improving productivity and growth

in SMEs'.¹⁶ The Treasury, too, is looking at how to increase the supply of capital to growing innovative firms, as part of its 2017 Patient Capital Review, for which the Treasury's consultation paper notes that 'a lack of supply of appropriate capital appears to be one important factor that contributes to fewer firms scaling up'.¹⁷

For SMEs the estimated gap has been shrinking. In the financial year 2011/12 69 per cent of firms applying for loans or debt finance were able to get what they needed, by 2015/16 the figure was 81 per cent. Despite this it is estimated that applications for around £4 billion of finance by around 100,000 SMEs are rejected each year.¹⁸ The gap is likely larger than this £4 billion as firms may be put off from applying due to the lack of appropriate financing available or the expectation of being turned away. Further still, promotion of appropriate finance could boost interest and encourage innovation in business.

It is worth noting that the 2011 to 2016 figures show that even in a period of economic recovery between a fifth and a third of UK private sector firms have been unable to access the finance they required. Further still, despite a recovery in lending to SMEs starting in 2014, in all but one quarter since 2011, net lending to small- rather than medium- sized enterprises has declined meaning that despite the highest levels of business creation less and less finance is being made available to allow our start-ups and small businesses to grow.

Figure 1.7: Quarterly change in net lending to SMEsSource: BBA 2017¹⁹

The problems the UK faces now are not unique to our economy or our generation. Several countries, including the UK, have or have had institutions – national development, promotional and investment banks and agencies – which have been set up and mandated to provide finance directly or indirectly to SMEs to ensure that where the markets have failed there is still investment in creditworthy SMEs. In most cases these institutions, that are owned by governments, have endured as profitable or low-cost investors in business that have operated independently of the government of the day. Given the evidence considered above there is a case for considering the creation of such an investment institution in the UK.

2

How could a national investment bank help?

To determine how a new investment institution might help address the challenges facing the UK economy, brief studies have been compiled which examine the experiences of five such institutions that were created with the express purpose of providing the long-term finance necessary for the growth and development of enterprise. The studies examine how they were structured, how they have functioned and whether they have been successful investors in enterprise.

The studies are of:

- The Industrial and Commercial Finance Corporation, which was a UK institution founded in 1945 that no longer exists as it was created, but which provides a valuable lesson for the UK today.
- Germany's KfW, a government-owned promotional or development bank which has total assets of €507 billion and in 2016 had a financing volume of €81 billion, of which €21.4 billion of financing was for the promotion of SMEs, business founders and start-ups.

- The US Small Business Administration, an independent agency of the federal government, which has an outstanding loan portfolio of \$124 billion which expanded by 4.5 per cent in 2016. In total, during the 2016 financial year, the SBA approved lending of almost \$29 billion.
- The European Investment Bank, a multilateral development bank which, in 2016, had assets worth over €573.2 billion with new lending that year of £76.4 billion. The EIB investments in the UK economy came to €6.9 billion in 2016 Innovation and support to smaller businesses in the UK claimed 14 per cent and 3 per cent of those investments, respectively.
- The British Business Bank, an institution created in 2012 to support SMEs in the UK. It provided £717 million in new commitments in 2016/17.
- The newly-proposed Scottish National Investment Bank.

The studies are followed by a summary of what lessons could be learnt were the UK government to try to set up such an institution for the UK. A more detailed case study of each of the five institutions is appended.

It is worth noting that, despite the small sample size, national investment, development and promotional banks are incredibly common. The UK is unique in not having a substantial state-backed and mandated institution. France has the Banque Publique d'investissement (BPI) which injected €24 billion into

its economy in 2016. Spain has the Instituto de Credito Oficial (ICO) which provided €5.4 billion of investment in 2016, having provided €61.5 billion to the Spanish economy between 2012 and 2016. Italy has Cassa di Risparmio di Roma (CdR) which lent €30 billion in 2016.

The Industrial and Commercial Finance Corporation

The Industrial and Commercial Finance Corporation (ICFC) was created in 1945 under the guidance of the Bank of England, with funding from major banks, to address an issue which the Macmillan report had recognised in 1931 – ‘there is [no] readily accessible channel, corresponding to the new issue market for larger firms, through which the small industrialist can raise long-term funds’.

The ICFC’s aim was therefore ‘to provide credit ... to business or enterprises in Great Britain, particularly in cases where the existing facilities provided by banking institutions and the Stock Exchange are not readily or easily available’.¹ To achieve this the ICFC, with agreement from the shareholder banks, offered loans and equity worth between £5000 and £200,000, identified as the level at which there was demand for finance but which was above the level available through commercial loans at the time and below the level at which banks would make significant business investments.²

The ICFC experienced immediate demand and by 1947 had loans outstanding of over £10 million. By 1956 that figure reached £30 million. The ICFC was

operationally independent and initially focused on providing finance to smaller businesses. Applications were assessed by employees with knowledge of the local economies in one of 19 regional offices.

Lending came in the form of either fixed-rate loans or though equity finance. Loans were typically offered on a 5 to 10 year repayment period, though sometimes longer, and often came with a grace period before repayments were required.

The ICFC did not make a loss until 1975, following the recession, and soon returned to profit. Over that period the pressure from the shareholder banks meant the lending mandate did not change with inflation or demand. The reluctance of the shareholder banks to continue funding the ICFC also led to the issue of £45 million of shares in 1959. These factors encouraged the pursuit of shorter-term profits and a change in focus away from financing smaller businesses, towards corporate mergers. The ICFC eventually became 3i, a private equity and venture capital company.

Successes and limitations

- Initially, the ICFC's lending effectively targeted the problem of the Macmillan gap.
- Operational independence and reluctant support from the shareholder banks ensured pressure to be a commercially-viable corporation.
- A regional structure and the accruing of local knowledge allowed the ICFC to make sound long-

term investments in creditworthy businesses which may otherwise not have had the necessary background to secure lending.

- The structure encouraged lending across all regions and sectors of the UK.
- Having banks as shareholders limited the ability of the ICFC to operate fully across the Macmillan gap, as they were unwilling to have the institution compete at the lower end of the market, limiting the functioning of the ICFC.
- The issuing of shares to raise capital led to the ICFC more aggressively pursuing profit, eventually undermining the initial role of the corporation.
- The ICFC remained profitable during the time it was most active in targeting the Macmillan gap.

Kreditanstalt für Wiederaufbau

KfW was formed in 1948 following a mandate from the Anglo-American military government to establish a reconstruction loan corporation in occupied Germany.³ KfW is a public law institution which is 80 per cent owned by the Federal Republic of Germany, 20 per cent owned by the German states and benefits from a federal republic guarantee.⁴ It is considered one of the safest banks in the world with the highest ratings from three major credit rating agencies.⁵

The 'Law Concerning Kreditanstalt für Wiederaufbau' outlines the functions of the institution

as ‘Performing promotional tasks, in particular financing, pursuant to a state mandate in the following areas; small and medium-sized enterprises, liberal professions, and business start-ups; risk capital; housing; environmental protection; infrastructure; technical progress and innovations; internationally agreed promotional programmes; development cooperation; other promotional areas specifically stated in laws, regulations, or published guidelines on public economic policy that are assigned to KfW by the Federal Republic or by a Federal State.’⁶

Since its creation KfW has been primarily funded through retained earnings and bond issues, with its first issues on the capital market in 1949.

KfW Mittlestandsbank, which in 2016 provided €21.4 billion of financing for the promotion of SMEs, business founders and start-ups, is the arm of KfW which is of most interest when considering how to design an institution which can help close the finance gap in the UK.

KfW relies on local saving banks, cooperatives and commercial banks to on-lend to small businesses, as KfW does not have any domestic branches of its own. The banks, not KfW, do the appraisals of the individuals or firms looking to borrow and decide whether to apply for a loan or product offered by KfW.

Rather than supplying loans directly, most KfW products simplify the loan on offer by assuming some of the liability – currently up to 80 per cent of credit risk on the products they offer. KfW’s primary support

comes in the form of long-term loan packages, with up to a maximum of 20 years repayment periods. Packages offered also can come with up to three repayment-free years.

Successes and limitations

- KfW relies on a system of local banks to distribute loans. This allows the bank to make use of local economic knowledge and good client relationship to provide investment creditworthy SMEs and start-ups.
- KfW allows for the provision of loans with fixed rates, long terms and repayment free periods.
- KfW also provides other forms of socially beneficial finance. This includes loans offered at competitive rates to local governments for major infrastructure projects.
- Despite KfW's first losses during the 2008 financial crisis, the bank helped smooth the impact of the financial crisis in Germany, lending a record level (€28.5 billion) to SMEs in 2010.
- KfW accesses almost all its funds for lending by issuing bonds on capital markets. As such, it provides a model for a state-owned, independently financed institution that could operate at no cost to the taxpayer.

The Small Business Administration

The Small Business Administration (SBA) was created by the US Congress in 1953 as an independent agency

of the federal government. It is a national investment institution with an aim 'to aid, counsel, assist and protect the interests of small business concerns, to preserve free competitive enterprise and to maintain and strengthen the overall economy of our nation.'⁷

The SBA and its functions are clearly mandated in law. The three key functions of the SBA being the provision of capital to small business, the provision of business counsel or entrepreneurial development services, and supporting the awarding of government contracts in order to reach a statutory target of having 23 per cent of federal contracts, by value, being awarded to small business.⁸

Though fees taken from the loans are supposed to cover the costs incurred by the SBA, including paying out on loan guarantees, the SBA consistently requires additional funding from Congress. Usually around \$1 billion, it was \$871 million in 2016 but has been as high as \$6.2 billion in 2011.⁹

In order to achieve these functions the SBA has a network of offices across the country which process loans, and provide disaster assistance and counselling.

The main tool for supporting SMEs is the 7(a) loan guarantee program, which accounts for 63 per cent of the SBAs loan portfolio. 7(a) loans are targeted at small businesses which are unable to apply for commercial loans. They are provided by lenders that have partnered with the SBA, which include most major American banks as well as local and state banks. The SBA guarantees up to of 85 per cent of loans up to

\$150,000 and up to 75 per cent on loans up to \$5 million. The SBA provides loans with long maturities, ranging from seven to ten years, though reaching a maximum of 25 years when the investment is used to purchase fixed assets or real estate with a long-term useful life.¹⁰ The loans aim to have competitive interest rates, which are agreed with the lender and SBA and can either be fixed rate, or variable with a maximum spread, in order to provide some certainty for the borrower. The loans can also come with interest only payment periods in order to help businesses to start generating a sustainable income before significant repayments are required.¹¹

Successes and limitations

- The SBA model does provide a benefit for the US economy. Financing in 2016 supported close to 494,000 jobs, amounting to approximately \$1,250 of federal funding for each job supported. Further still, the method of financing has ensured that many creditworthy businesses that would have been unable to access finance otherwise have been now able to do so.¹²
- The SBA is not an organisation that has returned profits, requiring annual funding from government.
- Having the SBA as a government agency, while making it easy for governments to use it as a tool to respond to crisis and to implement economic policy, makes it liable to political control and may be the reason for which the SBA does not return profits.

Loan guarantees through major banks can work, but the example of the SBA shows that the returns on these investments are not necessarily going to be pumped back into the economy in a way that benefits the domestic economy.

The European Investment Bank

The European Investment Bank (EIB) is a multilateral development bank, founded in 1958 as the Treaty of Rome came into force and is the investment bank for the European Union.¹³ In 1994 the European Investment Fund (EIF) was set up to help increase the availability of finance for SMEs across the EU. The fund, along with the EIB, now forms part of the EIB Group.¹⁴

The reason for examining the case for the EIB Group is two-fold. First, it is a state-backed investment organisation in which the UK holds a 16 per cent stake and from which the UK received over €30 billion in investments between 2012 and 2016.¹⁵ Second, unless rules for the EIB group are changed during the process of the UK negotiating its withdrawal from the EU, the UK will no longer be able to hold a stake in the EIB Group and should therefore see its investment returned and the UK will receive substantially less investment from the EIB group once it has departed.

As the EIB Group is at the same time an EU public body and a bank it, like all the other institutions we have looked at, has a mandate made by public policy decision but runs day-to-day as an operationally independent institution.

Lending by the EIB Group comes in the form of project loans, intermediated loans, venture capital, microfinance, and equity and fund investments.

The EIF is the arm of the EIB Group specialising in SME finance. The EIF provided, in the four years from 2011 to 2015, €2.3 billion of equity finance, €438.1 million of loan guarantees and securitisation and €14.7 million in microfinance. This finance it expected to have mobilised €4.1 billion of resources during that period.

The EIB has always returned a profit, making profits of between €2.5 and €2.9 billion in the last 5 years. As well as leveraging paid-in capital, the EIB raises funds through the issuing of bonds. In 2016, the bank raised €66.6 billion on international capital markets.¹⁶

Successes and limitations

The EIB cannot be considered a model for a national investment bank as it is designed to support international rather than national policy objectives. However, the following points remain of interest in considering the creation of a new UK national investment bank:

- The EIB Group is guided by a public policy mandate, and shows that an institution can operate profitably under such a mandate.
- Investment in SMEs is not the only function of the bank. The considerable amount of finance being made available for infrastructure shows that a publically backed bank can seek to address both the infrastructure and SME demands for patient capital.

- That SMEs cannot, in general, apply directly to the EIB Group for finance reflects the fact that decisions about investments in smaller enterprises can be made more effectively at a local level.
- The fact that the EIB is investing profitably in the UK to the tune of £8 billion annually highlights both that there is a demand to be met and profitable investment to be made by a publically backed institution in the UK.
- The UK is leaving the EU and EIB funding in the UK cannot be expected to continue, especially not at the same level it currently experiences.

The British Business Bank

Unlike any of the other institutions looked at so far, the British Business Bank (BBB) has a very short history. It was created in September 2012 with a commitment of £1 billion of government funding after pressure on the government to act, following the financial crisis, to support UK SMEs.

Initially it brought together government programmes aimed at SMEs as part of the British Business Bank programme under the Department for Business, Innovation and Skills. In 2014 the government got EU state aid clearance and the British Business Bank plc was formed. The BBB aims to ‘make finance markets work better for small businesses in the UK at all stages of their development.’¹⁷

The BBB is fully government-owned but independently managed. Rather than directly financing small businesses, it guarantees and supports lending from partners, such as banks, leasing companies, venture capital funds and web-based lending platforms. The BBB is also funded by the government, and unlike KfW does not raise most of its funds on capital markets, though a number of its programmes are supported by EIB investments.¹⁸

Much of what the BBB offers does help target the finance gap and help support SME development and innovations. The Enterprise Finance Guarantee, and similarly the ENABLE guarantees, in which the BBB take on a proportion a partner lender's loan risk in return for a fee will encourage further lending to SMEs. The Help to Grow programme shows the banks is moving in a similar direction to KfW and the SBA in providing structured products with partner banks, with finance targeted at the finance gap. The Start Up Loans Company is providing microfinance and business mentoring and support. However, they are all projects set-up in coordination with government policy and with government funding.

Successes and limitations

Despite the new nature of the BBB, its early successes and the fact the government is considering expanding its operations, means there are important lessons that can be taken when considering a future UK investment bank. They are as follows:

- The BBB, in 2016/17, managed a 3.9 per cent return, well above its target of 2.525 per cent, which was set to be above the cost of borrowing from the UK government. The bank had a net operating profit of £49.8 million.¹⁹
- The BBB in 2017 had assets of just £1.02 billion, making just £717 million in new commitments in 2016/2017. This funding in total supports a stock of finance of just £9.2 billion. This compares to KfW, which provided €21.4 billion in SME finance in 2016 and has an overall volume of lending of €472.4 billion as of December 2016.²⁰
- Importantly, an independently managed state-backed institution is able to run an operating profit with returns on capital well above the cost of UK government borrowing. This means that, with a government guarantee, the institution should be able to fully finance its lending through borrowing from international capital markets.
- The BBB made £0.7 billion of new commitments in 2016/17, compared to KfW's €21.4 billion for SMEs. This is in part because of the bank's limited funding and in part due to the fact the bank is relatively new.
- The Conservatives' 2017 manifesto recognised that increasing the responsibility and funds of the BBB means it is essential that offices around the country be opened. The government envisages this as a way of distributing funds introduced to replace those coming from the EU.

Other UK state-backed financing institutions

The BBB is not the only state-backed financing organisation in the UK. Both the Welsh and Scottish governments have organisations helping to support and finance SMEs. Wales has Finance Wales and Scotland has Scottish Enterprise.

The Scottish Investment Bank (SIB), the investment arm of Scottish Enterprise, invested £63.5 million in 2016/17 which leveraged a further £106 million of private investment.²¹ Similarly Finance Wales invested £56.5 million and leveraged £79.1 million from private investors.²² The current levels of investment made relative to those of KfW, and even the BBB, are small but their success in investing in business has contributed to the decision of both devolved administrations to set up new development organisations.

In 2016 and 2017 both the Scottish and Welsh devolved governments announced plans for their own development banks, the Scottish National Investment Bank (SNIB)²³ and the Development Bank of Wales²⁴.

The Development Bank of Wales will replace Finance Wales by 2018 and be governed by an independent Board of Directors. However, it will do little more than continue the current raft of programmes operated under the management of the Welsh government by Finance Wales and is only aiming at investing £80 million a year in the Welsh economy, with a plan to encourage £1 billion of investment by 2021.²⁵

The SNIB, however, is expected to follow the example of KfW and raise funds from international capital markets. A report by Common Weal and the New Economics Foundation outlining a proposal for the SNIB estimated that if the Scottish government were to set aside £225 million – 6.5 per cent of the Scottish government's capital budget – as paid-in capital for 6 years, providing the SNIB with £1.35 million of subscribed capital, then the SNIB would be able to raise over £3 billion assuming a leverage ratio of one to 2.5. This would put the SNIB in line with KfW in terms of capital raise as a proportion of GDP.²⁶

It is expected that the SNIB would raise funds beyond those initially provided by the Scottish government through the issuing of bonds to private investors and pension funds. The bonds issued, like those of the EIB, need not have an explicit government guarantee but could rely on both the fact the SNIB is government owned and the success of its portfolio attract investors.

Helping the UK economy

Each of the investment institutions examined have been successful in providing the kind of investment the UK economy needs to address the challenges of low productivity growth and poor investment. So it is worth reflecting on what lessons could be learnt were the UK government to try and set up such an institution in the UK.

The case studies have shown that there is a widespread understanding that there is a benefit

derived from having an institution mandated to support business and, with the exception of the SBA which is a government agency rather than an independent institution, operate at no ongoing cost to the taxpayer.

The ICFC, which was funded by shareholder banks, provided a model in the UK which recognised the importance of utilising local knowledge in making investment decisions through its offices spread across the country. However, the initial dependence on the banks and then the later shareholder model meant that over time the ICFC was able to drift from its mandate and of itself cannot provide a long-term sustainable model.

KfW also utilises local knowledge, but primarily by on-lending through other local and publicly owned banks. The UK does not have a system of local or public banks that a UK institution could utilise so could not effectively rely on on-lending to ensure investments make the most of local economic knowledge. KfW does, however, provide a good example of an institution that has been sustainable and profit making and which has operated on a public mandate outlined in law. KfW also benefits from a government guarantee and the ability to raise funds through the issuing of bonds.

The SBA, again, benefits from having a nationwide structure. However, it is the only example which does not return a profit. Instead it has to seek funds from Congress each year. This is likely a result of two things. Firstly, as a government agency it is not

fully operationally independent of government and is focused more by its policy objectives than by its expectation of returning a profit. Secondly, the agency relies not only on local banks to distribute loans which have SBA guarantees, a number of partner banks are national or international banks which, unlike the German local banks, do not have a mandate to support local economies meaning they are less likely to ensure investments are sound.

The EIB doesn't offer us significant lessons for a national bank structure but does illustrate the necessity for a clear mandate, and the fact that SME support is offered by partners with a presence in national economies reflects the understanding that local knowledge allow for more sound investment. The experience of the EIB also shows that it can be profitable to invest on a public policy mandate in the UK.

The BBB shows that a government-owned but independent institution can operate profitably in the UK. However, it still relies on government investments to fund new programmes, which themselves are driven by government policy. This limits the volume of lending that the institution can support and encourage political interference in programmes which undermines the long-term sustainability of the institution.

There is some recognition from the government that, particularly in light of the decision to leave the EU, the BBB may need to do more. The Conservatives' 2017 manifesto said the following:

Through our modern industrial strategy and digital strategy, we will help digital companies at every stage of their growth. We will help innovators and start-ups, by encouraging early stage investment and considering further incentives under our world leading Enterprise Investment Scheme and Seed Enterprise Investment Scheme. We will help digital businesses to scale up and grow, with an ambition for many more to list here in the UK, and open new offices of the British Business Bank in Birmingham, Bristol, Cambridge, Edinburgh, Manchester and Newport, specialising in the local sector. As we set out in chapter one, we will ensure digital businesses have access to the best talent from overseas to compete with anywhere in the world. This will be complemented by at least one new institute of technology in the UK, dedicated to world-leading digital skills and developed and run in partnership with the tech industry. When we leave the European Union, we will fund the British Business Bank with the repatriated funds from the European Investment Fund.²⁷

The Industrial Strategy released in November 2017 seemed to move away from this, however, and although the BBB has been awarded more funds to invest it now only sets out the creation of regional managers to ensure businesses across the UK know how to access finance.²⁸

The announced creation of the SNIB shows that there is support in the UK for a state-backed, self-financing, investor in business, particularly one which, as with KfW and the EIB, has a mandate which

encompasses the provision of patient capital for other social purposes such as investment in infrastructure. It also provides a model in the UK which a government could look to, learn from and work with to develop a UK-wide institution.

3

Designing an investment bank for the UK

It is clear from the case studies that government-owned investment institutions can play an important role in providing suitable finance for businesses. Given that there is a lack of investment in enterprise in the UK and given that such investment could be a significant driver of productivity and long-term growth it seems that designing an investment institution along the lines of those considered here could be a key way of tackling the UK's economic woes.

As already noted, the UK government has recognised that an independent state-backed financing institution can play a positive role in supporting the economy. However, the functioning of the current BBB is limited. In comparison with the other institutions examined the volume of financing is small and it offers a complex array of programmes driven by government policy not by a desire to ensure that the finance gap is being effectively targeted. It does not ensure it is utilising local knowledge and it is not, as it should be, an independent self-financing investor.

So what is needed instead? For any new significant institution to be a success it needs to be both tailored to the needs of the UK economy, and operate in such a way that it will remain politically and financially viable in the long run. The latter point is essential as any attempts to issue shares in, or to sell off, the bank will likely see the institution under pressure to boost short-term returns, and subsequently undermine the role of the institution in helping to close the finance gap.

The examples of the ICFC, KfW and, to a degree, the SBA provide a good base from which to model a UK institution. However, the government must seek to create an institution that is properly adapted to the UK's unique economic and political environment. It is in this light that the following section outlines a proposal for a new operationally independent, regionally structured UK Investment Bank.

Mandate

The structure and mandate of this new institution, as with both KfW and the SBA, would ideally be set out in law. This would help ensure its permanency, give the UKIB the ability to operate independently from the government of the day and fend off political pressure. The mandate should be clear but set out only the broad functions of the UKIB. The new institution would also only be able to be dissolved by law.

The bank should be mandated to increase the provision of patient capital to SMEs across the UK on a commercial basis, either by lending directly or through

on-lending programmes with partner organisations. The bank should seek to return a small profit which should cover operating costs, with all further costs being reinvested. The bank should also provide non-financial support to business in receipt of investments to ensure a greater chance of the investment being successful.

The new bank, as with KfW, should not be limited to lending to SMEs, as patient capital is not the only problem for SMEs. The two key areas of economic importance in which KfW operates are the support of exporting firms and supporting government backed infrastructure projects. The UKIB should be allowed to provide lending for these purposes, but as with SME lending, all loans must be commercially viable and infrastructure projects should have a long-term economic benefit for the regions in which they are developed.

When looking at the functions other institutions play it seems clear that lending by the UKIB should be limited to that which best targets the finance or patient capital gap and should therefore primarily come in the form of providing or supporting lending at a competitive market rate, for loans terms between three and 25 years. Lending should either be fixed-rate or variable within set limits. There should be provisions to provide payment-free periods of one to three years for businesses that will require a period of adjustment before being expected to return a profit.

However, the terms under which the bank operates, such as the value of loans, the loan repayment

periods, the products offered, should not be fixed, and should be periodically reviewed and negotiated by a supervisory committee and an executive. This would allow the bank to adjust its operations in line with the needs of the economy. It was evident that the restrictions on the ICFC, which were effectively enforced by its shareholder banks, limited its ability to act, particularly as lending limits did not rise with inflation.

Structure

As well as being legally mandated, the law creating the institution should ensure that it is majority owned by the UK government. Other devolved or local authorities should be considered as potential shareholders in the institution; this would give them a stake in the UKIB and help maintain pressure on the institution to invest across the UK rather than focusing in London and the South East, as tends to be the case with new investments.

One of the keys to success, in the case of the ICFC and KfW, is that the judgements on whether a business is commercially viable are made at relatively local level. Those making the decisions know the local economy and can expect to build a relationship with the client. This is important in two ways; first, the local knowledge allows for a more informed judgment which takes into account more than just the financial history of a firm or individual; second, often scaling up a business requires more than just finance, and can

require support for new management, new business models and new firm structures, this sort of business development support can only effectively be offered at a local level. The ICFC achieved this best through the creation of its regional offices, the SBA has both regional and district offices across the US, and KfW operates primarily through the local banks all across Germany.

Given the UK does not have a network of local banks the ability of a new institution to use current banks as a means of providing finance at a local level is limited. Not only might a new institution struggle to create financial products with which current banks would be willing to work, but banks in the UK have become incredibly centralised and do not currently have the ability to utilise local knowledge and build a sustainable and productive relationship with a client. This given, while a new UK investment bank could seek to provide loan guarantees and on-lend through the current banking system, it could also look to support the creation of local banks by providing them with greater lending capabilities for local business, but this should not, at least initially, be the primary means through which the institution would operate.

Instead the UK Investment Bank should operate with regional offices, initially reflecting the 12 economic regions of the UK.¹ The regional approach by the ICFC, which had a total of 19 offices during the 1970s, was essential to ensuring that lending was not too heavily concentrated in London. This ability of

such an institution to provide financing for all regions of the UK is important both politically and in helping to ensure the patient capital gap is filled. A significant number of SMEs and particularly high productivity manufacturers are based outside of London.

In looking at structure it is also important to take into account the devolved nature of the UK. Northern Ireland, Wales and Scotland already have state-backed financing institutions operating programs to support business – Invest Northern Ireland, Finance Wales and Scottish Enterprise. Further to this Scotland has announced the creation of a new Scottish National Investment Bank and the Welsh government is set to announce the creation of a Development Bank of Wales. The UK government should look to work with these institutions, as they could either form part of the UK Investment Bank, operating as the regional office, or collaborate with the UKIB in relation to investments in that region.

As well as having a regional infrastructure, which is vital in terms of ensuring the bank is able to accrue the investment knowledge and expertise needed to give it a competitive advantage, it is important that the management structure reflects the operational independence and the mandate of the UKIB.

The day-to-day running of the bank should be fully independent of political interference. As such, an independent Executive Board should be appointed, consisting of the UKIB management and include representatives from across the business community.

The targets and the general means through which the bank seeks to fulfil its mandate should be agreed between the Executive, and a Supervisory Committee, consisting of representations from government and regions across the UK and a fixed number of external experts appointed by the government with the agreement of the committee for fixed terms. The committee would meet annually to agree any significant changes to the operational mandate of the UKIB, including limits on lending, which borrowers are eligible for support and the banks leverage ratio. Beyond that the Supervisory Committee would be able to meet in an ad-hoc manner to review any challenges facing the bank.

Funding

For the UK Investment Bank to be operating on a similar scale to KfW it would have to be providing the equivalent of 0.7 per cent of GDP – approximately £13.5 billion in 2016 – in financing for SMEs. This would not include loans for infrastructure projects, financial products to support exports, or finance provided by UKIB for other purposes. It is also worth noting that in 2016 the total investment of the EIB Group in the UK was €8.1 billion (over £7 billion), a level of investment that would be worth continuing after the UK leaves the EU.

Though UKIB should focus primarily on the provision of patient capital for SMEs, its further mandate to support economically beneficial infrastructure projects and businesses looking to trade internationally would

allow it to take on much of the development role currently taken on by the EIB.

Given this, it would be reasonable for a new UK Investment Bank to aim to be providing as much as £20 billion of investment into the UK economy annually if it took on the roles of the EIB and had a mandate that extended beyond just SME investment. This target is likely to take some years to achieve and progress towards it should be driven primarily by the commercial viability of investment opportunities.

The success of KfW, the historic performance of the ICFC and the current performance of the BBB can provide us with the confidence that beyond the initial capitalisation of such an institution, a UK Investment Bank can become self-funding, gaining backing from capital markets, issuing bonds, and reinvesting returns. Indeed, the proposals for the SNIB expect this to be the case. The initial capitalisation and cost of setting up the UK Investment Bank is therefore the key issue.

On leaving the EU, the UK will leave the EIB Group. The UK currently has a shareholding worth an estimated £10.2 billion, which will likely have to be returned to the UK government if the bank's rules are not changed to accommodate non-EU members.² This money could be returned directly to the UK Investment Bank to invest according to the mandate of the bank. This includes €3.5 billion of paid-in capital. On top of this the UK has committed a further €35.7 billion of callable, subscribed capital.³ The amount of capital that would be available to as it came back from

the EIB would easily provide the government with sufficient capital to set up a new UKIB. After the first year of operation the UKIB could then issue bonds in order to raise funds for investment.

The set up costs would be low relative to the volume of capital required to start investing, and should the government be willing to use the BBB infrastructure as a stepping-stone to creating a new UKIB, the operating profit of the BBB would likely cover the cost of setting up further offices.

As a state-backed institution, the UKIB's liabilities would be assumed by the government. However, there is no reason why the UK, as with other countries, including Germany, could not consider the liabilities of this independently run public sector institution as 'contingent' and subsequently not include the UKIB liabilities in its calculation of public debt.

This system would effectively expand the operations on the UK banking sector to fill the finance gap that exists between the national demand for domestic patient capital, and the City's need to seek short-term and safer returns to investments. The bank as a significant new lending institution would undoubtedly have to be authorised and regulated by the Financial Conduct Authority and the Prudential Regulation Authority. This would be unlikely to be a problem as repurposing the capital from the EIB Group would ensure that as the UKIB was set with sufficient capital to allow it to borrow all it needed while managing its risk appropriately.

Conclusion and proposals

The UK economy is not operating as it should. The economic output of each worker is barely increasing and failure to increase our productivity since the financial crisis has been holding back growth. There is no doubt that low investment, particularly in enterprise, is a cause of the UK's current economic woes and a significant part of that problem is a failure of the financial sector to lend to SMEs, which make up the majority of businesses in the UK. This lack of suitable finance for investment in SMEs, namely patient capital, is holding back innovation and productivity growth and needs to be addressed if the UK economy is going to be set back on a path to sustainable growth.

The case studies, particularly of Germany's KfW and the US's SBA, show that government-owned investment institutions can play an important role in providing the sort of business investment the UK is lacking. Such investment could be a long-term driver of productivity and growth, providing a sustainable source of finance for UK enterprises.

With the creation of the BBB, the UK government has already recognised that a government-backed

financing institution can play a positive role in the economy. However, the BBB is not fit for purpose. Dependent on handouts from the government, it pursues an investment agenda for the government of the day. It is not the operationally-independent, self-financing investor the UK economy needs.

If the government is going to seriously tackle the challenges of low investment and productivity then they must go further and create a new UK investment institution, either as a new institution or through a substantial reform of the BBB, which would be mandated to provide the longer-term finance needed by SMEs to invest, grow and increase the UK's productivity. Having considered the successes and limitations of several institutions, their structures, their mandates and their funding models, the following is proposed:

- The creation of a new UK Investment Bank (UKIB) in law, which is fully owned by the UK, devolved and local governments.
- The UKIB would have offices in all regions of the UK. However, there should be scope for a different arrangement for devolved government already in the process of developing their own financing institutions.
- The UKIB would be legally mandated to provide loans both directly to SMEs and by on-lending to SMEs through local banks. Loans and loan

guarantees should only be provided on the basis of a direct assessment of the business looking to borrow by analysts with knowledge of the local or regional economy.

- The UKIB would be expected to provide lending at a competitive market rate, for loans terms between three and 25 years. Lending should either be fixed-rate or variable within set limits. There should be provisions to provide payment-free periods of one to three years for businesses that will require a period of adjustment before being expected to return a profit.
- The UKIB should offer business and management advice to businesses which receive funding or loan guarantees from the bank, and should work with businesses to maximise the chances of success.
- The UKIB must be operationally independent from government, with an independent Executive Board. Though governments may work with UKIB to implement programmes aimed at supporting business, this must be a secondary function. The primary function of the UKIB should be the general provision of long-term loans to creditworthy SMEs and start-ups.
- The UKIB should have a full government guarantee, but beyond the initial start-up funding should raise all necessary capital from markets. As with KfW in Germany, the guarantee would result in contingent

liabilities but these would not be considered part of the public debt.

- The UKIB could operate an infrastructure investment arm which would invest in national, regional and local infrastructure projects through the provision of finance to local, devolved and/or the UK government.

Case Study I

The Industrial and Commercial Finance Corporation

In 1945 political pressure to increase the availability of finance for small and medium sized enterprises led to the creation of the Industrial and Commercial Finance Corporation (ICFC). This was created under the guidance of the Bank of England, with funding from major banks, to address an issue raised in the 1931 Macmillan report, which recognised that ‘there is [no] readily accessible channel, corresponding to the new issue market for larger firms, through which the small industrialist can raise long-term funds’.¹ The problem was subsequently identified as the ‘Macmillan gap’.

The Macmillan report in 1931, and the war-time coalition that made preparations for the post-1945 economy, recognised that the main UK banks were not willing to provide long-term capital for SMEs. This is because smaller business investments would still cost banks the a similar amount to assess and administer as larger investments, creating a disincentive to invest in small, and even medium-sized, firms. This problem has once again been recognised in the Treasury’s 2017

consultation on patient capital, 'Financing Growth for Innovative Firms'. It is a problem which has been exacerbated in the UK by the City's ability to operate easily in international financial markets.

The ICFC was therefore created to plug the gap in financing between commercial loans, at the time identified as reaching a maximum of around £5,000, and the level at which banks would provide significant investment for businesses, identified at around £200,000.² Its aim was 'to provide credit ... to business or enterprises in Great Britain, particularly in cases where the existing facilities provided by banking institutions and the Stock Exchange are not readily or easily available'.³

A history of the ICFC, written by Richard Coopey, a Fellow at the London School of Economics, and Donald Clarke, an ex-director of 3i (the successor to the ICFC), judged the institution a success, both in helping to plug the Macmillan gap and financially. The authors noted that the ICFC 'provided a national service at no cost to the taxpayer and a substantial return for its shareholders at minimal cost to them'.⁴

However, the ICFC underwent gradual change and moved away from its purpose of targeting the Macmillan gap. Perhaps the most significant change came in 1959, when the ICFC was given the opportunity to raise funds on the markets and issued £45 million of shares. This put significant pressure on the organisation to ensure returns for shareholders. This resulted in the corporation starting to seek easier

short-term profits throughout the 1960s and 1970s, and slowly turning its attention to corporate mergers, most notably through the setting up of Industrial Mergers Ltd in 1967. In 1973 the ICFC was joined with another organisation, Finance Corporation for Industry (FCI), which had been set up at the same time as the ICFC with a mandate to provide finance for larger firms in industrial sectors but which had had significantly less success. The ICFC, along with the FCI, now operated under Finance for Industry (FFI) which was set up 'to provide medium- and long-term funds for the growth of British Industry.'⁵

In 1975 the ICFC made its first annual loss of £20 million following the recession in the UK. This led to a widening of the corporation's lending policy in the interests of returning to profitability in the short-term. By 1983 it had been renamed Investors in Industry (3i) and is now a radically different institution, operating as a venture capital firm, 3i.⁶

Mandate and operations

Unlike any of the other institutions reviewed here, the ICFC was not a fully state-backed institution. Instead it was reluctantly set up by banks to address a market failure so that the government did not need to act and create state-backed institutions like those in Europe. The result of this was an institution that had a very narrow mandate and which had shareholders that were not particularly motivated to support the institution they created.

The ICFC was initially set-up to fill the Macmillan gap and given a mandate to provide lending to SMEs between £5,000 and £200,000. Despite funding the institution, the shareholder banks were sceptical of the ICFC's ability to survive and did little to help it. The founders of the ICFC had initially hoped to get banks to refer potential businesses to it if banks were unwilling to provide finance themselves. However, of the 430 applicants the ICFC received by the February of 1946 only 89 had been referred by commercial banks and referrals were often for non-creditworthy businesses.⁷ Further still, the commercial banks, having limited ICFC lending to prevent it from competing with them, were found to be providing loans to businesses which had received offers of financing from the ICFC.

While helping to set up the corporation, the Bank of England opposed any plans to link the ICFC to government policy or to approach funding regionally. The opposition was driven by concerns that the UK would adopt a more continental banking model. Therefore once the corporation was set up it operated independently from both the Bank of England and the government and had to be (and was) a commercially viable operation to succeed.

The existence of the Macmillan gap was evidenced by the immediate demand for loans despite the lack of support from banks. By 1947 the ICFC had loans outstanding of over £10 million and by 1956 that figure had reached £30 million. Lending came in the form of either fixed-rate loans or through equity finance. Loans,

which would typically be offered on a 5 to 10-year time period, though sometimes more, would often come with a grace period before loan repayment were required in order to help firms overcome the 'valley of death', the period post-expansion in which firms often are unable to immediately return profit.

The pressure to succeed meant the ICFC had to be a cautious investor and was incredibly careful in evaluating businesses for loans. Its methods proved successful, with the corporation taking into account the firm's history and potential when negotiating terms of the loans. The success depended on expert knowledge of the businesses they were supporting and the local economies. This was achieved through a network of regional branches and through training its own employees to assess businesses and jointly put forward proposals with business to get funding.

The regional structure and local knowledge gave the institution a significant competitive advantage when compared to London-based banks with central structures and allowed it to make profitable investments in businesses that otherwise did not have the security or necessary historical accounts to secure long-term investment. Further still, as more regional offices opened the volume of lending outside of London notably increased.

The corporation also made an effort to invest across a range of sectors, though the vast majority of lending went to manufacturing firms, with the biggest concentration in engineering and electrical goods

(accounting for 21.4 per cent of investments in 1967), to ensure it would not be too exposed to economic shocks in any individual sector. The ICFC also avoided single product manufacturers as they were deemed too be too risky an investment.

The ICFC was initially reliant on its shareholder banks to provide it with funds , which often limited the amount of lending the corporation could offer. During the 1950s credit squeezes led to the banks trying to reduce the ICFC's funds. This pressure led to the 1959 share issue, which ultimately proved popular and provided the corporation a significant amount of capital to invest, but which led to a gradual change in the functioning of the ICFC.

Successes and limitations

The ICFC provides us with a number of valuable lessons. The points of note are as follows:

- The ICFC's lending effectively targeted the problem of the Macmillan gap without distorting markets or competing directly with the existing banks. However, the fact the lending mandate was not adjusted regularly with inflation meant that it limited the role of the ICFC and encouraged it to look at other streams of revenue.
- Operational independence from the government and the Bank of England encouraged a self-reliant institution and ensured there was pressure to be a commercially viable corporation.

- A regional structure and the accruing of local knowledge allowed for high quality assessments, which in turn ensured the ICFC could make long-term investments in creditworthy businesses which would have otherwise not had the necessary background to secure lending.
- The structure also encouraged lending across all regions of the UK and across a variety of sectors.
- Having banks as shareholders limited the ability of the bank to operate fully across the Macmillan gap, as they were unwilling to have the institution compete at the lower end of the market.
- The share issue that followed led to the banks more aggressively pursuing profit, eventually undermining the initial role of the corporation.
- The ICFC was profitable for close to thirty years and did not make a loss until 1975, following a major recession, by which time it had already started to drift from its original purpose. It is therefore reasonable to expect that if an institution could be created to operate along the lines of the early ICFC it would be capable of operating at a profit and at no continuing cost to the taxpayer.

Case Study II

Kreditanstalt für Wiederaufbau

KfW (Kreditanstalt für Wiederaufbau, which translates as the Credit Institute for Reconstruction) was formed in 1948 following a mandate from the Anglo-American military government to establish a reconstruction loan corporation in occupied Germany.¹ KfW is a public law institution that is 80 per cent owned by the Federal Republic of Germany, 20 per cent owned by the Länder (German states) and benefits from a federal republic guarantee.² As a result it is considered one of the safest banks in the world with the highest rating from the three major credit rating agencies.³

KfW was created to play a much broader economic role than the ICFC. The 'Law Concerning Kreditanstalt für Wiederaufbau' outlines the functions of the institution as 'Performing promotional tasks, in particular financing, pursuant to a state mandate in the following areas; small and medium-sized enterprises, liberal professions, and business start-ups; risk capital; housing; environmental protection; infrastructure; technical progress and innovations; internationally agreed promotional programmes; development

cooperation; other promotional areas specifically stated in laws, regulations, or published guidelines on public economic policy that are assigned to KfW by the Federal Republic or by a Federal State.’⁴

The largest injection of funds for KfW came initially in the form of \$1.4 billion through the US Marshall Plan.⁵ However, since its creation the institution has been primarily funded through retained earnings and bond issues, with its first issues on the capital market in 1949.

Mandate and operations

Following its early success in helping to support the reconstruction of Germany, KfW became a vital part of the German economic model. It has gradually evolved over time, taking on responsibilities for export finance, international development and finance for tackling climate change.

This is in part because, unlike the ICFC, the German government is actively involved in how KfW is run. KfW has two governing bodies, the Executive Board and the Board of Supervisory Directors. The Executive Board is responsible for the day-to-day running of the bank in accordance with the laws which govern it. The Executive Board is appointed by the Board of Supervisory Directors, which is chaired by the Federal Minister for Finance and the Federal Minister for Economic Affairs and consists of a number of Federal and state politicians, as well as leaders of business groups and unions. As well as these two boards an

SME Advisory Council, also chaired by the Federal Minister for Finance and the Federal Minister for Economic Affairs, includes a mix of politicians and staff from the Federal Ministries for Finance and Economic Affairs.⁶

The political direction given to the bank prevents the institution from seeking easy profits as its focus is kept primarily on social development goals, promoting the interests of the domestic population.

Today KfW has total assets of €507 billion and in 2016 had a financing volume of €81 billion. Financing is provided through four separate arms. The two domestic promotional arms are:

- KfW Mittelstandsbank, which in 2016 provided €21.4 billion of financing for the promotion of SMEs, business founders and start-ups.
- Kommunal- und Privatkundenbank/Kreditinstitute, which provided €33.7 billion of finance for the promotion of housing construction and refurbishment, improved accessibility and education, as well as financing of municipal infrastructure and the provision of global loans.

KfW then has two further arms that focus on international business:

- KfW IPEX-Bank, which supports the internationalisation of firms, providing financing for firms looking to export. In 2016 €16.1 billion was provided for export and project finance.

- KfW Development Bank and KfW DEG, which combined in 2016 provided €8.9 billion in development finance for developing emerging economies.

KfW is now primarily funded through international financial and capital markets, with €72.8 billion raised through the sale of bonds in 2016. Though over 90 per cent of funds are accessed this way, KfW still receives some funds from the federal government, which are typically for the purposes of social development goals and are either used to reduce the cost of finance aimed at achieving such goals or are distributed as grants.⁷

As we will see, KfW's levels of financing are far greater than both the SBA and the BBB, despite SMEs being of similar importance to each of the institutions respective economies. Unlike the UK, where SMEs are considered companies with fewer than 250 employees, Germany considers SMEs to be companies with fewer than 500. These companies make up 99.6 per cent of German businesses, account for almost 60 per cent of the workforce and 36.8 per cent of turnover.⁸

KfW's domestic financing is almost entirely disbursed as on-lending into the German banking system, which is significantly more diverse than the UK. As KfW does not have any domestic branches of its own, it relies on local saving banks, cooperatives and commercial banks to on-lend funds. The banks, not KfW, do the appraisals of the individuals or firms looking to borrow and decide both whether to finance

the project and whether to apply for a loan or product offered by KfW.

This system of on-lending allows KfW to take advantage of the relationship between customers and their current banks, allowing for better judgements to be made. Rather than supplying the loan directly, most KfW products simplify the loan on offer by assuming some of the liability, reducing the risk taken on by the lending bank and therefore making them more willing to lend. KfW currently will assume up to 80 per cent of credit risk on the products they offer.

There are two exceptions to the use of on-lending by KfW when it comes to the domestic provision of finance. First, the provision of grants, which are currently offered for energy-saving investments in homes and which are applied for and disbursed directly. The second is the provision of loans to public bodies, including local governments and cities seeking loans directly from KfW.⁹

The German banking system is notably different from that of the UK, to the extent that without radical change, the UK could not hope to operate primarily through on-lending in the current system if any new institution is to have any chance of closing the finance gap. This is taken into further consideration when in discussing the limitations of the KfW model and the current functioning of the UK BBB.

KfW Mittelstandsbank, and the products offered to start-ups and businesses looking for finance to grow and innovate, is the arm of KfW which is of most

interest when considering how to design an institution which can help close the finance gap in the UK.

Much like the ICFC, KfW's primary support comes in the form of long-term loans of varying loan terms, up to a maximum of 20 years. The loan packages offered also often come with one to three repayment-free years.

The main loans available for start-ups and young businesses are the ERP Start-up Loans, which come in two forms. The ERP Start-up Loan – StartGeld which is for business founders or individuals and small enterprises operating for less than five year requiring up to €100,000 as start-up capital. A maximum of €30,000 is allocated for working capital; the rest must be capital expenditure. KfW adopts 80 per cent of the credit risk with the clients own bank adopting just 20 per cent. These loans are eligible for up to two repayment-free years and come with a fixed interest rate more competitive than those offered by other German banks.¹⁰

The second is the ERP Start-up Loan – Universal. This covers a broader range of clients, primarily new businesses and SMEs which have been active for less than five years, but also included German businesses wanting to invest outside of Germany. The loans are available up to a maximum of €25 million for the establishment, take-over, acquisition or consolidation of an enterprise. Again the loan is offered at a competitive rate, with a fixed rate for up to 10 years and the option of up to three years repayment free.

As with the ICFC, the long loan terms, the fixed term rates, and the repayment free years are essential in providing suitable finance for SMEs and start-ups.¹¹

KfW also provides ERP Capital for Start-up which ensures that new business, with less than three years of operations lacking sufficient equity are able to get to get finance for working capital and capital expenditure, as well as cover costs of market entry. To do this KfW provides subordinated loans with subsidised interest rates which have loan terms of 15 years, worth a maximum of €500,000 and with no repayments for a seven-year period. The borrower must have equity equal to at least 10 per cent of the total investment, with KfW providing up to 40 per cent of the total investment in the form of a subordinated loan. The borrower is therefore not required to have any collateral, and in the case of liability the claims of KfW rank below those of other creditors. This loan significantly reduces the risk to other investors and effectively provides a medium term expansion of the borrower's equity base, allowing them access to debt financing they would not otherwise be able to get.¹²

This type of lending can be key to not only increasing the availability of finance for firms, by crowding in other investors into otherwise risky investments, but also in increasing demand for loans, and it does not require owners of SMEs to seek equity finance. Something which many small business owners are often unwilling to do, not wanting to relinquish control of their company.¹³

As well as young businesses, KfW provides finance for innovation covering up to 100 per cent of the cost of developing innovations up to €5 million. Again with fixed-term rates, repayment free periods and the option for subordinated capital. It also provides investments of up to €25 million for digitalisation and innovation of enterprises.¹⁴

Unlike the ICFC, all these products are applied for and assessed through the borrower's own bank. This ensures that lending supported by KfW does not crowd out the rest of the German banking sector, as banks that offer KfW loans are free to offer their own financing to clients.

As mentioned earlier, KfW also provides lending for other social development goals. These include a number of green, environmental and energy efficiency loans, export finance, international development finance, lending for housebuilding and education, and lending for infrastructure projects for local governments and authorities.¹⁵

The common thread for all these projects is the requirement for patient capital. Long-term loans and investments, with competitive and affordable interest rates, which still return profits to the lender. As with SME and business lending, the federal guarantee and KfW's top credit rating allow the bank to borrow at low interest rates on the international markets and subsequently lend at competitive rates.

All these types of lending contribute further to the German economy. Loans focusing on green technology

and energy efficiency help to drive innovation and support German manufacturers. Export finance makes it easier for businesses to take the risk of expanding to international markets, an essential task in developing globally competitive firms. Finance to support educational endeavours helps ensure appropriate skill levels exist in the German workforce, again essential for allowing business to thrive. Housebuilding and infrastructure projects provide relatively safe returns for the bank and encourage local employment. Infrastructure projects in particular can help support domestic SMEs as they provide relatively stable demand for products and services. Development finance too provides a relatively safe investment, and is predominantly provided in the form of loans to governments and development banks.

Successes and limitations

KfW has been an almost unequivocal success and is an indisputably valuable tool in helping to support business in Germany. For the first time in 2007, and then the following year in 2008, KfW made overall losses. These were in particular due to the banks attempt to bailout IKB, a business lender, which it later sold at a significant loss, through its exposure to losses during the financial crisis in Iceland and through a routine transfer of €319 million on the day Lehman Brothers declared bankruptcy. The losses amounted to €6 billion and €2.7 billion in the two years.¹⁶ However, KfW continued lending following the crisis and, with

some backing from the federal government, increased its focus on lending to SMEs, quickly returning to profit. In 2011 it was awarded Best Sustainable Investor, has won numerous awards since and is ranked among the safest banks in the world. Despite a bumpy ride, the overall effect was to smooth the impact of the financial crisis in Germany, lending a record level (€28.5 billion) to SMEs in 2010, as well as continuing to support infrastructure and other projects while commercial banks withdrew lending.¹⁷

One major problem with the KfW model exists for the UK; the reliance on a network of local banks willing to promote and use KfW loans. The UK operates a very centralised banking system in comparison with Germany. Commercial banks, by share of deposits, make up around 85 per cent of the UK market, compared to less than 40 per cent in Germany. The remaining banks in Germany are either Co-ops or public savings banks, with the latter taking just over 40 per cent of the market share. Further still, two-thirds of deposits in Germany are with regional or local banks, which only operate within certain localities. This compares to less than one-twenty fifth of UK deposits.¹⁸

This means that in Germany the majority of banks have their customers or the public as owners, and as such have a much greater interest in promoting the social and business development goals of KfW. The prevalence of local banks which can only take deposits and invest in specific regions further encourages the idea of productive local investment. In fact the local

banks account for some 70 per cent of SME financing in Germany and are the primary provider of KfW loans to SMEs.¹⁹

This is a significant contrast to the UK, where the majority of banks have very little limits on where they can invest or who they can take deposits from nationally. Further still, the majority of banks are private commercial banks, driven not by public interest but by the interests of their shareholders. This means that banks in the UK are far more likely to seek to maximise short-term profits through investments, often overseas or in assets which do not boost productivity (such as housing), in order to maximise returns to their shareholders.

As a result banks in the UK, though maybe partially interested in accessing finance to reduce risks of loans to business, both do not have the necessary interest or knowledge of the local economy to make assessments for such financing, nor do they operate with an ideology conducive to the long-term development of local economies or even the overall economy of the UK.

Despite this, there are still some key takeaways from the case of KfW which provide a useful insight into how to develop a successful financing institution, which for almost 70 years has helped to provide 'patient capital' for the development of the German economy and the SMEs within it. They are:

- KfW, as with the ICFC, relies on a regional network for the assessment and distribution of loans to

Start-ups and SMEs. Unlike in the UK this regional network exists as part of the current banking sector.

- KfW provides loans tailored to the needs of growing businesses, with fixed rates, long terms and repayment free periods.
- KfW not only provides loans for the purpose of growing and developing businesses, but also provides other forms of socially beneficial finance. This includes for infrastructure, which is a specific problem in the UK. KfW allows local governments to borrow directly for projects, which if replicated in the UK could allow local governments and to borrow and competitive rates for major infrastructure projects.
- Despite a government guarantee, KfW accesses almost all its funds for lending from capital markets, relying on its strong credit rating to pass on low interest rates to businesses. As such, it provides a model for a state-owned, independently financed institution that could operate at no cost to the taxpayer. Though, as with KfW, a UK government might see fit to use the institution to disperse grants and subsidised loans for social and environmental policy goals.
- As KfW is state-owned and backed by a federal guarantee it was able to maintain and even increase its level of financing for businesses during the financial crisis, helping to smooth the impact of

credit withdrawal, particularly for SMEs and start-ups which are much more vulnerable to market volatility.

- Finally, the finance provided through KfW is in orders of magnitude larger than any such institutions operating in the UK. Given that Germany and the UK have similar number of high growth start-ups this should be a major concern.

Case Study III

The Small Business Administration

The Small Business Administration (SBA) was created by the US Congress in 1953 as an independent agency of the federal government. It is a national investment institution with an aim 'to aid, counsel, assist and protect the interests of small business concerns, to preserve free competitive enterprise and to maintain and strengthen the overall economy of our nation'.¹

The creation followed the abolition of the Reconstruction Finance Corporation (RFC), which had been created in 1932 in response to the financial crisis of the Great Depression. The RFC was a government lending programme aimed at supporting all business damaged by the depression. However, during the Second World War concern for small businesses grew as the war economy saw large businesses rapidly expand and adopt new technologies to support defence contracts, leaving smaller business struggling to compete. This concern led to the creation of the Smaller War Plants Corporation in 1942, which was in time abolished and much of its functions were passed

to the RFC, which continued to support small business until its abolition.²

With the abolition of the RFC, President Eisenhower proposed the creation of a new small business agency to continue the role of government in supporting small businesses. The SBA was then created by the Small Business Act in 1953 and was operational by 1954.³

Mandate and operations

Much like KfW, the SBA and its functions are clearly mandated and its role is defined by law. Despite several amendments over the years the prime functions of the SBA have changed little since its creation. The three key functions being the provision of capital to small business, the provision of business counsel or entrepreneurial development services, and supporting the awarding of government contracts in order to reach a statutory target of having 23 per cent of federal contracts, by value, being awarded to small business. Further to this the SBA acts as a public advocate for small business, with the creation of the SBA Office of Advocacy in 1978, and to provide disaster relief to businesses.⁴

In order to achieve these functions the SBA has a network of offices across the country which process loans, and provide disaster assistance and counselling.

As with Germany and the UK, SMEs make up a significant proportion of the US economy. The US, like Germany, considers SMEs to be firms with fewer than 500 employees. SMEs make up over 99 per cent of all

US firms and account for 47.8 per cent of private sector employees. From 1993 to 2016 they accounted for 62 per cent of new jobs.⁵

The SBA has total assets of \$12.7 billion and an outstanding loan portfolio of \$124 billion which expanded by 4.5 per cent in 2016. In total, during the 2016 financial year, the SBA approved over 74,000 loans to businesses at a total lending of almost \$29 billion.⁶

The main tool for supporting SMEs is the 7(a) loan guarantee program, which accounts for 63 per cent of the SBAs loan portfolio. 7(a) loans are targeted at small businesses which are unable to apply for commercial loans. They are provided by lenders that have partnered with the SBA, which include most major American banks as well as local and state banks. The SBA guarantees up to of 85 per cent of loans up to \$150,000 and up to 75 per cent on loans up to \$5 million. As with the other institutions we have looked at, the SBA specifically provides loans with long maturities, generally ranging from seven to ten years, though reaching a maximum of 25 years when the investment is used to purchase fixed assets or real estate with a long-term useful life.⁷

The loans aim to have competitive interest rates, which are agreed with the lender and SBA and can either be fixed rate, or variable with a maximum spread, in order to provide some certainty for the borrower. The loans can also come with interest only payment periods in order to help businesses to start generating a sustainable income before significant repayments are

required. Most loans require some collateral though, if insufficient capital is the reason for an inability to access finance, loans will still be offered provided all available collateral is offered. Principal business owners are required to give a personal guarantee.⁸

There are a variety of limitations and eligibility criteria which can vary depending on sector and business type. In general, however, the loans must be provided on the following grounds:

- 'There must be sufficient invested equity in the business so it can operate on a sound financial basis;
- There must be a potential for long-term success;
- The owners must be of good character and reputation; and
- All loans must be so sound as to reasonably assure repayment.'⁹

There are also a number of special purpose 7(a) loans operating along similar lines, to help businesses with problems such as exporting or short-term or cyclical problems. Rather than the SBA getting returns on the lending, lenders offering 7(a) loans are charged a fee for each loan a partner organisation offers with an SBA guarantee. The fee is calculated as a percentage of that guarantee.¹⁰

The second most common form of finance offered through SBA programs is the 504 loan. Its primary purpose is to support economic development through business expansion and job creation. The loans are

subordinated mortgages, provided at a fixed rate for up to 20 years, for the purpose of buying or renovating capital assets.¹¹

Lending is limited to \$5 or \$5.5 million depending on: the impact in terms of numbers of jobs; the job type, with greater support available for manufacturing and energy related job; the owner, with greater support for businesses owned by veterans, women or minorities; whether the project improves the environmental impact of the business; or, other specific policy goals.¹²

In order to get financing, the borrower must provide 10 per cent of the overall investment, a second lender must provide at least 50 per cent of the investment. An SBA 504 Certified Development Company, which will have worked with the borrower to arrange the financial package, will then provide up to 40 per cent of the investment, which is fully guaranteed by the SBA.¹³

Further to this, the SBA lends to not-for-profit intermediaries who provide micro-loans of up to \$50,000 to small business owners for terms of up to six years. The intermediaries are also given SBA grants to provide training and counselling to small businesses and start-ups.¹⁴

The SBA also provides a number of business development services out of centres across the US. As with the ICFC, the SBA sees an important role in not just providing finance, but also providing the knowledge and expertise needed to grow and develop the business.

Successes and limitations

There are two primary issues with the model of the SBA. The SBA, unlike KfW and the ICFC, is not an organisation that has returned profits. Though fees taken from the loans are supposed to cover the costs incurred by the SBA, including paying out on loan guarantees, the SBA consistently requires additional funding from Congress. Usually around \$1 billion, it was \$871 million in 2016 but has been as high as \$6.2 billion in 2011.¹⁵

This is less than ideal in a state-owned investment institution, which one would hope would have profits to invest back into the domestic economy rather than have to rely on annual contributions from the taxpayer. The lack of profitable investments suggests that the SBA model allows too much lending to go to less than creditworthy business. As such the SBA perhaps ought to consider reducing the proportion of the finance they guarantee and have lenders take on a greater proportion of the risk in order to ensure they are more careful in assessing for loans. Further to this, the profit from the loans is ultimately returned to the shareholders of the partner banks, which unlike KfW are not predominantly local banks with a mandate to invest in the local economy.

This problem is likely enhanced by the fact SBA is a federal agency rather than an operationally independent organisation. Its financing and programmes are therefore subject to political pressure and lobbying, and not driven by a desire to remain commercially viable.

Despite this, the SBA model does provide a benefit for the US economy. Financing in 2016 supported close to 494,000 jobs, amounting to approximately \$1,250 of federal funding for each job supported. Further still, the method of financing has ensured that many creditworthy businesses that would have been unable to access finance otherwise have been now able to do so. It has addresses the patient capital gap by providing long term lending to some 70,000 SMEs in the US.¹⁶

In considering the case of the SBA, and in planning a model for the UK, it is important to consider the following:

- Having the SBA as a government agency, while making it easy for governments to use it as a tool to respond to crisis and to implement economic policy, makes it liable to political control and may be the reason for which the SBA does not return profits. As such, operational independence is probably an important factor in creating self-financing UK institution.
- Loan guarantees through major banks can work, but the example of the SBA shows that the returns on these investments are not necessarily going to be pumped back into the economy in a way that benefits the domestic economy.

Case Study IV

The European Investment Bank

Unlike the three previous institutions looked at, the European Investment Bank (EIB) is in effect a multilateral development bank. It was founded in 1958 as the Treaty of Rome came into force and has been an investment bank for the then European Communities and the now European Union ever since.¹ In 1994 the European Investment Fund (EIF) was set up to help increase the availability of finance for SMEs across the EU. The fund, along with the EIB, now forms part of the EIB Group²

Like KfW, the EIB Group's role is not only the support of SMEs, but also the provision of infrastructure and development finance.

The reason for examining the case of the EIB Group is two-fold. First, it is a state-backed investment organisation in which the UK holds a 16 per cent stake and from which the UK received over €30 billion in investments between 2012 and 2016, and so it represents a major investment by the UK government in a publically owned institution.³ Second, unless rules for the EIB group are changed during the

process of the UK negotiation its withdrawal from the EU, the UK will, on departure, no longer be able to hold a stake in the EIB Group and should therefore see its investment returned. The UK will also receive substantially less investment from the EIB group once it has departed.

Mandate and operations

The main role of the EIB Group in the UK is not investment in growing businesses, with only three per cent of UK loans in 2016 going towards supporting smaller businesses and 14 per cent going towards innovation. The majority of investments go toward infrastructure and environmental projects (47 per cent and 36 per cent respectively).⁴

As the EIB Group is at the same time an EU public body and a bank it, like all the other institutions we have looked at, has a mandate made by public policy decision but runs day-to-day as an operationally independent institution. A Board of Governors determines the guiding principles and the high-level policies of the EIB, a Board of Directors is responsible approving financing operations the banks policies and the Management Committee is in charge of the day-to-day management of the EIB. The bank is ultimately accountable to the EU and its 28 member states who are the shareholders of the bank.⁵

Lending by the EIB Group comes in the form of project loans, intermediated loans, venture capital, microfinance, and equity and fund investments.

The functions

Project loans are for individual projects which require over €25 million of investment, the EIB will offer to invest up to a maximum of 50 per cent of the total investment in any individual project and come with long repayment periods. The terms of such loans can vary significantly depending on the project and the investors. These projects often include national or regional public sector involvement and assessed on their ability to deliver a positive impact for the local economy. The primary purpose of these loans is to encourage the development of economically beneficial strategic infrastructure (such as digital, transports or utility infrastructure).⁶

Intermediated loans are based on the EIB forming partnerships with intermediaries, such as national promotional of development banks, to on-lend finance to further at least one of four public policy goals. These are:

- Increased in growth and employment potential, including support for SMEs.
- Economic and social cohesion; addressing economic and social imbalances, promoting the knowledge economy, skills and innovation and linking regional and national transport infrastructure.
- Environmental sustainability, including supporting competitive and secure energy supply.
- Action for climate-resilient growth.⁷

As with the project loans, the terms of the on lending varies depending on the arrangement the EIB has with the intermediary. The EIF manages most of the intermediated lending for SMEs.

The EIB Group also manages a significant number of equity and fund investments aimed at catalysing greater investment across the EU. The funds are used to promote the EU's policy objectives for supporting innovation and skills, SMEs, Infrastructure and environmental development.

As part of its operations, the EIB Group, along with the EU commission launched the European Strategic Investment Fund (ESIF), as a means of tackling the finance gap in the EU.⁸ The €21 billion fund is capitalised with €5 billion from the EIB and a €16 billion guarantee from the central EU budget. Of this fund €5.5 billion allocated to the EIF, for its operations described below, and the remaining €15 billion is allocated to the EIB for investment in infrastructure and innovation. Combined the funds are expected to allow for €61 billion of financing to be offered by the EIB Group which aims to support some €315 billion worth of investments.⁹

The EIF is in effect the arm of the EIB Group specialising in SME finance. The EIF provided, in the four years from 2011 to 2015, €2.3 billion of equity finance, €438.1 million of guarantees and securitisation and €14.7 million in microfinance. This finance it expected to have mobilised €4.1 billion of resources during that period.

The EIF investments, though significantly smaller in total than that of the EIB, are all directed toward businesses, and in particular SMEs.

The EIF's equity investments in the UK come in a range of forms. These include investments in funds specialising in bring new technologies from proof of concept to market, investments in high risk firms with mezzanine finance, and through investment in private equity funds. The EIF has also increasingly invested in venture capital funds to support the commercialisation of new technologies and products.

In 2015 the EIF invested in 16 equity funds, many of which were multinational, and made two-co-investments. These investments totalled €655.8 million and are expected to have mobilised a €2.9 billion of investment in the UK.

The EIF also manages the UK Future Technologies Fund (UK FTF), a fund-of-funds launched in 2010 in collaboration with the UK Government. UK FTF invests into venture capital funds targeting advance manufacturing, information and communication technologies and life sciences.¹⁰

In 2015, the EIF also provided guarantees and securitisation to support UK SMEs. These investments totalled €280.3 million. These investments include the InnovFin SME Guarantee Facility with Santander UK PLC and Barclays Bank PLC, allowing innovative SMEs to benefit from around €274.1 million (£200 million) of new lending over the next two years, and the guarantee agreements with EZBOB and Iwoca, UK

based providers of business loans operating through online platforms whose agreements are expected to provide €103 million (£80 million) of additional lending to support small businesses in the UK. The InnovFin SME Guarantee and the Iwoca agreement also benefit from guarantees from the ESIF.¹¹

As well as partnering with private UK investors to increase lending to SMEs through guarantees, the EIF provides guarantees for lease financing, some of which has been done in collaboration with the British Business Bank.

The EIF supports small businesses, further targeting its investments at the finance gap, through guaranteeing microfinance. This is achieved through the managing of the Europe-wide Employment and Social Innovation Guarantee Financial Instrument. This instrument was used to invest €7.3 million in UK microfinance in 2015.¹²

As with KfW, and as we shall see with the BBB, EIB Group finance for SMEs is in most cases provide not directly, but through guarantees for intermediaries lending in their respective countries. This reflecting the fact that smaller investments require more local and specialised knowledge. This is reflects in the decision of the EIB Group to provide £184 million for the UK Northern Powerhouse Investment Fund and £32.5 million for the Midlands Engine.¹³ It is further expected to provide £60 million for the UK North East Fund.¹⁴

Successes and limitations

The EIB has remained in profit since its creation, making profits of between €2.5 and €2.9 billion in the last 5 years. The bank, in 2016 had assets worth over €573.2 billion with new lending that year of €76.4 billion. The bank also raised €66.6 billion through the issuing of bonds on international capital markets.¹⁵

As a publically owned institution operating successfully in the UK the case of the EIB Group is of interest. Unlike the ICFC it cannot be considered a model for a national investment bank as it is designed to support international rather than national policy objectives, however, the following points remain of interest in considering the creation of a new UK national investment bank:

- The EIB Group, as with all our institutions in guided by a public policy mandate, and shows that an institution can operate profitably under such a mandate. Further still, the decision of the EIB and EU Commission to create the ESIF to target the finance gap shows a recognition at an international level, of the need to increase patient capital.
- As with KfW investment in SMEs is not the only or the largest function of the bank. The considerable amount of finance being made available for infrastructure shows that a publically backed bank can seek to address both the infrastructure and SME demands for patient capital.

- The fact that SMEs cannot, in general, apply directly to the EIB Group for finance reflects the fact that decisions about investments in smaller enterprises can be made more effectively at a local level.
- The fact that the EIB is investing profitably in the UK to the tune of £8 billion annually highlights both that there is a demand to be met and profitable investment to be made by a publically backed institution in the UK.
- The UK is leaving the EU and this means that EIB funding in the UK cannot be expected to continue, especially not at the same level it currently experiences. A new institution could help fill this gap, both adopting a role in infrastructure investment and increasing the volume of the UK's investment going to SMEs and growing business.

Case Study V

The British Business Bank

Unlike any of the other institutions looked at so far, the British Business Bank (BBB) has a very short history. It was created in September 2012 with a commitment of £1 billion of government funding after pressure on the government to act, following the financial crisis, to support UK SMEs.

Initially it brought together government programmes aimed at SMEs as part of the British Business Bank programme under the Department for Business, Innovation and Skills. In 2014 the government got EU state aid clearance and the British Business Bank plc was formed, which is 100 per cent government-owned but independently managed.

Unlike the ICFC, whose primary function was investing directly in business, the BBB, similar to SBA, provides some tailored finance products which are offered through intermediaries. However, the BBB also invests through a number of equity funds to leverage in funding from private investors.

The BBB invests significantly smaller volumes than both KfW and the SBA making just £717 million in new commitments in 2016/2017.¹

Mandate and operation

The BBB aims to ‘make finance markets work better for small businesses in the UK at all stages of their development.’²

The BBB is fully government-owned but independently managed. Rather than directly financing small businesses, it guarantees and supports lending from partners, such as banks, leasing companies, venture capital funds and web-based lending platforms. The BBB is also funded by the government, and unlike KfW does not raise most of its funds on capital markets, though a number of its programmes are supported by EIB investments.³

The BBB also operates a commercial subsidiary, British Business Bank Investments Ltd, pursues investments in banks, non-bank lenders, and venture capital funds, in order to increase the choice of finance available to SMEs.

The finance being offered by the BBB includes:

- The Enterprise Finance Guarantee (EFG) – which facilitates loans to small businesses that have insufficient security to meet a lender’s normal requirements. As of December 2016, the EFG had provided 27,000 business loans worth £2.8 billion. The BBB guarantees 75 per cent of loans for small businesses otherwise unable to access debt financing in return for a two percent annual fee.⁴
- The Angel CoFund – which helps small businesses to secure investment from the Fund itself and

‘business angel’ syndicates, in a ratio of about 1:4. Since November 2011, the Fund has enabled small businesses to secure £172 million in investment.⁵

- The ENABLE programmes – which include; the ENABLE guarantee encouraging lending to smaller businesses, offering a government-backed portfolio guarantee to cover a portion of participating banks’ losses, this currently is only operated with the Clydesdale and Yorkshire Bank in a £125 million pilot; and ENABLE funding which has committed £239.4 million to improve asset and lease financing through smaller finance providers.⁶
- Enterprise capital funds – which combine private and public money to make equity investments in high growth businesses, in order to encourage venture capital funds to operate in markets where smaller businesses cannot access the growth capital they need. Over £946 million has been committed as of the end of January 2017.⁷
- ‘Help to grow’ growth loans – launched in 2016, lenders who have agreed to offer ‘Help to grow’ loans (currently Lloyds Bank and OakNorth) offer ‘debt-based finance which goes beyond senior debt in terms of risk appetite.’ Relatively new, and still being developed, the programme works with partners to provide financial products between £0.5 and £2 million, with potential for deferred payments, in which the BBB provides a first loss guarantee.⁸

- Start Up Loans – the BBB backs the Start Up Loans programme. Funded by the government, the Start Up Loans Company is a subsidiary of the BBB which provides new businesses with loans of up to £25,000 at six per cent interest, along with free mentoring and support. As of the end of December 2016, more than £284 million had been lent to over 40,000 entrepreneurs.⁹
- The Northern Powerhouse Investment Fund (NPIF) aims to generate £400 million of new investment, together with another £100 million from a separate fund for the North East Local Enterprise Partnership (LEP), which chose not to take part in the NPIF. Funding will be drawn from the European Regional Development Fund allocations for participating LEPs, grant funding, and loans from the BBB and EIB (the later contributing £184 million¹⁰). The money will be allocated to ‘sub-funds’ which in turn will lend to and invest in small businesses across the NPIF area. The NPIF will use 60 per cent of its funding as debt finance (including an additional £20 million for microfinance to SMEs) and 40 per cent as equity finance. Furthermore, in January 2017, the Northern Powerhouse was allocated £556 million from the Local Growth Fund. The money is to pay for projects including flood defences, an intermodal terminal at Goole to connect the town’s rail, sea, road and motorway links, an innovation fund for SMEs in Manchester and Cheshire, the regeneration

of Hull city centre, a conference centre and hotel in Blackpool, and an International Advanced Manufacturing Park in Sunderland.¹¹

- Midlands Engine Investment Fund – the 2016 budget created a £250 million investment fund, funded by legacy programmes, the BBB, and EU funding, to support the growth ambitions of businesses in the Midlands. It is administered jointly by the BBB and the LEPs in the Midlands.¹²
- The BBB is also setting up the Cornwall & Isles of Scilly Investment Fund (CIOSIF) in partnership with the Cornwall & Isles of Scilly LEP. The £40m investment Fund will support SMEs and help to address an equity gap in start-up and development capital.¹³

The BBB also manages JEREMIE (Joint European Resources for Micro to Medium Enterprises) Funds in the North of England, targeted at SME finance, and the venture capital funds set up by the now defunct Regional Development Agencies.¹⁴

Successes and limitations

Much of what the BBB offers does help target the finance gap and help support SME development and innovations. The Enterprise Finance Guarantee, and similarly the ENABLE guarantees, in which the BBB take on a proportion a partner lender's loan risk in return for a fee will encourage further lending to

SMEs. The Help to Grow programme shows the banks is moving in a similar direction to KfW and the SBA in providing structured products with partner banks, with finance targeted at the finance gap. The Start Up loans Company is providing microfinance and business mentoring and support.

Further to this the British Business Bank has been successful in providing finance, with a return on deployed capital increasing each year since 2014. The bank in 2016/17 managed a 3.9 per cent return, well above its target of 2.525 per cent, which was set to be above the cost of borrowing from the UK government. The bank had a net operating profit of £49.8 million.¹⁵

However, as a state-owned institution aimed at supporting SMEs, the BBB operations, when compared to that of KfW or even the EIB, are severely limited. The BBB in 2017 had assets of just £1.02 billion, making just £717 million in new commitments in 2016/2017. This funding in total has supports a stock of finance of just £9.2 billion. This compares to KfW, which provided €21.4 billion in SME finance in 2016 and has an overall volume of lending of €472.4 billion as of December 2016.¹⁶

There is however recognition from the government that, particularly in light of the decision to leave the EU, that the BBB will need to do more. The Conservative's 2017 manifest said the following:

Through our modern industrial strategy and digital strategy, we will help digital companies at every stage of their growth. We will help innovators and start-ups,

by encouraging early stage investment and considering further incentives under our world leading Enterprise Investment Scheme and Seed Enterprise Investment Scheme. We will help digital businesses to scale up and grow, with an ambition for many more to list here in the UK, and open new offices of the British Business Bank in Birmingham, Bristol, Cambridge, Edinburgh, Manchester and Newport, specialising in the local sector. As we set out in chapter one, we will ensure digital businesses have access to the best talent from overseas to compete with anywhere in the world. This will be complemented by at least one new institute of technology in the UK, dedicated to world-leading digital skills and developed and run in partnership with the tech industry. When we leave the European Union, we will fund the British Business Bank with the repatriated funds from the European Investment Fund.¹⁷

It is also important to note that the government recognises the need for an institution with offices spread across the UK.

Despite the new nature of the BBB, its early successes and the fact the government is considering expanding its operations, means there are important lessons that can be taken when considering a future UK Investment Bank. They are as follows:

- The UK government recognises, at a minimum, the need for some state-backed support for financing of SMEs. However, as with the SBA, the current government funds programmes offered through

the BBB meaning that the ability to run a number of its programmes is dependent on the support of the government and the Department for Business, Energy and Industrial Strategy.

- Importantly, an independently operating state-backed institution is able to run an operating profit with returns on capital well above the cost of UK government borrowing. This means that, with a government guarantee, the institution should be able to fully finance its lending through borrowing from international capital markets.
- £0.7 billion of commitments, compared to KfW's €21.4 billion for SMEs, is an incredibly small amount and highlights how much more a state-backed institution could be doing to support SMEs. This is in part because of the bank's limited funding and in part due to the fact the bank is relatively new. However, if the ambition of a UK Investment Bank is to close the financing gap and to support long-term growth and innovation in the UK economy, then a much higher level of financing is needed, requiring the bank to be given the ability to fund itself through the issuing of bonds on international capital markets.
- The Conservatives' 2017 manifesto recognised that with increased responsibility and greater funds it is essential that offices around the country be opened. However, the government envisages this as a way

of distributing funds introduced to replace those coming from the EU structural funds, not as the means of operating an independent and proactive regionally structured investment bank.

Bibliography

Bone, G. (2016) *Banking for the Common Good: Laying the foundations of safe, sustainable, stakeholder banking in Scotland*, Discussion Paper by NEF, Friend of the Earth, Move your Money and Common Weal. <http://www.foe.org.uk/files/Banking%20for%20the%20Common%20Good.pdf>

Coopey, R., and Clarke, D. (1995), *Fifty Year: Investing in Industry*, New York, Oxford University Press.

Dolphin, T. and Nash, D. (2012) *Investing for the Future: Why we need a British Investment Bank*, IPPR. <http://www.ippr.org.uk/publications...>

Jacobs, M., Stirling, A. and Colebrook, C. (2016) *Out of Shape: Taking the pulse of the UK economy*, IPPR. <http://www.ippr.org.uk/publications/out-of-shape>

Lob, H., Schneider-May, J. and Kauffmann, D. (2016) *Regulation of Promotional Banks and potential impacts*, KfW Research. [https://www.kfw.de/PDF/Download-Center/Konzernthemen/Research/PDF-Dokumente-Studien-und-Materialien/PDF-Dateien-Paper-and-Proceedings-\(EN\)/Regulation-of-promotional-banks-November-2016.pdf](https://www.kfw.de/PDF/Download-Center/Konzernthemen/Research/PDF-Dokumente-Studien-und-Materialien/PDF-Dateien-Paper-and-Proceedings-(EN)/Regulation-of-promotional-banks-November-2016.pdf)

Macfarlane, L., (2016), *Blueprint for a Scottish National Investment Bank*, New Economics Foundation, 2016, <http://www.nef.org.uk/>

Merlin-Jones, D. (2012) *Extending Lending: The case for a state-backed investment bank*, London, Civitas.

Michie, R. and Wishdale, F. (2014) *Business Development Banks and Funds in Europe: Selected Examples*, EPRC University of Strathclyde.

Skidelsky, R., Martin. F. and Westerlind Wigstrom, C, (2011) *Blueprint for a British Investment Bank*, Centre for Global Studies. <http://www.c>

Stirling, A. and King, L. (2017) *Financing Investment: Reforming finance markets for the long-term*, IPPR Discussion Paper. <http://www.ippr.org.uk/cej-financing-investment>

Wruuck, P. (2015) *Promoting investment and growth: The role of development banks in Europe*, Deutsche Bank Research. <http://www.dbresearch.com/>

The Good Jobs Task Force (2013) *The British Business Bank: Creating good sustainable job*, New Economics Foundation. <http://neweconomics.org/2013/09/the-british-business-bank/>

Notes

1. The investment problem

- 1 Data adapted from ONS, www.ons.gov.uk/employmentandlabourmarket and www.ons.gov.uk/economy/grossdomesticproductgdp (accessed 20 August 2017)
- 2 Data from OECD, stats.oecd.org/index.aspx?DatasetCode=PDB_LV (accessed 11 October 2017)
- 3 ONS, 'Capital stocks, consumption of fixed capital: 2016', 5 August 2016, <https://www.ons.gov.uk/economy/nationalaccounts/uksectoraccounts/bulletins/capitalstocksconsumptionoffixedcapital/2016> (accessed 20 August 2017)
- 4 Data from World Bank, data.worldbank.org/indicator/NE.GDI.FTOT.CD (accessed 11 October 2017)
- 5 Calculations made from Bank of England, Interactive Database: C Further Analyses of deposits and lending'. Annual data from Industrial analysis of sterling monetary financial institutions lending to UK residents: long runs, accessed at <http://www.bankofengland.co.uk/boeapps/iadb/index.asp?SectionRequired=C&first=yes&HideNums=-1&ExtraInfo=false&Travel=NIxSTxTCx&levels=1>
- 6 European Central Bank, 'The balance sheets of monetary financial institutions (MFIs)', https://www.ecb.europa.eu/stats/money_credit_banking/mfi_balance_sheets/html/index.en.html (accessed 13 September 2017)
- 7 FSB, 'UK Small Business Statistics', <https://www.fsb.org.uk/media-centre/small-business-statistics> (accessed 13 September 2017); World First, 'Thinking Global: The route to UK exporting success', October 2016, https://www.worldfirst.com/downloads/Think_Global_WorldFirst.pdf

- 8 HMT, 'Financing growth in innovative firms: consultation', August 2017, https://www.gov.uk/government/uploads/system/uploads/attachment_data/file/642456/financing_growth_in_innovative_firms_consultation_web.pdf
- 9 Eurostat, 'Enterprise birth and death rates, business economy, 2013', [http://ec.europa.eu/eurostat/statistics-explained/index.php/File:Enterprise_birth_and_death_rates_business_economy_2013_\(%25\)](http://ec.europa.eu/eurostat/statistics-explained/index.php/File:Enterprise_birth_and_death_rates_business_economy_2013_(%25)) (accessed 13 September 2017)
- 10 OECD, 'Entrepreneurship at a Glance 2016', September 2016, http://www.oecd-ilibrary.org/industry-and-services/entrepreneurship-at-a-glance-2016_entrepreneur_aag-2016-en
- 11 M. Stabe, A. Rininsland and S. Bernard, 'The FT 1000: The complete list of Europe's fastest-growing companies', Financial Times, 17 May 2017, <https://ig.ft.com/ft-1000/>
- 12 British Business Bank, 'Small Business Finance Markets 2016/17', February 2017, <https://british-business-bank.co.uk/wp-content/uploads/2017/02/BBB-SBFM-REPORT-2016-17-web.pdf>
- 13 CIPD, 'Alternative pathways into the labour market', October 2016, <https://www.cipd.co.uk/knowledge/work/trends/alternative-labour-market-pathways>, and A. Haldane, Speech to London School of Economics, 'Productivity Puzzles', 20 March 2017, <http://www.bankofengland.co.uk/publications/Documents/speeches/2017/speech968.pdf>
- 14 J. Bone, C. Haley, A. Ledger and H. Maltby, 'The State of Small Business: Putting entrepreneurs on the map', October 2017, Nesta, <https://www.nesta.org.uk/publications/state-small-business-putting-uk-entrepreneurs-map>
- 15 D. Harari, 'Productivity in the UK', House of Commons Library: Briefing Paper Number 06492, 20 September 2017, <http://researchbriefings.files.parliament.uk/documents/SN06492/SN06492.pdf>
- 16 HM Government, https://www.gov.uk/government/uploads/system/uploads/attachment_data/file/664563/industrial-strategy-white-paper-web-ready-version.pdf
- 17 HMT, 'Financing growth in innovative firms: consultation', August 2017.
- 18 BDRC Continental, SME Finance Monitor, Q2 2016, September 2016, <http://bdrccontinental.com/products/sme-finance-monitor/>

- 19 BBA, 'Bank Support for SMEs – 1st Quarter 2017', <https://www.bba.org.uk/news/statistics/sme-statistics/bank-support-for-smes-1st-quarter-2017/#.We3wV7pFxTw>

2. How could a national investment bank help?

- 1 R. Coopey and D. Clarke, *Fifty Years: Investing in Industry*, 1995, New York, Oxford University Press.
- 2 Ibid.
- 3 KfW, 'KfW Group – Almost 70 years of promotional activity', <https://www.kfw.de/KfW-Group/About-KfW/Identit%C3%A4t/Geschichte-der-KfW/> (accessed 13 September 2017)
- 4 KfW, 'Law Concerning Kreditanstalt für Wiederaufbau', https://www.kfw.de/Download-Center/KfW-Gesetz-und-Satzung-sowie-Gesch%C3%A4ftsordnungen/Law-concerning-KfW-and-KfW-By-laws/KfW_Gesetz_E.pdf (accessed 13 September 2017)
- 5 KfW, 'KfW at a Glance: Facts and Figures', March 2017, <https://www.kfw.de/PDF/Download-Center/Konzernthemen/KfW-im-Überblick/KfW-an-overview.pdf>
- 6 KfW, 'Law Concerning Kreditanstalt für Wiederaufbau'
- 7 SBA, 'Mission', <https://www.sba.gov/about-sba/what-we-do/mission> (accessed 13 September 2017)
- 8 SBA, 'What we do', <https://www.sba.gov/about-sba/what-we-do> (accessed 13 September 2017)
- 9 SBA, 'Agency Financial Report FY 2016'
- 10 SBA, *Resourcing Guide for Small Business*, Winter/Spring 2017, https://www.sba.gov/sites/default/files/files/resourceguide_national.pdf (accessed 13 September 2017)
- 11 Ibid.
- 12 Ibid.
- 13 EIB, 'Some dates and Figures', http://www.eib.org/about/key_figures/index.htm (accessed 13 September 2017)
- 14 EIF, 'EIF timeline: 20 years of support to SMEs across Europe', http://www.eif.org/who_we_are/20years/index.htm (accessed 13 September 2017)
- 15 EIB, 'The EIB in the United Kingdom', <http://www.eib.org/projects/regions/european-union/united-kingdom/index.htm> (accessed 13 September 2017)

- 16 EIB, '2016 Financial Report', March 2017, <http://www.eib.org/attachments/general/reports/fr2016en.pdf>
- 17 British Business Bank, 'What we do', <https://british-business-bank.co.uk/what-the-british-business-bank-does/> (accessed 13 September 2017)
- 18 British Business Bank, 'British Business Bank: Unlocking finance for smaller businesses', October 2016, <https://british-business-bank.co.uk/wp-content/uploads/2016/11/2016-10-28-British-Business-Bank-2-page-summary-FINAL.pdf>
- 19 British Business Bank, 'Annual Report and Accounts 2017', July 2017
- 20 British Business Bank, 'Annual Report and Accounts 2017', July 2017 and KfW, 'KfW at a Glance: Facts and Figures', March 2017
- 21 Scottish Enterprise, 'The Scottish Investment Bank Annual Review 2016-2017', <https://www.scottish-enterprise.com/about-us/what-we-do/investment/sib/sib-annual-review-2017> (accessed 6 September 2017)
- 22 Finance Wales Group, 'Annual report and financial statements: Year ended 31 March 2017', September 2017, <https://developmentbank.wales/sites/default/files/2017-09/FW%20Annual%20Repor2016-2017.pdf> (accessed 20 October 2017)
- 23 Scottish Government, 'Scottish National Investment Bank', 5 September 2017, <https://news.gov.scot/news/scottish-national-investment-bank> (accessed 6 September 2017)
- 24 Finance Wales, 'Development Bank of Wales', <http://www.financewales.co.uk/about-us/development-bank-of-wales.aspx> (accessed 6 September 2017)
- 25 Finance Wales Group, 'Annual report and financial statements: Year ended 31 March 2017',
- 26 L. Macfarlane, *Blueprint for a Scottish National Investment Bank*, New Economics Foundation, 2016, <http://allofusfirst.org/tasks/render/file/?fileID=3B9725EA-E444-5C6C-D28A3B3E27195B57>
- 27 Conservatives, 'Our Manifesto', <https://www.conservatives.com/manifesto> (accessed 5 September 2017)
- 28 HM Government, Industrial Strategy

3. Designing an investment bank for the UK

- 1 The NUTS 1 regions: Scotland, Wales, Northern Ireland, Greater London, South East, South West, East Midlands, West Midlands, Yorkshire and the Humber, North East, North West and East of England.
- 2 J. Ford, 'Cashing out of the European Investment Bank', FT, 21 March 2017, <https://www.ft.com/content/72e67940-0d7e-11e7-b030-768954394623?mhq5j=e6> (accessed 18 August 2017)
- 3 European Investment Bank, '2016 Financial Report', <http://www.eib.org/attachments/general/reports/fr2016en.pdf> (accessed 12 August 2017)

Case Study I: The Industrial and Commercial Finance Corporation

- 1 Committee on Finance and Industry (Macmillan Committee), 'Report of Committee', 1931 quoted in D. Merlin-Jones, *Extending Lending: The case for a state-backed investment bank*, 2012, London, Civitas.
- 2 R. Coopey and D. Clarke, *Fifty Years: Investing in Industry*, 1995, New York, Oxford University Press.
- 3 Ibid.
- 4 Ibid.
- 5 Ibid.
- 6 D. Merlin-Jones, *Extending Lending: The case for a state-backed investment bank*, 2012, London, Civitas.
- 7 R. Coopey and D. Clarke, *Fifty Years: Investing in Industry*, 1995.

Case Study II: Kreditanstalt für Wiederaufbau

- 1 KfW, 'KfW Group – Almost 70 years of promotional activity', <https://www.kfw.de/KfW-Group/About-KfW/Identit%C3%A4t/Geschichte-der-KfW/> (accessed 13 September 2017)
- 2 KfW, 'Law Concerning Kreditanstalt für Wiederaufbau', https://www.kfw.de/Download-Center/KfW-Gesetz-und-Satzung-sowie-Gesch%C3%A4ftsordnungen/Law-concerning-KfW-and-KfW-By-laws/KfW_Gesetz_E.pdf (accessed 13 September 2017)

- 3 KfW, 'KfW at a Glance: Facts and Figures', March 2017, <https://www.kfw.de/PDF/Download-Center/Konzernthemen/KfW-im-Überblick/KfW-an-overview.pdf>
- 4 KfW, 'Law Concerning Kreditanstalt für Wiederaufbau'
- 5 KfW, 'KfW Group – Almost 70 years of promotional activity'
- 6 KfW, 'The Management of KfW Group', <https://www.kfw.de/KfW-Group/About-KfW/Vorstand-und-Gremien/> (accessed 13 September 2017)
- 7 KfW, 'Annual Report 2016', <https://www.kfw.de/KfW-Group/About-KfW/Geschäftsbericht-2016/> (accessed 13 September 2016)
- 8 Federal Ministry for Economic Affairs and Energy, 'The German Mittelstand: Facts and figures about German SMEs', https://www.bmwi.de/Redaktion/EN/Publikationen/wirtschaftsmotor-mittelstand-zahlen-und-fakten-zu-den-deutschen-kmu.pdf?__blob=publicationFile&v=1 (accessed 13 September 2017)
- 9 KfW, 'Loans Are Usually On-Lent through Regular Banks', <https://www.kfw.de/KfW-Group/About-KfW/Arbeitsweise/Kreditvergabe-über-Hausbanken/> (accessed 13 September 2017)
- 10 KfW, 'Business start-ups and succession', <https://www.kfw.de/inlandsfoerderung/Unternehmen/Gründen-Erweitern/index-2.html> (accessed 13 September 2017)
- 11 Ibid.
- 12 Ibid.
- 13 Ibid.
- 14 KfW, 'Innovation', <https://www.kfw.de/inlandsfoerderung/Unternehmen/Innovation/index-2.html> (accessed 13 September 2017)
- 15 KfW, 'KfW at a Glance: Facts and Figures', March 2017, <https://www.kfw.de/PDF/Download-Center/Konzernthemen/KfW-im-Überblick/KfW-an-overview.pdf>
- 16 D. Merlin-Jones, *Extending Lending: The case for a state-backed investment bank*, 2012, London, Civitas.
- 17 D. Weldon, 'A Diverse Banking System', in A. Harrop (ed.), *The Great Rebalancing: How to fix the broken economy*, Fabian Society, 2013, http://www.fabians.org.uk/wp-content/uploads/2013/01/FABJ320_web.pdf

- 18 T. Greenham and L. Prieg, 'Reforming RBS: Local Banking for the Public Good', NEF, 25 February 2017, <http://neweconomics.org/2015/02/reforming-rbs/>
- 19 Centre for Public Impact, 'Sparkassen Savings Banks in Germany', 27 March 2017, <https://www.centreforpublicimpact.org/case-study/sparkassen-savings-banks-germany/>

Case Study III: The Small Business Administration

- 1 SBA, 'Mission', <https://www.sba.gov/about-sba/what-we-do/mission> (accessed 13 September 2017)
- 2 SBA, 'History', <https://www.sba.gov/about-sba/what-we-do/history> (accessed 13 September 2017)
- 3 Ibid.
- 4 SBA, 'What we do', <https://www.sba.gov/about-sba/what-we-do> (accessed 13 September 2017)
- 5 SBA, 'Frequently Asked Questions: About Small Business', August 2017, <https://www.sba.gov/sites/default/files/advocacy/SB-FAQ-2017-WEB.pdf> (accessed 13 September 2017)
- 6 SBA, 'Agency Financial Report FY 2016', <https://www.sba.gov/about-sba/sba-performance/performance-budget-finances/agency-financial-reports/fy-2016-agency-financial-report-afr>
- 7 SBA, *Resourcing Guide for Small Business*, Winter/Spring 2017, https://www.sba.gov/sites/default/files/files/resourceguide_national.pdf (accessed 13 September 2017)
- 8 Ibid.
- 9 Ibid.
- 10 Ibid.
- 11 SBA, 'Agency Financial Report FY 2016'
- 12 SBA, *Resourcing Guide for Small Business*, Winter/Spring 2017
- 13 Ibid.
- 14 Ibid.
- 15 SBA, 'Agency Financial Report FY 2016'
- 16 Ibid.

Case Study IV: The European Investment Bank

- 1 EIB, 'Some dates and Figures', http://www.eib.org/about/key_figures/index.htm (accessed 13 September 2017)

- 2 EIF, 'EIF timeline: 20 years of support to SMEs across Europe', http://www.eif.org/who_we_are/20years/index.htm (accessed 13 September 2017)
- 3 EIB, 'The EIB in the United Kingdom', <http://www.eib.org/projects/regions/european-union/united-kingdom/index.htm> (accessed 13 September 2017)
- 4 Ibid.
- 5 EIB, 'Governance and Structure', <http://www.eib.org/about/governance-and-structure/index.htm>; EIB, 'Statutory Bodies', <http://www.eib.org/about/governance-and-structure/statutory-bodies/index.htm> (accessed 13 September 2017)
- 6 EIB, 'Project Loans', <http://www.eib.org/products/lending/loans/index.htm> (accessed 13 September 2017)
- 7 EIB, 'Intermediated Loans', <http://www.eib.org/products/lending/intermediated/index.htm> (accessed 13 September 2017)
- 8 EIB, 'What is the European Fund for Strategic Investments (EFSI)?', <http://www.eib.org/efsi/what-is-efsi/index.htm> (accessed 13 September 2017)
- 9 Ibid.
- 10 EIF, 'EIF in United Kingdom', February 2016, http://www.eif.org/news_centre/publications/country-fact-sheets/EIF_Fact-sheet_UK.pdf (accessed 13 September 2017)
- 11 Ibid.
- 12 Ibid.
- 13 British Business Bank, 'Midlands Investment Fund', <https://british-business-bank.co.uk/ourpartners/midlands-engine-investment-fund/> (accessed 14 September 2017); EIB, '£184 million EIB backing for Northern Powerhouse Investment Fund', <http://www.eib.org/infocentre/press/releases/all/2017/2017-039-pound184-million-eib-backing-for-northern-powerhouse-investment-fund.htm> (assessed 14 September 2017)
- 14 EIB, 'The North East Funds', <http://www.eib.org/projects/pipelines/pipeline/20150185> (accessed 13 September 2017)
- 15 EIB, '2016 Financial Report', March 2017, <http://www.eib.org/attachments/general/reports/fr2016en.pdf>

Case Study V: The British Business Bank

- 1 British Business Bank, 'Annual Report and Accounts 2017', July 2017, https://annualreport2017.british-business-bank.co.uk/uploads/documents/BBB_AR_2017_Tagged.pdf
- 2 British Business Bank, 'What we do', <https://british-business-bank.co.uk/what-the-british-business-bank-does/> (accessed 13 September 2017)
- 3 British Business Bank, 'British Business Bank: Unlocking finance for smaller businesses', October 2016, <https://british-business-bank.co.uk/wp-content/uploads/2016/11/2016-10-28-British-Business-Bank-2-page-summary-FINAL.pdf>
- 4 British Business Bank, 'Supporting business loans – Enterprise Finance Guarantee', <https://british-business-bank.co.uk/ourpartners/supporting-business-loans-enterprise-finance-guarantee/> (accessed 13 September 2017)
- 5 British Business Bank, 'Angel Cofund', <https://british-business-bank.co.uk/ourpartners/angel-cofund/> (accessed 13 September 2017)
- 6 British Business Bank, 'Wholesale solutions – Our ENABLE Programmes', <https://british-business-bank.co.uk/ourpartners/wholesale-solutions/> (accessed 13 September 2017)
- 7 British Business Bank, 'Enterprise Capital Funds', <https://british-business-bank.co.uk/ourpartners/enterprise-capital-funds/> (accessed 13 September 2017)
- 8 British Business Bank, 'Help to Grow – Growth Loans', <https://british-business-bank.co.uk/ourpartners/growth-loans/> (accessed 13 September 2017)
- 9 British Business Bank, 'The Start Up Loan Company', <https://british-business-bank.co.uk/partners/start-up-loan-company/> (accessed 13 September 2017)
- 10 EIB, '£184 million EIB backing for Northern Powerhouse Investment Fund', <http://www.eib.org/infocentre/press/releases/all/2017/2017-039-pound184-million-eib-backing-for-northern-powerhouse-investment-fund.htm> (accessed 13 September 2017)
- 11 BBC News, '£556 million Northern Powerhouse cash allocation welcomed', 23 January 2017 <http://www.bbc.co.uk/news/uk-england-38721046> (accessed 9 September 2017)

- 12 British Business Bank, 'Midlands Engine Investment Fund (MEIF)', <https://british-business-bank.co.uk/ourpartners/midlands-engine-investment-fund/> (accessed 12 September 2017)
- 13 British Business Bank, 'Cornwall & Isles of Scilly Investment Fund', <https://british-business-bank.co.uk/ourpartners/cornwall-isles-scilly-investment-fund-ciosif/> (accessed 12 September 2017)
- 14 British Business Bank, 'Overseeing other state investments', <https://british-business-bank.co.uk/ourpartners/managing-other-schemes-on-behalf-of-the-taxpayer/> (accessed 12 September 2017)
- 15 British Business Bank, 'Annual Report and Accounts 2017', July 2017
- 16 British Business Bank, 'Annual Report and Accounts 2017', July 2017 and KfW, 'KfW at a Glance: Facts and Figures', March 2017
- 17 Conservatives, 'Our Manifesto', <https://www.conservatives.com/manifesto> (accessed 5 September 2017)

The UK economy is suffering from low productivity. This has been weighing heavily on GDP growth since the 2008 financial crisis, with output per worker stagnating at one of the lowest levels of any advanced economy. Raising productivity requires investment in productive enterprise. But UK investment, as a proportion of domestic output, has fallen from about a quarter of GDP in 1990, when it was broadly in line with that of other developed economies, to just over 16 per cent. It is now well below that of most advanced economies.

An important factor in this has been the decline in bank loans to business as a proportion of domestic lending, from 31 per cent in 1988 to eight per cent in 2016. Instead lending has been increasingly channelled into unproductive real-estate investment. Lending to business now accounts for only five per cent of UK banking assets, compared with 14 per cent of eurozone banking assets.

This is in part driven by the market failure described as the patient capital gap – or finance gap – in which banks fail to meet demand for borrowing from creditworthy small and medium-sized firms because there are easier returns available from alternative investments. In 2015/16, some 19 per cent of SMEs seeking investment were unable to access suitable finance. So while the UK has the highest business start-up rate in Europe and world-leading research, it has performed badly when it comes to growing and developing those businesses.

These problems are not unique to either the UK or the current period. Several countries, including the UK in the past, have responded to these issues by establishing national investment institutions, mandated to provide finance to SMEs. In this new publication, Justin Prottis examines the record of a selection of these institutions. Drawing on their experiences, he sets out how a new national investment bank could be designed and established to tackle the specific challenges the UK faces today.

