



# UK Competitiveness and the International Financial Services Cluster in London

Microeconomics of Competitiveness

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## SECTION I: COMPETITIVENESS OF THE UNITED KINGDOM

### Overall Economic Performance

The UK economy has posted impressive performance over the past decade, with a strong record of GDP growth combined with high employment and low inflation. Despite this record, UK competitiveness continues to lag key competitors, and labor productivity must be improved in order for the UK to narrow its performance gap with the US.

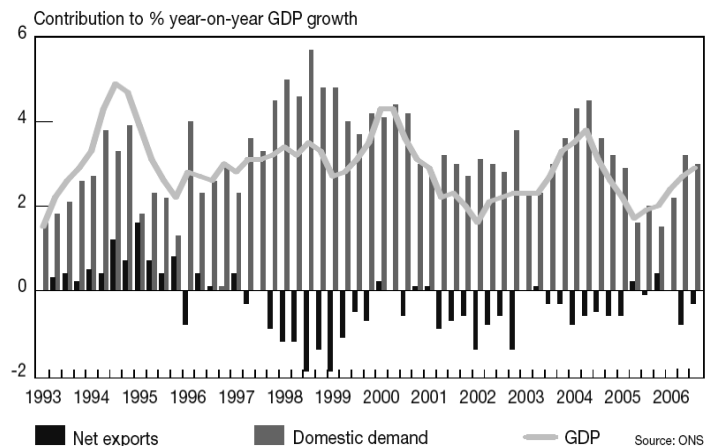
UK GDP growth over the past 25 years has been strong, outpacing the rest of the G7 (IMF WEO, 2007) (**Exhibit 1**). Strong domestic demand has been the predominant driver of this growth, offset by a slightly negative trade balance (**Exhibit 2**). Unemployment remains low (currently 5.5%) and inflation has been largely within the Bank of England's target range of 1-3% since 1997 (Economist Intelligence Unit, 2006). Commentators remain bullish on the UK economy despite recent rises in inflation (3.1% CPI) and interest rates (5.25%), with growth expected to continue through 2007 and inflation falling back to target by year end (EIU, 2006).

**Exhibit 1: UK GDP Per Capita Growth vs. Peers**

GDP per capita, constant prices (Source: IMF WEO data)						
	CAGR (80-85)	CAGR (85-90)	CAGR (90-95)	CAGR (95-00)	CAGR (00-05)	CAGR (80-05)
Canada	1.7%	1.5%	0.6%	3.2%	1.5%	1.7%
France	0.5%	2.5%	0.7%	2.2%	0.8%	1.3%
Germany	1.3%	2.7%	1.5%	1.8%	0.6%	1.6%
Italy	1.6%	3.1%	1.2%	1.9%	0.1%	1.6%
Japan	2.4%	4.3%	1.2%	0.7%	1.3%	2.0%
United States	2.3%	2.3%	1.2%	2.9%	1.4%	2.0%
<b>United Kingdom</b>	<b>1.9%</b>	<b>3.0%</b>	<b>1.4%</b>	<b>2.9%</b>	<b>2.0%</b>	<b>2.2%</b>
<b>Annual GDP Growth Rank</b>	<b>3</b>	<b>3</b>	<b>2</b>	<b>3</b>	<b>1</b>	<b>1</b>
G7 Simple Average (excl. UK)	1.6%	2.7%	1.0%	2.1%	0.9%	1.7%
<b>UK over (under-) performance</b>	<b>0.3%</b>	<b>0.3%</b>	<b>0.3%</b>	<b>0.8%</b>	<b>1.0%</b>	<b>0.5%</b>

Source: IMF WEO 2006.

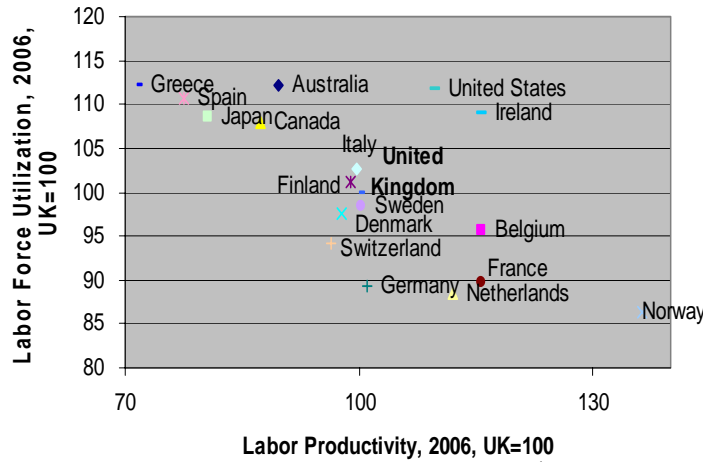
**Exhibit 2: Drivers of UK GDP Growth**



Source: Office of National Statistics, 2007.

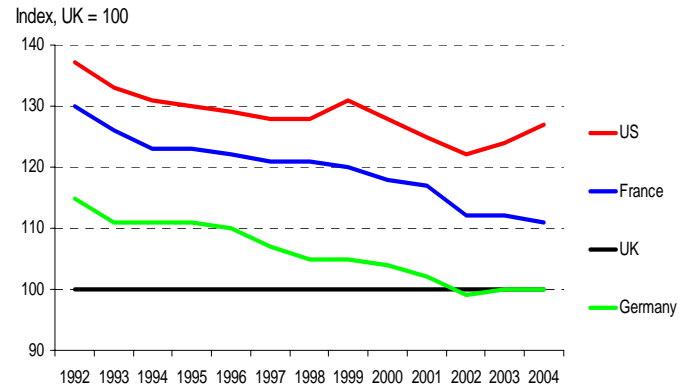
Despite this impressive record, the UK lags its competitors on several dimensions of competitiveness. Both labor force utilization and labor productivity significantly lag the US (**Exhibit 3**). Looking at GDP per worker over time, the UK is making progress in closing the gap with its European peers but the gap with the US remains large and is widening (**Exhibit 4**).

### Exhibit 3: Labor Force Utilization and Productivity



Source: OECD Factbook, 2006 and team analysis<sup>1</sup>

### Exhibit 4: GDP Per Worker



Source: UK Department of Trade & Industry, 2006

Labor productivity explains much of the UK’s performance gap and will likely drive its ability to close this gap in the future. In an effort to increase productivity, three contributing factors to labor productivity have received government attention: education and skill development, infrastructure improvements, and R&D investment. Several other factors that are not rooted in the UK’s fundamental competitiveness have likely contributed to recent GDP growth. First, the government has pursued an expansive fiscal policy since 2000 (EIU, 2006). Government expenditure has risen from 38% of GDP in 2000 to 44% of GDP in 2006 (EIU, 2006). Over the same period, a government budget surplus of 4% of GDP has reversed to a 3% budget deficit (EIU, 2006). This may necessitate future tax increases, which could hurt competitiveness. Second, the UK housing market boom, during which the average home price has tripled in the last ten years, has contributed to robust consumer spending, much of which has been debt-financed (*Economist*, 2007). Finally, the UK has benefited recently from a massive inflow of immigrant workers, which may have boosted GDP as much as 1% since 2004 and over 3% since 1997, according to some estimates (*Economist*, 2007).

<sup>1</sup> <http://fiordiliji.sourceoecd.org/pdf/fact2006pdf/10-03-02.pdf>

## Composition of the Economy and Mix of Economic Activity by Cluster

*The UK boasts one of the most advanced economies in the world. Its strongest and deepest clusters are in service industries, though many other clusters remain competitive globally. As a result, the UK enjoys considerable inward FDI, particularly from the US.*

As is the case for most advanced economies, services dominate the UK economy and account for 73.4% of GDP (IMF WEO, 2007). **Exhibit 5** shows that services represent four of the country's six largest clusters, with the business services and financial services clusters being global leaders. Several strong supporting clusters exist, including communications services, IT, publishing and printing, and, to an extent, transportation and hospitality.

The UK was the second largest recipient of inward FDI in the world in 2006 (behind the US), attracting nearly \$170 billion (**Exhibit 6**). The US represents the largest source of UK inward FDI, with a stock of roughly \$150 billion (UNCTAD, 2007).<sup>2</sup> Other large investors include the major European economies, Canada, Japan, and Australia. Much of this activity can be explained by increasing interest in British companies as M&A targets for foreign firms. UK firms bought by overseas groups in recent years include Corus, Abbey National and P&O (BBC, 2007). This M&A activity is a testament to the UK's liberal foreign ownership laws and lack of national protectionist sentiment.

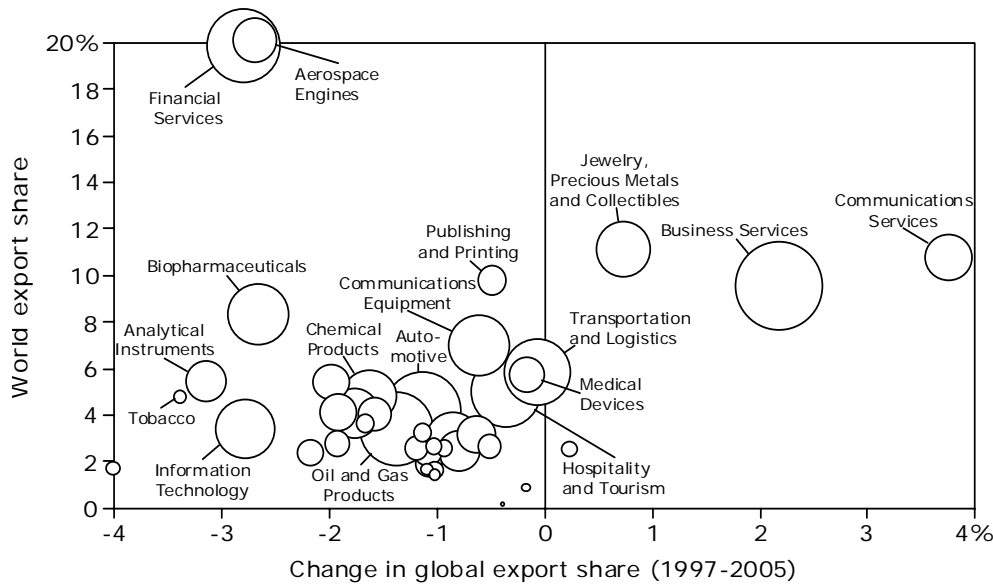
The UK also remains one of the world's most important sources of FDI as the second largest investor behind the US. This indicates that British businesses have a global perspective and are eager to seek international opportunities (UNCTAD, 2007).<sup>3</sup>

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<sup>2</sup> [www.metrics2.com/blog/2007/01/18/global\\_foreign\\_direct\\_investment\\_inflows\\_surged\\_34.html](http://www.metrics2.com/blog/2007/01/18/global_foreign_direct_investment_inflows_surged_34.html)

<sup>3</sup> [www.metrics2.com/blog/2007/01/18/global\\_foreign\\_direct\\_investment\\_inflows\\_surged\\_34.html](http://www.metrics2.com/blog/2007/01/18/global_foreign_direct_investment_inflows_surged_34.html)

### Exhibit 5: UK Clusters: Global Share



Source: ICCP, 2007

### Exhibit 6: FDI Inflows to Developed Economies (\$bn)

Host region/economy	2004	2005	2006 <sup>a</sup>
<b>World</b>	<b>710.8</b>	<b>916.3</b>	<b>1 230.4</b>
<b>Developed economies</b>	<b>396.1</b>	<b>542.3</b>	<b>800.7</b>
Europe	217.7	433.6	589.8
European Union	213.7	421.9	549.0
EU-15	185.2	387.9	510.7
France	31.4	63.6	88.4
Germany	- 15.1	32.7	8.1
Italy	16.8	20.0	30.0
United Kingdom	56.2	164.5	169.8
New 10 EU member states	28.5	34.0	38.4
Czech Republic	5.0	11.0	5.4
Hungary	4.7	6.7	6.2
Poland	12.9	7.7	16.2
United States	122.4	99.4	177.3
Japan	7.8	2.8	- 8.2

Source: UNCTAD, 2007

### Macroeconomic, Political, Legal, and Social Context

*The Thatcherite reforms of the 1980's set the macroeconomic stage for a quarter century of economic growth in the UK, and competitiveness remains high today. UK membership in the EU has created both opportunities and risks over the years. Additionally, the UK's economic success has not been equally shared across geographic regions or socioeconomic classes, with potential implications for political and social stability going forward.*

Margaret Thatcher came to power in 1979 following three decades of failed post-war economic policies (**Exhibit 7**). The Conservative government introduced sweeping economic reforms, including the privatization and deregulation of industry, increased fiscal discipline, and tight monetary policies. Among the new government's first moves was the elimination of foreign exchange and capital controls. These policies helped catalyze major changes in the financial markets (coming to be known as the "Big Bang") and improved UK competitiveness, and their benefits are still felt today (Middleton, 2000).

Importantly, when Tony Blair and the Labour Party gained power in 1997, the privatization and economic liberalization agenda of the Thatcher era was not reversed. Rather, in a surprise move, the Bank of England was granted independence and given an inflation targeting remit. The Chancellor of the Exchequer, Gordon Brown, imposed fiscal discipline through his so-called "Golden Rule" of only borrowing to invest over the course of each economic cycle. In his most recent budget, Brown cut the corporate tax rate from 30% to 28%, making it the most competitive rate in the G7 (*Economist*, 2007).

Recent macroeconomic concerns have focused on rising inflation (currently 3.1% using the preferred Consumer Price Index measure), slightly above the Bank of England's 2% target (*Economist*, 2007). Rising oil prices and a housing market bubble have been blamed, and interest rates are widely expected to rise to 5.5% when the Bank's monetary policy committee meets in early May (*Economist*, 2007). The UK's trade deficit has also deteriorated recently, widening to £4.3bn in January. However, the UK's export portfolio remains robust, accounting for 4.5% of global export share (ONS, 2007). Generally, UK services have been increasing global share, offsetting declines in exports of goods (ONS, 2007).

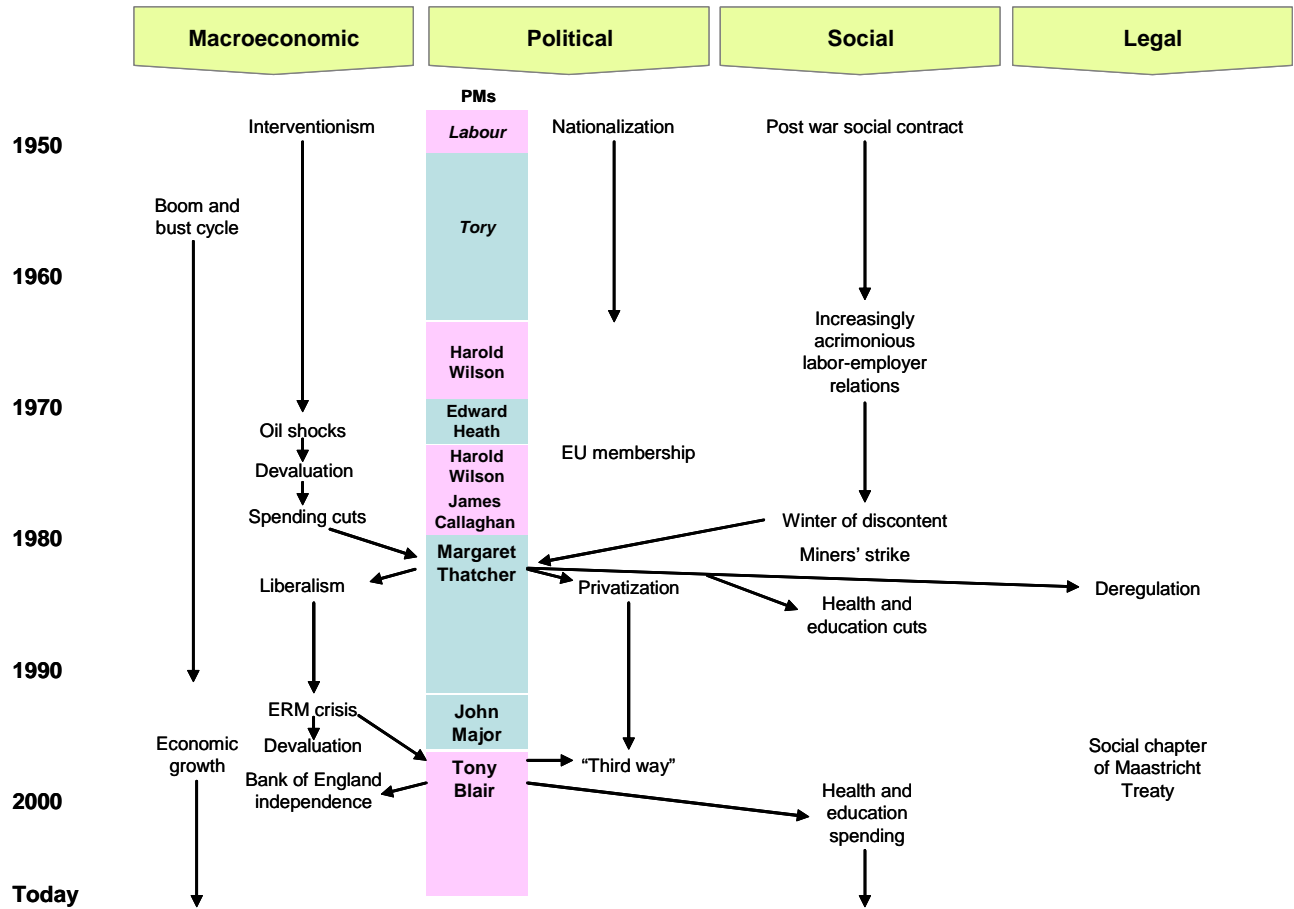
The domestic political agenda is increasingly framed by deepening EU integration. In the 1980's, Mrs. Thatcher famously asked for the UK's "money back" in response to European agricultural subsidies; the British public remains "Eurosceptic" relative to their Continental neighbors. The UK business community also regards the EU with caution, recognizing that, as one of the most liberal, free market economies in Europe, the UK has more to lose if European regulation trends toward the EU average. Recent arguments over the Social Chapter and European Working Time Directive are good examples of this tension (*Financial Times*, 2006). The UK's guarded stance towards European integration and the Euro is healthy given its economic position, and there are no plans to join the Euro (*Financial Times*, 2007).

The UK's rise in prosperity over the past two decades has not been shared equally across its citizens. Inequality as measured by the Gini Coefficient has risen consistently since the mid 1980's, though it remains near the OECD average and below that of the US (OECD, 2006). The UK suffers from higher rates of poverty than other large economies in the EU, resulting largely from differences in its social welfare policies relative to those of other EU nations. Regional economies within the UK have had differing levels of success. While London and the southeast region have flourished, the rural and industrial regions outside of London have struggled. In 2005, London's Gross Value Added per capita was 36% higher than the national average and almost double that of the UK's poorest regions (ONS, 2007).

Increased immigration into The UK has also posed social and cultural challenges. In particular, the decision to allow unrestricted immigration from EU accession countries (Czech Republic et. al) caused widespread concern about increased pressure on public services and housing. However, as unemployment remains low, migrant labor continues to play an important role in the UK economy (*Financial Times*, 2007).



## Exhibit 7: UK Macroeconomic, Political, Social, and Legal Timeline



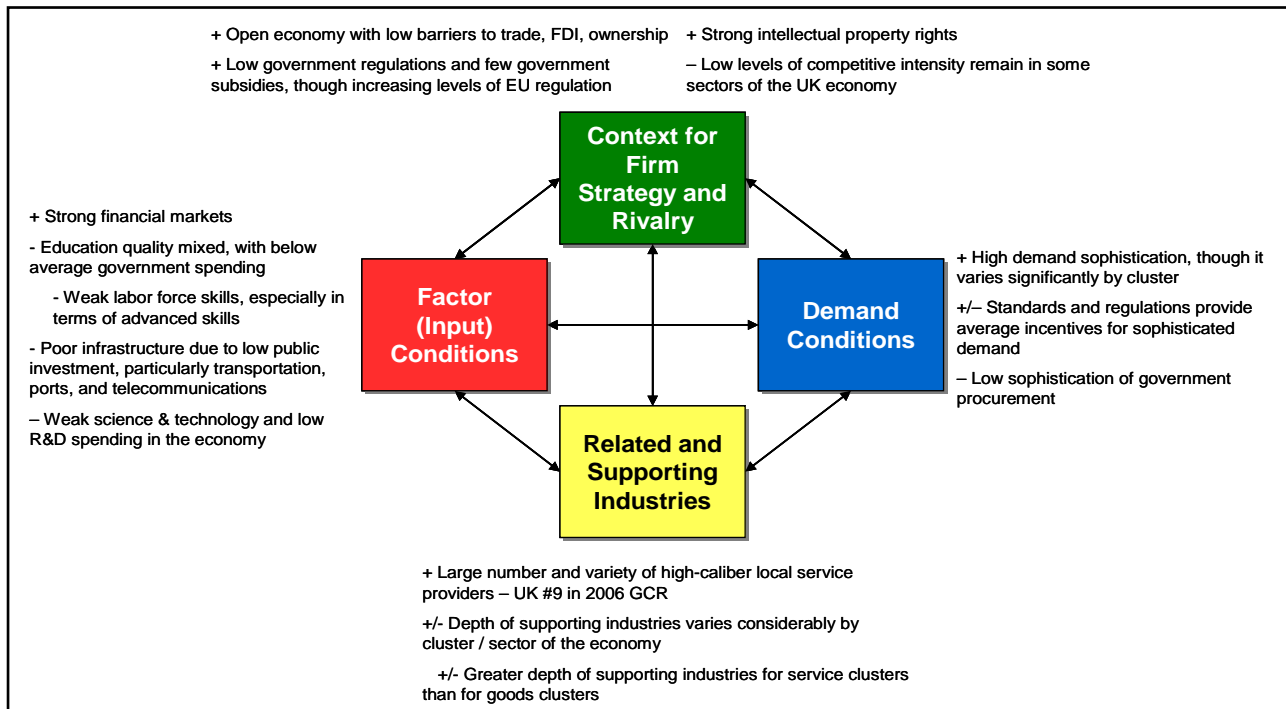
Source: Team analysis

## National Diamond

*The UK national diamond is well-developed and reflects the country's high levels of competitiveness (Porter and Ketels, 2003). Relative to other advanced economies, the UK diamond is characterized by strong context and private-sector demand. The biggest weakness is in factor conditions, where the UK suffers from relatively low labor skills, poor infrastructure, and low levels of innovation.*

**Exhibit 8** highlights many of the UK's strengths, particularly an open, flexible economy with high sophistication of demand and large numbers of high-quality service providers. While noting these strengths, we will focus our attention on the relative weaknesses of the UK diamond and the ways in which current government policy is attempting to address these weaknesses.

## Exhibit 8: UK National Diamond

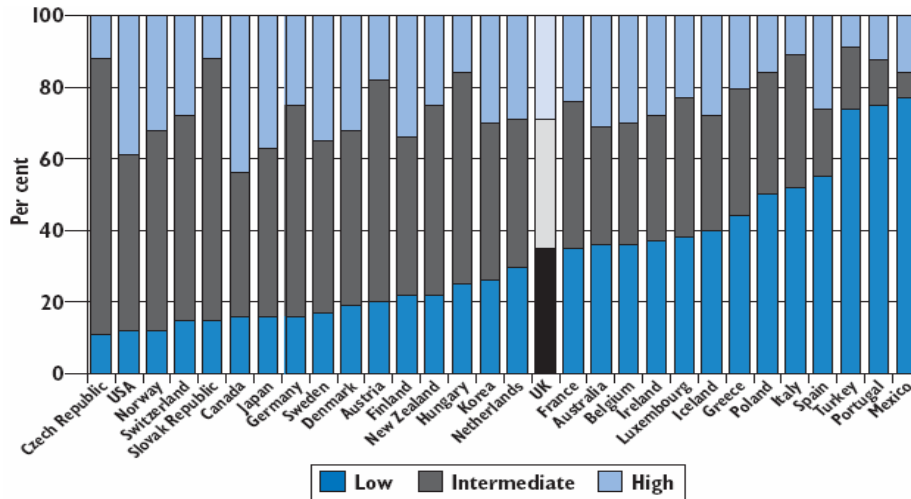


Source: Team analysis

Despite having a relatively “light-touch” regulatory environment, survey data show that UK business is very concerned about the cumulative burden of regulation, especially from the EU (Hampton, 2005). To meet these concerns, the government is adopting a more “risk-based” approach to regulation, ensuring that regulatory costs are proportionate to the risks posed. At the European level, the UK government strongly supported the target to reduce administrative burdens arising from EU legislation by 25 per cent by 2012 (HMT, 2007). It remains to be seen how much progress will be made in this area.

Basic adult skills in the UK lag other advanced industrial economies (**Exhibit 9**). More than one-third of adults do not hold the equivalent of a basic school-leaving qualification, almost one-half of adults (17 million) have difficulty with numbers, and one-seventh (5 million) are not functionally literate (Leitch, 2006). Additionally, the UK’s technical and vocational skills lag countries such as Germany and France in both quantity and quality.

### Exhibit 9: International Comparisons of Qualification Profiles



Source: Leitch, 2006

In response to this skills challenge, the government has increased education spending as a percentage of GDP from one of the lowest in the industrialized world at 4.7% in 1997 to among the highest at 5.6% in 2007 (ONS, 2007). Adult education has also improved with the *Skills for Life* strategy that helped over 1.6 million adults improve their basic skills and achieve qualifications in literacy, language and numeracy since 2001 (Leitch, 2006). For vocational training, the “Train to Gain” service provides firms with free, flexibly-delivered training in the workplace for their low-skilled employees, and has enrolled over 55,000 employers and almost 350,000 low-skilled individuals (Leitch, 2006). Despite these initiatives, much more progress will be required if the UK hopes to improve its global standing. At its current rate of improvement, the UK is forecast to at best “stand still” as other leading nations continue to improve their skills levels (Leitch, 2006).

The UK continues to rank poorly on measures of innovation, including research and development investment and patenting activity. As of 2005, the UK spends 30% less on R&D as a percentage of GDP than the US and 17% less than the OECD average, trailing in both public and business R&D expenditure (OECD, 2005). UK patent filings per capita are below the EU

average and significantly trail peers such as France, Germany, the United States, and Japan (European Innovation Scorecard, 2006). Furthermore, the UK patent portfolio comes primarily from corporations, while universities, government entities, and other research institutions generate relatively few patent filings (Porter and Ketels, 2003).

A 2003 government report set out a strategy to improve the UK's innovation performance and make the UK the leading country in Europe for R&D within a decade (DTI, 2003). The report identified six priorities and related commitments, such as encouraging knowledge transfer, leveraging government's procurement power, supporting high-level skill development, improving regulatory frameworks, and supporting entrepreneurship in SMEs. This strategy was extended in two 2004 government reports and accompanying financial commitments—the “Science and Innovation Investment Framework 2004–2014” and the “DTI Five Year Program.” However, the goal of increasing R&D investment in the UK will only succeed if private sector investment increases alongside public sector investment.

Years of underinvestment in UK infrastructure have further harmed productivity. The UK has the most congested roads in the EU, which adds directly to business costs and makes it difficult to reap the benefit of just-in-time production methods (*Economist*, 2007). Unreliable trains take a toll on commuters. The British Chambers of Commerce's “2006 Transport Survey” found that the inadequacies of UK infrastructure cost the economy £17 billion per year, or 1.4% of GDP.<sup>4</sup> In response, the UK government has dramatically increased investment in transportation infrastructure. Over one-hundred road schemes have been completed, and the UK opened a high-speed rail line, cutting journey times between London, Birmingham, Manchester, and Glasgow. Public transport has seen improvements in reliability and cleanliness and, as a result, bus use is increasing year on year for the first time in decades and more people are using

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<sup>4</sup> [www.britishchambers.org.uk](http://www.britishchambers.org.uk)

trains than at any time since the 1960s.<sup>5</sup> Still, road congestion continues to increase and limited space means that building more roads is not an option.

### **Institutions for Collaboration**

*Historically, IFCs in the UK have been relatively weak and focused on activities that did not increase competitiveness. Recently, however, new, more productive IFCs have emerged, many of which resulted from government focus or coordination.*

The IFC landscape in the UK has been shaped to a great extent by a history of adversarial industrial relations. Some of the strongest IFCs have therefore formed along traditional union versus employer lines, focusing on wage and employment negotiation (e.g. the Confederation of British Industry and the Trades Union Congress).<sup>6</sup> Despite their strength as institutions, it is doubtful whether these IFCs significantly improved competitiveness before the Thatcherite reforms in the 1980s radically reduced union power.

The Labour government has followed a strong policy of devolution since 1997 in an attempt to push decision-making down to the lowest appropriate level of government. For example, to encourage regional collaboration, the government introduced nine Regional Development Agencies (RDAs). The RDAs' role is to drive regional economic development by acting as regional coordinators and strategic planners. Since 2002, RDA funding from central government has been received as a "single pot" to be distributed locally as appropriate (as opposed to being hypothecated by central government departments). At the national level, power has been devolved to the Scottish Parliament and the Welsh Assembly, each with its own elected representatives and (limited) tax raising powers. Both these developments have helped to improve coordination between business and government.

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<sup>5</sup> [www.dst.gov.uk](http://www.dst.gov.uk)

<sup>6</sup> [www.wikipedia.org](http://www.wikipedia.org)

A recent government review explored the links between UK business and universities and concluded that the UK university sector has historically lacked commercial focus, while UK industry has been a poor “customer” for university research (Lambert, 2003).<sup>7</sup> Unsurprisingly, few IFCs exist linking academia to commerce. Recently, attitudes in both business and universities have been changing, and successful IFCs have been established. For example, the Science and Industry Councils are networks where senior industry executives and university vice-chancellors meet to address regional issues. Knowledge House promotes links and knowledge transfer between universities and industry in the Northeast of England.

The Technology and Strategy Board (TSB) was established to support collaborative R&D with businesses and the UK Research Councils. Earlier this year, it was announced that the TSB would focus on five “innovation platforms”: intelligent transport systems, network security, assisted living and health care technologies, low environmental impact buildings, and environmentally-friendly vehicles. The new Board plans to learn from the US Defense Advanced Research Projects Agency (DARPA) and recruit secondees directly from industry (HMT, 2007).

### **Strategic Issues and Recommendations**

*Several key issues warrant further attention from policymakers, public institutions, and the private sector: Increasing regulation, labor skills, public infrastructure, and innovative activity.*

While the government has made progress in reducing the complexity of the UK regulatory environment, there is still work to be done. Regulatory inspection and enforcement is divided among sixty-three national regulators, 203 trading standards offices, and 408 environmental health offices in 468 local authorities. Additionally, the specter of increasing EU regulation further complicates the UK regulatory environment (Hampton, 2005). We

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<sup>7</sup> [http://www.hm-treasury.gov.uk/media/DDE/65/lambert\\_review\\_final\\_450.pdf](http://www.hm-treasury.gov.uk/media/DDE/65/lambert_review_final_450.pdf)

recommend that the UK overhaul its regulatory bureaucracy to remove barriers for new business formation and capital investment. Regulators should study successful models of business-friendly, service-oriented regulatory bodies such as those in Singapore and Costa Rica.

The UK's increased investments in education and skills development are laudable but insufficient to close its skills gap with other advanced economies. First, a large portion of the recent increase in public education spending has gone toward increased education bureaucracy rather than into schools themselves.<sup>8</sup> The Department for Education and Skills should review its budget priorities in an effort to direct more of the additional education resources into classrooms. Second, the UK needs to ensure that investments in primary and secondary education are matched by increased, more specialized, skill development at the post-secondary and vocational levels. The government can help facilitate this process by creating "skills councils" in various areas, particularly for technical skills, encouraging educational institutions and large employers to work together on these issues.

The UK has initiated a number of programs to address the country's poor innovation performance. We recommend two additional steps without which it will be difficult for the country to achieve its goals. First, the UK should increase tax incentives for R&D investment. At the very least, tax credits must outweigh the 10% "noise level" associated with conducting R&D in a high-cost location like the UK, which would represent a doubling or trebling of current incentives. Second, the Department of Trade and Industry should consider creating an oversight body to coordinate all the innovation-oriented programs and policies begun in the last few years.

Finally, while recent investments in roads, railroads, and public transportation have generated some improvements, UK road congestion remains a significant problem. We recommend that the country consider implementing a congestion charge scheme modeled on the

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<sup>8</sup> [www.bowgroup.org](http://www.bowgroup.org)

successful London system. By charging drivers to enter the city and investing the proceeds in public transportation, London has dramatically decreased road congestion and improved the city's attractiveness for residents and visitors. We believe the UK could benefit from a similarly substantial step to address congestion, particularly around its largest cities. Additionally, the UK's communications and utilities infrastructure remain poor relative to its peers. We recommend that the government provide appropriate tax incentives for private sector players to invest in these needed infrastructure improvements.

## **SECTION II: THE FINANCIAL SERVICES CLUSTER IN LONDON**

### **Historical Evolution of the Cluster**

*The financial services cluster in London nearly dates back to the inception of the city itself. Understanding the storied history of the cluster not only provides context for our analysis, but also offers insight into the source of its current and future success.*

London emerged as a centre of commerce during the Roman occupation of Britain from AD 43 to 403 (Jones and Kernstine, 2005). During the Elizabethan era, when Britain's seaborne trade began to expand, institutions such as the Royal Exchange and the Bank of England were established as a meeting place for merchants and brokers. This area of London would later be known as "the City" (Kynaston, 1994). In the eighteenth century, London's domestic money market matured and the City became the focal point of global trade between Europe, Asia and the Americas. By 1900 London lay at the heart of the first global economy as a provider of extensive supplies of short-term liquid assets. These bills were used as credit between traders across the globe even when neither transacting party was British. By this point, London was home to many of the world's markets including the Baltic Exchange and the Metal Exchange (Jones and Kernstine, 2005). Supporting industries such as specialist law firms, chartered accountancies and Lloyd's insurance underwriters flourished.



On the eve of World War I, Britain held 40% of the world's foreign-owned debt. The war would prove a turning point as Britain was forced to suspend the gold standard for sterling in the face of massive war debts. As the UK and Europe were preoccupied by reconstruction and the repayment of war debt, the US economy flourished, providing a burgeoning domestic market for the New York financial cluster. The Wall Street crash, followed by the Great Depression, signaled a major crisis for the global economy. Many interpreted the financial crisis as indicative of the dangers of unregulated global markets, and international capital flows collapsed, dramatically reducing London's importance as an international financial center. Subsequently, over one-third of the City was destroyed during WWII air raids. In the post-war years, as confidence in sterling declined, and as the British Empire was dismantled it seemed that London's days as a global financial center were coming to a close.

The rise of the Eurodollar market in the 1950s proved an important innovation for the City as foreign currency trading grew exponentially with traders took advantage of the UK's relatively light regulations (Jones and Kernstine, 2005). During the sixties, many new foreign banks opened in London, where they found it easy to recruit well-qualified staff.

In 1986 the London Stock Exchange became the first major European market to be deregulated, through a series of measures that came to be known as the "Big Bang" (Jones and Kernstine, 2005). As barriers fell, competition increased and large American banks such as Citibank, Chase Manhattan, and Shearson Lehman moved in. British banks were largely forced out of the market, but Margaret Thatcher's conservative government saw little reason to protect uncompetitive domestic banks. During the nineties, the Bank of England's "light touch" regulation model came into question following a series of high-profile banking failures and financial scandals (Jones and Kernstine, 2005). In 1998 the City's regulators were unified into

the Financial Services Authority (FSA), but regulation has remained light, especially in contrast to the United States, which implemented Reg. FD (public disclosure) in 2000 and Sarbanes-Oxley (various investor protection measures) in 2002.

## **Mapping the Cluster**

*The co-location of the various entities that form the financial services cluster in London has been essential to its strong performance. In this section we describe these entities and their relation to one another to understand the “skeleton” of the cluster and, later in the paper, to show the cluster’s increasing vulnerability as the importance of co-location diminishes.*

At the heart of the London financial services cluster are its securities exchanges and over-the-counter (OTC) markets (**Exhibit 10**). These include the more well-known exchanges such as the London Stock Exchange (equity/debt), AIM (international small cap equity market), Euronext.Liffe (derivatives) and several lesser-known, but fundamentally important commodities markets (London Metal, AXP Power UK, London Bullion Market). Prior to 1997, the LSE, like most major securities markets, relied on in-person, securities specialists to trade on its trading floor, making co-location vital of exchange-related services vital. These included both transaction-related services and intermediaries that bring companies to and place capital from the markets such as custodial, commercial and investment banks. It is important to note that the LSE’s conversion to electronic trading (similar to other global exchanges, including the NASDAQ in the US) has reduced the need for co-location of financial services, and has, in fact, led to a wave of consolidation of securities exchanges (NASDAQ’s purchase of a 25% stake in the LSE last year preceding its failed takeover attempt is just one such example).

The UK non-life and reinsurance sectors are centered on Lloyd’s, the world’s leading market for internationally traded insurance. This has led to the growth of insurance-related services including actuaries, claim handlers, and loss adjustors. London has a well-developed

maritime services cluster supported by its proximity to the port of London and the existence of the Baltic Exchange as a source for market information on ship-brokering.

The cluster is regulated at both the city level (City of London), the UK level (UK Financial Services Authority, HM Treasury, Bank of England), and the EU level (European Economic Area, Basel Committee on Banking Supervision). Despite these numerous layers, the UK's pragmatic approach to regulation has made the cluster more attractive to international investors due to its greater transparency, enforcement, and investor protections.

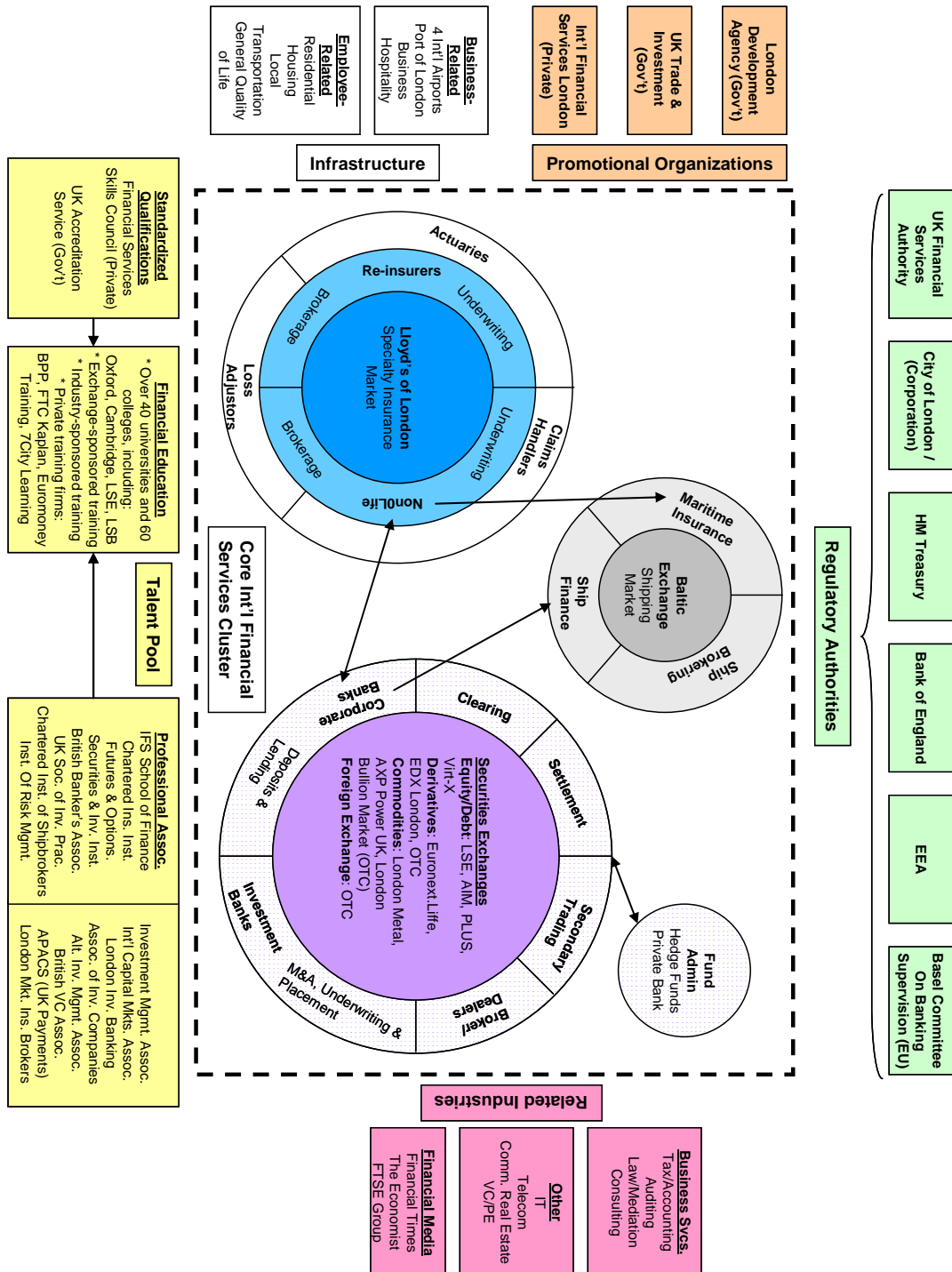
Regarding institutions for collaboration, London is home to dozens of professional associations supporting the different sectors of the financial services industry. In addition, the cluster has a number of promotional organizations, spanning the public and private sectors and designed to promote and support the cluster. One example is UK Trade & Investment, which is a government organization designed to support UK companies do business abroad and help foreign companies do business in the UK.

Regarding human resources development for the cluster, London and its environs are home to over one hundred institutions of higher learning (including world-class institutions such as Oxford and the London School of Economics), with a majority offering courses of study related to finance and economics. Many companies, professional associations, and private firms also offer specialized training for work in the financial sector.

London is home to a robust professional services industry, encompassing all of the major areas of business services: tax, accounting, auditing, law, mediation, management consulting and VC/PE, supported by strong infrastructure related to IT, telecommunications and commercial real estate. It is also aided by the availability of international transport as well as a strong business hospitality industry (encompassing hotels, conference centres, restaurants, etc.).

Finally, two of the leading financial services publications, *The Financial Times* and *The Economist*, are based in London. These related industries have enhanced the competitiveness of the cluster by contributing to the dissemination of information, best practices, and innovation.

**Exhibit 10: London Financial Services Cluster Map**



Source: Team Analysis

## Historical Cluster Performance

*Driven in part by its innovation, the financial services cluster had performed extraordinarily well in recent decades, serving as an engine for growth for the rest of the UK economy. Besides being evident in market share data, we also see evidence of the cluster's outstanding performance in the UK's financial services trade balance. At the same time, the cluster has experienced recent declines in market share, part of which we attribute to industry changes, and another part of which is due to the emergence of low-cost rivals.*

### Evidence of the Cluster's Strength

The importance of the cluster to the UK economy is clear: in 2006, the UK's financial services sector employed over 1 million people and generated 9.5% of GDP (Manpower Research, 2007). The cluster's global importance is illustrated by its market share in several key areas, including the global secondary bond market, the derivatives market, foreign exchange, cross-border equities trading, and cross-border bank lending (**Exhibit 11**). London's uniquely international orientation is also evidenced by the fact that 264 of the 347 authorized banks located in the UK in 2005 were branches or subsidiaries of foreign banks, indicating that London is an attractive location in which to compete. Moreover, the UK was the largest source and recipient of cross-border bank lending with 20% and 23% global market share, respectively, in 2005.<sup>9</sup>

In terms of international market share, the strength of the cluster is evident in a number of ways. First, London remains one of the leading insurance markets in the world, capturing 9% of global premiums (up from 6% in 1996).<sup>10</sup> This gives London the third largest insurance industry in the world, behind the US and Japan. Second, London is the third largest equity market in the world by capitalization (behind New York and Tokyo). However, London is the top *international* trading location, with a 43% share of total cross-border turnover in equities in the

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<sup>9</sup> [http://www.hm-treasury.gov.uk/media/1E0/E6/bud06\\_cityoflondon\\_262.pdf](http://www.hm-treasury.gov.uk/media/1E0/E6/bud06_cityoflondon_262.pdf)

<sup>10</sup> *Ibid.*

first nine months of 2005.<sup>11</sup> Third, London plays a leading role in international bond markets. Over \$1 trillion worth of bonds were issued in the first half of 2005, making London the largest issuer with nearly a fifth of the global total.<sup>12</sup> Fourth, London dominates the global market for foreign exchange trading, with about one-third of all transactions. And finally, Euronext.liffe is the world's second largest derivative exchange (after the Chicago Mercantile Exchange) with 31% of global turnover in 2004.<sup>13</sup>

### Exhibit 11: UK Share in Key Financial Services Businesses vs. Peers

	UK	USA	Japan	France	Germany	Others
<b>% share</b>						
Cross-border bank lending (March 2005)	20	9	8	8	11	44
Foreign Equities turnover (Jan-Sept 2005)	43	31	–	–	3	23
Foreign Exchange turnover (April 2004)	31	19	8	3	5	34
<b>Derivatives turnover</b>						
(i) exchange traded (volume of contracts, 2004)	7	31	2	4	12	44
(ii) over-the-counter (April 2004)	43	24	3	10	3	17
International bonds – secondary market (2004)	70	–	–	–	–	–
Fund management (as a source of funds, 2004)	8	45	12	5	4	26
Hedge fund assets (December 2004)	20	69	1	2	–	8

Sources: International Financial Services Ltd, Bank for International Settlements, London Stock Exchange, Bank of England, Systematics International, International Securities Market Association, World Federation of Exchanges and EuroHedge.

Source: HM Treasury, 2006

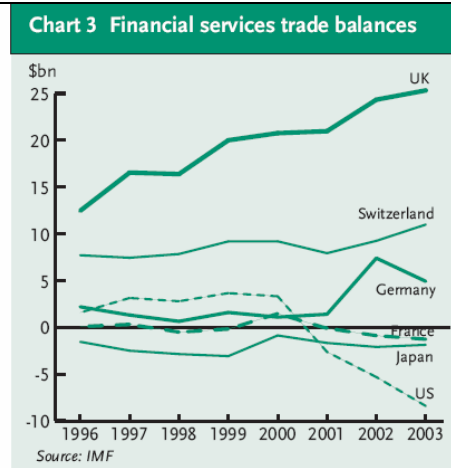
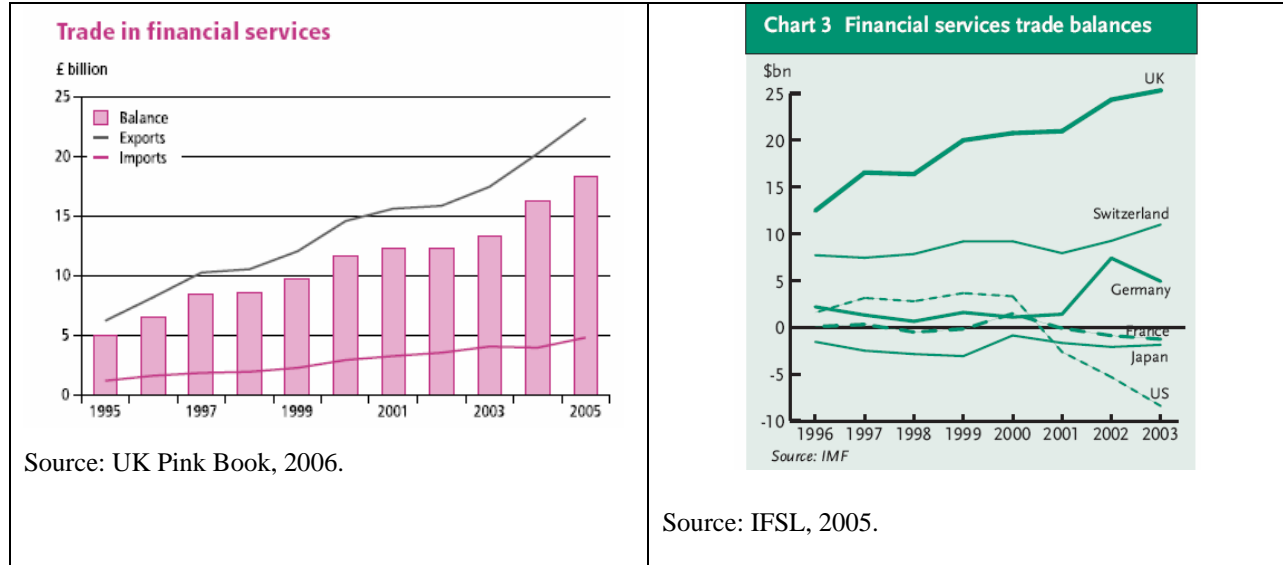
Besides these market share data, the growth in the UK's international financial services sector is evident in its strong financial services trade balance (**Exhibit 12**). In contrast to the US and Japan, the UK has maintained a positive balance in the past decade, primarily because its ability to export financial services has outpaced its domestic economy's need for those services.

<sup>11</sup> *Ibid.*

<sup>12</sup> *Ibid.*

<sup>13</sup> *Ibid.*

## Exhibit 12: UK Trade Balance in Financial Services



Source: IFSL, 2005.

## Explaining Cluster Performance: The Cluster Diamond

### Drivers Behind the Cluster's Strength

We explain the strength of the cluster by examining its diamond in **Exhibit 13**. First, the cluster's global success has been supported by its historical and geographical "inheritances:" long-standing political and economic ties to Europe, the US, Asia, and the Middle East; a historic legacy of internationalism and trade and a tradition of economic openness; a highly international and outward-looking population that speaks the global language of business (English; a legacy of the British Empire); and a favorable geographical position relative to the US and Continental Europe and causing the UK work day to overlap with US and Asian financial markets' open hours.

Global firms are attracted by London's openness to foreign companies; strong factor conditions including, in addition to skilled labor, broad, deep, and liquid markets; and an effective regulatory environment. As noted previously, financial services firms in London benefit from a less constraining regulatory environment and less political pressure than is present

in New York in particular. In 1995, regulatory change enabled the LSE to open its more flexible AIM market for small issuers (especially targeted at international companies) as a complement to its more established Main Market. This has led to a dramatic shift of IPOs to the UK from US markets, which are subject to more stringent regulations like Reg. FD and Sarbanes-Oxley. While the US saw an annual average of 178 venture-backed IPOs during the 1990s, in the last six years this annual average has dropped to 50.<sup>14</sup> This is in contrast to the UK, where the AIM market alone saw 318 IPOs in 2005 (up from 66 in 2003), of which 72 were of international companies (up from 5 in 2003). Main market IPOs on the LSE grew from 20 in 2003 to 77 in 2005. It is important to note that London's regulatory environment is not so business-friendly as to provide insufficient monitoring and consumer protection. The 2006 GCR ranked the UK 3<sup>rd</sup> on both "presence of demanding regulatory standards" and "effectiveness of antitrust policy."

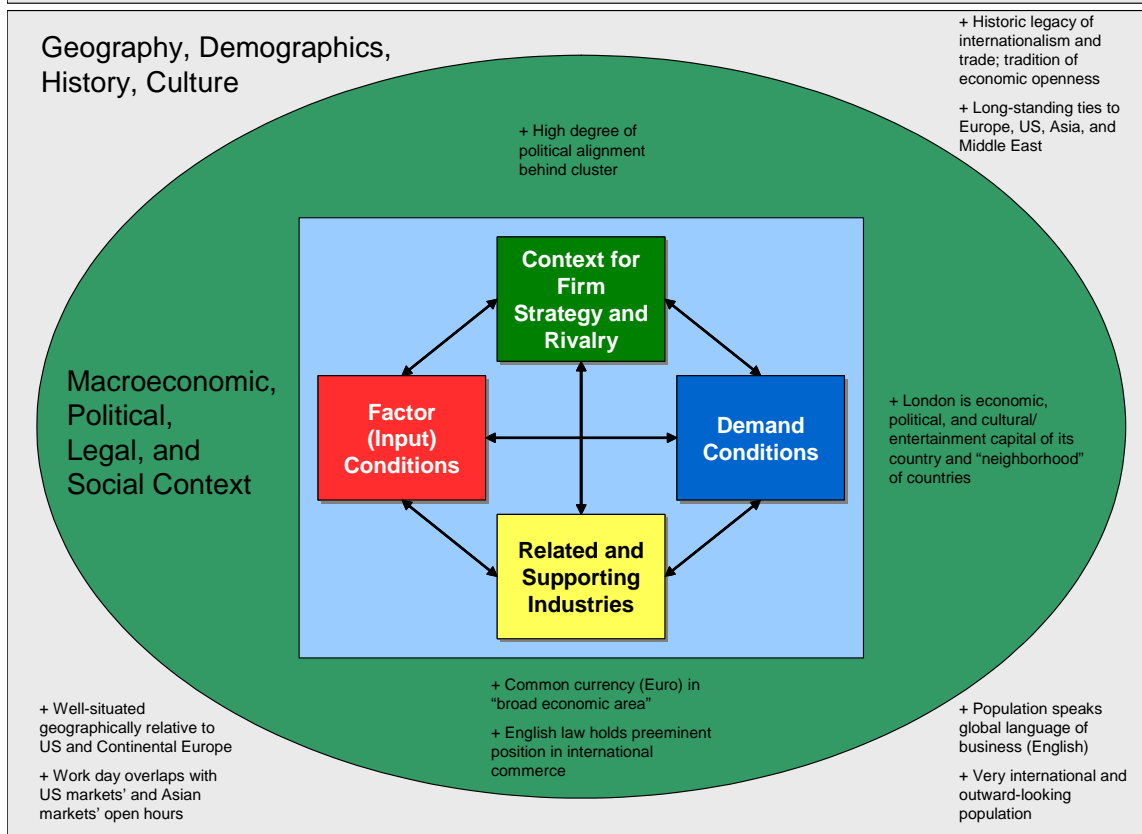
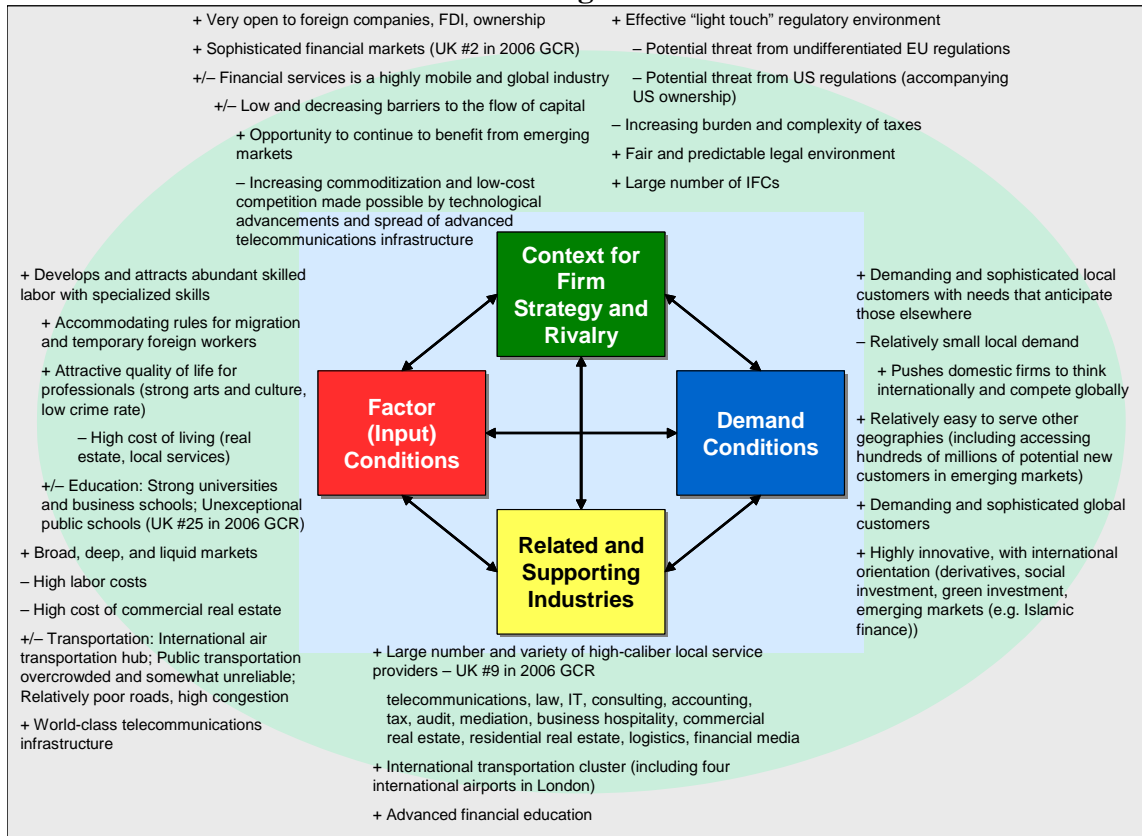
Skilled labor is the most important source of competitive advantage in financial services. The ability to attract this labor is driven by the attractiveness of London as a place for financial services professionals to live and work. London is an attractive place to live because it is the *de facto* economic, political, and cultural/entertainment capital of its "neighborhood" of countries (Mercer, 2006). In addition, the UK has accommodating rules for the migration and temporary foreign workers; especially from EU countries.

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<sup>14</sup> Grady, Robert E. "The Sarbox Monster," The Wall Street Journal. April 26, 2007. [http://intranet.hbs.edu/community/hbsnews/042607\\_wsj.html](http://intranet.hbs.edu/community/hbsnews/042607_wsj.html)



### Exhibit 13: The Cluster Diamond is Strong



Source: Team Analysis

The success of the cluster is also the result of its high levels of innovation. The UK has been ranked #1 or #2 on “financial market sophistication” in the GCR since 2004, which both fuels, and is a result of, the financial services cluster’s innovativeness (GCR 2006). Innovation is driven by highly-skilled and specialized labor, the presence of demanding and sophisticated global customers and intense competition (both global and local). This has fostered investments into new product categories such as exotic derivatives, social and “green” investment, and Islamic finance. Additionally, innovation is fostered by multi-sector initiatives such as “London Innovation.”<sup>15</sup>

On the macroeconomic front, the cluster has benefited from a backdrop of economic stability since Thatcher. New Labor’s continuation of the Conservative party’s policies has also helped the cluster. Moreover, broad adoption of the Euro (though not by the UK) has resulted in increased centralization of financial services in Europe, with London dominating Euro trading. Being outside the Euro also may have provided other advantages to the cluster, such as more flexibility in dealing with the local currency and local regulations.

Finally, the cluster continues to benefit from an unusually high degree of political alignment behind it because of the important of the cluster to both the London and UK economies. This alignment spans City and National government, and includes both major political parties.

#### Indications of Vulnerability

Despite its increasing trade balance and growing market share in certain products, the UK financial services cluster has been losing overall market share relative to other nations (**Exhibit 14**). This indicates that, given its composition, the strong growth of the UK financial services cluster is not keeping pace with the even stronger growth of the global financial services market.

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<sup>15</sup> <http://www.london-innovation.org.uk/server.php?show=nav.008009>

One hypothesis for this loss in share is that other countries are capitalizing on the decreased importance of co-location for financial services. These clusters can offer a lower-cost alternative to the cluster in London for many of the more commoditized financial services, and in some cases, and have the added benefit of being closer to the clients they serve.

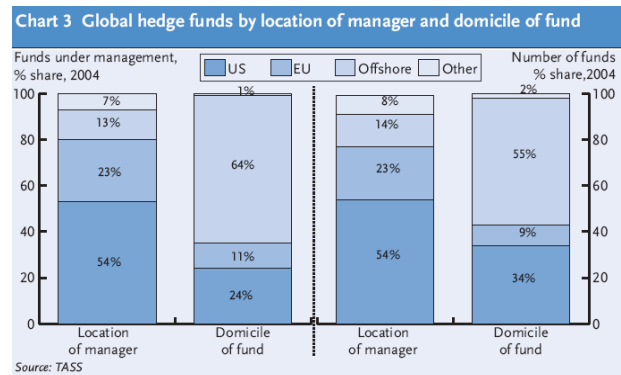
Another hypothesis is that, despite its leadership in other products, London has lagged in the hedge fund space. Indeed, the major financial services centers that have gained market share in recent years (USA, Luxembourg, Ireland), have all benefited from the unparalleled growth in the asset management/hedge fund industry in the past decade. Until 2006, hedge funds were not regulated in the US and were only subject to limited disclosure requirements, which made New York the leading center for both hedge fund management and hedge fund investment. Similarly, of the European countries, Luxembourg, Ireland and Switzerland were seen to have the most liberal regulations (and tax-friendly regimes) related to hedge funds. Thus, while London is the most popular destination for European hedge fund management, many European funds are domiciled in less regulated and tax neutral on-shore and off-shore destinations (International Financial Services London, 2005).

**Exhibit 14: Cluster Is Losing Global Share; Impact of Hedge Funds on the Cluster**

**Financial Services Cluster**  
**Export Performance by Nation, 1997-2005**

Country Name	Export Value (\$mm)	Share	Share Change
<b>United Kingdom</b>	<b>\$38,760</b>	<b>19.9%</b>	<b>(2.8%)</b>
USA	36,110	18.6	4.6
Luxembourg	26,607	13.7	5.3
Switzerland	14,470	7.4	(1.1)
Ireland	13,554	7.0	3.6
Germany	8,330	4.3	(0.8)
Japan	5,910	3.0	0.6
China, Hong Kong SAR	4,964	2.6	(1.0)

Source: Prof. Michael E. Porter, International Cluster Competitiveness Project, Institute for Strategy and Competitiveness, Harvard Business School; Richard Bryden, Project Director. Underlying data drawn from the UN Commodity Trade Statistics Database and the IMF BOP statistics.



## **Strategic Issues and Recommendations**

*The increased mobility of capital caused by electronic trading and advances in telecommunication has created both challenges and opportunities for the financial services cluster in London. While capital mobility has empowered new clusters to emerge in certain commoditized sectors of financial services, it has also increased rivalry between existing world-class clusters to gain share of a larger global pie.*

Despite lagging in innovation by traditional metrics such as investment in R&D and patents per capita, the UK has excelled in financial markets innovation by, for example, embracing derivatives more effectively than rival countries (NESTA 2006). However, as previously innovative financial products become “commoditized” (Cheong, 2007), the strongest growth in the financial sector seems to be occurring in investment management (e.g., hedge funds and private equity); a sector in which London is relatively weak.

Thus the government policy imperative should be to support innovation within the cluster, through an “ecology of innovation.” We borrow the idea of an ecology of innovation from NESTA. NESTA argues that in order to make innovation more likely, policymakers should foster a positive context for innovation rather than focusing purely on the amount invested in R&D. Concretely, this means enhancing overall education and skills (level and type) and attracting skilled foreign labor; maintaining a high level of security; building a “livable” city in which highly skilled workers want to work; investing in transportation and other infrastructure; formulating a tax system that is internationally competitive in terms of the rate, and clear and fair in collection and enforcement, balancing robust and credible financial regulation with regulators being sufficiently limber to adjust regulations if doing so makes sense to accommodate financial innovations, and enhancing collaboration and interconnectedness between cluster participants. Development of this context also requires the attraction and retention of skilled bureaucrats and regulators, which could be achieved by following Singapore’s strategy of paying market wages.

Because financial services is a knowledge-based industry, highly-skilled and specialized workers are necessary. Recognizing the importance of these high-skilled workers to the cluster, the City of London has created a Business Traineeship Scheme that encourages school and college graduates from London's surrounding communities to seek full-time employment in the city through short-term work placement. At the national level, the UK government has funded the creation of national Financial Services Academies (similar to vocational academies) in London, Manchester and Norwich through successful bid by the Financial Services Skills Council. The City of London Corporation is now jointly sponsoring new academies in Islington and Hackney with the City University & KPMG, respectively (Snyder, 2006).

Quality of life is an important factor for the attraction and retention of employees for a financial services cluster. In this regard, these are several issues that the government must address for London. Traffic congestion in the central London business district is a major concern. To this end, the City's Transport for London began levying a congestion charge for all vehicles entering, leaving or traversing the congestion charge zone between 7am and 6pm in 2003, and the fee was raised to £8 in July 2005. The congestion charge zone was enlarged in February 2007. While this charge has led to a reduction in traffic, critics have attacked the potential for businesses to begin exporting jobs outside of the congestion charge zone to be closer to their employees, and the inadequacy of London's public transit system to handle the additional load.

Similarly, London's lack of affordable housing "has become a major constraint on the London economy and the ability of businesses and the public services, especially those seen as highest priority by the Government and the public...to recruit and retain staff."<sup>16</sup> The City of

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<sup>16</sup> "Executive Summary of Mayor's Housing Commission." City of London website, accessed March 22, 2007. [http://www.london.gov.uk/mayor/housing\\_commission/exec\\_summary1.jsp](http://www.london.gov.uk/mayor/housing_commission/exec_summary1.jsp)

London formed a commission related to these housing issues back in 2000, which issued 18 recommendations on how to increase the availability and affordability of housing through new development, liberalization of zoning and development policies for existing properties, and improving the management process of vacant properties. More recently, Mayor Ken Livingstone published a new spatial development plan entitled “The London Plan” in 2004, with alterations concerning pressing housing concerns in 2006.

Like other international financial centres, London, and specifically the Square Mile, has been a target for terrorism in the past, including the bombing of the Baltic Exchange in the early 1990s, and the attacks on the public transit system on July 7, 2005. In order to deal with the increased threat levels, the UK government has levied a national business tax in order to fund additional police recruitment, extension and reinforcement of the “Ring of Steel” security cordon that surrounds the City of London, and additional coordination with businesses with respect to emergency planning. While these measures are adequate from a government perspective, it is also important for individual businesses to step up their emergency preparedness. These include protecting and preparing their employees for such emergencies, and investing in comprehensive and effective data back-up systems.

Given the opportunity presented by increased capital mobility, London can gain an edge in European markets through the development of a platform for pan-European clearing and settlement system so as to increase efficiency and decrease transaction costs. While the “Market in Financial Instruments Directive” at the EU-level which comes into force in November 2007 will reduce some of these transaction costs, this will only reduce the impetus to promote actual integration (McCreevy, 2006).

The efficacy of the initiatives listed above requires significant support and active participation of all cluster participants. To this end, the government's UK Trade & Investment agency (UKTI) launched the Financial Services Sector Advisory Board (FSSAB) in late 2006. The group brings together leaders from City companies, institutions, and associations, along with national and regional government leaders. Public-private industry partnerships have the highest impact when industry leaders have a formalized line of influence to senior decision-makers, such as in Connecticut Gov. Rowland's Department of Economic and Community Development in the 1990s, or the Economic Committee in Singapore in the 1980s. Since the FSSAB is new, it is unclear what influence the organization will have, however, the involvement of senior decision-makers such as the Mayor of London and an extensive list of industry leaders is promising.

### Conclusion

Given the industry's sensitivity to globalization and rapid technological change, London's leadership position in international financial services is in no way guaranteed. The cluster faces a number of challenges—local as well as global—that cluster participants have developed strategies to address. Based on our review of these strategies, we believe that key decision-makers have accurately assessed the challenges they face and undertaken viable efforts to address these challenges. If cluster participants are able to execute on current plans and continue to effectively diagnose and respond to new challenges, we believe that London's financial services leadership will endure.

## References

- Anthony Cheong, Ranu Dayal, Robert Gruebner, Svilen Ivanov, and Achim Schwetlick, Boston Consulting Group, "Investment Banking and Capital Markets, Fourth Quarter 2006," March 20, 2007, online
- BBC, January 18, 2007: online.
- DTI Report (2003). "Competing in the global economy: the innovation challenges." Report for the Department of Trade and Industry.
- Economist Intelligence Unit, March 1, 2007: online.
- The Economist*, February 9, 2007: 16.
- The Economist*, March 22, 2007: online.
- The Economist*, April 19, 2007: online.
- European Innovation Scorecard (2006). [http://www.proinno-europe.eu/doc/EIS2006\\_final.pdf](http://www.proinno-europe.eu/doc/EIS2006_final.pdf)
- Hampton, Philip (2005). "Reducing administrative burdens: Effective Inspection and Enforcement." Paper presented to HM Treasury March 15, 2005.
- HM Treasury (2006). "Financial Services in London: Global Opportunities and Challenges." International Financial Services London. "Hedge Funds: City Business Series." April 2005: pp.7-8.
- International Monetary Fund, World Economic Outlook Database, September 2006: online.
- Jones, Geoffrey and Meghan Gallagher-Kernstine (2005). "Walking on a Tightrope: Maintaining London as a Financial Center." Harvard Business School case.
- Kynaston, David (1994). The City of London: A World of Its Own, 1815-1890. London: Chatto & Windu, p. 9.
- Leitch, Sandy (2006). "Prosperity for All in the Global Economy: World Class Skills." Paper presented for HM Treasury December 5, 2006
- Manpower Research Report (2007). Manpower Outlook Survey: UK: 10.
- Mercer Human Resource Consulting (2007). "2007 Quality of Living Survey."
- McCreevy, Charlie. "Clearing and Settlement: The Way Forward." Speech to the Economic and Monetary Affairs Committee of the European Parliament. July 11, 2006.
- Middleton, Roger. *The British Economy since 1945* (New York: St. Martin's Press, 2000): 13.
- NESTA Policy & Research Unit, "The Innovation Gap: Why policy needs to reflect the reality of innovation in the UK," October 2006, p. 1
- Office of National Statistics, [www.statistics.gov.uk](http://www.statistics.gov.uk)
- Organization for Economic Development and Cooperation, "Factbook," 2006: <http://puck.sourceoecd.org/vl=16106872/cl=20/nw=1/rpsv/factbook/>
- Porter, Michael and Christian Ketels (2003). "UK Competitiveness: moving to the next stage." DTI Economics Paper No. 3
- Snyder, Michael. "The Challenges Ahead." Big Bang 20 Years On: New Challenges Facing the Financial Services Sector. London: Centre for Policy Studies, 2006. 6-7.
- United Kingdom Department of Trade and Industry, "Final Synthesis Report," March 2006, DTI Report Series No. 9: 12.

## Interviews

- Jan Loeyes, Managing Director and Global Strategist, JPMorgan, April 2007.
- Simon Jowers, Head of Global Markets: Financial Services Strategy, HM Treasury, April 2007.