Intellectual Capital (IC) in Financial Services Organisations: Is It Possible to Make It Socially Responsible?

Piotr Wiśniewski
Department of Corporate Finance, College of Finance and Management, Warsaw School of Economics, Poland, Europe
piotr.wisniewski@sgh.waw.pl

Abstract: Financial companies worldwide are blamed for having precipitated the gravest global economic meltdown since the Great Depression of the 1930s. While the aftershocks of the last turmoil are still palpable and some observers prophesy that another sharp economic downturn might be in the offing – global policymakers, analysts, researchers and the public at large ruminate how to redress the balance of powers to ensure socially sustainable financial and macroeconomic growth. This paper reviews the expansion of worldwide financial industries relative to real economies ("financialisation"), exemplifies its social ramifications and indentifies the root causes of socially disruptive innovation undertaken in financial institutions. Finally, the paper highlights the prerequisites of social equilibria in financial organisations, of which most are endogenous in nature.

Keywords: intellectual capital, innovation, financial organisations, financial industry, social responsibility

1 Financialisation as a socioeconomic phenomenon

According to T.I. Palley "Financialisation is a process whereby financial markets, financial institutions, and financial elites gain greater influence over economic policy and economic outcomes. Financialisation transforms the functioning of economic systems at both the macro and micro levels" (T.I. Palley, 2007). Underpinning this transformation is how intellectual capital is created (innovation in products and services) and managed (corporate structures) by financial firms.. Unbridled financialisation, as argued throughout this paper, has engendered systemic distortions ultimately leading to the global financial crisis of 2007-2009, and subsequent socioeconomic turbulence, including the European sovereign debt crisis.

This paper examines financialisation growth in three dimensions (corresponding to the key classes of investment assets):

- *aggregate financial leverage* – also referred to as "gearing", representing the scale of total bank lending existing in contemporary economic systems at personal, corporate, industrial and sovereign levels;
- *aggregate stock market capitalisation* – epitomising the role played by equity (stock) markets in contemporary economies;
- issuance of hybrid instruments (financial derivatives) – demonstrating the (mostly speculative) use of complex financial instruments whose trading has concentrated around non-public (i.e. over the counter, OTC) markets.

Despite recurring misgivings concerning Gross Domestic Product (GDP) as a proxy for contemporary socioeconomic progress (Cf. J.C.J.M. van den Bergh, 2007), GDP related measures of financial sector expansion, as the most established in theory and available in practice, have been used. To minimise cross-border overlap in accounting for the selected yardsticks of financialisation, World Bank and Bank for International Settlements global datasets have been applied.

1.1 Financial leverage

Financial leverage (otherwise known as "gearing") – expressed as domestic crediting supplied by the worldwide banking industry – exceeded global Gross Domestic Product (GDP) already in 1982 and has never looked back. This attests to how rampant bank lending has outweighed real economic output in the global economy – despite successive waves of macroeconomic volatility (Figure 1). The global overreliance on external financing, sometimes branded as "predatory lending" (HUD, 2011) has

Reference this paper as:. Wiśniewski, P. "Intellectual Capital (IC) in Financial Services Organisations: Is It Possible to Make It Socially Responsible?" *The Electronic Journal of Knowledge Management* Volume 10 Issue 3 (pp268-278,) available online at www.ejkm.com

resulted in far-ranging socioeconomic disequilibria, ultimately bringing the worldwide economy to the brink of a collapse unseen since the early 1930s of the 20th century.

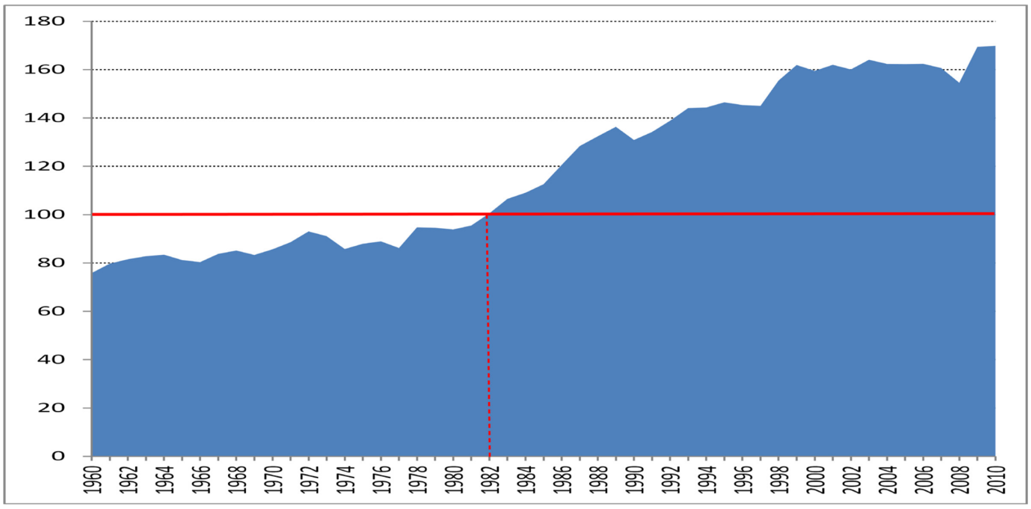


Figure 1: Domestic credit provided by international banking sectors as percentage of global Gross Domestic Product (GDP) in 1960-2010
Source: based on World Bank financial sector online datasets: http://data.worldbank.org/topic/financial-sector?display=graph [retrieved: November 15, 2011].

1.2 Stock market capitalisation

The relationship between the stock market value of listed companies (representing a fraction of all active businesses, and a yet smaller fraction of all tradable financial instruments) related to Gross Domestic Product (GDP) is often cited as a proxy for the role played by listed companies in the real economy. In the surveyed period (1990-2010), this proportion spiked twice above the 100 percent threshold ("bubbles") portending bear markets ("busts") and impending macroeconomic contractions ("recessions"). In general terms, the past decade has witnessed a soaring scale of stock market valuations v their underlying "brick-and-mortar" fundamentals (Figure 2).

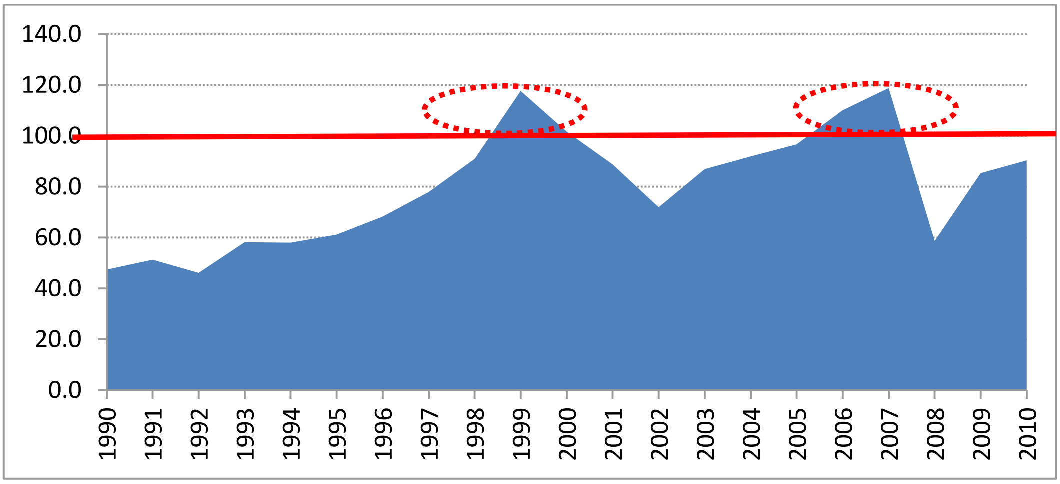


Figure 2: The capitalisation of worldwide listed companies as percentage of global Gross Domestic Product (GDP) in 1990-2010
Source: based on World Bank financial sector online datasets: http://data.worldbank.org/topic/financial-sector?display=graph [retrieved: November 15, 2011].

1.3 Over the counter (OTC) derivatives outstanding v stock market capitalisation

As demonstrated by Figure 3, since the beginning of the new millennium the notional value of over-the-counter (OTC) financial derivatives has deviated from the capitalisations (market values of equity) posted by publicly quoted companies – particularly in the countdown to the last global financial crisis.

This divergence attests to a dramatic shift of gravity from public, regulated and relatively transparent stock markets (whose prime goal is fostering the growth of enterprises) to non-public, *laissez-faire* and opaque over the counter (OTC) platforms (dominated by speculators and oftentimes assisted by algorithmic trading systems). Surprisingly, whereas the global financial turmoil of 2006-2009 (with its subsequent aftershocks still perceptible) made a dent in global stock market valuations, it only managed to flatten the rampant growth of OTC trading.

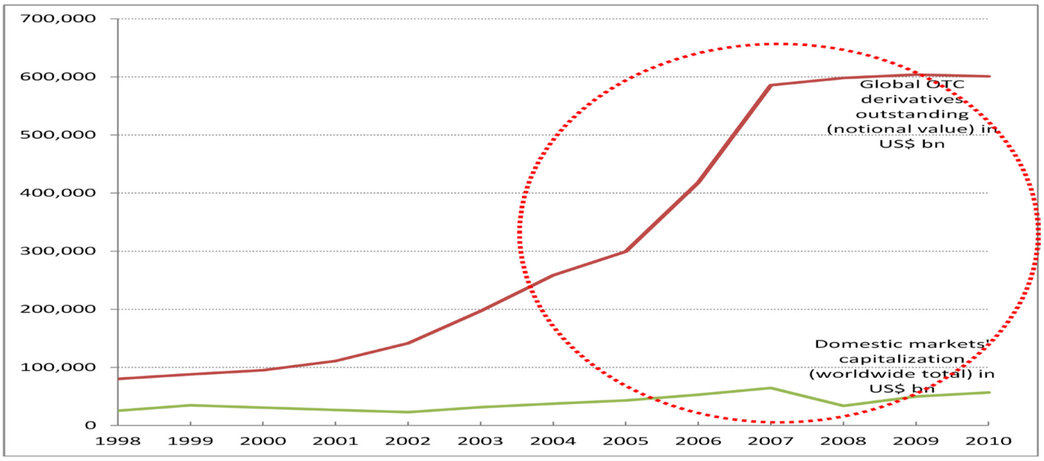


Figure 3: Worldwide stock-markets' capitalisations v global over-the-counter (OTC) derivatives' (notional) value outstanding in 1998-2010 (in US$ bn)
Source: based on Bank for International Settlements (BIS) financial derivatives statistics online: http://www.bis.org/statistics/derstats.htm [retrieved: November 15, 2011];
Federation of World Exchanges (FWE) market capitalisation statistics online: http://www.world-exchanges.org/statistics/time-series/market-capitalisation [retrieved: November 15, 2011].

2 Financialisation as a challenge to socioeconomic sustainability

The Standard & Poor's (S&P) 500 Volatility Index (VIX), widely dubbed the "Fear Index", represents a leading benchmark of near-term (30-day) volatility implied for financial options based on the S&P 500 Index: a bellwether of the U.S. economy (Cf. CBOE 2009). Since inception in 1993 (though sometimes calculated *ex post* to cover preceding periods), the VIX has mirrored varying outlooks (positive or negative) for U.S. blue chips.

Evidently, the global financial meltdown of 2007-2009 coincided with unprecedented VIX fluctuations: culminating at the bottom of the crisis. The long-term trend of VIX growth (with two major aftershocks following the recent meltdown) can be viewed as a rising degree of uncertainty as to a sustainable course of the U.S. economy (Figure 4).

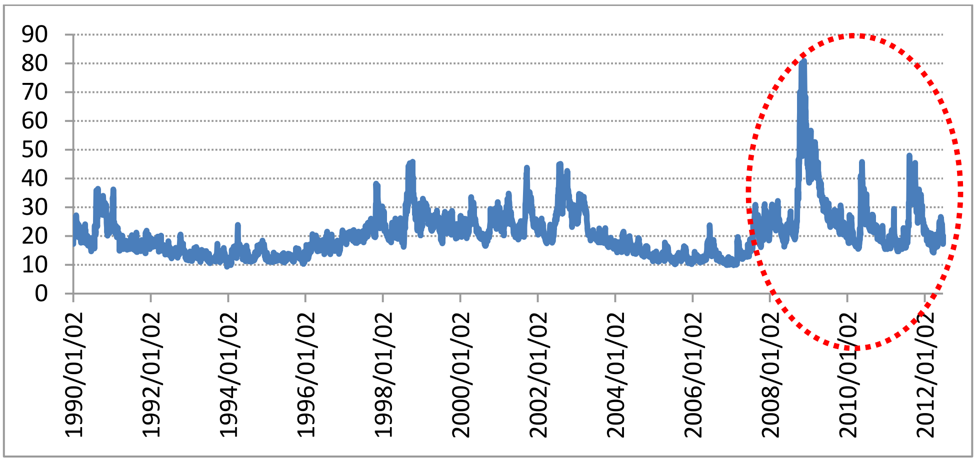


Figure 4: The Standard & Poor's (S&P) 500 Volatility Index (VIX), also known as the "Fear Index", between January 2, 1990 and June 22, 2012

Source: Yahoo!Finance datasets, downloadable online from:http://finance.yahoo.com/q/hp?s=%5EVIX+Historical+Prices [retrieved: June 24, 2012].

Using a fairly novel bibliometric tool (Google's N-gram Viewer) and plotting on the time scale the terms "financial" and "crisis" for both major dialects of the English language (British and American), one can detect a striking similarity in trending since the Great Depression of the 1930s.

The Ngram results need to be interpreted with considerable caution (as expressedly avowed by their creators), yet it is symptomatic that throughout the post-war period "financial" references have coincided with "crisis" events. Such correlation might be indicative of continuous public stigma associated with the development of financial institutions and their innovation output (Figure 5).

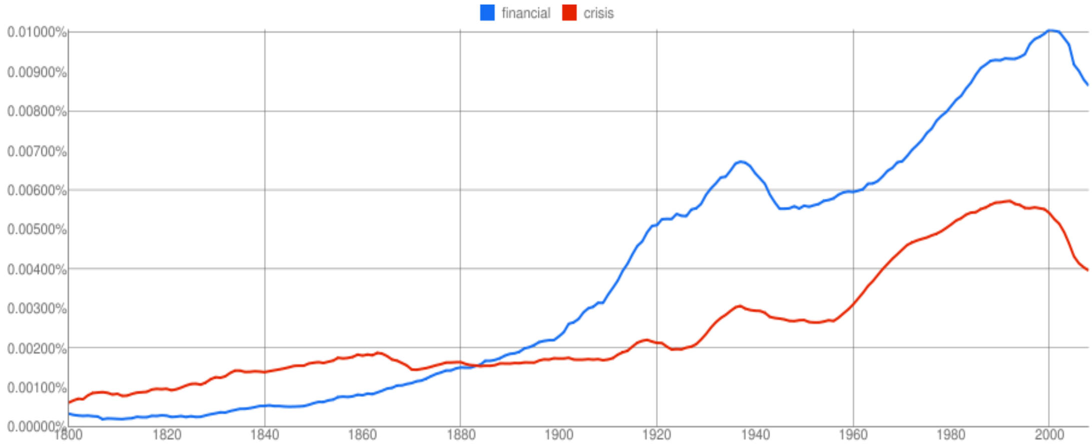


Figure 5: The ocurrence of unigrams (or 1-grams): "financial" and "crisis" in the English language corpus of books in 1800-2008*

Source: Google Books N-gram Viewer (by Google Labs), available online at: http://books.google.com/ngrams/graph?content=financial%2Ccrisis&year_start=1800&year_end=2008&corpus=0&smoothing=3 [retrieved: November 15, 2011].

White-collar crime committed in the financial industry represents a particularly vexing by-product of rampant financialisation. For obvious reasons (limited detection and legal efficiency; time lags) this type of crime is not adequately represented in current official statistics, however, pending cases offer a partial glimpse into its magnitude.

The U.S. Federal Bureau of Investigation (FBI) statistics of white-collar financial crime fall under the following categories (F.B.I., 2011):

- *"corporate fraud*: falsification of financial information of public and private corporations, self-dealing by corporate insiders and obstruction of justice;
- *securities & commodities fraud*: affinity fraud, pyramid Schemes, prime bank investment fraud, advanced fee fraud, promissory notes, commodities fraud (foreign currency exchange fraud, precious metals fraud), market manipulation, broker embezzlement and late-day trading;
- *mortgage fraud*: material misstatements, misrepresentations, or omissions relating to a real estate transaction which is relied on by one or more parties to the transaction (including: foreclosure rescue schemes, loan modification schemes, illegal property flipping, builder bailout/condo conversion, equity skimming, silent second, home equity conversion mortgage, commercial real estate loans and air loans);
- *financial institution fraud*: sophisticated examples of insider fraud (embezzlement and misapplication), check fraud, counterfeit negotiable instruments, check kiting and fraud contributing to the failure of financial institutions;
- *insurance fraud*: premium diversion/unauthorised entities, insurance-related corporate fraud, viatical settlement fraud, workers' compensation fraud, disaster fraud, staged auto accidents and property insurance fraud;
- *mass marketing fraud*: advanced fee fraud, Nigerian letter fraud, foreign lottery/sweepstakes fraud, overpayment fraud and recovery/impersonation schemes,

- *money laundering*: the process whereby criminals conceal or disguise the proceeds of their crimes or convert those proceeds into goods and services (it allows criminals to infuse their illegal money into the stream of commerce, thus corrupting financial institutions and the money supply, thereby giving criminals unwarranted economic power)."
- As shown in Figure 6, among the types of fraud proliferating shortly before the global financial crisis of 2007-2009 were mortgage and (to a lesser extent) securities & commodities instruments. The two categories epitomise negative social outcomes related to intense financialisation, with particular emphasis on the abuse of (securitised) structured finance products marketed to the public at large. Conversely, fraud targeting financial institutions contracted dramatically during this period.

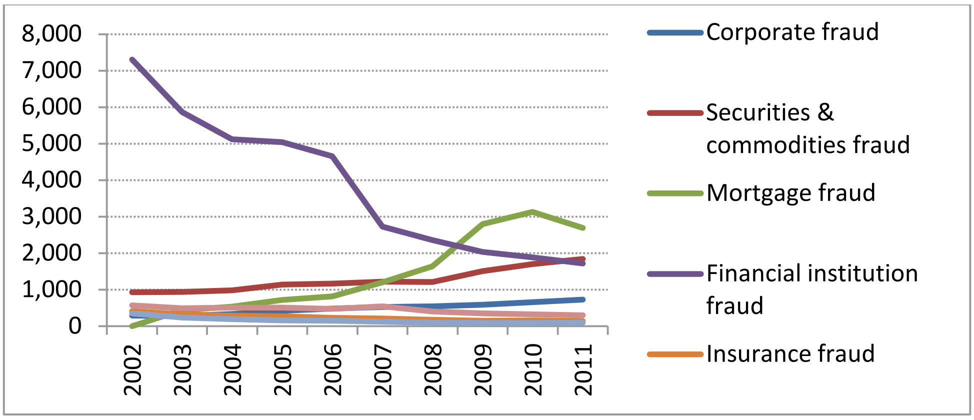


Figure 6: White-collar financial crime (pending cases of corporate, securities & commodities, mortgage, financial institution, insurance, mass marketing fraud and money laundering) pursued by the U.S. Federal Bureau of Investigation (FBI), 2002-2011

Source: Federal Bureau of Investigation (FBI), Financial Crime Reports to the Public 2002-2012, available online at: http://www.fbi.gov/stats-services/publications [retrieved: June 25, 2012].

Remarkably, global fraud reported in financial services and insurance ranked atop all economic sectors covered by the FBI in 2009 and in 2011. Notably, insurance led this ignominious ranking (in first place for 2011 – alongside communications). Such an observation comes with one practical caveat: owing to a greater extent of regulation, financial activity tends to be more transparent, thus more detectible in human perceptions as well as reportable statistics (Figure 7).

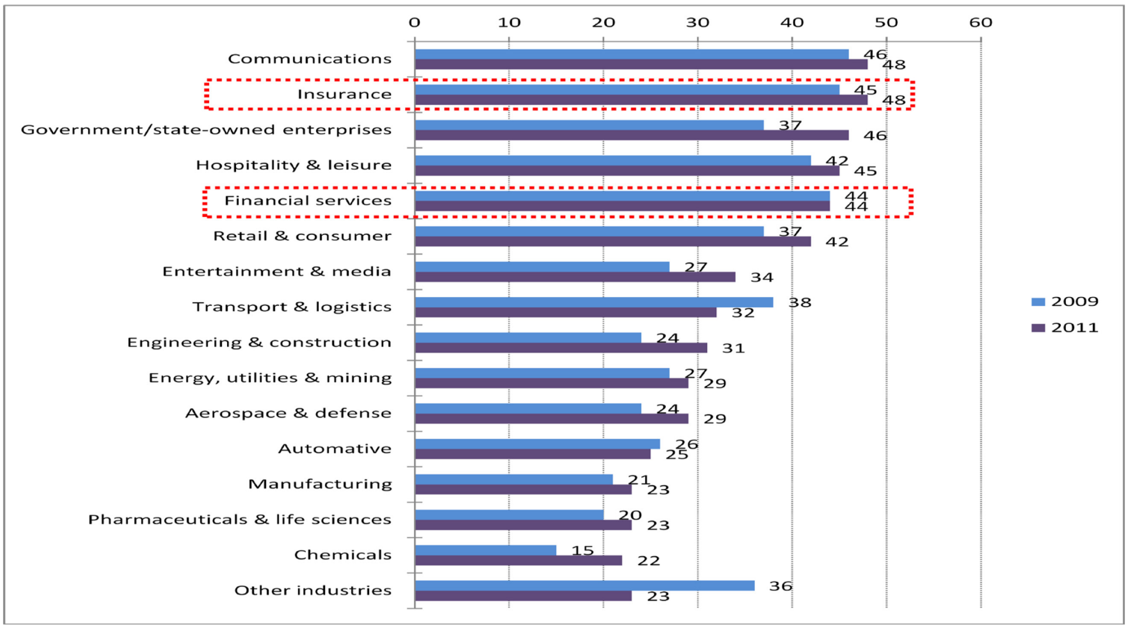


Figure 7: Global fraud reported by industry in 2011 v 2009 (by % of respondents representing individual industry sectors)

Source: PriceWaterhouseCoopers (PwC), Global Economic Crime Survey, November 2011, p. 18.

From the social perspective, a particularly rankling feature of rampant financialisation has been a yawning income gap between the rich and the poor (or even the average) – originally expounded by the Kuznets Curve (Kuznets, 1971) and compared internationally through the Gini coefficient (Gini, 1912).

As demonstrated by Figure 8, the top percentile of American earners (comprising wealth derived from capital gains) have benefited from a long-term rise in remuneration, notably dynamic in the runups to both global contractions (the Great Depression of 1929-1932 and the economic crisis of 2007-2009). This protracted ascent is particularly striking when contrasted with the rather languid progress in emoluments of the other two brackets of American high earners. Such a divergence has wide ranging social implications, as income inequalities are oftentimes aggravated by – even more pronounced – opportunity barriers. If continued, this alarming trend can undermine the future competitiveness of human capital in the U.S. and other advanced economies (Cf. Stiglitz, 2012).

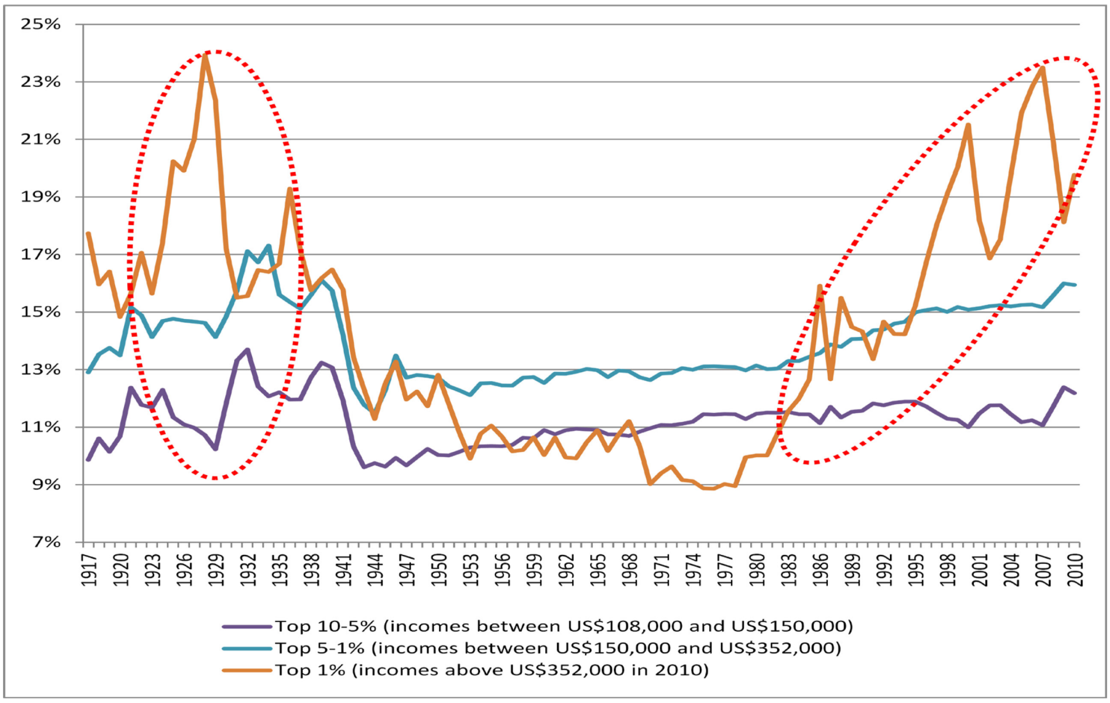


Figure 8: The Income Share of Top Earners (1%, 5-1% and 10-5%) in the United States in 1917-2010

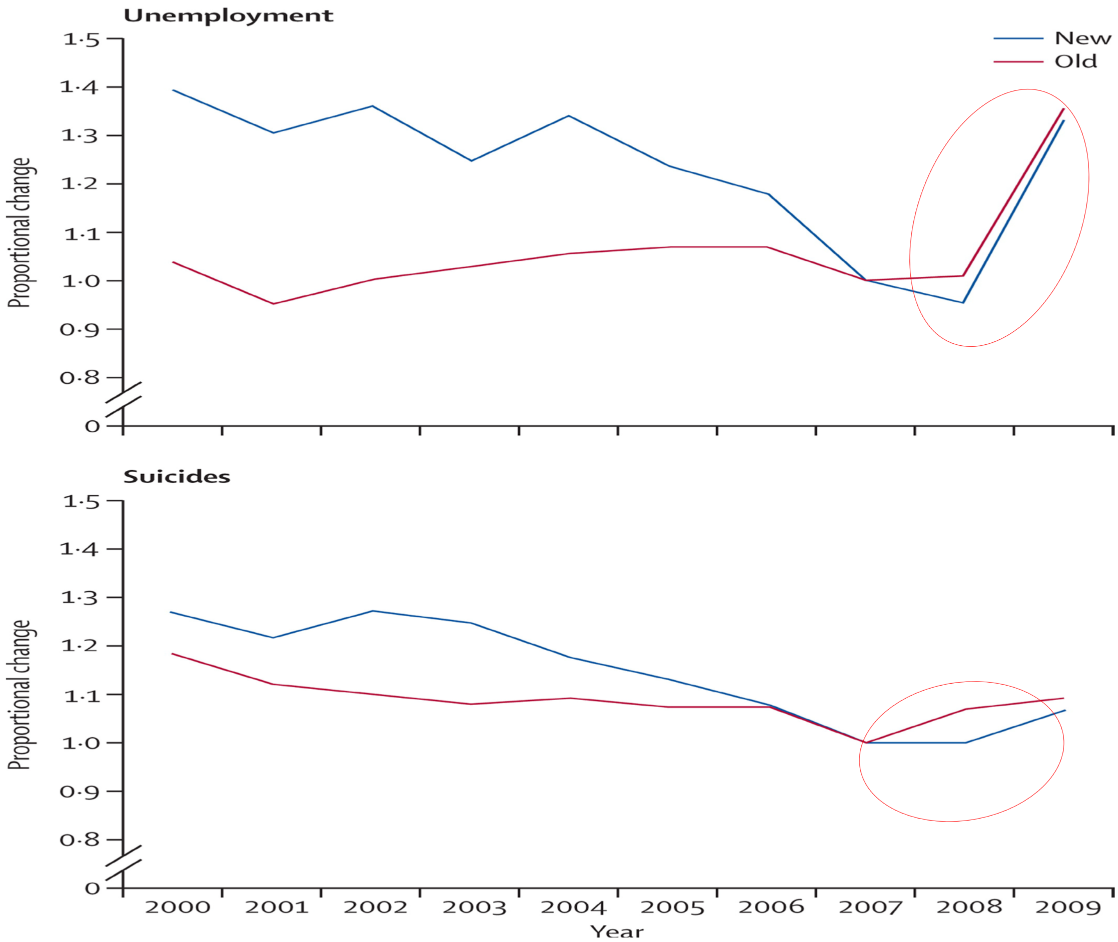
Source: T. Piketty, E. Saes, Income Inequality in the United States,1913-1998, The Quarterly Journal of Economics, Vol. CXVIII, Issue 1, February 2003, pp. 7-18 (series updated to 2010), available at: http://elsa.berkeley.edu/~saez/TabFig2010.xls [retrieved: June 25, 2012]. Note: income is defined as market income (i.e. incorporates capital gains).

The most palpable manifestation of social pathologies attributable to financialisation concerns human health. Among the health hazards of financial distress cited in economic literature are (United Nations, 2011):

- *increased mortality* from certain diseases (e.g. cardiovascular conditions) (Brenner, 1971);
- *higher alcohol consumption* and (if prolonged) risk of *liver cirrhosis* (Brenner, 1975);
- *major depressive disorders* (Dooley, 1994).
- However disturbing the aforementioned health hazards, the most ravaging impact of financial crises relates to suicidal acts. The relationship between financial volatility and suicidal attempts has for long been researched internationally and yet has remained highly controversial. In particular, it has been difficult to prove linkage between stock market volatility and an increased incidence of suicidal tendencies (Nandi, 2012). By far more causal evidence has corroborated a connection between unemployment and suicide. The transmission mechanism is simple: financial

crises lead to increased unemployment, which (in turn) has a knock-on effect on the number of suicidal acts, especially in lower income groups.

- Figures 9 & 10 demonstrate how falling trends in (population weighted) unemployment and suicide rates in Europe were quickly reversed with the advent of the global financial crisis (whose psychological bottom occured in 2008). The spike in suicide rates (coincident with the sharp economic downturn) affected both Old (Austria, Finland, Greece, Ireland, the Netherlands, the United Kingdom) and New Europe (the Czech Republic, Hungary, Lithuania and Romania) – the division of the EU members dating back to 2004, when the largest recent wave of EU enlargement took place.



Figures 9 & 10: Unemployment and Suicides in Selected Old and New EU Members in 2000-2009

Source: D. Stuckler et al., Effects of The 2008 Recession on Health: A First Look at European Data, The Lancet, Volume 378, Issue 9786, July 2011, pp. 124 – 125. Note: adult unemployment and suicide in people aged 0-64, indexed on 2007 (the last complete year before the crisis; y-axis values represent proportional change relative to that year).

3 Intellectual Capital (IC) in financial services organisations: structural distortions

Given the frantic pace of innovation in the financial industry (already exemplified in this paper), it is vital to examine its underlying causes and effects. The following factors have spurred the exuberant and socially disruptive proliferation of financial products and services over the past few decades (Cf. Wiśniewski, 2011):

- *executive short-termism and misaligned incentives*: modern-age financial organisations are short term oriented (via overaggressive compensation structures embedded in managerial contracts) and heavily skewed toward marketing and sales (board representation, hands-on decision making and, again, compensation) at the expense of in-house risk management and regulatory compliance (underrepresented, undertrained, understaffed, underequipped and under-motivated);

- *widespread financial illiteracy*: most global societies have failed to develop widely accessible primary, secondary and tertiary educational systems that would promote a basic level of understanding (by the public at large) of “plain-vanilla” financial products and services (let alone their hybrids, i.e. complex financial derivatives); this nescience has resulted in social vulnerabilities and limited public accountability of financial elites;
- *unethical conduct and unprofessionalism*: thus far, most financial executives have not been subjected to sufficient standards of ethics and professionalism requisite for the fiduciary duties that they routinely perform (in practical terms the overwhelming majority of financial professionals are not obligated to demonstrate any proven technical acumen or skills, or to adhere to any formalised code of conduct);
- *political oblivion and ignorance*: runaway financial sectors have not been properly supervised, managed or coordinated by governments (most countries have been unable to formulate broad economic goals – let alone detailed action plans defining future roles to played by the increasingly potent financial sectors), while frequent swings of the political pendulum have added to volatility caused by lopsided microeconomic incentives.
- *longstanding deregulation* (*de jure* and *de facto*): global financial centres have for long vied for global supremacy (in capital flows, political prominence and talent recruitment) through a variety of means including regulatory arbitrage (reducing regulatory burdens and a more relaxed attitude toward existing laws – sometimes to a point of downright negligence).

The growing alienation of financial industries and their elites has given rise to mass movements opposed to social disparities and (more specifically) financialisation. The scale of such protests has been unprecedented (earning it the 2011 “Person of the Year” designation by Time Magazine); Appendix 1 catalogues their key characteristics. Besides political goals, most protesters decried corruption of their governments, income inequalities and certain aspects of financial sector dysfunction.

4 Macro- and microeconomic prerequisites of intellectual capital growth in financial organisations

It is evident that the unchecked expansion of worldwide financial organisations and industries has become a significant social liability. The following measures will help restore lasting equilibria in financial enterprises, their environments and will adequately motivate key financial executives:

- *upgrading the quality of human & structural capital*: most policymakers and reformers ignore or underrate the importance of corporate culture in financial firms, whereas this domain requires a particularly radical overhaul: contemporary financial organisations need to develop and cultivate a policy of broad-based stakeholder and personnel engagement (most financial institutions still point up shareholder value maximisation in their mission statements – which in practice is downgraded to serving the short/medium term objectives of top executives);
- *downsizing*: by all established measures of relativity, global financial sectors and firms that make them up are “too big for their societies” and need to be scaled back to proportions commensurate with the underlying economies – this process can be accomplished by fragmenting financial oligo- and monopolies (e.g. omnipotent credit rating agencies, multinational conglomerates) and imposing fiscal levies on transactions deemed socially onerous (e.g. certain financial derivatives and their combinations as well as systemically disruptive trading strategies);
- *cleaning up*: regulatory effectiveness and ethical conduct need to become an integral part of executive decision making in contemporary financial settings – this requires tighter regulations applied to and within financial organisations to ensure a level “playing field” of competition for all participants involved in financial markets as well as symmetrical risk/reward profiles of key executives involved in the origination, structuring, marketing and management of financial products and services;
- *wising up*: basic financial notions must become routine elements of primary, secondary and (to some extent) tertiary education curricula (regardless of their general focus) – this will help protect societies from the most abusive practices followed by over-aggressive financial firms;
- *knowing the way*: electorates should force governments into formulating clear-cut development goals for entire economies and industrial sectors within them – a greater degree of accountability and transparency with help balance financial industry and macroeconomic objectives.

Figure 9 highlights a combination of external (macroeconomic and sectoral) as well as corporate (in-house) measures aimed at creating a sustainable environment for the global financial industry and a high quality of intellectual capital output produced by financial organisations and their executives.

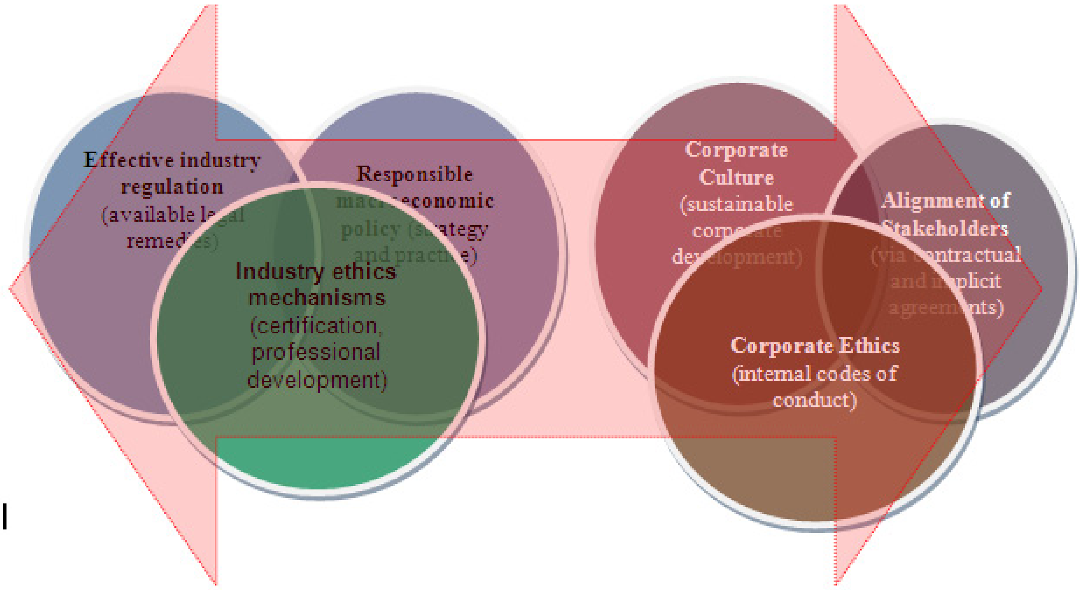


Figure 11: Prerequisites of Intellectual Capital Growth in Financial Organisations

Source: Own elaboration

5 Conclusion

In recent decades certain aspects of global innovation undertaken in financial organisations have proved socially disruptive. This argument can be derived from a quantitative assessment of "financialisation" (the process whereby financial organisations and whole industries overbalance real economies that underlie them), negative social effects of financial sector activity (financial crime, social pathologies and rising perceptions of uncertainty) as well as widespread examples of popular discontent with financial elites, their products and services (mass protests).

Numerous systemic distortions need to be addressed to restore long-term equilibria in financial industries and their institutions. Challenges persist in and outside financial organisations. Critics usually point to those of an external character, whereas a lasting balance can only be achieved from within financial organisations. This can happen by aligning the goals of all corporate stakeholders through convergent motifs/incentives extending beyond a single (electoral, economic or stock market) cycle, fostering attitudes promoting sustainable corporate growth and adherence to professional ethics.

References

Bank for International Settlements (2011), financial derivatives statistics online: http://www.bis.org/statistics/derstats.htm

Bergh van den, J.C.J.M (2007), Abolishing GDP, Vrije Universiteit Amsterdam & Tinbergen Institute, Tinbergen Institute Discussion Paper TI 2007-019/3, Amsterdam, The Netherlands, pp. 2-9.

Brenner, M.H. (1971). Economic Changes and Heart Disease Mortality. American Journal of Public Health, Vol. 61, No. 3 (March), pp. 606-611.

Brenner, M.H. (1975). Trends in Alcohol Consumption and Associated Illnesses: Some Effects of Economic Changes. American Journal of Public Health, No. 65, pp. 1279-1292.

CBOE (2009), The Chicago Board Options Exchange (CBOE) Volatility Index – VIX, Methodology – White Paper: http://www.cboe.com/micro/vix/vixwhite.pdf

Dooley, D. *et al*. (1994). Depression and Unemployment: Panel Fi ndings from the Epidemiologic Catchment Area Study. American Journal of Community Psychology, vol. 22, No. 6, pp. 745-765.

Federal Bureau of Investigation (2011), Financial Crime Reports to the Public 2002-2011: http://www.fbi.gov/stats-services/publications

Federation of World Exchanges (2011), market capitalisation statistics online: http://www.world-exchanges.org/statistics/time-series/market-capitalisation
Gini C. (1912), Variabilità e mutabilità, Memorie di metodologica statistica (Edited by Pizetti E, and Salvemini, T), Rome, Italy.
Google Books (2011), Ngram Viewer, Google Labs: http://books.google.com/ngrams/graph?content=financial%2Ccrisis&year_start=1800&year_end=2008&corpus=0&smoothing=3
HUD (2011), U.S. Department of Housing and Urban Development (HUD) report on "predatory lending" practices in the U.S. economy: http://www.huduser.org/publications/pdf/treasrpt.pdf
Kuznets, S. (1971), Modern Economic Growth: Findings and Reflections, Nober Prize in Economics Lecture: http://www.nobelprize.org/nobel_prizes/economics/laureates/1971/kuznets-lecture.html
Nandi, A. *et al*. (2012), Economic Conditions and Suicide Rates in New York City, American Journal of Epidemiology, Vol. 175 (6), pp. 527-535.
Palley, T.I. (2007), Financialisation: What It Is and Why It Matters, Working Paper No. 525, The Levy Economics Institute and Open Societies, Washington D.C., pp. 2-6.
Piketty, T., Saes, E. (2003), Income Inequality in the United States 1913-1998, The Quarterly Journal of Economics, Vol. CXVIII, Issue 1, pp. 7-18 (.: data updated to 2010): http://elsa.berkeley.edu/~saez/TabFig2010.xls http://emlab.berkeley.edu/users/saez/pikettyqje.pdf
PriceWaterhouseCoopers (PwC), Global Economic Crime Survey (2011), p. 18.
Standard & Poor's (2011), S&P 500 Volatility Index (VIX): "Fear Index" in 1990-2011, available via Yahoo!Finance datasets: http://finance.yahoo.com/q/hp?s=%5EVIX+Historical+Prices
Stengel, R. (2011/2012), Person of the Year – The Protester (Editorial), Time Magazine, (double issue): December 26, 2011/January 2, 2012, pp. 3-6, 17-24, 37-79.
Stiglitz, J. (2012), The Price of Inequality: How Today's Divided Society Endangers Our Future, W. W. Norton & Company, New York, pp. 1-449.
Stuckler *et al*. (2011), Effects of The 2008 Recession on Health: A First Look at European Data, The Lancet, Volume 378, Issue 9786, July 2011, pp. 124 – 125.
Torpey, P. (2011), Arab Spring: an interactive timeline of Middle East protests, The Guardian (online edition): http://www.guardian.co.uk/world/interactive/2011/mar/22/middle-east-protest-interactive-timeline
United Nations (2011), The Global Social Crisis. Report on the World Social Situation 2011, Department of Economic and Social Affairs, New York, pp. 1-129.
Wikipedia (2011): www.wikipedia.com
Wiśniewski, P. *et al.* (2011), Alienation of Financial Markets v Global Economic Prospects, Warsaw School of Economics Rector's Grant (2011); results forthcoming in Warsaw School of Economics Working Papers (in 2012), Warsaw, Poland.
World Bank (2011), financial sector online datasets: http://data.worldbank.org/topic/financial-sector?display=graph

Appendix 1: Selected international mass movements opposed to income inequality, alienation of political elites and financialisation (at year-end 2011)

Country of origin (movement name – if available)	Inception date*	Causes –> Goals	Casualties** death(s)/ injured
Greece	05/05/10	unemployment, inflation, corruption, sovereign debt crisis, International Monetary Fund pressure, harsh austerity measures (including welfare cuts), bipartidism, particracy, democracy deficit –> regime change	4/270
Algeria	01/03/11	inflation, low salaries, unemployment, regressive taxes –> regime change, human rights, democracy	8/420
Jordan	01/07/11	inflation, low salaries, unemployment regressive taxes, ethnic tensions –> democracy	1/70
Tunisia (Tunisian Revolution, Sidi Bouzid Revolt, Jasmine Revolution, Dignity Revolution)	01/14/11	government corruption, inflation, self-immolation of Mohamed Bouazizi, unemployment, lack of liberty –> regime change	224/94
Saudi Arabia	01/21/11	prisoners held without trial, alienation of Shia community, military intervention in Bahrain –> political and economic changes, withdrawal from Bahrain, equality for Shias	6/3
Egypt (Egyptian Revolution, 25 January Revolution, Freedom Revolution, Rage Revolution, Revolution of the Youth, Lotus Revolution, White Revolution)	01/25/11	police brutality, state of emergency laws, electoral fraud, political censorship, corruption, unemployment, food price inflation, low minimum wages, demographic structural factors –> regime change	924/6,467
Yemen (Yemeni Uprising)	02/03/11	unemployment, poor economic conditions, upcoming constitutional amendments, corruption, regional inspirations (Arab Spring) –> resignation and prosecution of A. A. Saleh, new constitution, dissolution of parliament, economic growth, freedom of media	1,870/1,000

Iraq	02/12/11	corruption, lack of national security, low standard of public services, unemployment, Saudi led intervention in Bahrain –> regime change	35/n.a.
Wisconsin, U.S.A. (The 2011 Wisconsin Protests)	02/14/11	opposition to Budget Repair Bill proposed by Governor S. Walker to limit public employee collective bargaining and address state budget shortfall –> defense of existing entitlements	0/0
Syria (Syrian Uprising)	03/17/11	dictatorship, absence of effective constitution, government corruption, unemployment, regional inspirations (Arab Spring) –> resignation of B. al-Assad, democratic reforms, regime change, expanded civil rights, recognition of Kurdish rights, abolition of Supreme State Security Court, lifting of emergency law	6,237/1,857
Bahrain (Bahraini Uprising, February 14 Revolution)	02/14/11	corruption, discrimination against Shias, unemployment, slow progress of democratisation –> resignation of King Hamad, constitutional monarchy, deportation of foreign mercenaries, new constitution, end to economic and human rights violations, equality for Shias, fair elections, freedom	51/1,000
Libya (2011 Libyan Civil War, Libyan Revolution, Libyan Uprising),	02/15/11	crimes against humanity, human rights violations, ethnic tensions, corruption, nepotism, lack of liberty –> regime change, revolution	30,000/50,000
China (Chinese Pro-Democracy Protests)	02/20/11	inspiration with Arab Spring –> access to food, work, housing; judicial independence, property rights, political pluralism, freedom of the media	0/4
Toronto, Canada (Slutwalk)	04/03/11	explaining or excusing rape by referring to any aspect of woman's appearance –> freedom of dress	0/0
Spain (2011 Spanish Protests, 15-M Movement, Indignant Movement)	05/15/11	unemployment, poverty, welfare cuts, political corruption, particracy, unrepresentative bipartidism, democratic deficits –> democracy enhancement, depoliticisation, reducing influence of economic powers in politics	0/310
Tibet	03/16/11	Chinese oppression leads to self-immolation of 12 Tibetan monks, nuns and former clerics –> Tibet independence	12/0
U.K. (2011 Anti-Cuts Protest in London, March for the Alternative)	03/26/11	sweeping budget cuts in wake of parliamentary elections –> opposition to extent and pace of austerity program, showing alternative to cuts (tax reform)	0/66
India (2011 Indian Anti-Corruption movement)	04/04/11	government, police, judicial, corporate corruption, kleptocracy, electoral fraud, red tape, abuse of power, black money –> strong and independent anti-corruption legislation and enforcement, sweeping electoral and judicial reform, crackdown of financial fraud	0/53
Mexico (Mexican Indignados Movement)	03/28/11	Mexican drug war, government and corporate corruption, regressive economic policies, economic and social inequality, poverty –> drug decriminalisation, social democracy	n/a
Chile (Chilean Protests, Chilean Winter)	05/28/11	excessive privatisation of educational sector, limited public access to education –> end to school voucher system: its replacement by state managed/funded public education, end to for-profit schooling, implementation of tax breaks for education	1/500
Israel (Israeli Social Justice Protest, Housing Protest, Cost of Living Protest, Real Estate Protest, Tents Protest, Middle Class Protest)	07/14/11	rising costs of housing and living, government corruption, widespread poverty, widening gap between rich and poor –> improved economic conditions for lower/middle class (lower public housing, living and transportation costs), tax reform, free schooling, end to privatisation	n/a
New York, U.S.A. (Occupy Wall Street, We Are the 99 Percent)	09/17/11	limited rights, homelessness, wealth inequality, no access to high quality medical care, environmental pollution, corporate influence of government, corruption of political elites –> social revolution, civic democracy	n/a
Oakland, U.S.A. (Occupy Oakland)	10/10/11	wealth inequality, corporatism, injuries suffered by protesters clashing with police –> social revolution, civic democracy	n/a/4
Russia	12/05/11	claims of electoral irregularities and vote fraud –> freedom for political prisoners, annulment of election results, new elections, regime change	n/a

Source: R. Stengel, Person of the Year – The Protester (Editorial), Time Magazine, (double issue): December 26, 2011/January 2, 2012, pp. 3-6, 17-24, 37-79; G. Blight, S. Pulham & P. Torpey, Arab Spring: an interactive timeline of Middle East protests, The Guardian (online edition) available at: http://www.guardian.co.uk/world/interactive/2011/mar/22/middle-east-protest-interactive-timeline [retrieved: December 26, 2011]; www.wikipedia.com and web sites of specific movements. (*)Dates in U.S. format (month/day/year), (**) available estimates used.