

UNIVERSITÀ DI FERRARA
DIPARTIMENTO DI ECONOMIA E MANAGEMENT
Corso di
«CREAZIONE DI VALORE AZIENDALE, SOSTENIBILITÀ
E RISK MANAGEMENT»

*Intangibles: Towards a Non-Financial
Measure of Company Performance*

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28 February – 1st March – 7 March 2022

BALANCE SHEET ON JANUARY 31, 1399

FRANCESCO DI MARCO DATINI & Co. IN BARCELONA

ASSETS

Explanation	Barcelonese Currency						Per Cent. of Total
	£	s.	d.	£	s.	d.	
CASH AT BANK AND IN HAND							
Cash in hand	18	17	2				.1
Deposit accounts	1,242	9	8				8.2
Special account	440	0	0				2.9
	<hr/>			1,701	6	10	11.2
RECEIVABLES							
Local tradesmen for goods sold	4,841	14	10				31.9
Local customers for exchange	2,192	19	4				14.5
Local customers for insurance	99	17	11				.7
	<hr/>			7,134	12	1	47.1
BALANCES WITH FOREIGN CORRESPONDENTS							
Venice	1,305	5	9				8.5
Genoa	9	7	7				.1
Avignon		6	0				.0
Montpellier	854	15	1				5.6
Paris	19	5	2				.1
Pisa	980	12	7				6.4
Bruges	1,036	2	7				6.5
Florence	520	10	10				3.8
Perpignan	118	18	5				.8
	<hr/>			4,845	4	0	31.8
DATINI BRANCHES IN OTHER PLACES							
Majorca	88	9	0				.6
Venice	224	16	10				1.4
Florence	211	16	0				1.4
	<hr/>			525	1	10	3.4
INVENTORIES							
Goods in stock				288	0	9	1.9
FIXTURES							
Office furniture	95	0	0				.6
Martha, our slave (<i>Marta, nostra schiava</i>)	30	0	0				.2
	<hr/>			125	0	0	.8
MISCELLANEOUS							
Sundry deferred charges and supplies	112	1	10				.7
Drawing account Simone d'Andrea	25	0	2				.2
Shortage in cash	38	13	0				.3
Sundry adjustments for errors	17	18	6				.1
	<hr/>			193	13	6	1.3
BAD DEBTS				384	7	3	2.5
UNTRACED ERROR IN CASTING THE BALANCE				11	9	1	.0
Total	<hr/>			15,208	15	4	100.0

BALANCE SHEET ON JANUARY 31, 1399

FRANCESCO DI MARCO DATINI & Co. IN BARCELONA

LIABILITIES

<i>Explanation</i>	<i>Barcelonese Currency</i>						<i>Per Cent. of Total</i>
	£	s.	d.	£	s.	d.	
PAYABLES							
Local merchants (mostly acceptances)				1,951	2	9	12·8
BALANCES WITH FOREIGN CORRESPONDENTS							
Majorca	586	5	6				3·8
Valencia	865	1	9				5·7
Perpignan	3	11	2				·0
Montpellier	91	0	10				·6
Paris	297	0	0				2·0
Bruges	2,848	18	9				18·7
Bologna	570	7	6				3·8
Florence	2,090	12	10				13·7
Genoa	666	12	11				4·4
Pisa	182	7	1				1·2
Venice	59	10	6				·4
				8,261	8	10	54·3
DATINI BRANCHES IN OTHER PLACES							
Florence	804	19	1				5·3
Genoa	1,037	13	11				6·8
Avignon	32	17	8				·2
Majorca	510	11	6				3·4
Valencia	171	11	3				1·1
				2,557	13	5	16·8
CONSIGNMENT SALES				828	7	9	5·5
RESERVE FOR ACCRUED TAXES AND CONTINGENCIES				80	0	0	·5
OWNER'S EQUITY							
Francesco di Marco Datini da Prato				768	6	8	5·1
→ Net profit on merchandise and exchange	751	10	7				4·9
Later adjustment	10	5	4				·1
				761	15	11	5·0
Total				15,208	15	4	100·0

Source : Datini Archives, Prato (Tuscany), No. 1165.

STATEMENT OF PROFIT and LOSS,
JULY 11, 1397 – JANUARY 31, 1399

FRANCESCO DI MARCO DATINI & Co. IN BARCELONA

(In Barcelonese Currency)

	£	s.	d.
Profits on trade (<i>Pro di mercatantie</i>)	689	11	5
Profits on foreign exchange (<i>Pro di cambio</i>)	262	4	0
Credit balance of merchandise expense (<i>Spese di mercatantie</i>)	133	13	7
Total of gross profits	1,085	9	0
Deduct expenses:	£	s.	d.
Rent for eighteen months	60	0	0
Irrecoverable account	3	8	0
Convoy expenses (<i>guidaggio</i>)	67	12	0
Living expenses	106	1	5
Depreciation on office equipment	16	17	0
Reserve for unpaid taxes and other accruals (<i>riserbo di spese di lelde a pagare e altre spese</i>)	80	0	0
Total expenses	333	18	5
 Net income	751	10	7

AGENDA

- 1) Intangibles, risks and the new economic environment
- 2) The traditional measurement approach to intangibles (The “problem”)
- 3) International initiatives. The WICI contribution
- 4) Some concluding remarks

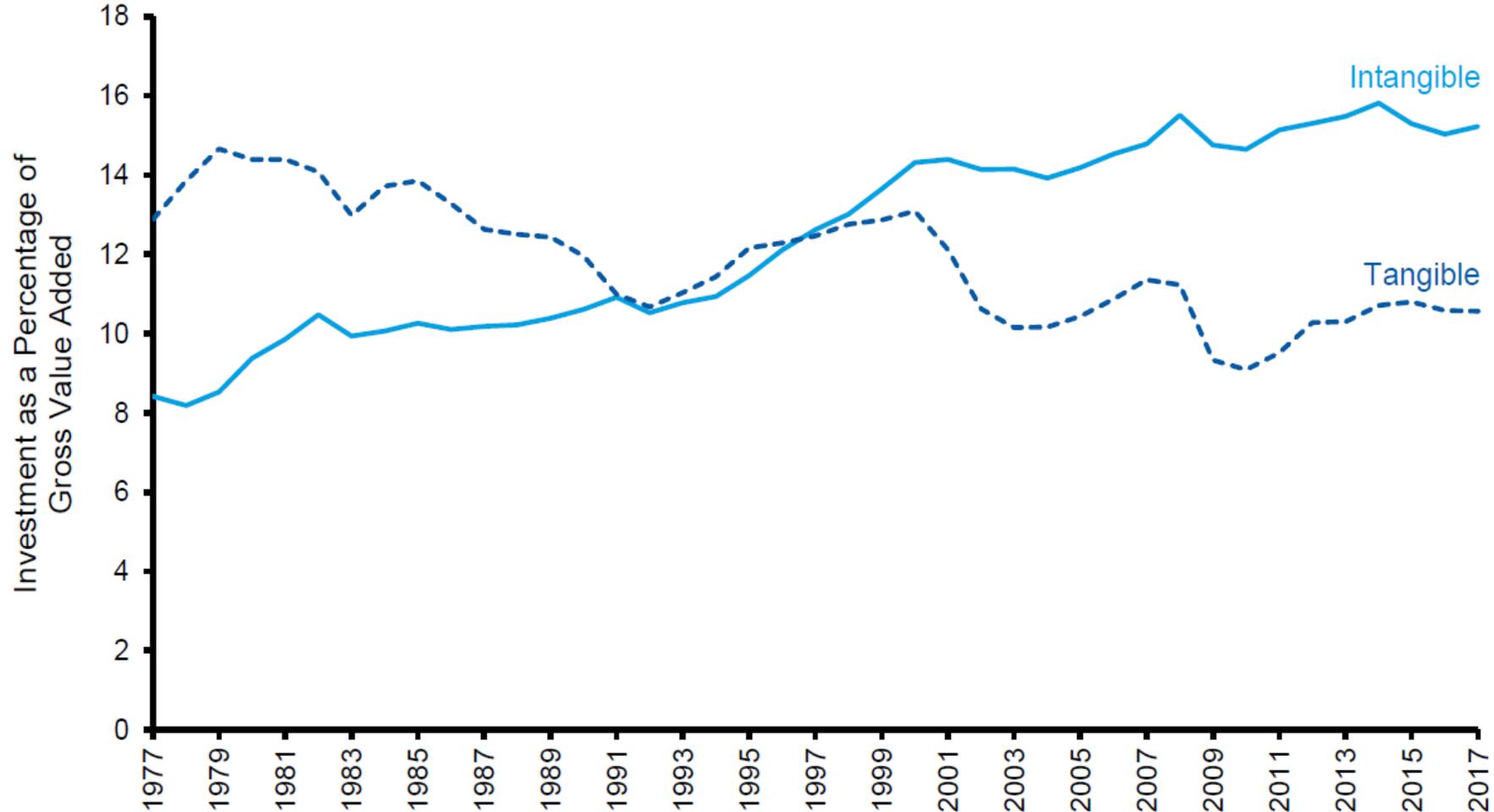


1. INTANGIBLES, RISKS AND THE NEW ECONOMIC ENVIRONMENT

The Rise of an Interest in Intangibles

- From “land, capital, labour” to “knowledge, (financial) capital, technology” → so-called “knowledge economy”
- Progressive change in the bases of creation of firm value
 - from industrial to post-post-industrial economy (advanced service firms/technology)
 - post-fordist, interactive mode of production
 - decentralization/diffusion of knowledge
- From unidimensional to multidimensional performance drivers for an organisation’s survival & growth
- Obsolescence of traditional accounting systems (S&P 500 → Market-to-Book Ratio \cong 2 to 4) → several scholarly studies point out the declining relevance of accounting information (Lev & Zarowin, 1999)

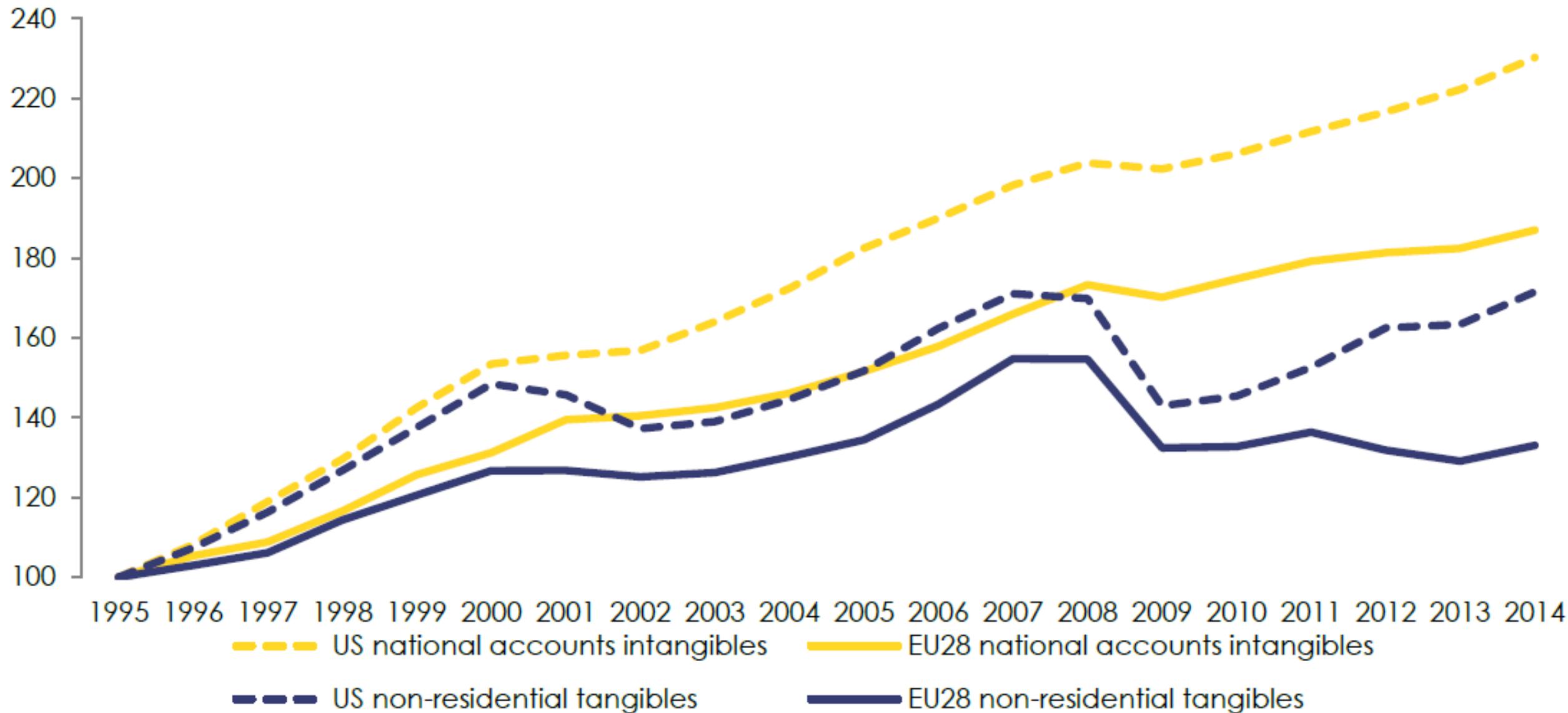
The Intangibles-Tangible Widening Gap



Source: Unpublished update to Corrado and Hulten (2010) using methods and sources developed in Corrado and Hao (2013) and in Corrado et al. (2016) and Corrado et al. (2017) for INTAN-Invest© and the SPINTAN project, respectively. The SPINTAN project was funded by the European Commission FP-7 grant agreement 612774.
Note: Investment as a percentage of gross value added for the business sector.

Source: Carol Corrado & Charles R. Hulten

Graph 1: Non-residential intangible and tangible investments in the EU-28 and the U.S., total economy;
Chain linked volumes, index 1995 = 100

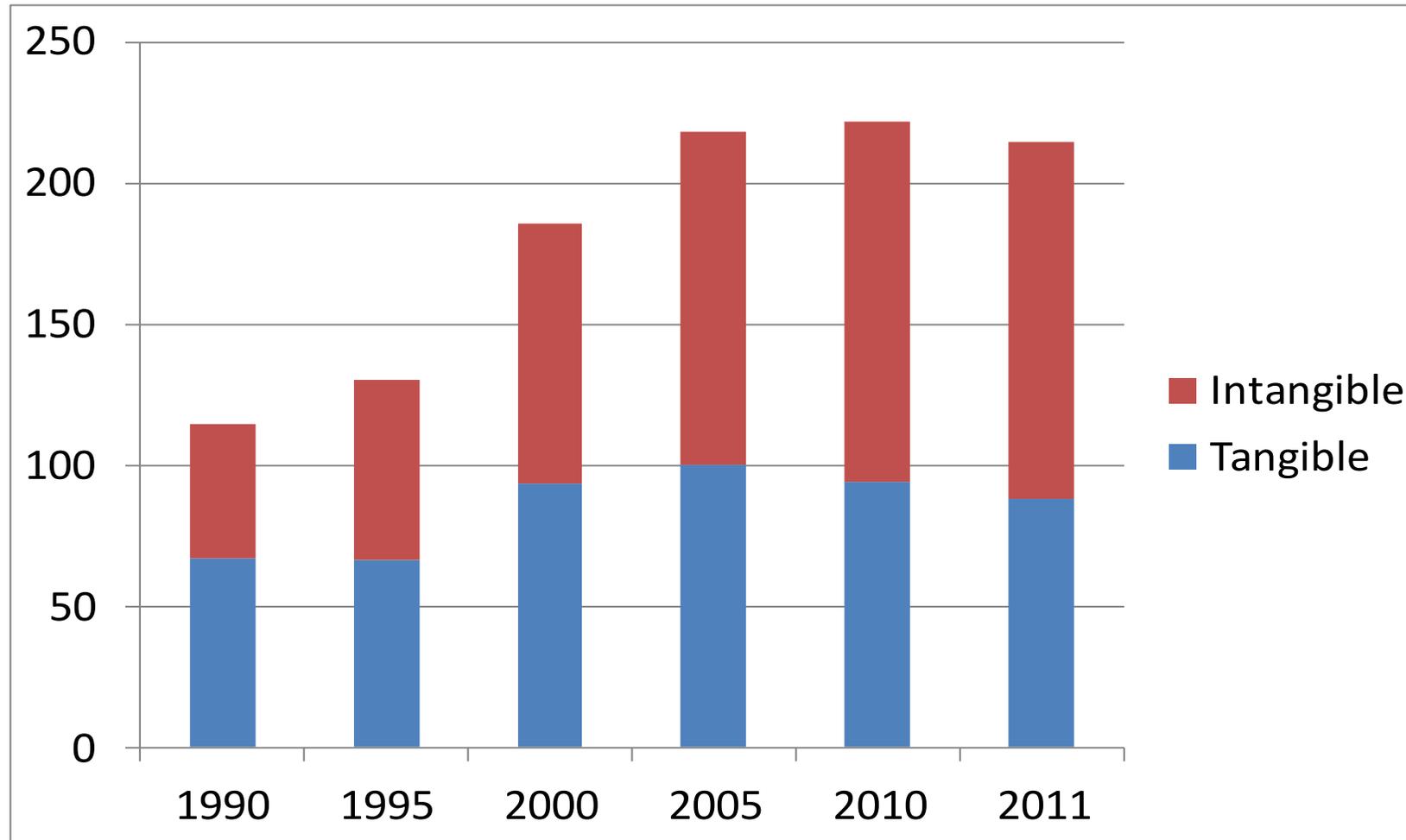


Source: Thum-Thyssen et al., European Commission, 2017, p. 12.

Intangible investment dominates

£ billion
nominal

UK Market Sector investment



Knowledge investment by firms for future returns:

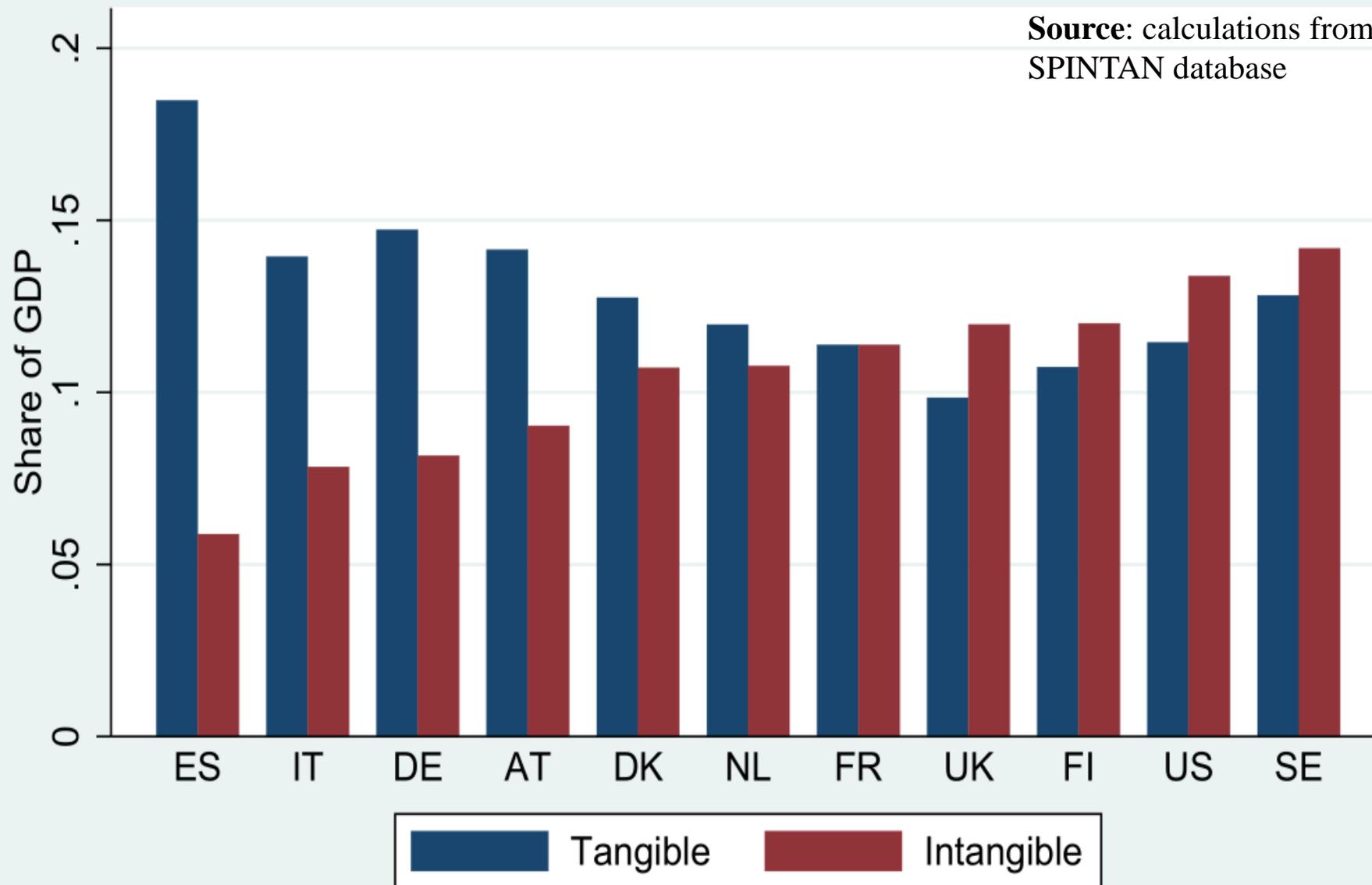
- Software, Creative works, R&D, Designs, Business organisation / processes, Workplace skills, Reputation / brands

Source: UK Investment in Intangible Assets and IPRs, Haskel et al., Sept. 2014

Tangible and intangible shares of GDP

(Averages, 1999-2013)

Source: calculations from SPINTAN database



Note: Ranked by intangible share. GDP adjusted to include intangibles. Data for whole economy.

Tendenze di fondo a livello aziendale

- Verso la “conceptual company” → Importanza crescente della conoscenza che alimenta rilevanza degli intangibles che sono quasi tutti legati a forme di conoscenza) → legame «genetico» tra intangibili e conoscenza
- La rivoluzione digitale («**Industria 4.0**») allarga il ruolo/peso degli intangibili
- Aspetti strategici oggi → business model, R&D e innovazione, marketing e rapporti con la clientela, marchi e brevetti, know-how, capacità imprenditoriali e manageriali, competenze organizzative e personali → tutti fattori intangibili
- Intangibili sono quindi le leve cruciali (*drivers*) per la creazione di valore sostenibile nel tempo → intangibili raggruppabili in **capitale umano, capitale organizzativo e capitale relazionale-sociale**
- Capacità di creare valore nel tempo legata dunque alla **conoscenza** presente nell'azienda e alla **capacità di coniugare assieme** esigenze di business, risorse intangibili e vincoli/opportunità di natura socio-ambientale

Importance of intangibles

Instagram at time of \$1B purchase

No revenue

Virtually no assets

12 employees



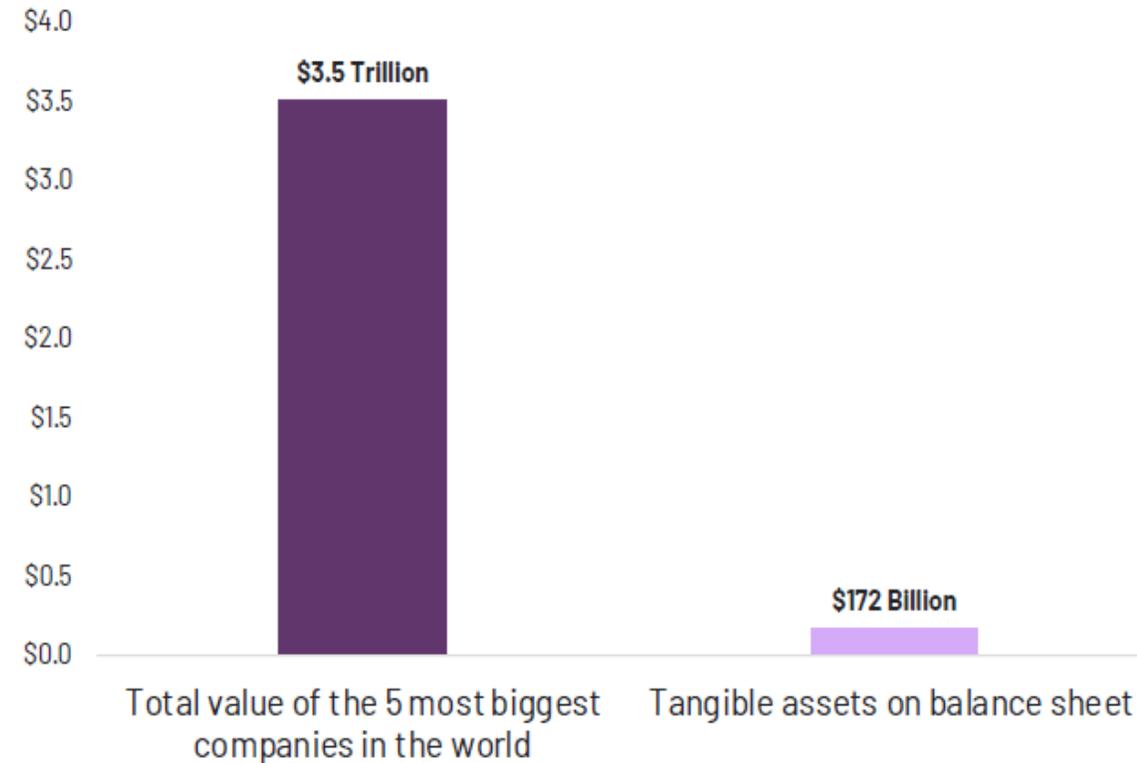
Estimates of Instagram's worth today

\$100B

COMPONENTS OF S&P 500 MARKET VALUE



Tangible vs. intangible assets



Towards the Conceptual Company

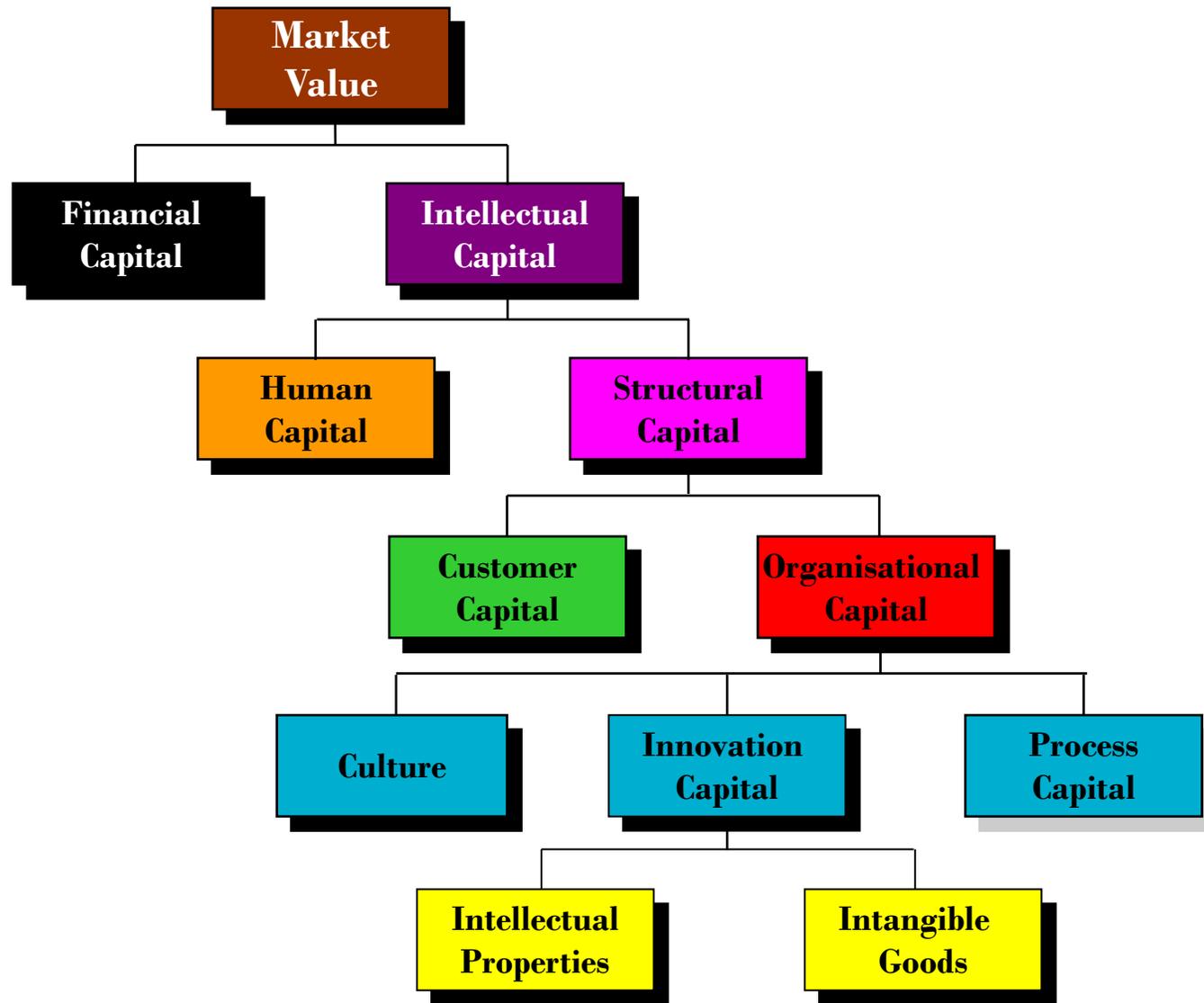
- Negligible physical assets (low PP&E, inventories)
- Intangibles-intensive: R&D, brands, alliances, human resources, organization capital
- Strong patent/trademark protection
- Extensive outsourcing of manufacturing, distribution and other low-knowledge functions
- Extensive trade in intellectual property (IP): patent sale and licensing, know-how sale
- Flexible business model

Definizione di intangibili

- Le attività intangibili → fonti di benefici futuri non dotate di corporeità fisica:
 - **Proprietà intellettuale** → intangibili con diritti legali (es. copyrights)
 - Nella definizione inclusi intangibili legati alla **innovazione** (brevetti), al **mercato** (marchi), alle **risorse umane** (capacità e competenze, addestramento e formazione), e all'**organizzazione** (sistemi di compensazione, procedure informatiche, routines, struttura)
 - “**Hard**” intangibles (separabili/negoziabili su un mercato) vs. “**Soft**” intangibles (non separabili/cedibili su un mercato)

Il concetto di Capitale Intellettuale

- Capitale intellettuale – CI – ricomprende gli **intangibili interni** (competenze, skills, capacità, procedure, ecc.) ed **esterni** (immagine, marchi, customer satisfaction, alleanze, ecc.) che sono dinamicamente inter-relati e **disponibili per un'organizzazione**, e che consentono ad essa di trasformare un insieme di risorse materiali, finanziarie e umane in un sistema capace di perseguire una creazione di valore sostenibile (WICI Intangibles Reporting Framework, 2016)
- Il capitale intellettuale → concetto che abbraccia gli intangibili **disponibili (a volte anche controllati)** e utilizzati nei processi



Source: *Intellectual Capital Report, Skandia, 1998*

The Disaggregation of the Market Value

Gestione e vulnerabilità degli intangibili

- Gli Intangibili rappresentano una ricchezza aziendale “nascosta”, di cui c’è poca consapevolezza → vanno quindi **conosciuti, gestiti e “protetti”**
- Molto tempo per costruirli e poco tempo per perderli
- Necessità di monitorare il loro livello e il loro valore per evitare che essi “**evaporino**” → rischi elevati e ritorni incerti
- L’esempio più calzante è quello della **reputazione**, che è un fondamentale punto di forza per l’azienda, ma che può trasformarsi in una passività, se non continuamente supportata dalla qualità della ricerca, dei prodotti, del servizio e delle risorse umane



2. THE TRADITIONAL MEASUREMENT APPROACH TO INTANGIBLES (THE “PROBLEM”)

Traditional Accounting for Intangibles

(e.g. International Accounting Standard no. 38)

- General suspicion of accountants towards intangibles
- No reliable measure = no accounting recognition
- No recognition possible for internally generated intangibles (e.g. R&D, Brands, Training)
- Conservative measurement criteria → general principle: immediately expensed as a cost
- Goodwill is too a synthetic representation of intangibles
- In general, rather poor information on long term growth drivers (key performance indicators – KPIs)

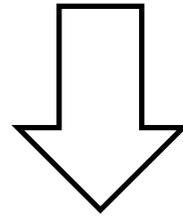


What is Happening?

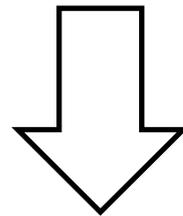
- Intangible assets account for 50-65% of corporate value, and generate most of its earnings and growth.
- Yet, due to old-fashioned accounting rules, intangibles are not recognized as assets. Ex.: Pfizer's office and lab buildings and equipment are recognized as assets, but its patents on drugs are not. Earnings are really mis-stated too
- Negative consequences are serious:
 - value measures (e.g., market-to-book ratio) are biased,
 - performance measures (ROE, ROA, EVA) are deceiving, and
 - the prediction of future earnings and cash flows is largely flawed
- Also internal corporate resource allocation is seriously distorted by deficient information about intangibles.

La questione di base

Aziende hanno necessità di conoscere e gestire i propri intangibili per gestire in modo più consapevole i propri processi di creazione di valore

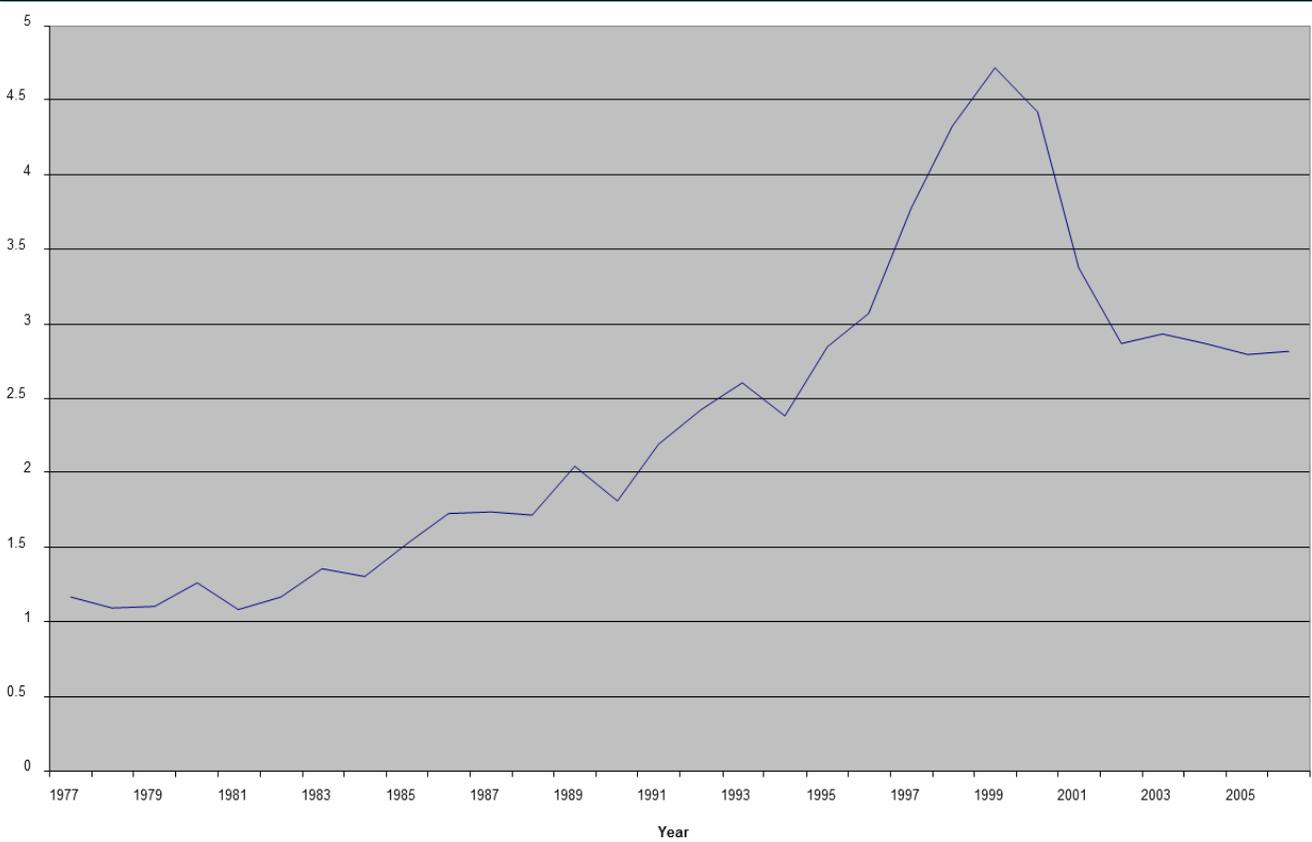


L'informazione è necessaria per una gestione razionale e consapevole

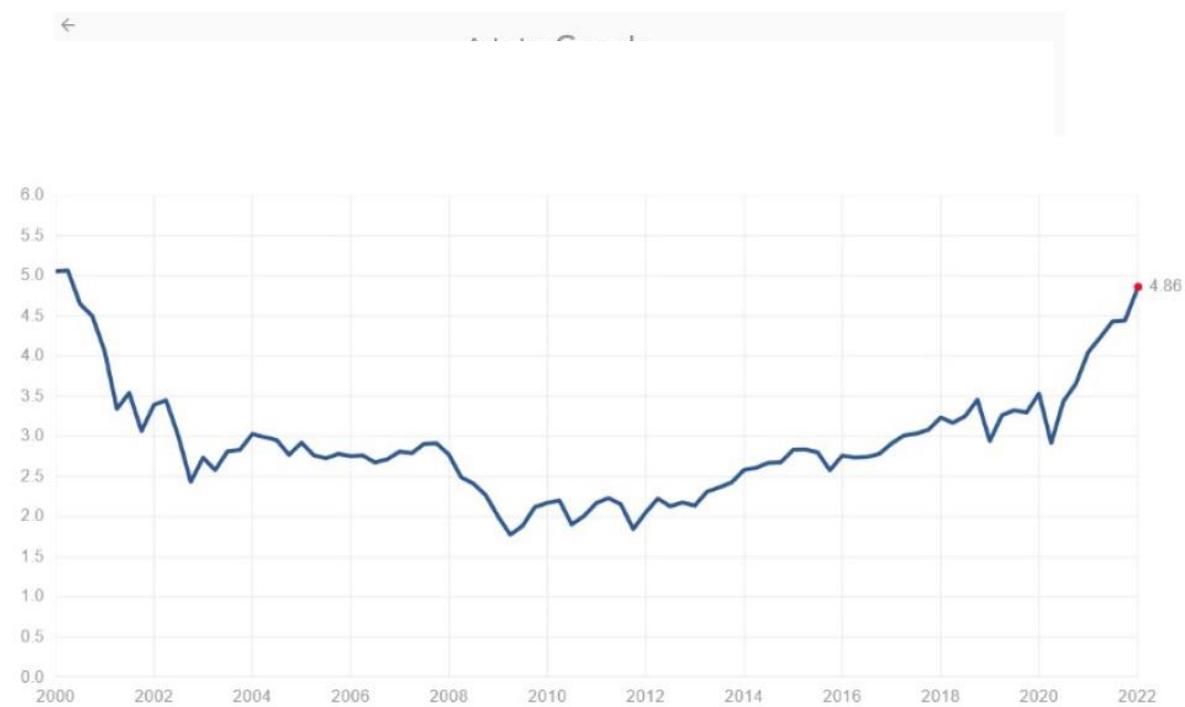


Vi è un'evidente e dannosa carenza di informazioni rilevanti, strutturate, sistematiche, affidabili (audited) e comparabili

Indice S&P500 – Valore borsistico/valore contabile: 1977-2022



S&P 500 Price to Book Value



Current S&P 500 Price to Book Value: 4.86 +0.01 (0.29%)

3:13 PM EST, Thu Jan 6

- Mean: 2.90
- Median: 2.79
- Min: 1.78 (Mar 2009)
- Max: 5.06 (Mar 2000)

Aspiag Service srl/Despar Nordest – Stato patrimoniale pro-forma 2013

Stato patrimoniale *pro forma* con valorizzazione capitale intangibile

ATTIVO	31/12/2013	%
Immobilizzazioni immateriali	128.081.573	7,95%
Capitale Intangibile	545.000.000	33,84%
di cui:		
Capitale Umano	235.000.000	
Capitale Relazionale	146.000.000	
Capitale Organizzativo	164.000.000	
Immobilizzazioni materiali	511.964.294	31,79%
Immobilizzazioni finanziarie	78.058.890	4,85%
Altre attività immobilizzate	23.534.241	1,46%
Totale Attivo Immobilizzato	1.286.638.998	79,90%
Totale Attivo Corrente	323.685.007	0
TOTALE CAPITALE INVESTITO	1.610.324.005	100,00%
PASSIVO	31/12/2013	%
Capitale Proprio	906.315.093	56,28%
Totale Passività Consolidate	276.562.469	17,17%
Totale Passività Correnti	427.446.443	26,54%
TOTALE FONTI DI FINANZIAMENTO	1.610.324.005	100,00%

Ma con quali conseguenze?

- A causa di regole contabili “arcane e arcaiche”, gli intangibili non sono riconosciuti nella maggior parte dei casi come asset in bilancio.
Ad es., gli immobili e i fabbricati della Pfizer e i suoi macchinari sono riconosciuti come asset, mentre i brevetti relativi ai suoi farmaci non lo sono. **Gli utili sono dunque miscalcolati.**
 - Ne derivano **serie conseguenze negative**:
 - le misure di valore (es. rapporto tra valore borsistico e valore contabile) ne risultano sfavorevolmente affette;
 - le misure di performance (ROE, ROA, EVA) sono fuorvianti; e
 - le proiezioni di utili e flussi di cassa futuri sono ampiamente errate.
 - Anche **l’allocazione delle risorse all’interno dell’impresa** è seriamente distorta dalle carenze informative inerenti agli intangibili
-

Nuovo scenario e nuove forme di reporting

- In questo quadro in forte evoluzione, il tradizionale bilancio d'esercizio presenta limiti informativi e offre un'immagine rilevante ma parziale. Performance oggi non può più riassumersi semplicemente nella massimizzazione dell'utile e dei flussi di cassa disponibili → concetto molto più sfaccettato e complesso
- Dal bilancio economico-finanziario non si comprendono gli impatti dell'azienda sul contesto socio-ambientale (le c.d. «esternalità»)
- A fronte di un'economia quale quella odierna, sempre più fondata sulla conoscenza e su risorse soft, vi sono **poche informazioni e misure sugli intangibili aziendali**, specie se internamente generati (ad esempio, marchi, brevetti, reputazione, competenze e skills, procedure, relazione con la clientela, alleanze, customer ed employee satisfaction, ecc.)

Nuovo scenario e nuove forme di reporting (2)

- Il tradizionale bilancio d'esercizio presenta limiti informativi e offre un'immagine rilevante di natura finanziaria, ma parziale → **intangibili trattati come costi anziché come investimenti**
- Dal bilancio si può comprendere – seppur con tutti i suoi limiti – la situazione finanziaria e il valore creato, ma sfuggono le ragioni alla base della capacità di un'azienda di produrre valore nel presente e nel futuro → sfuggono gli intangibili aziendali (es. marchi, brevetti, reputazione, competenze e skills, procedure, relazione con la clientela, alleanze, leadership, ecc.) → **perché e come un'azienda crea valore nel breve e medio-lungo periodo?**

Nuovo scenario e nuove forme di reporting (3)

- Peraltro, il concetto stesso di valore viene a mutare, ampliandosi e riferendosi non solo al capitale e ai rischi di tipo finanziario →
 - ad es., un'impresa può andar bene dal punto di vista economico-finanziario, ma avere la sua reputazione con i clienti e il suo rischio climatico in rapido peggioramento → inoltre, valore solo per l'azienda oppure valore (anche) per gli stakeholder e la società nel suo complesso?

The Arguments Against a Change

- *No one wants it.* Ex.: FASB claims that surveys of managers and investors do not detect enthusiasm for change
- *No harm done.* Companies have no problems raising capital for intangible investments within current accounting standards.
- *It's very difficult.* Intangibles are hard (impossible) to value. Amortization rates difficult to come by. They differ from industry to industry.
- *Increased manipulation.* The uncertainty about intangibles' values provides managers additional tools to manipulate earnings and asset value.

Wiley Finance Series

The **End** of **Accounting**

*and the Path Forward for
Investors and Managers*

BARUCH LEV
FENG GU

WILEY

In July 2016, Professors Baruch Lev (NYU) and Feng Gu (Buffalo) publish an important and controversial book, where the problems with today's accounting are analysed and a new way forward is proposed

The Winter of Our Discontent*, i.e. many calls for an accounting reform

- ❖ “There is a widely-held view that financial reporting disclosures need to be reformed. Views differ on what exactly the problem is, but few people seem to be happy with the current position.” (ICAEW, Financial Reporting Disclosures..., 2013).
- ❖ SEC’s current Disclosure Effectiveness project: “... considering ways to improve the disclosure regime for the benefit of both companies and investors.”
- ❖ “FASB rules produce financial statements that virtually no one understands.” DiPiazza et al., 2006 (CEOs of six largest accounting firms).

Already in early 1990’s → “Jenkins Report” in the USA

*William Shakespeare, Richard III (+ Steinback’s novel).

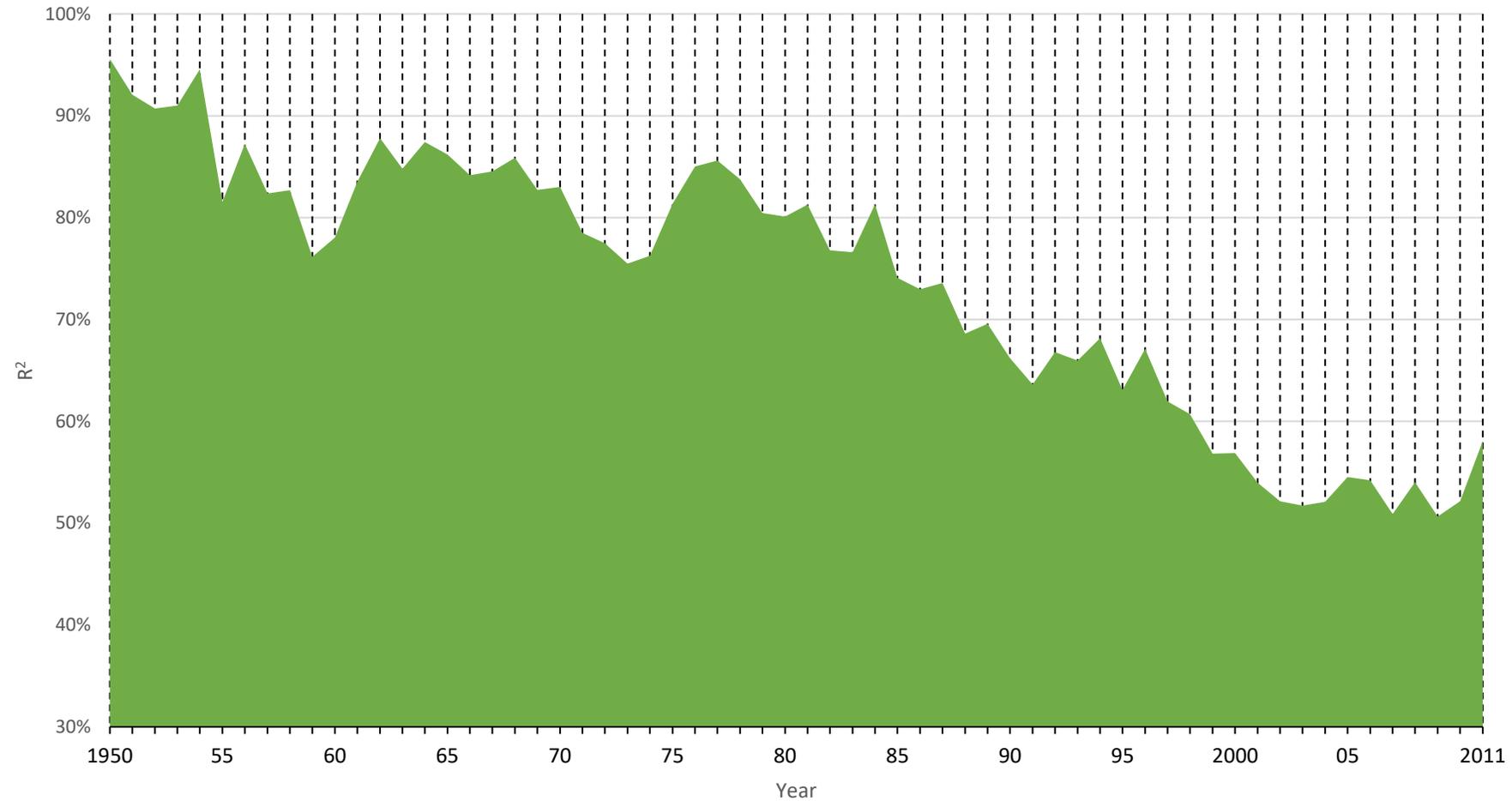
Some Facts

- The evidence on the fast-shrinking usefulness of financial information
- The major reasons for the accounting fade (none dealt with by regulators).

Accounting Information and Stock Prices: A Decreasing Relationship

Figure 3.4: The Deteriorating Usefulness of Financial Information

R^2 from regression of companies' market value on their sales, cost of goods sold, SG&A expenses, earnings, total assets, and total liabilities, all companies, 1950-2013



New Methodology: Focus on Incremental (Timely) Information

Figure 4.1: The Increasing Contribution to Investors of All Company-Related Information (Top Curve) and the Decreasing Contribution of Financial Information (Bottom Curve)

Percentage of all information used by investors jointly contributed by: analysts' and managers' forecasts, important non-accounting events, and financial reports (top curve), and financial reports only information (bottom curve), all firms, years 1993-2012

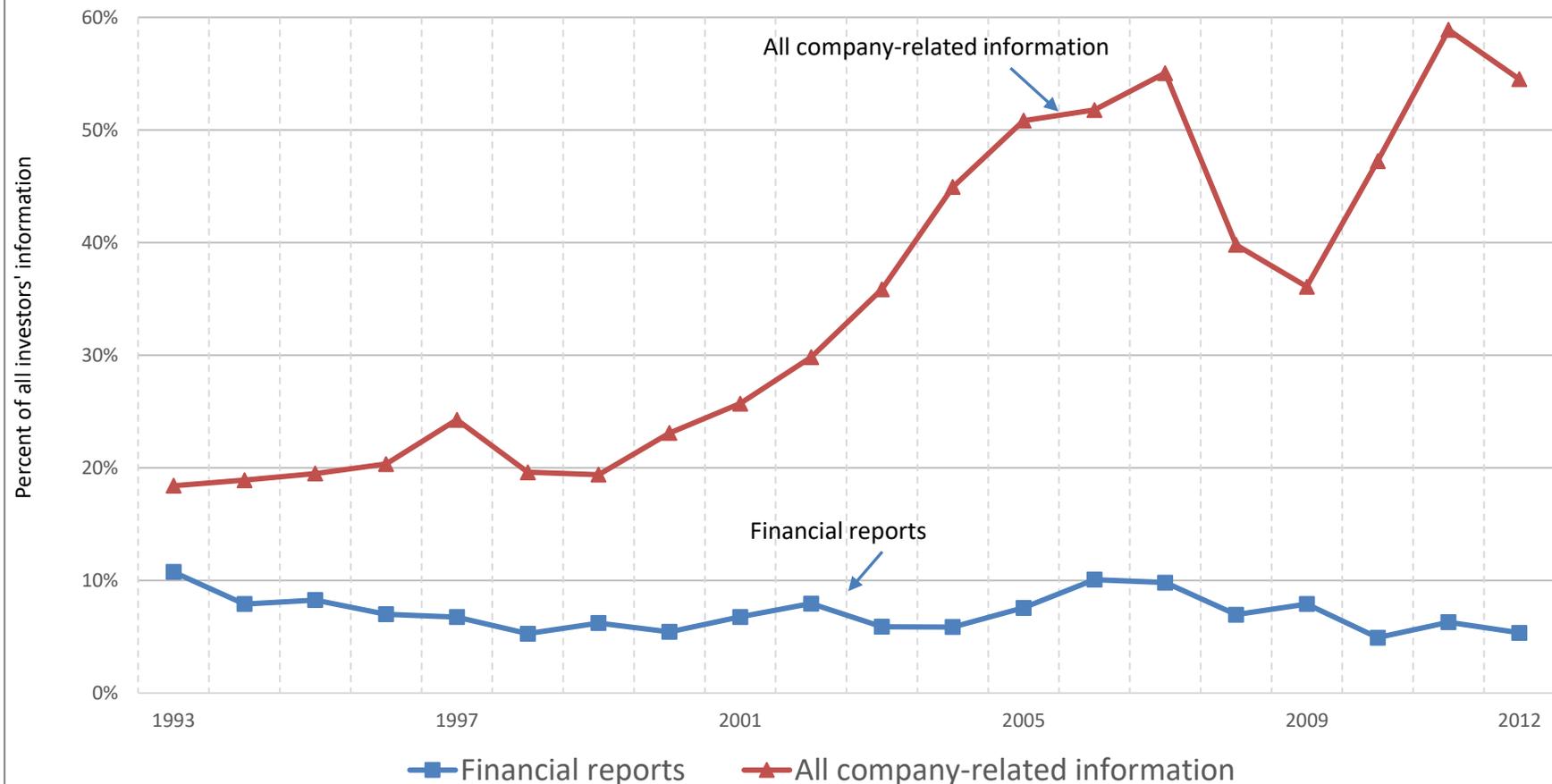
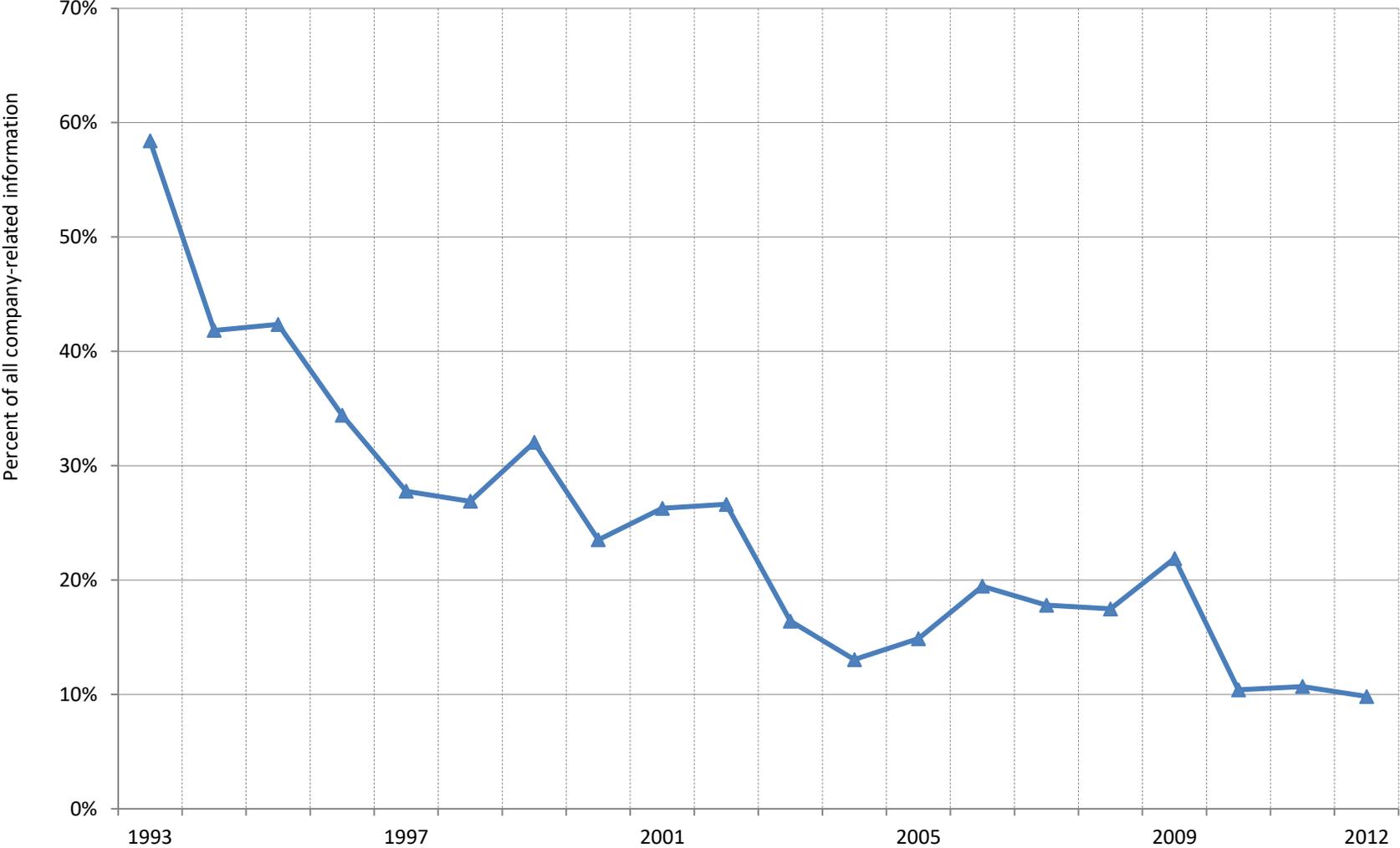


Figure 4.2: The Decreasing Contribution of Financial Reports to All Company-Related Information Used by Investors



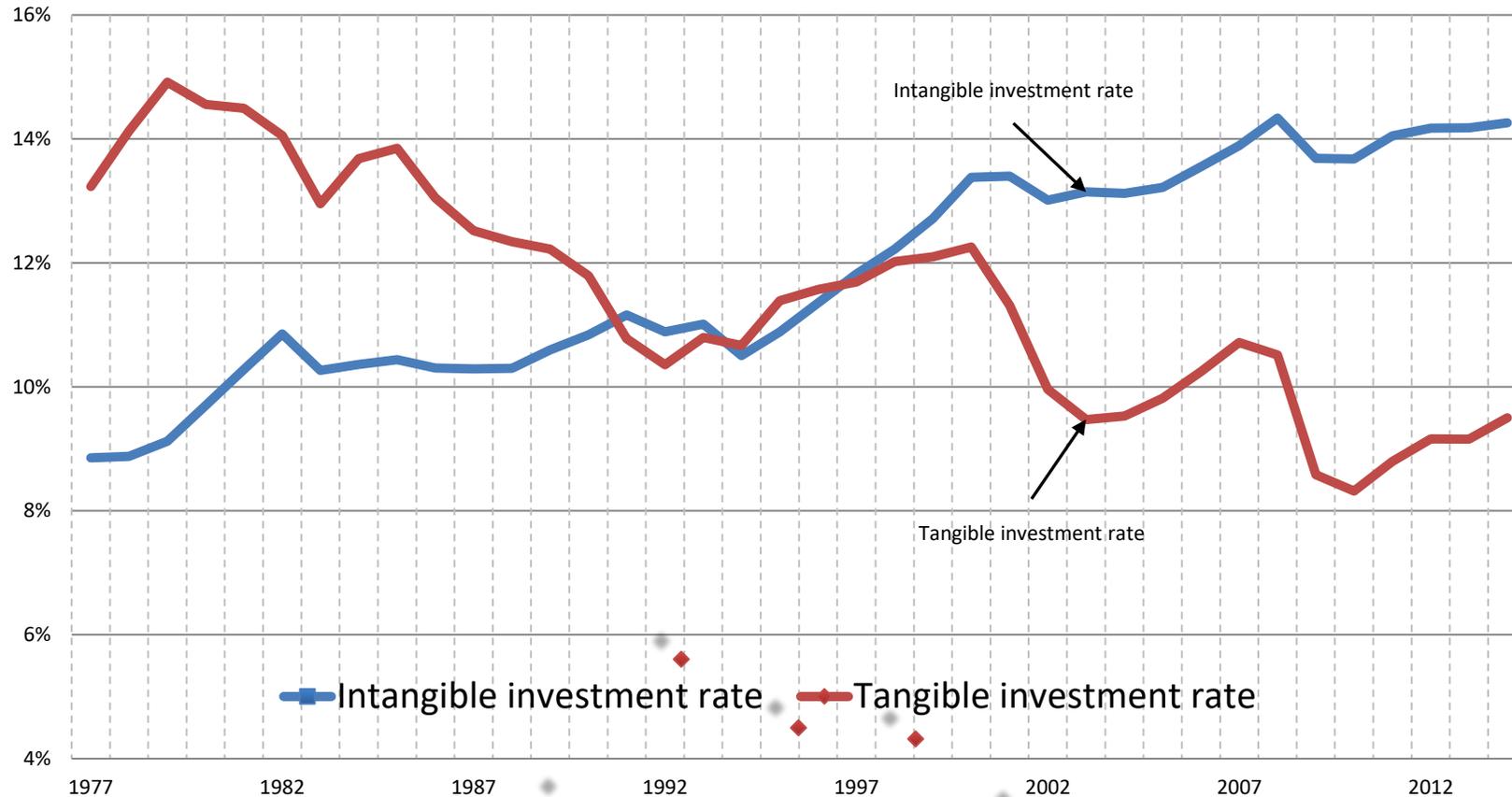
Why is this happening?

Three main causes:

- Intangibles
- Estimates
- Increasing importance of non-accounting events

The Rise of Intangibles and Fall of Accounting

Figure 8.1: The Intangibles Revolution: U.S. Private Sector Investment in Tangible and Intangible Capital (relative to Gross Value Added), 1977-2014



Source: Carol Corrado & Charles R. Hulten

The Pervasiveness of Estimates

- Most financial statement items (accounts receivable, inventory, fixed assets, sales of long term products, pension expense, etc.) are based on managers' estimates and forecasts; often multiple estimates.
- These estimates and the consequent reliability of financial information are increasingly challenged by:
 - Deregulation, globalization, and fast technological changes, all enhancing business uncertainty, and making accounting forecasts (asset write-offs, options expense) increasingly difficult.
 - Managers' manipulation of financial information by misestimates and biased forecasts. They can do it with impunity.

Investors Unable to Assess Impact and Reliability of Estimates

- As an example → GE, 2010 Financial Report:
“We **estimate** total long-term contract revenues... We measure long-term contract revenues by applying our contract-specific **estimated** margin rates to incurred costs. We routinely update our **estimates** of future costs for agreements in process... We provide for any loss that we expect to incur on these agreements when the loss is **probable**.”

Shouldn't investors know how much of GE's total 2010 revenue of \$150 billion is based on estimates?



3. INTERNATIONAL INITIATIVES. THE WICI CONTRIBUTION

A series of European initiatives at an institutional level

- 2002-2003: Official Study for the European Commission (DG Enterprise) on “The Measurement of Intangible Assets and Associated Reporting Practices”

Partners:

- University of Ferrara (lead partner)
- New York University (Prof. Baruch Lev)
- Melbourne University (Prof. Margaret Abernethy)

http://ec.europa.eu/enterprise/services/business_related_services/policy_papers_brs/intangiblesstudy.pdf

A series of European initiatives at an institutional level (cont'd)

2005-06: European Commission's (DG Research) study on IC reporting to increase R&D in SMEs and help these companies to access bank credit (RICARDIS) → published in June 2006

“Reporting Intellectual Capital to Augment Research, Development and Innovation in SMEs (RICARDIS)”, (cf. http://ec.europa.eu/invest-in-research/pdf/download_en/2006-2977_web1.pdf)

European Union initiatives

(cont'd)

- 2001-3: Research projects “PRISM” and “MERITUM” on Intangibles and their reporting
- 2005: Study by the DG Enterprise on the feasibility of a European repository of company data on intangibles
- 2006-7: Funding of the Research Project “Incas” devoted to IC Reporting in SMEs
- 2006-10: MUSING (Multi-Industry Semantics based Next Generation Business Intelligence)
- 2010: Study on the creation of a financial market for the securitisation of intellectual property



A series of European initiatives at an institutional level (cont'd)

April-May 2014: European Commission (DG Research) has published the Report by an Expert Group on “Intellectual Property (IP) Valuation” dealing also with reporting aspects

Some international developments in IC Reporting

The Intellectual Assets-based Management (IAbM) initiative by the Japanese Government and business community is strong and continuing since the last 7-8 years (cf. “Intellectual Asset Week”)

Interest by World Bank on Regional/Cities/
/Communities IC → Annual Conference in Paris

Research in this area by the Organisation for Economic Cooperation and Development (OECD) is always high (cf. last report on “Knowledge Economy”)

Also the World Intellectual Property Organisation (WIPO) is addressing the “IC Readiness” issue

Some international developments in IC Reporting

(cont'd)

1st International OECD Policy Conference in collaboration with the University of Ferrara & WIPO (Ferrara, 20-22 October 2005) → cf. www.ferraraonintangibles.net

2nd International OECD Policy Conference in collaboration with the METI of the Japanese Government (Tokyo, 7-8 December 2006)

Four conclusions of OECD work on corporate reporting (2008)

1. Necessity to provide taxonomies value-relevant for investors and managers
2. Necessity to develop *global* business reporting frameworks that are sector-specific, supported by KPIs and related XBRL taxonomies
3. Necessity to improve incentives for financial analysts to follow small IA-based companies
4. Necessity to consider the risks of managing IA & to systematically and specifically disclose risk issues (no more “boilerplate disclosures”)

Some recent international developments in IC Reporting (cont'd)



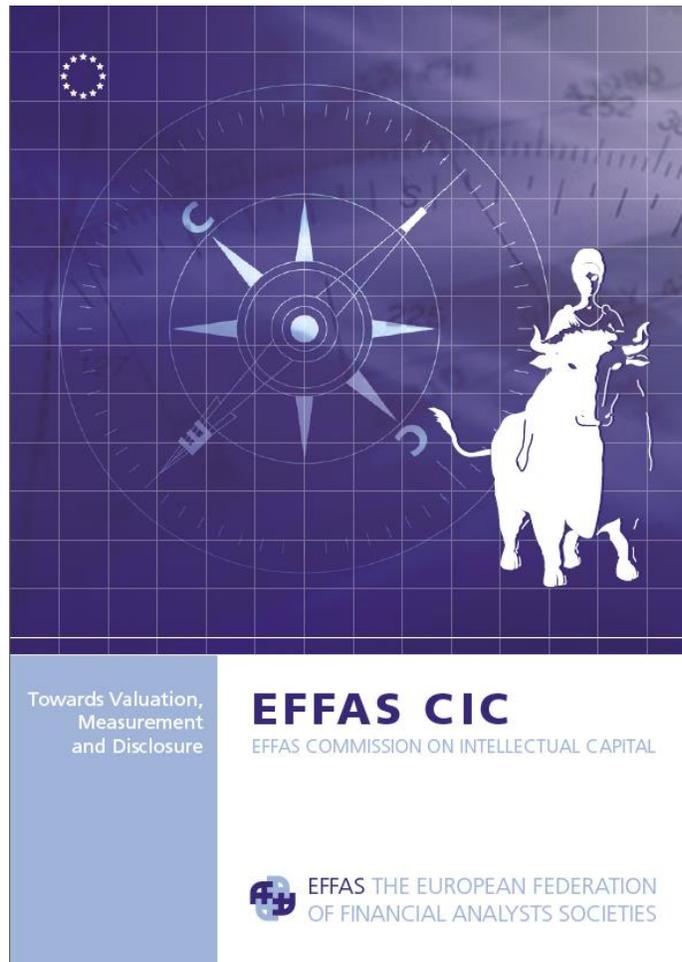
Increase in the interest of statistical agencies at national and international level → e.g. U.S. Federal Reserve, UK Statistical Office, Eurostat → “Growth Accounting” approach

The United Nations International Conference in New York, 23-24 June 2008 on “Information Gaps at Micro- and Macro-Level” → session on IC information and reporting

Principal Guidelines on IC Reporting

- IFAC, Study no. 7 (1998)
- Danish Agency for Trade and Industry (DATI) Guidelines (2000; latest edition 2003)
- Nordika Project Guidelines (2001)
- Meritum Project Guidelines (2002)
- German Ministry of Labour (2004, 2006, 2008)
- Japanese Ministry of Economy (METI) (2005-08)
- Australian IC Guidelines (2002 e 2005)
- Putting IC into Practice Guidelines (PIP) by Nordic countries (2006)
- “Référentiel français de mesure de la valeur extra-financière du capital immatériel des entreprises” by Observatoire de l’Immatériel (Oct. 2011)

Ten principles for effective communication of IC



**Why and how
the financial community
should tackle intangibles
– now**

EFFAS/CIC Principles

1. Clear link to future value creation
2. Transparency of methodology
3. Standardisation
4. Consistency over time
5. Balanced trade-off between disclosure & privacy
6. Alignment of interests between company & investors
7. Prevention of information overflow
8. Reliability and responsibility
9. Risk assessment
10. Effective disclosure placement and timing

EFRAG

Research project on better information on intangibles

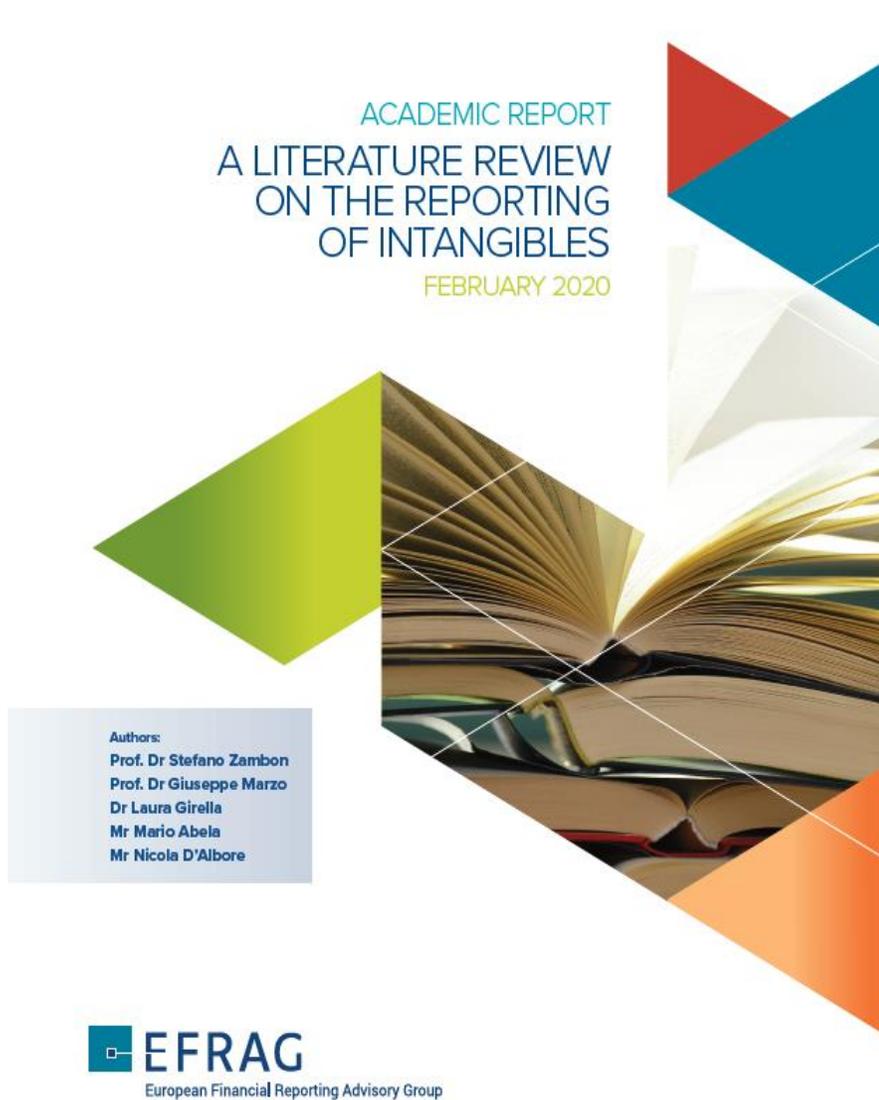
In August 2018, EFRAG has launched a new project with the aims of:

- explaining how entities report on creating, maintaining and/or improving their value;
- explaining how users consume information on creating, maintaining and/or improving value, and the extent to which current reporting addresses their needs; and
- providing suggestions on how information on creating, maintaining and/or improving value can be provided in financial reports in a manner that is useful for decisions on providing resources to the entity.



EFRAG

Research project on better information on intangibles (2)



As part of this project, on 5 February 2020 EFRAG has published an academic literature review on the reporting of intangibles prepared by the University of Ferrara's research team that has been selected after an international public competition

On 7 March 2020, EFRAG TEG has established an Advisory Panel on Intangibles composed of managers, financial analysts, investors and consultants



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**World Intellectual Capital/Assets
Initiative Network**

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World Intellectual Capital Initiative (WICI)

1st Informal Meeting – 1st October 2007 – OECD, Paris
Monaco Annex, 2, rue du Conseiller Collignon



- Participants (from left to right): Prof. Yasuhito HANADO, Waseda University (Tokyo/Japan), Desirée VAN WELSUM, OECD (Paris/France), Douglas LIPPOLDT, OECD (Paris/ France), Alexander WELZL, European Federation of Financial Analysts Societies EFFAS (Frankfurt a. M./Germany), Yoshiko SHIBASAKA, KPMG (Tokyo/Japan), Bob LAUX Microsoft Corporation (Redmond/USA), Amy PAWLICKI, American Institute of Certified Public Accountants AICPA (New York/USA), Gert-Jan KOOPMAN European Commission (Bruxelles/Belgium), Annabel BISMUTH, OECD (Paris/France), Prof. Stefano ZAMBON, University of Ferrara (Ferrara/Italy), Grant KIRKPATRICK, OECD (Paris/France), Michael KRZUS, Grant Thornton (Chicago/USA), Christina BOEDKER, Society for Knowledge Economics (Crows Nest/Australia); Participants not on the picture: Rainer GEIGER, OECD (Paris/France), Jean-Philippe DESMARTIN, ODDO Securities (Paris/France), Yoshiaki TOJO, OECD (Paris/France);

The WICI – The World's Business Reporting Network



The WICI Network was officially born on 31 March 2008 with the signature of the Memorandum of Understanding (MoU) in Washington DC at the American Enterprise Institute (AEI)

Founding values of WICI are its global reach and its collaborative and non-profit nature

The aim is now to provide the new measures and information giving content to the future of company business reporting (KPIs), including intangibles and intellectual assets

The “World Intellectual Capital/Assets Initiative” (WICI)



Università
di Ferrara

Promoting & Participating Parties

- Japanese METI (Ministry of Economy, Trade & Industry)
- Waseda University of Tokyo
- University of Ferrara
- European Financial Analysts (EFFAS)
- World Business Council for Sustainable Development (WBCSD)
- Brazilian Development Bank (BNDES) (observer)

- WICI Italy/Organismo Italiano di Business Reporting (O.I.B.R.)
- WICI France
- WICI Belgium

Our Vision and Goals

Our Vision

WICI, the world's business reporting network, is a quite unique private/public sector collaboration aimed at improving company reporting for representing value creation and, hence, capital allocation through better corporate reporting information

Our Goals

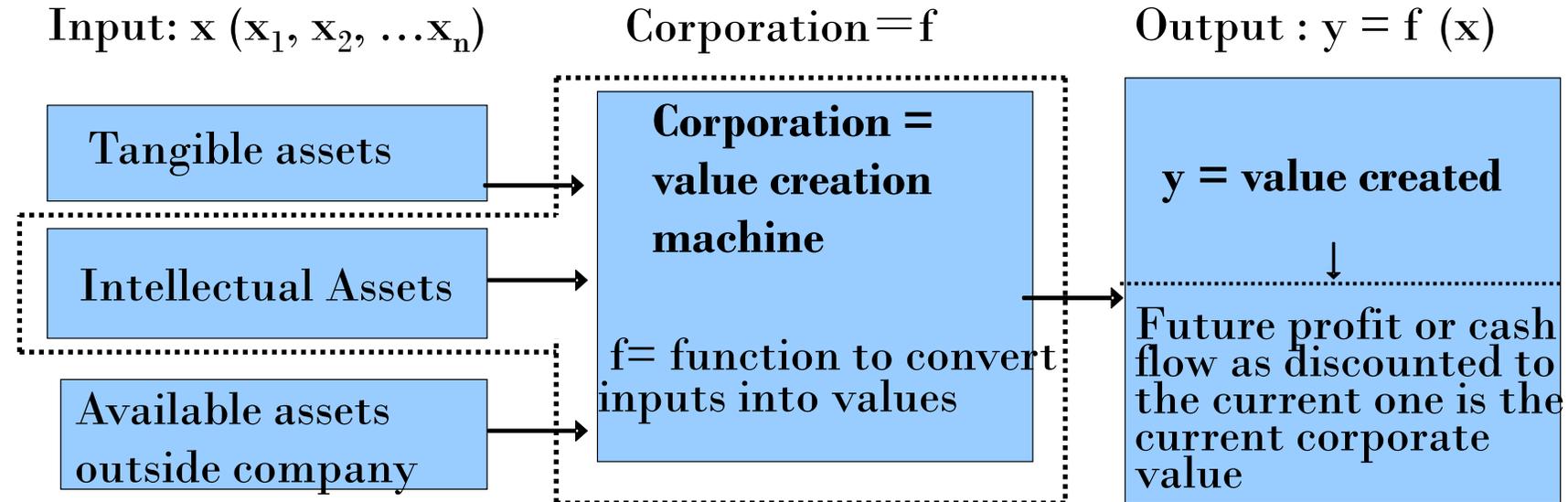
- **The first is to contribute to develop a new global framework for measuring and reporting intangibles and corporate performance to shareholders and other stakeholders**
- **The second is to develop guidelines for measuring and reporting on industry-specific key performance indicators (KPIs)**
- **The third is to facilitate the development of XBRL taxonomies for this type of content**



We believe that such better information will improve capital allocation decisions both within companies and between investors and companies. The result will be more value creation for a better world economy.

Focus on Value Creation

Company is a value creation mechanism, which can be expressed in a metaphor of the mathematical function. The part surrounded by dotted line is usually invisible.



Both $IAs(x)$ and conversion mechanism or business model (f) are substantial.

Main categories of IAs

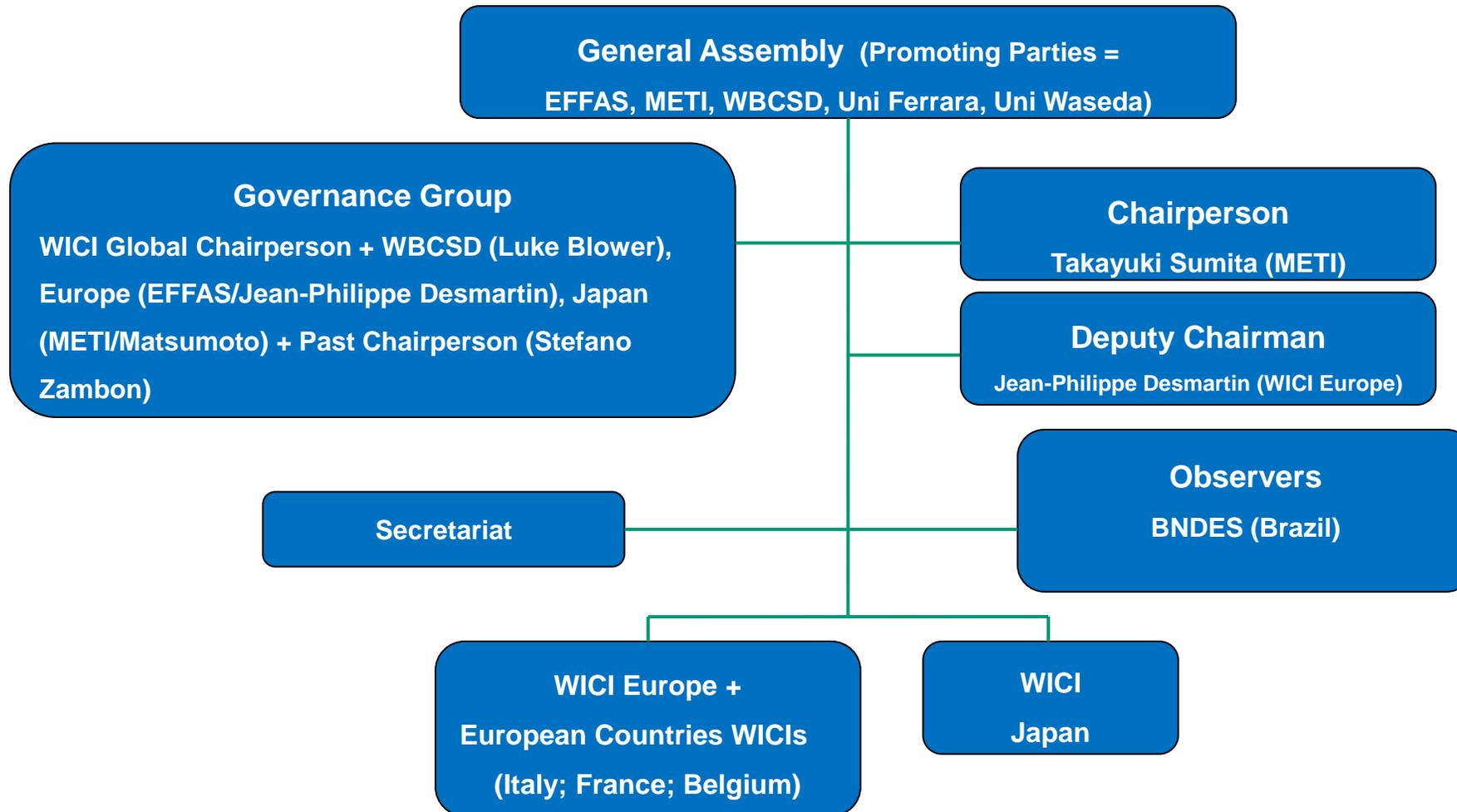
Human assets (including their knowledge or technique, leadership...),

Organisational assets (including teamwork, loyalty, accumulation of technology)

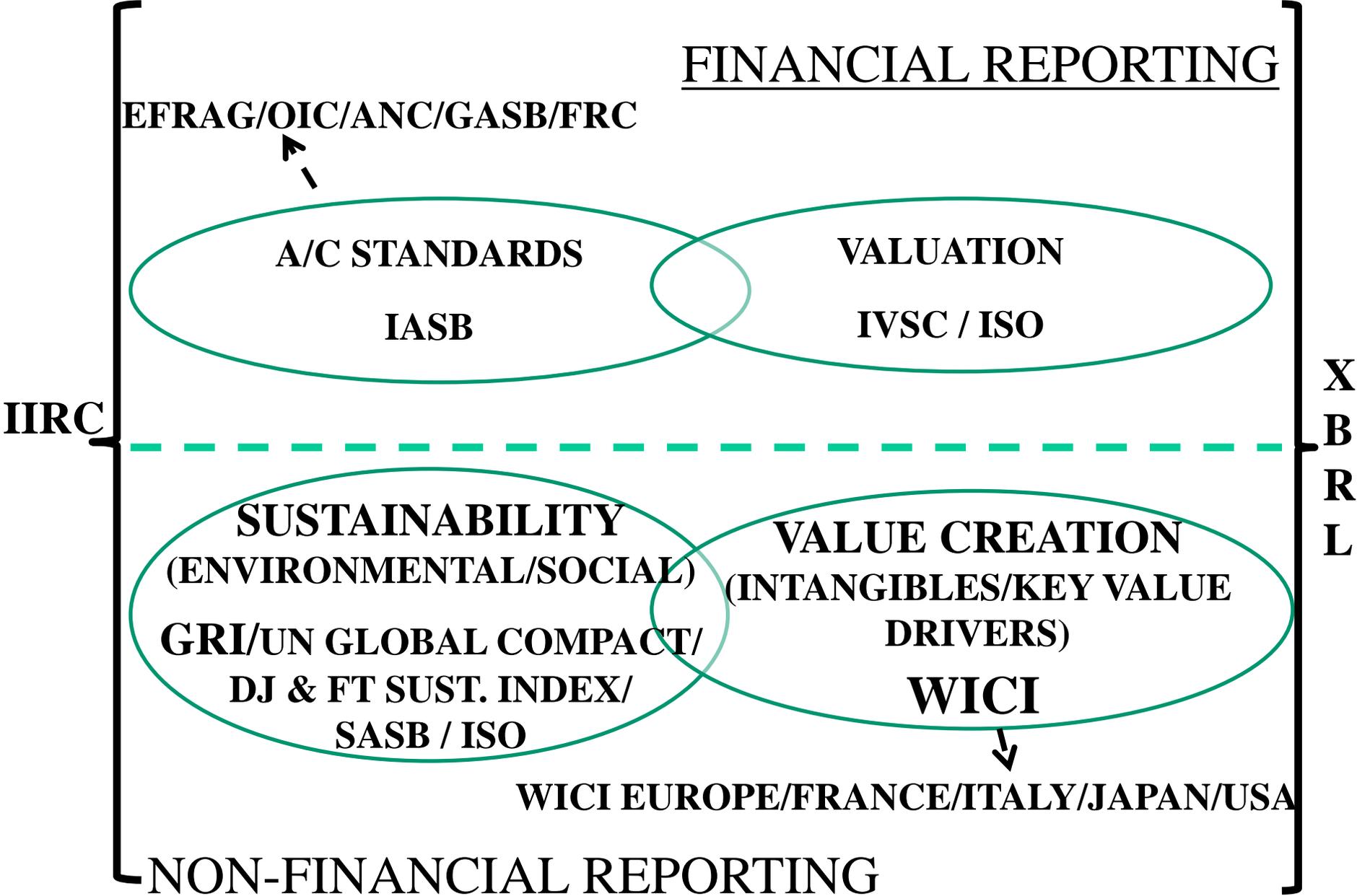
Relational assets (including reputation, network with business partners...)

The Structure of WICI

(as of 1st July 2019 until 30 June 2022)



INTERNATIONAL OVERVIEW of REPORTING SCENE





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Presentation of the 'WICI Intangibles Reporting Framework' (WIRF)

Prof. Stefano Zambon

Global Chair, WICI

University of Ferrara



UNIVERSITÀ
DEGLI STUDI
DI FERRARA
- EX LABORE FRUCTUS -



W I C I

Global WICI Network
the world's business reporting network

www.wici-global.com

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WICI INTANGIBLES REPORTING FRAMEWORK (WIRF)

On 16 February 2016 WICI launched the first draft of a Reporting Framework for Intangibles for an international public consultation

It establishes definitions and guiding principles of this reporting for measuring in non-financial terms (i.e. through KPIs) intangibles

A disclosure framework for intangibles is also included

It was possible to respond to and comment on the questions posed by 16 May 2016. On 22 September 2016 the final version of the WICI Intangibles Reporting Framework was approved and launched.

WICI Framework's Background

Financial report today does not reflect the real strengths of a company.
From current financial information we cannot see:

- the origin of company competitiveness
- its value creation as a combination of company-specific Intangibles
- the sustainability of its strengths, and
- the company long term value creation capacity

In this situation, financial people cannot properly evaluate a company.

Therefore, we need some reporting mechanism to describe the real origin of strengths and business sustainability of a company

Verso il concetto di «Business Sustainability»

(WICI Intangibles Reporting Framework, 2016)

Business Model

**BUSINESS
SUSTAINABILITY**
(including financial sustainability)

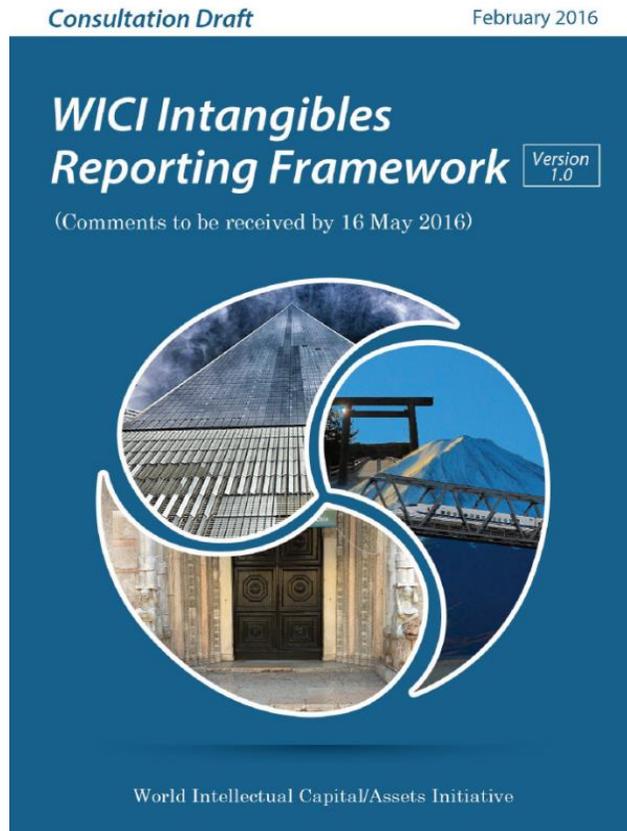
*Knowledge and
Intellectual Capital (intangibles)*

*Natural and
Societal Capital*

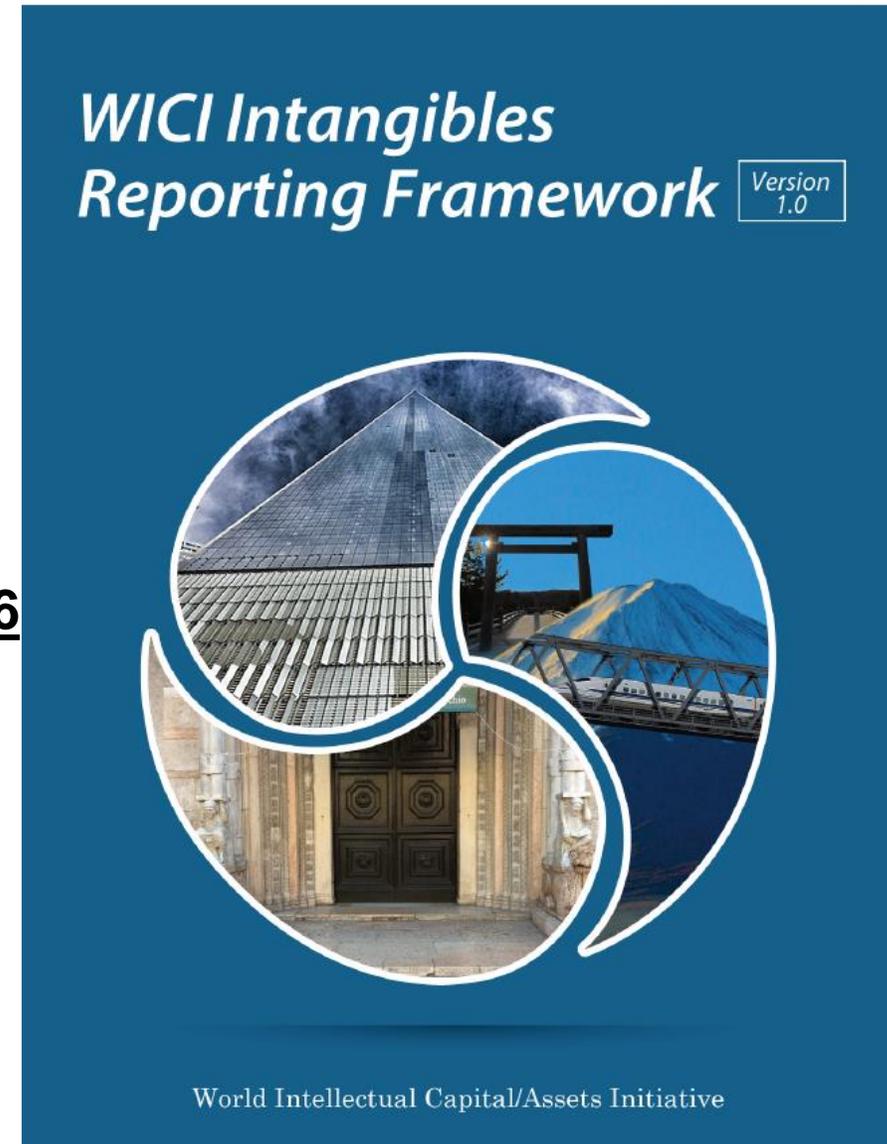
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the world's business reporting network

September 2016



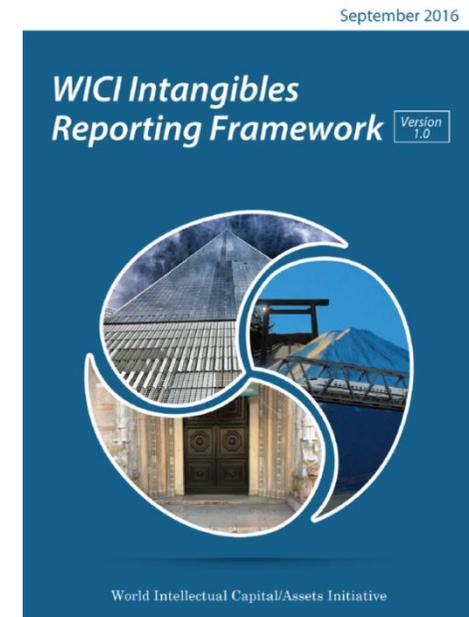

22 Sept. 2016



**Consultation Draft:
15 February 2016**

WICI INTANGIBLES REPORTING FRAMEWORK (WIRF)

- Aimed to fill in a today large “reporting gap” present today, which is the guidance on measuring and disclosing an organization’s intangible resources
- It essentially addresses the non-financial (or non-monetary or extra-financial) information on intangibles, insofar as financial information on them is covered by accounting and valuation standards and rules
- Auditing issues have intentionally not been covered



WICI INTANGIBLES REPORTING FRAMEWORK (WIRF)

Due Process followed

Due Process Steps	Date/Period
Decision made on the development of an intangibles reporting Framework by WICI Governance Group	13 th May 2015
Formation of a dedicated technical team within WICI	31 st May 2015
Public presentation of the Draft Framework at WICI Symposium 2015	4 th December 2015
Approval of the Framework Consultation Draft by the WICI Governance Group	11 th February 2016
Publication of the “WICI Intangibles Reporting Framework Consultation Draft” including an associated set of consultation questions for stakeholders (www.wici-global.com/wirf/WICI_Intangibles_Reporting_Framework_v1.0.pdf)	15 th February 2016
Period of public consultation	From 15 th Feb to 16 th May 2016
Analysis of the comments and responses received	From 17 th May 2016 to 31 th May 2016
Revision of the Framework on the basis of the comments and responses received	From 1 st June 2016 to 31 st August 2016
Final approval by the WICI Governance Group	15 th September 2016
Launch of the final version of WIRF	22 nd September 2016

16 responses received (e.g., IIRC, SASB, CDSB, E&Y, KPMG, Erste Bank)

Monthly or bi-monthly conference calls by the WICI Governance Group and the technical team have also been held.

WICI INTANGIBLES REPORTING FRAMEWORK

- WIRF crystallizes in one conceptually consistent Framework the best practices and proposals that have emerged in the field of intangibles reporting over the last twenty years.
- It is important to underline that WIRF is largely based on an evolutionary interpretation of the 2005 Japanese Guidelines on “Intellectual Assets based Management” (IAbM) and the 2008 “Principles for Effective Communication of Intellectual Capital” by the EFFAS Commission on “Intellectual Capital”, as well as the IIRC’s <IR> Framework

WICI INTANGIBLES REPORTING FRAMEWORK

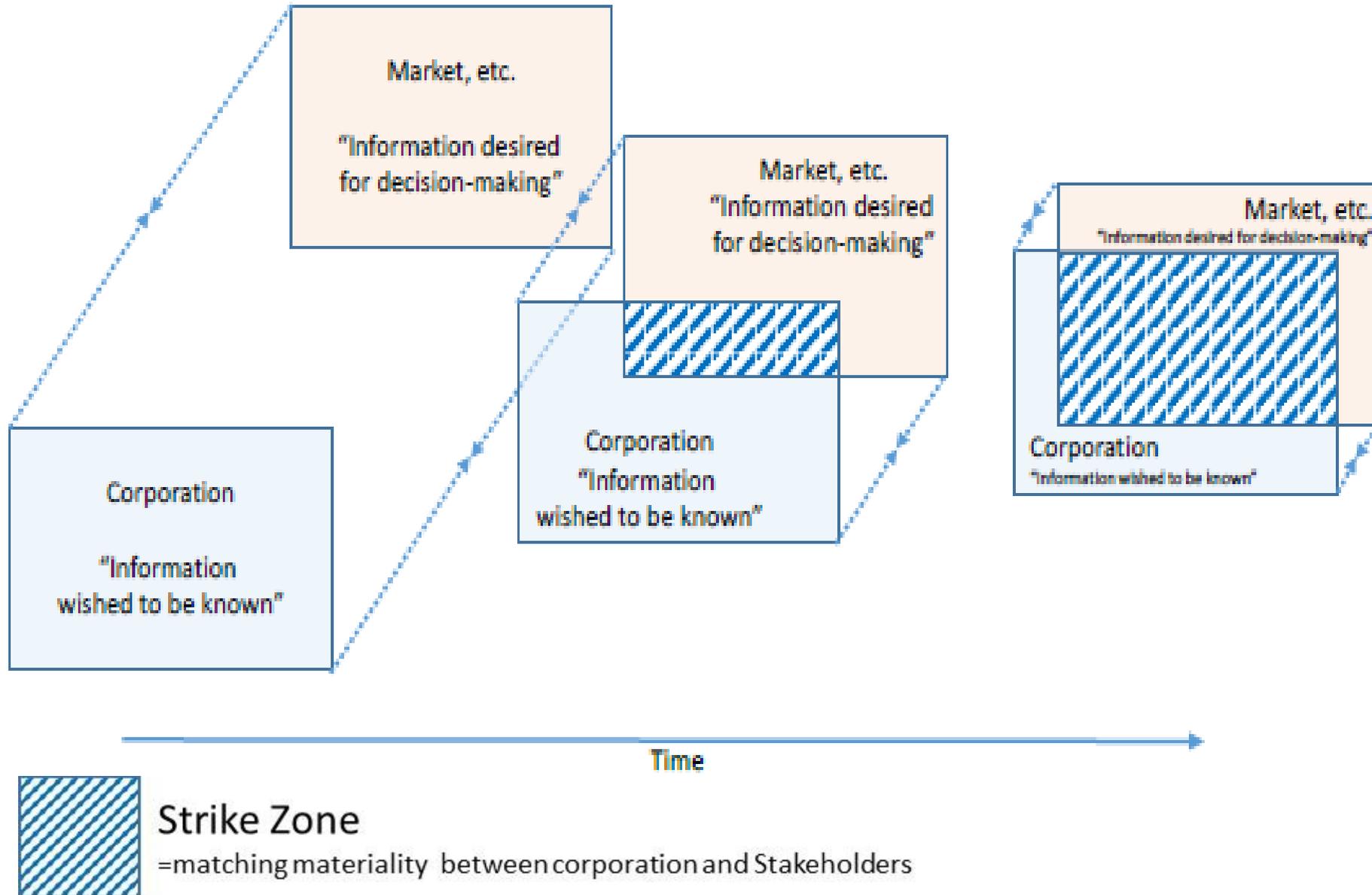
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Chapter 1 – Rationale and Objective of the Framework

- The purpose of the “WICI Intangibles Reporting Framework” is to ***establish the principles, the contents and the structure for the reporting of intangible resources which are material for an organization’s value creation process and its communication to stakeholders.***
- The Framework is ***principles-based***
- The primary target audience is ***all companies and other organizations*** of the private, public and not-for-profit sectors.
- Reporting and communication on intangibles are intended to provide ***useful information for decision making***, and in particular ***resource allocation decisions***, primarily to the organization’s ***management*** as well as ***providers of financial capital*** including investors, creditors, and analysts. These are expected to be the primary information users.

【Figure 1.2】 Positive information cycle between an organization and its stakeholders



【Figure 1.1】 WICI's Framework Focus within the corporate reporting landscape



Six capitals as defined by IIRC

* Organisational Capital according to WICI Framework

Chapter 2 – Definition of Intangibles

- Intangibles are ***non-physical resources*** which, either alone or in conjunction with other tangible or intangible resources, can generate ***a positive or a negative effect on the value of the organization in the short, medium and long term***
- Intangibles may impact two distinct but inter-connected forms of value:
 - ***Strategic value*** is that related to the enhancement of the competitive, market, product, reputation, and/or risk profile of the organization;
 - ***Financial value*** is that linked to the generation of net cash flows over time.
- It is not necessary that intangibles are owned or controlled by an organization. They simply have to be available and/or utilized by it to generate value → ***new concept of capital***

Chapter 2 – Definition of Intangibles (cont'd)

Positive Intangible Resources (“intangible assets”)

They are the drivers of long-term competitive differentiation and advantage. They derive from a strategic utilization (including the combination) of intangibles that is conducive to an organization’s sustainable strategic value and/or sustainable future streams of cash flows

Negative Intangible Resources (“intangible liabilities”)

- Intangibles that may have substantive negative impact on an organization’s strategic and/or financial value (e.g., bad reputation of the organization; poor management quality and leadership).
- Negative intangible resources are often linked to specific risks of an entity

Chapter 2 – Definition of Intangibles (cont'd)

Intellectual Capital

- The above definition of intangible assets is fundamentally equivalent to the concept of Intellectual Capital.
- Intellectual Capital encompasses the internal (competencies, skills, leadership, procedures, know-how, etc.) and external (image, brands, alliances, customer satisfaction, etc.) intangibles which are dynamically inter-related and available to an organization, thereby enabling it to transform a set of tangible, financial and human resources into a system capable of pursuing sustainable value creation
- Intellectual Capital is typically subdivided into three main categories, which are 1) Human capital, 2) Relational capital, and 3) Organizational capital. The boundaries of these categories are flexible and they should not be interpreted/perceived in a static or rigid way.

Chapter 3 – Interpretations of the Principles for Intangibles Reporting and Communication

- Principles and guidelines from existing corporate reporting frameworks are well established.
- Rather than presenting new and different intangibles reporting principles, the role of the WICI Framework is to identify the most important Principles for intangibles reporting and communication, and to provide an interpretation of each selected principle in the context of reporting on intangibles.

Basic references for these Principles are:

- International <IR> Framework (2013)
- Principles for IC Communication by EFFAS Commission on Intellectual Capital (2008)

Chapter 3 – Interpretations of the Principles for Intangibles Reporting and Communication

Interpretations of the basic Principles in the context of intangibles reporting and communication are provided for:

- Materiality
- Connectivity
- Conciseness
- Comparability
- Future orientation

Chapter 4 – Structure of Intangibles Reporting

Definition of Key Performance Indicators (KPIs):

“KPIs are numerical figures (metrics) related to critical/material factors of value creation, and which should provide objective evidence of performance trends by tracking them over time.”

The role of KPIs in reporting is to support the narrative explanation of the organizational strategy linking to past, present or future financial and/or strategic performance → distinction between lagging and leading KPIs.

Chapter 4 – Structure of Intangibles Reporting (cont'd)

According to their level of relevance, KPIs can be articulated on three levels:

- General KPIs are those that may be relevant for most organizations across industries and sectors.
- Industry-specific KPIs are those specific to a certain industry or sector
- Organization-specific KPIs are those specific to each organization that should be reported in order to best represent its unique value creation mechanism.
- Examples of industry-based KPIs are those proposed by the WICI (www.wici-global.com/kpis)

Chapter 4–Structure of Intangibles Rep'ing (cont'd)

- **Suggested structure of Intangibles Reporting → 3 sections**
 - ***Outline of business and management philosophy:***

This information consists of the illustration of the general characteristics of the organization's activities and the resilient management philosophy, with attention devoted to its value creation mechanism
 - ***Intangibles and value creation from past-to-present:***

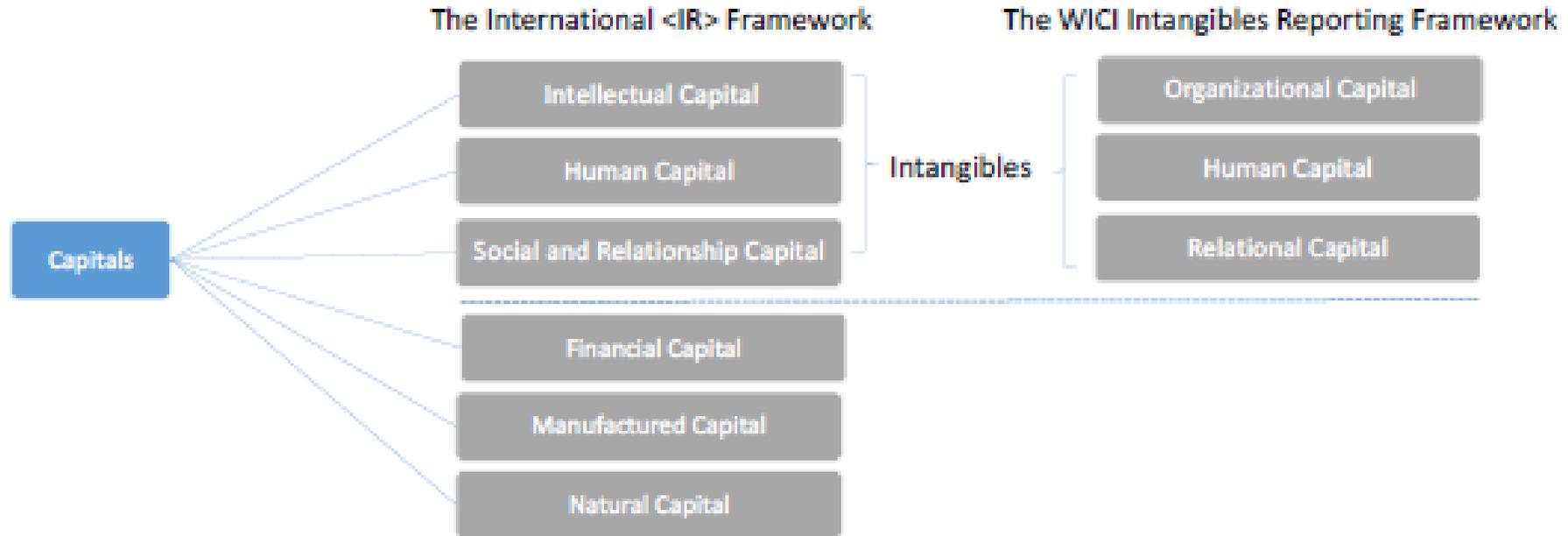
This information addresses intangibles, their role in the strategic management of the organization, and their contribution to value creation from past to present period. Information can be presented using KPIs
 - ***Intangibles and value creation from present-to-future:***

This section covers information on intangibles, their role in the strategic management of the organization, and their contribution to value creation from the present to the future period. Information should be presented using KPIs related to future performance

Some guidance and examples on relevant KPIs and information are provided for each of the three section

APPENDICES

Appendix 1 – Comparison between IIRC and WICI Frameworks



Appendix 2: Economic characteristics of intangibles

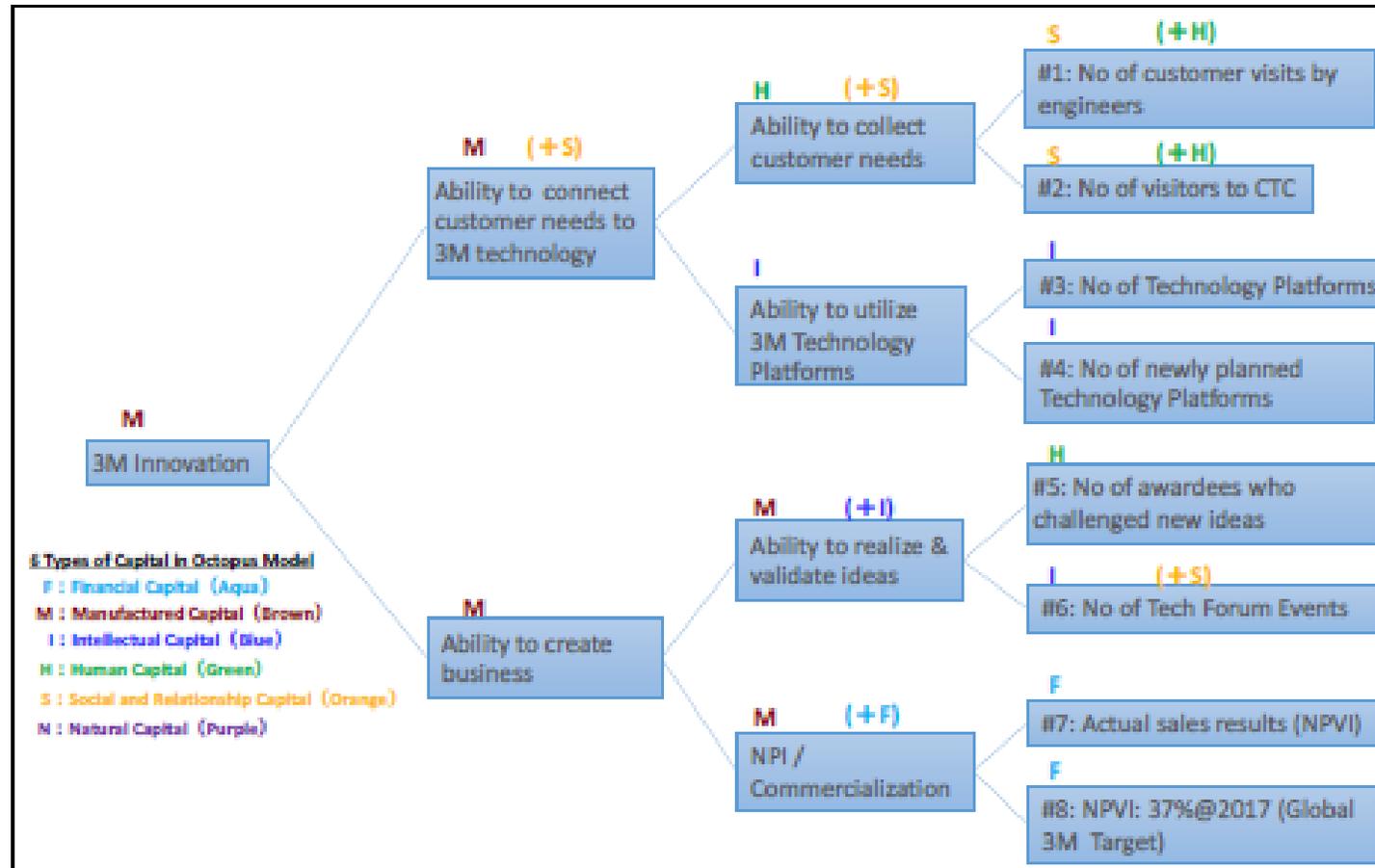
Appendix 3: Differences from accounting definitions

Appendix 4: Extant principles for reporting & communication on intangibles

APPENDICES (cont'd)

Appendix 5 – Some examples of interrelatedness between KPIs

Logic Tree for 3M Innovation



Source: presentation by Mike Masahiko Kon (3M Japan Vice President/WICI Japan Vice Chair) at 12th World Congress of Accounting Educators and Researchers, Florence (Italy), November 14, 2014.

GLOSSARY

Composed of 20-strong items → some of them controversial (business reporting, strategic value)

E.g. “Non-financial” (or non-monetary)”

“The term "non-financial" is utilized in this Framework to refer to narrative or quantified information that is not expressed in monetary units (e.g., percentage, Likert scale, absolute number, physical measures).

Non-financial' does not mean that a measure or information does not have a financial impact or significance.

Sometimes the expressions “non-monetary”, “extra-financial”, “pre-financial” or “not yet financial” are used synonymously with “non-financial”.”

WICI KPIs



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W I C I Europe

*regional jurisdiction of the
Global WICI Network*
the world's business reporting network

www.wici-global.com

I WICI-Key Performance Indicators (KPIs) legati a intangibles e value creation

- The WICI Global Network (of which OIBR is a part) has developed:
- Sector-agnostic KPIs → 50 + 6 Generic KRIs linked to intangibles
 - Industry KPIs → 571 (the most numerous after those of SASB)
 - 10 sectors (Food & Beverage, Fashion and Luxury, Oil & Gas, Electricity, Mining, High Technology, Automotive, Electronic Devices, Pharmaceuticals, Telecommunications). OIBR is leading an international Working Group for WICI-KPIs in the banking sector (retail, asset management, private banking)
 - KPIs oriented to "represent" company's value creation
 - Freely available on the WICI website (www.wici-global.com/kpis)

**Organisational/
Entity
level**

**Company-Specific
Intangibles Indicators
(no particular limit)**

**Sector/Industry
level**

**Industry-Specific
Intangibles Indicators
(15-25 max.)**

**Generic
level
(Sector-agnostic)**

**Basic Intangibles Indicators
(10-15 max.)**

WICI Intangibles Reporting Framework (2016): combining KPIs comparability & specificity

WICI - GENERIC KPIs ON INTANGIBLES

Generic KPIs list (as of 19 Nov. 2020)

1. Average age of employees
2. Job leaving ratio
3. Degree of internal consistency with/penetration of management principles
4. Human Resource Development expenditure per employee
5. Degree of employee satisfaction
6. Number of training hours per employee
7. Percentage of revenues invested in training
8. Internal corporate image with the employees
9. Average level of management leadership
10. Employees' level of education synthetic index
11. Percentage of positions filled through internal personnel growth
12. Percentage of women in management
13. Management turnover
14. Employee turnover Human Employee
15. Average seniority of company employees (total employees)
16. Number of active patents
17. Revenues from products derived from last 5 years registered patents
18. Number of R&D projects near to application/operational implementation
19. Number of internal R&D-generated products
20. Degree of R&D concentration on products/services lines/families

Capital	Subject
Human	Employee
Human	Employee
Human	Management
Human	Employee
Human	Management
Human	Employee
Human	Employee
Human	Management
Human	Management
Human	Employee
Human	Employee
Organisational	Patents
Organisational	Patents
Organisational	R&D
Organisational	R&D
Organisational	R&D

WICI - GENERIC KPIs ON INTANGIBLES (2)

21. New product ratio (Sales of products or services within 3 years from the initial sales / total sales)
22. Value Added per employee
23. Number of proposed vs implemented internal improvement proposals
24. Intellectual property owned and its citation index
25. Outsourced R&D cost
26. Number of products in the pipeline covered by patents
27. Revenues from last 5 years new products
28. Revenues from new products-to-total sales ratio/revenues from new products-to-net profit ratio
29. Number of technology platforms
30. Active patents on registered patents
31. Percentage of sale revenues invested in product development/innovative activity
32. No. of innovative projects transferred to application development / Innovation Department workforce
33. Product non-conformity ratio
34. Substitution of key positions index
35. Percentage of sale revenues invested in software/information systems
36. Brand Strength (Brand Image/Reputation/Loyalty)
37. Brand contribution to EBITDA (extra margin)
38. Number of product recalls
39. Changes in customer unit price (Year on year sales value divided by the number of pieces sold)
40. Level of credit confidence (average contracted interest rate in loans or straight bond issuances - prime rate)

WICI - GENERIC KPIs ON INTANGIBLES (3)

41. Customer satisfaction per product/service line
42. Customer loyalty per product/service line
43. Corporate reputation/External corporate image
44. Inclusion in Socially Responsible Index (SRI) funds at the end of year or during the year
45. Change in the per-customer earnings
46. Market share per product/service line
47. New customers-derived sale revenues
48. Penetration index vis-à-vis the most relevant customers
49. Percentage of sales invested in marketing and external communication
50. Revenues acquisition Index (from new customers)

KRIs (Key Risks Indicators) specific on Intangibles-related risk/opportunities

1. Compensation claims in pending lawsuits
2. Diversification of risks (No. of main factories of suppliers of core products, or Herfindahl-Hirschman Index, showing the degree of decentralization of the share of major products in relation to total sales)
3. Sale revenue concentration on main product/service lines
4. Sale revenue concentration on top 5 customers
5. Number of suppliers per product/service line
6. Level of reputational risk



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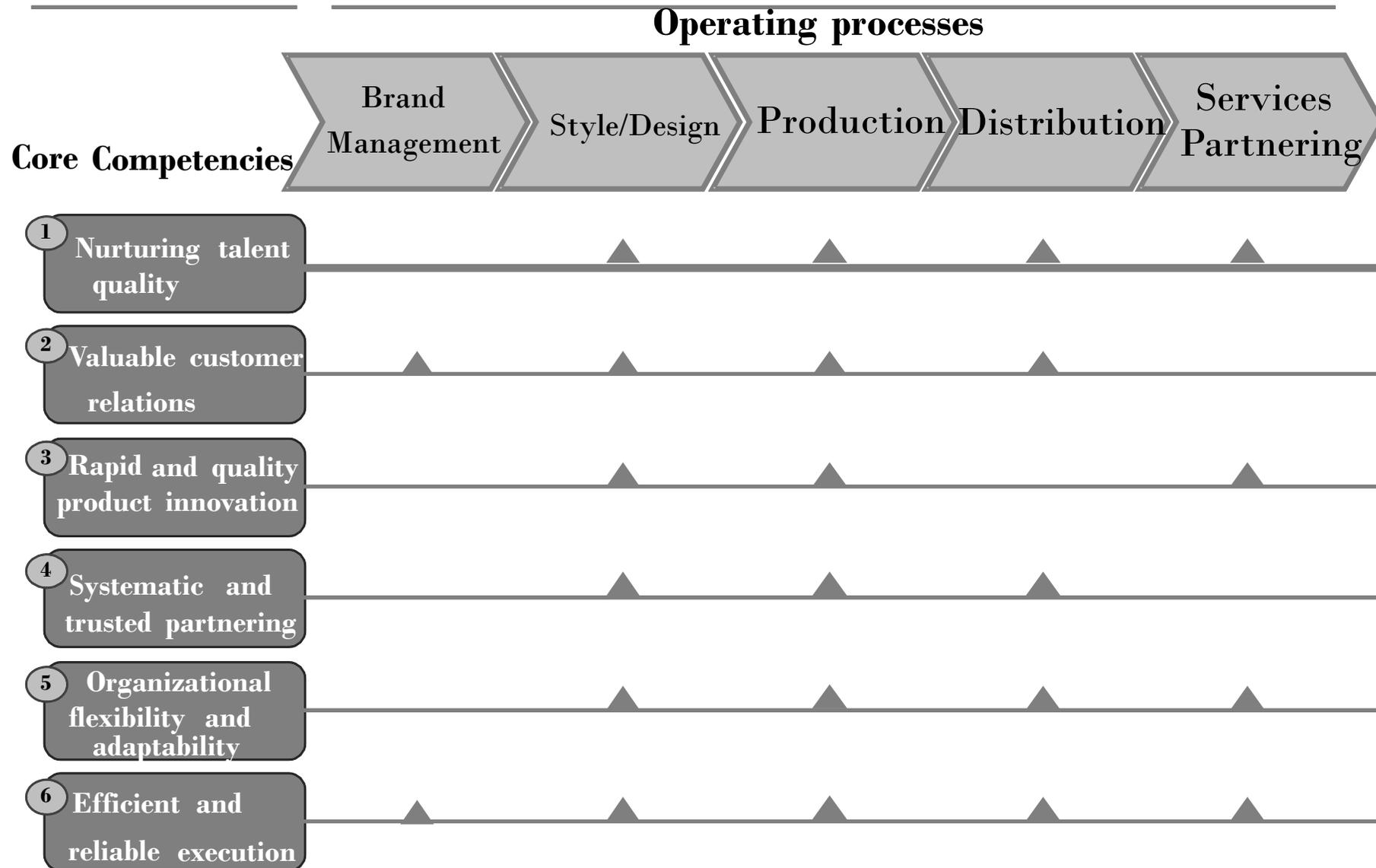
www.wici-global.com

**THE KPIs PROJECT on
FASHION & LUXURY**

by the

**Joint WICI Europe-EFFAS CIC KPI Task Force-
NIBR/WICI ITALY**

Fashion industry core competencies & value chain



Fashion's KPIs per core competences

1 Nurturing of talent quality

- Average employee's age and seniority
- Staff turnover
- Training hours
- HR education
- Job rotation
- MBO
- Boutique sales staff training experience
- Employee commitment index
- High quality recruitment
- Management/Employee share of ownership
- Annual career review rate
- Share of women in upper/top mgmt.
- Share of employees in talent programs
- Training costs (also per employee)
- Access rate to training
- Financial KPI forecast hit rate by management
- Position in students' annual employer ranking survey
- Formal mentorship
- No. of CVs received
- Proportion of staff covered by collective bargaining agreements
- Executive compensation on total revenues/net income
- Share of executive positions filled internally

4 Systematic and trusted partnering

- Suppliers by main raw material
- Suppliers turnover rate
- Dependence rate from key suppliers
- Raw materials purchase cost
- Raw materials purchase cost by main raw material
- Average distance from key suppliers
- Shipment times
- Outside contractors' number and saturation level
- External product development
- Number of exclusive suppliers vs. total suppliers
- Number of second-tier suppliers that have become first-tier
- Weight of licensing

2 Valuable customer relationship

- Brand value
- Number of brands
- Loyalty of clients to a specific brand
- Customer satisfaction index
- Brand awareness
- Brand preference
- Reputation index/External image
- Internet community
- Customer list
- Behavior of customers on the list in relation to loyalty activities
- Elasticity of demand
- Customer loyalty rate
- Exhibition participation ratio
- Items being bought by customers on the list
- Longevity of customers on the list
- Top of the line
- Avg. breadth of information available on customers
- Advertising costs
- % of total income generated from brand

5 Organizational flexibility and adaptability

- Share of employees familiar with strategy
- Average expenditure per capita
- Employee Satisfaction Index
- Child Labour

3 Rapid and quality product innovation

- Number of meetings between purchasers and suppliers
- No. of new patents registered during the year
- No. of new products developed
- Local production rate
- Internal communication
- Competitors
- Portion outsourced on total sales

6 Efficient and reliable execution

- Sales by geographic area, main products, lines, brands, distribution channels
 - Gross margin by geographic area, main products, brands, distribution channels
 - Market share by geographic area
 - Average number of sales people per 100 sq meters of shop
 - Sale volume per square meter
 - Franchisee average sale
 - Outlets sales per square metre
 - DOS sales per square meter
 - Headcount
 - Headcount by contract's type
 - HR absenteeism
 - Headcount by Department
 - Number of staff in boutique
 - Revenue of sales to customers on the list
 - Number of franchisee
 - Break-even point of franchisees
 - Maintenance costs for franchisees
 - Number of outlets
 - DOS number of wholesale stores
 - Maintenance costs and break-even point for DOS (direct operation stores)
 - Products selected that were out of stock
 - Delivery's delay
 - Delivery costs that were too high
 - Problems with connection to website
 - No confirmation or status report given
- (To be continued)

List of KPIs for the Fashion and Luxury sector

<i>Nr</i>	<i>Focus</i>	<i>Process</i>	<i>IC area</i>	<i>KPI</i>	<i>KPI Formula</i>	<i>KPI's features</i>	<i>Suggested relevance</i>
1	Nurturing of talent quality	All processes	Human Capital	Average employee' s age	Ratio of the sum of employee's age and the total number of employees.	age and trend	Nice to Have
2	Nurturing of talent quality	All processes	Human Capital	Average employee's seniority	Ratio of the sum of employee' seniority and the total number of employees.	time and trend	Must Have
3	Nurturing of talent quality	All processes	Human Capital	Staff turnover	Number of people who left the company during the year on the total workforce at the beginning of the year (in all company and specifically in the Design Office and development Office.	percentage and trend	Must Have
4	Nurturing of talent quality	All processes	Human Capital	Training hours	Amount of training hours on the number of employees (total and for HQ employees and sales people).	percentage and trend	Nice to Have
5	Nurturing of talent quality	All processes	Human Capital	HR education	Percentage of employees by the education's degree.	percentage and trend	Nice to Have
6	Nurturing of talent quality	All processes	Human Capital	Job rotation	Percentage of employees who changed their task in the last year on the total number of employees.	percentage and trend	Nice to Have
7	Nurturing of talent quality	All processes	Human Capital	MBO	Percentage of bonuses on the successful objectives achieved by the employees.	percentage and trend	Must Have
8	Nurturing of talent quality	Distribution process	Human Capital	Boutique sales staff training experience	Sum of the training hours.	time and trend	Must Have
9	Nurturing of talent quality	Services Partnering	Human Capital	Employee commitment index	It is scored from an annual Employee Survey which provides a reliable measure of employees' commitment to their work and the company.	score and trend	Must Have
10	Nurturing of talent quality	Services Partnering	Human Capital	High quality recruitment (e.g., recruitment from the 5 best business schools and/or the 5 best technical schools)	Percentage of high quality recruitment on total recruitment.	percentage and trend	Must Have
11	Nurturing of talent quality	Services Partnering	Human Capital	Management/Employee share of ownership	Percentage of stocks of company owned by employees/management.	percentage and trend	Nice to Have
12	Nurturing of talent quality	Services Partnering	Human Capital	Annual career review rate	Number of career advancement cases on total employees.	percentage and trend	Nice to Have
13	Nurturing of talent quality	Services Partnering	Human Capital	Share of women in upper/top mgmt (to attract female talents)	Number of women on the total upper/top managers.	percentage and trend	Must Have
14	Nurturing of talent quality	Services Partnering	Human Capital	Share of employees in talent programs	Number of employees in talent program on the total employees.	percentage and trend	Must Have



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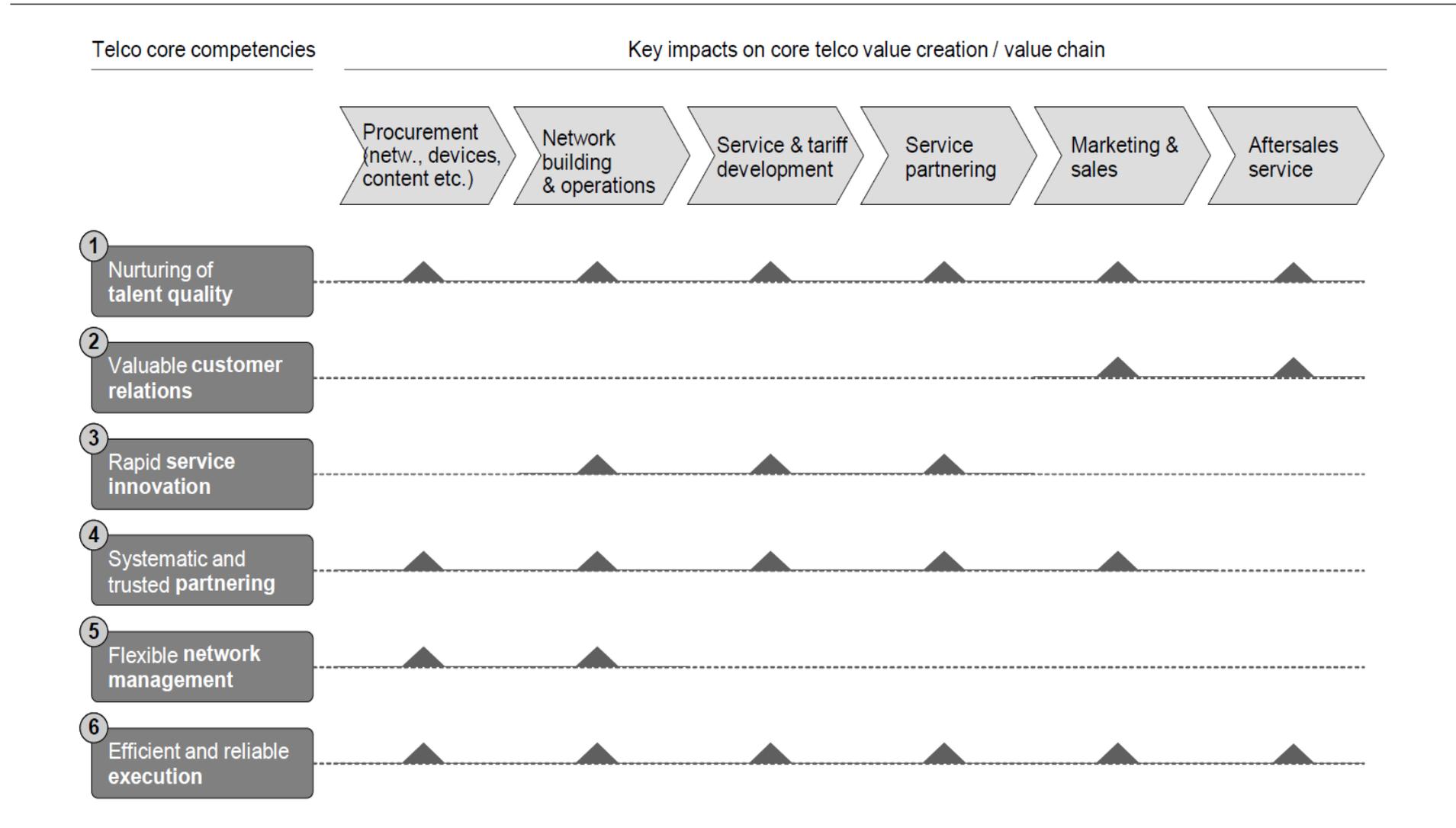
**THE KPIs PROJECT on
TELECOMMUNICATIONS**

by the

Joint WICI Europe-EFFAS CIC KPI Task Force

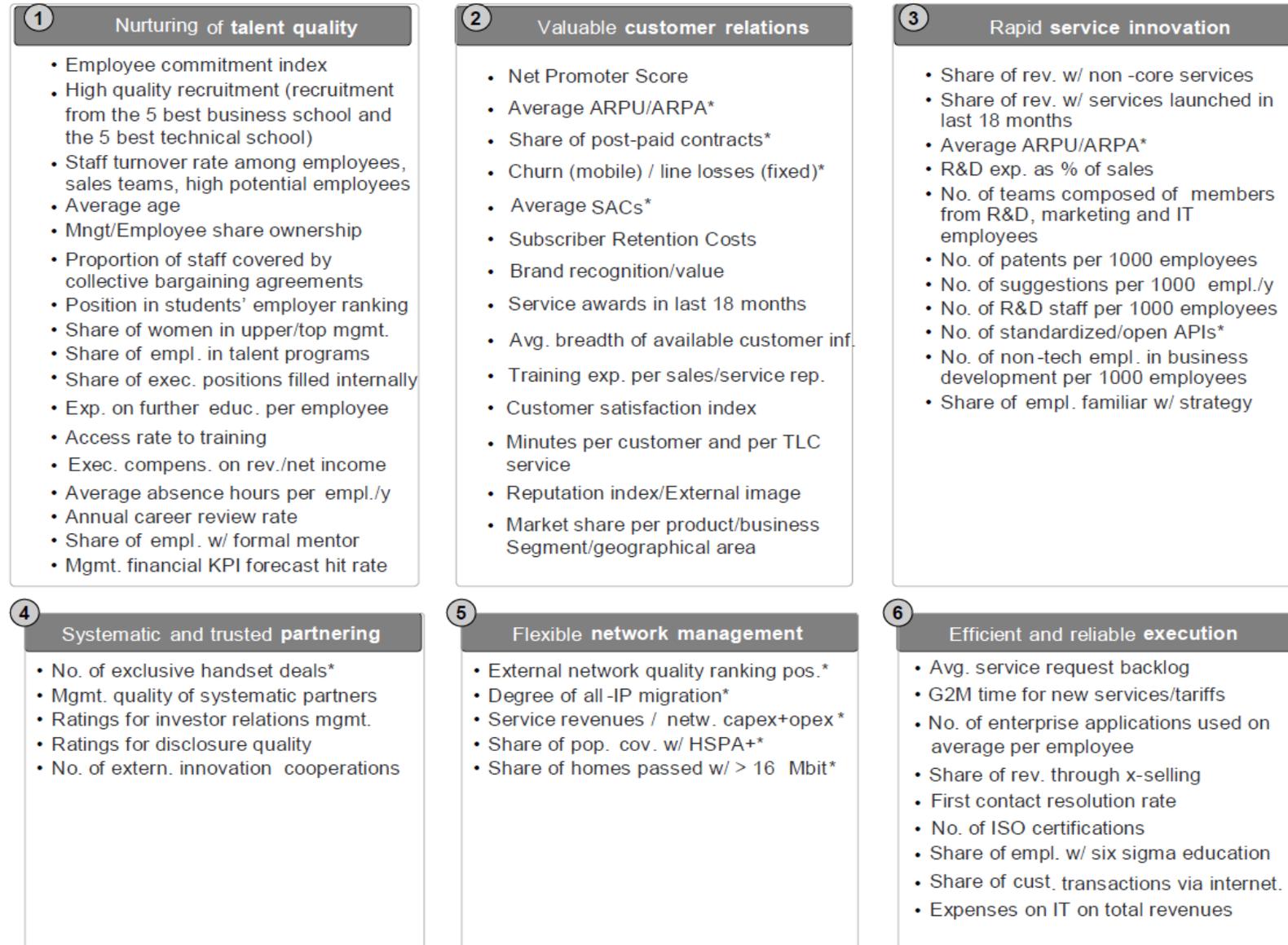
WICI - Telco illustration

Figure 1. The proposed model



WICI - Telco illustration (2)

Figure 2. TLC sector: the complete list of proposed KPIs per core competencies/critical success factors



WICI - Telco illustration (3)

Table 1. The complete list of KPIs for the telecommunication sector

<i>Nr.</i>	<i>KPI</i>	<i>IC area</i>	<i>Focus</i>	<i>Importance*</i>	<i>KPI's features</i>
1	Employee commitment index	Human Capital	Nurturing of talent quality	1	degree and trend
2	High quality recruitment (recruitment from the 5 best business school and the 5 best technical school)	Human Capital	Nurturing of talent quality	1	percentage and trend
3	Staff turnover rate among employees, sale teams, high potential employees	Human Capital	Nurturing of talent quality	1	percentage and trend
4	Average age	Human Capital	Nurturing of talent quality	1	year and trend
5	Management/Employee share ownership	Human Capital	Nurturing of talent quality	1	percentage and trend
6	Proportion of staff covered by collective bargaining agreements	Human Capital	Nurturing of talent quality	1	percentage and trend
7	Executive compensation on total revenues/net income	Human capital	Nurturing talent quality	1	Percentage and trend
8	Annual career review rate	Human Capital	Nurturing of talent quality	2	percentage and trend
9	Share of women in upper/top mgmt. (to attract female talents)	Human Capital	Nurturing of talent quality	2	percentage and trend
10	Share of employees in talent programs	Human Capital	Nurturing of talent quality	2	percentage and trend
11	Share of executive positions filled internally	Human Capital	Nurturing of talent quality	2	percentage and trend
12	Expenses on further education per employee	Human Capital	Nurturing of talent quality	2	money and trend
13	Access rate to training (Proportion of employees having their annual career review with the management)	Human Capital	Nurturing of talent quality	2	percentage and trend



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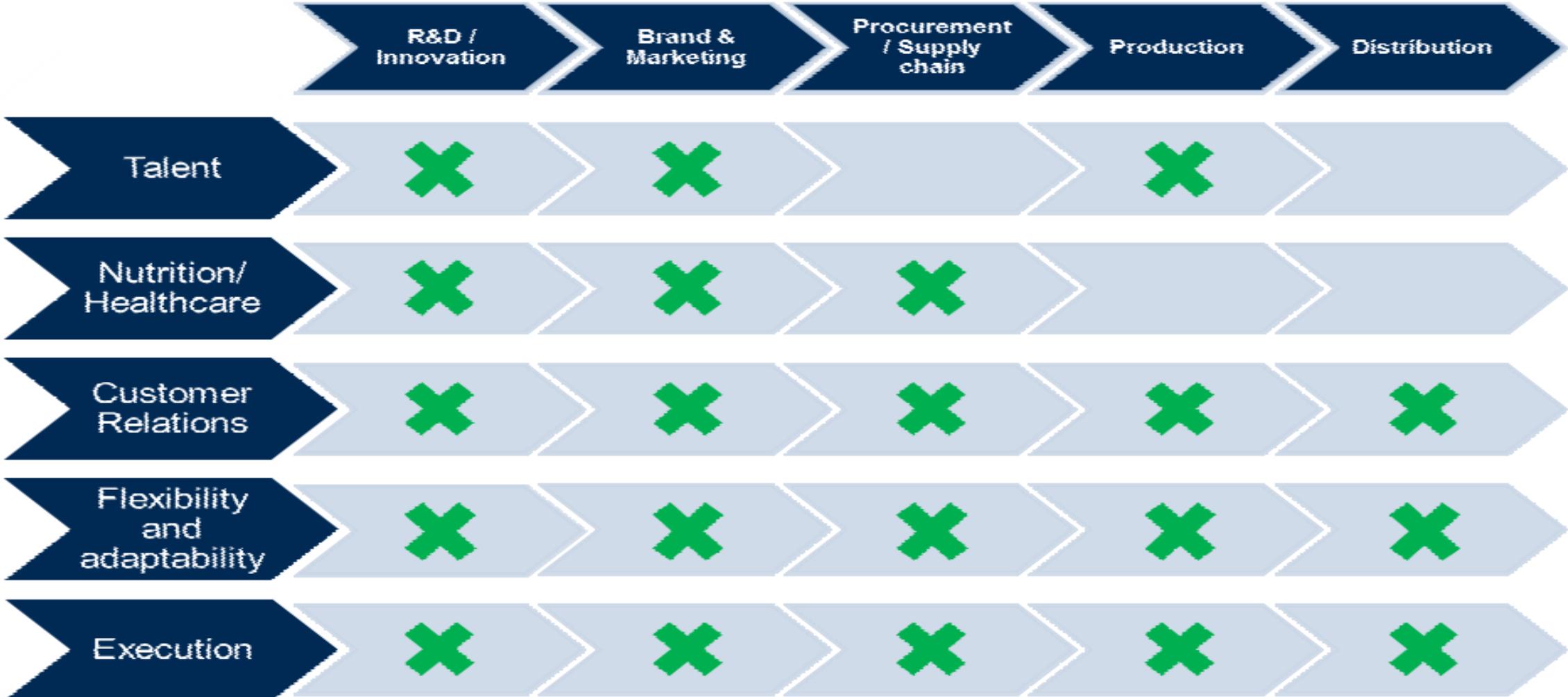
**THE INDUSTRY KPIs PROJECT on
FOOD AND BEVERAGE**

by the

Joint WICI Europe-OI/WICI FRANCE

(2019)

FOOD & BEVERAGES VALUE CHAIN- MAIN FOCUS



HUMAN CAPITAL (13 KPI'S – 7 “MUST HAVE” + 6 “NICE TO HAVE”)

KPI's	FOCUS	KPI's Formula	Risk/ Opportunity	Suggested relevance	Bloomberg coverage (%)	
1	Employee commitment index	Execution	Existence of a global and regular employees survey? Yes/No Employee survey results (Key drivers, % of participation and dynamics)	Risk	Frequently used	0%
2	Absenteism	Execution	Average absence hours per employee./year	Risk	Frequently used	0%
3	Staff turnover rate among employees, new employees & high potential employees	Execution	Number of employees who left the company during the year on the total workforce at the beginning of the year	Risk	Frequently used	42%
4	Glass Ceiling reduction	Execution	Share of women in top mgmt vs general	Opportunity	Frequently used	50%
5	Glass Ceiling reduction	Execution	Remuneration ratio between CEO and median pay in the firm (only european employees data for european corporates)	Risk	Frequently used	100%
6	Employability	Execution	% of trained employees	Opportunity	Frequently used	58%
7	Working accident (frequency and severity)	Execution	Lost time accident/ 1 million worked hours and lost days /1000 worked hours), including contractors.	Risk	Frequently used	67%
8	Attractivity	Talent	Position in students and managers annual employer ranking survey	Opportunity	Nice to have	0%
9	Mngt/Employee share ownership	Execution	Percentage of stocks of company owned by employees/ management; % of employees having shares	Opportunity	Nice to have	100%
10	Employability	Execution	Average age	Risk	Nice to have	33%
11	Attractivity	Talent	Nb of adequate CV received	Opportunity	Nice to have	0%
12	Annual career review rate	Talent	% of employees having received an annual review	Opportunity	Nice to have	0%
13	Internal mobility	Talent	Share of positions filled internally (Executives, intermediary management, global)	Opportunity	Nice to have	0%

RELATIONAL CAPITAL (14 KPI'S – 8 “MUST HAVE” + 6 “NICE TO HAVE”)

KPI's	Focus	KPI's Formula	Risk/ Opportunity	Suggested relevance	Bloomberg coverage (%)	
14	Innovation	Customer relation & nutrition	% of sales in product launched in the past 1-2-3 years	Opportunity	Frequently used	0%
15	Brand: value, awareness, preference...	Customer relation	Loyalty to a specific brand Amount spent on brand recognition	Opportunity	Frequently used	0%
16	Client portfolio concentration	Customer relation	% of turnover with top 5 clients (Walmart, Carrefour, etc.)	Risk	Frequently used	0%
17	Customer satisfaction / Net promoter score	Customer relation		Opportunity	Frequently used	0%
18	Digital advertising spending	Customer relation	% of expenses on digital media	Opportunity	Frequently used	0%
19	% of product with nutrition labels	Nutrition	% of product sold with a responsible consumption logo/label (ex Nutri-score, etc)	Opportunity	Frequently used	0%
20	% of organic products	Nutrition		Opportunity	Frequently used	0%
21	% of “healthy” products	Nutrition	No GMO, no nanotechnologies, no alcohol for beverage companies	Opportunity	Frequently used	0%
22	Nutrition research programs/ Nutrition research budget	Nutrition	number of nutrition programs/ % of sales covered by nutrition program	Risk	Nice to have	0%
23	R&D/Innovation	Customer relation & nutrition	% of new products launched after integration of nutritional research Online sales	Opportunity	Nice to have	0%
24	Client loyalty /repeat purchase	Customer relation	% of clients part of loyalty programmes / identified as repeat customers	Opportunity	Nice to have	0%
25	Marketing training	Customer relation & nutrition	% of marketing teams trained on responsible marketing, etc	Opportunity	Nice to have	0%
26	Reputation index/External image	Customer relation	Food waste awareness/actions	Risk	Nice to have	0%
27	E-reputation/ Millenials specificities	Customer relation	Number of followers, likes, on social media	Risk/Opportunity	Nice to have	0%

ORGANISATIONAL CAPITAL (11 KPI'S – 6 “MUST HAVE” + 5 “NICE TO HAVE”)

KPI's	Focus	KPI's Formula	Risk/ Opportunity	Suggested relevance	Bloomberg coverage (%)	
28	Strategic axes & level of management	Flexibility & adaptability	Number of level of management (5,6,7..)	Risk	Frequently used	0%
29	Safety	Execution	% of production sites certified GFSI, % of production plants covered by HACCP methods	Risk	Frequently used	0%
30	Suppliers relationship	Flexibility & adaptability, Execution	Length of duration for key suppliers (nb of years)	Opportunity	Frequently used	0%
31	Number of recalls	Execution & Customer relation	% of volume, costs	Risk	Frequently used	0%
32	Children marketing policies	Execution & Customer relation		Risk	Frequently used	0%
33	Cybersecurity	Execution	Cybersecurity in % of total IT Expenses, specific employee trainings	Risk	Frequently used	0%
34	Local production rate/ local content rate	Flexibility & adaptability, Execution	% of local sourcing	Opportunity	Nice to have	0%
35	Suppliers relationship	Flexibility & adaptability, Execution	Average terms of payment	Risk	Nice to have	0%
36	Dependence rate from key suppliers	Flexibility & adaptability, Execution		Risk	Nice to have	0%
37	Supply chain digital strategy	Flexibility, adaptability, Execution	Capex, logistics costs as a % of sales	Risk	Nice to have	0%
38	Raw materials traceability/ sustainability	Customer relation	% of purchasing volume under ESG/safety audits	Risk	Nice to have	0%



4. SOME CONCLUDING REMARKS

“Take Aways”

- Intangibili di un'azienda sono i motori fondamentali della sua crescita nel medio-lungo periodo e della sua creazione di valore nella prospettiva dello sviluppo sostenibile
- Un problema rilevante spesso sottovalutato nell'ambito della sostenibilità è quello di conoscere ed analizzare le **risorse intangibili su cui poggia la creazione di valore sostenibile**, al fine di governare tali risorse in un'epoca di trasformazione digitale
- La creazione di valore, e quindi la rivoluzione della sostenibilità nei processi d'impresa e nei sistemi industriali ed economici, «cammina sulle gambe» delle **informazioni aziendali** → «what can be measured, get managed»
- Necessità di **strumenti informativi**, che accompagnino il bilancio economico-finanziario, per **governare in modo consapevole e analitico lo sviluppo sostenibile delle aziende e la loro creazione di valore**

Verso gli ESG-I (...«I» sta per Intangibles)



PERSPECTIVES ON THE FUTURE OF INTANGIBLES REPORTING

- In 2016, Prof. Baruch Lev and Prof. Feng Gu in their book «**The End of Accounting**» stated that «arcane» and not insightful accounting information should be accompanied by a system of industry-based indicators on critical resources and processes for the value creation of an organization → Traditional financial information will of course persist, but its relevance for investors' decision making will be limited
- Similar line followed by the E&Y's project on «**Long-term value**»
- WICI has been moving exactly along this avenue by setting a Framework for a **more insightful representation and reporting of intangibles and value creation mechanism of an organisation**
- Relevance of WICI Framework also for the **development of Integrated Reporting** practice

Emerging remarks

- Difficulties of current accounting and reporting practice to capture long-term value creation drivers
- We are moving towards new systems of corporate information linked to value creation and articulated on KPIs focussing on key-factors of the business model and activities
- WICI provides a comprehensive set of voluntary sector-based KPIs from where a company can choose the most representative of its unique value creation story

The New Role of Accounting and Accountants

In the future accounting will not and cannot be only about financial numbers and double-entry

An important role will be played by non-financial information and management narrative, especially regarding company key-value drivers in the medium long-term

Conclusioni

Sostenibilità socio-ambientale e intangibili devono «andare a braccetto» con il business aziendale → rischi e attività a impatto socio-ambientale si riflettono sull'operatività e sulla capacità di creare valore aziendale → ad es., la sostenibilità alimenta il capitale reputazionale di un'azienda, che è un fondamentale intangibile per il business

GRAZIE!

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