HUMAN CAPITAL MANAGEMENT

Margin of safety

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Schroders

CONTENTS

EXECUTIVE SUMMARY

Margin of safety

As the knowledge economy has grown in recent years, **human capital has become a more important piece of the investment puzzle.** Its significance is amplified when the pendulum swings between capital and labor – a topic that has been punctuated by COVID-19 and its aftermath. In this report, we define human capital and human capital management, and explain why understanding this theme is critical to sustainable investment.

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Definition

An organization's human capital refers to its people's capabilities; a cumulative, unique, path-dependent set of individual and collective attributes, including skills, experiences, and relationships, available to the organization to create economic value. **Human capital management consists of all the systems and processes employed by the organization to optimize its return on human capital investments.** Effective human capital management involves the stewardship of a variety of systems, shown in Figure 1, under governance that is aligned with an organization's purpose, in support of its ability to deliver outcomes that either meet or exceed expectations from its diverse stakeholders.

Figure 1: Human systems at the core of an organization affect multiple stakeholders

Outcomes	Financial capital: returns, productivity
	Human capital: quality jobs, health & safety
	Social & natural capital: brand equity, social and nature impacts
Human systems	Innovation
	Talent and learning
	Incentive and performance management
	Culture and inclusion
	Operating model and workforce strategy
Company foundations	Social & natural capital: brand equity, social and nature dependencies
	Company purpose and governance

Source: Schroders.

Why should we care?

There are both structural and cyclical reasons for integrating human capital analysis into investment practice. While the long run bargaining power of labor has fallen, **it is not possible for most sectors to reduce the bargaining power of labor into perpetuity.** Cyclically speaking, fears of the 'great resignation' may be behind us, but so far at least, Central Banks have yet to break the global labor markets. Wages, employment and unfilled vacancies remain above pre-pandemic levels and despite increasing layoffs, the number of unemployed per job listing is still historically low. Further, the one year anniversary of 'peak resignation' presents cyclical risk.

One might argue that differentiation in physical assets is falling as manufacturing capacity has been commoditized and supply chains have become integrated in many industries. Were this to be the case, it could put the emphasis on other sources of value creation – human capital, for example – when we think about alpha generation. However, one does not have to argue for a paradigm shift in investing to believe human capital merits attention because fundamentally, strong human capital management should de-risk future performance. **People generate the organizational moat, creating resilience and margins of safety.** As one former Chief People Officer (CPO) put it to us in conversation:

> "...you wouldn't think about running an organization without sound financial management. Your people profession is an equally important arm in delivering success and should be so resourced."

DEFINING HUMAN CAPITAL MANAGEMENT

A systems approach

Productive Capital

Thomas Piketty famously described capital as:

"all forms of wealth that individuals (or groups of individuals) can own and that can be transferred or traded through the market on a permanent basis."[1]

Numerous critics have subsequently argued that the definition mixes the ideas of 'capital' and 'wealth', but its limitations may be altogether more simple than that. It omits the productive nature of human capabilities – skills, knowledge or labor – which are inherently developed, owned and shared but not permanently traded within society.

The Capitals Coalition defines capital as:

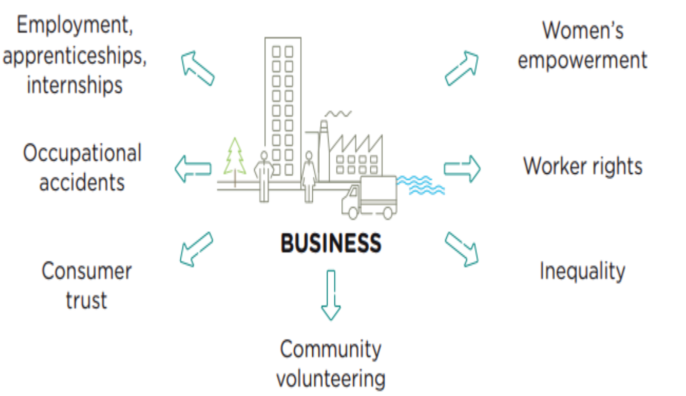
"any resource or asset that stores or provides value to people."[2]

In that sense, our appreciation of capital can and should change over time. Alan Greenspan famously evidenced this in an investment context when acknowledging in a 1999 press conference[3] the need for a change in our appreciation of what constituted a productive asset. Given the emergence of the knowledge-driven economy, there is every reason to think about an expanded definition of capital once again.

There are only a few instances today, through which people can qualify as an asset under the International Accounting Standards' definition of intangible assets, IAS 38. Certain types of software contractor are one such example, and sports players – whose economic benefits are owned once their registration rights have been signed by a club – are another. While organizations such as SHIFT and the Capitals Coalition have considered the merits of creating a capitalized living wage asset to promote the adoption of living wages across more companies and their supply chains, we are not arguing for a change in the current accounting paradigm per se. We are, however, suggesting that it is important to think about human potential and productivity as capital in a way that is similar to the categorization of plant and equipment. The reason for this is that people are the catalyst that activates otherwise inert forms tangible capital, physical or financial.

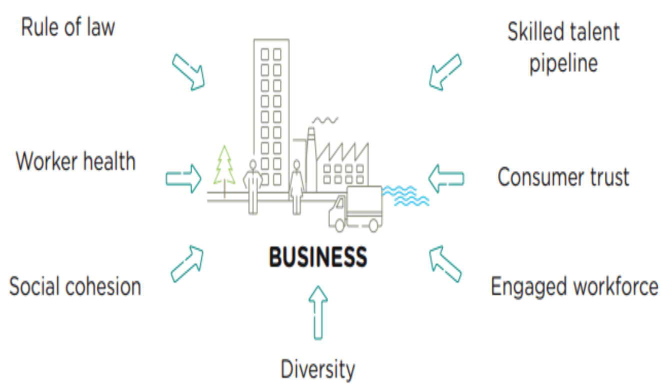
We define human capital as: the capabilities of an organization's people. These can be embedded in the knowledge, skills and relationships that are built up cumulatively as the company evolves. In that way, they become more valuable over time; people can thus become appreciating – or indeed depreciating - assets. People are effectively long-lived streams of productive potential, and companies can either invest in their growth, their maintenance, both or neither. This way of thinking about capital – in terms of stock and flows – is helpful to our cause when it comes to measurement and valuation. Figures 2 and 3 below highlight the interactions between human and social capitals and businesses, as defined by the Capitals Coalition's framework for impacts and dependencies.[4]

Figure 2: Human and social capital impacts



Source: Capitals Coalition.

Figure 3: Human and social capital dependencies



Source: Capitals Coalition.

1 See: Capital in the Twenty-First Century, Piketty, 2014.
2 See here for more on the Capitals Approach.
3 See here for full details. Alan Greenspan noted specifically that "*20–30 years ago when you built a steel plant, it was perfectly obvious what it was and it was capitalized. And when you consumed coke or ore, it was expensed. But in today's world it has become very much more difficult to figure out whether a particular outlay is expensed and not included in the measure of the GDP, or whether it is capitalized and it is. It's an all-or-nothing operation. And as a consequence of that, having moved to capitalizing the software that is not embodied in the hardware, a major shift in the process of how one evaluates what we're producing is occurring.*"
4 See here for more on the Social & Human Capital Protocol.

DEFINING HUMAN CAPITAL MANAGEMENT (CONT'D)

Our definition of human capital is focused on the people that are employed by an organization, but per the impacts and dependency graphics above, the nature of the relationship between an organization and people can contain significant nuance both within and exterior to a company[5].

Managing systems

Human capital management consists of all the systems and processes employed by the organization to optimize its return on human capital investments. Whole-systems thinking is critical to effective human capital management because people within an organization continuously interact with and influence one another. People create value and risk. Invariably, risk can manifest most prominently at times when part of the system fails, or is inadequate. We asked the numerous experts during this research – current and former Chief HR Officers (CHRO), CPOs and Heads of HR – what they thought made for successful human capital management. A significant proportion referred to whole- brained, systems thinking.

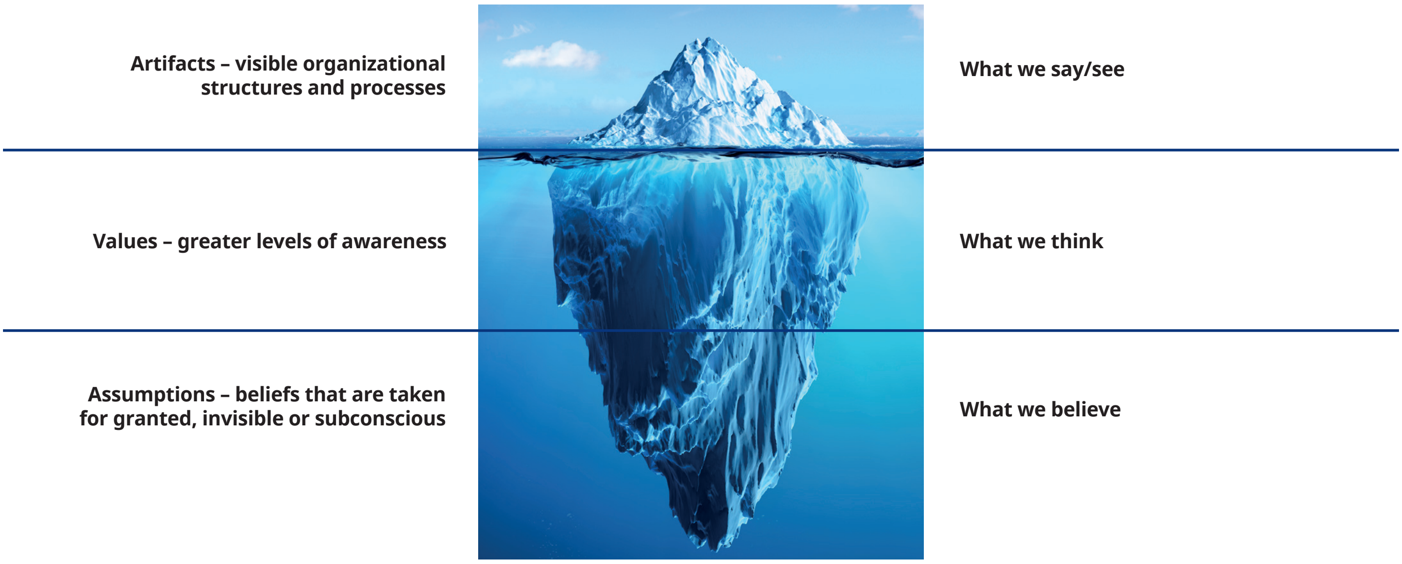
Quoting one CHRO of a multinational brand:

"...to be a Chief People Officer today, you have to be business-system-proficient. You have to hold your own with hard-nosed, hard-edged business leaders who will ask you to justify what you are proposing in the context of their whole business. You have to be financially numerate, focused on investment and returns."

Systems are common place in modern industry. Manufacturing production platforms, for example, are built on numerous systems working in harmony; maintenance needs to fit into the system in a way that promotes continual functionality whilst enhancing overall output. Synergy is core to the success of multiple systems, as implied by the well-known principle: the whole is greater than the sum of its parts. This has profound implications in human capital management, because while people's behavior and actions can be influenced both by endogenous and exogenous factors, it is hard to diagnose what goes on beneath the surface.

Taking our cue from Edgar Schein's model of organizational culture – see Figure 4 – we believe it makes sense to split the analysis of company human capital up into three principal layers: foundations, human systems, and outcomes. Foundations align to Schein's assumptions, the bedrock of the organizational hierarchy. The human systems that sit on top of these can drive employee action and behavior by bringing foundations to life and activating values. More often than not, it is only the consequences of effective or ineffective management of these systems that are visible. However, per Schein's theory, these represent only the tip of the iceberg.

Figure 4: A model of organizational culture



Source: Worldscope, Schroders. *for significant T-stats at 95% and ** for significant at 99%. We explicitly take into account the positive relationship with ROCE and R&D intensity in order to focus on the 'pure' information attributable to "Excess HCROI", which we define as HCROI adjusted for ROCE and R&D intensity. Time period for regression 2014-2022.

5 There are numerous definitions of human capital that are similar in nature. Among the most popular are the two that follow: "*The knowledge, skill, competencies and attributes embodied in individuals that facilitate the creation of personal, social and economic well-being.*" (Keeley 2007); "*The cumulative knowledge, skills and abilities of an organization's people and the impact on an organization's long term performance, as well as competitive advantage through optimizing organizational outcomes.*" (ISO 2018).

DEFINING HUMAN CAPITAL MANAGEMENT (CONT'D)

Figure 5 below illustrates our view of the organizational hierarchy, aligning Schein's model to a familiar set of human capital issues. Synonymous with the assumptions on which an organization is built, foundations are represented by a company's purpose and governance. We have sought to condense the human systems that can be actively influenced or managed by an organization to drive value creation into five categories. These are: operating model & workforce strategy, culture & inclusion, incentive & performance management, learning & development, and innovation systems. In Schein's iceberg, these human systems represent and bring to life the values of an organization. Outcomes can subsequently pertain to human, financial and other forms of capital.[6] Again, per Schein, these are the things that we see.

Figure 5: Human systems at the core of an organization affect multiple stakeholders

Source: Schroders

It is important to differentiate between what we describe as human capital overall, and the individual features that influence it, as identified above. These concepts are discussed more in our third and fourth reports, "Performance Levers" and "Codifying Best Practice", but are explained briefly as follows:

- **Purpose:** "*the raison d'etre of an organization, defining its reason to exist*"[7]
- **Workforce strategy:** how organizations plan and prepare their workforce to deliver on business strategy[8]
- **Culture:** "*an invisible hand at work inside of each of the employees that helps to guide their decisions and judgments in a way that the overall corporation would desire it to be*"[9]
- **Inclusion:** creating the right environment for diverse employees to thrive
- **Incentive & Performance Management:** motivational and improvement programs (carrot and stick)
- **Talent & learning:** how firms attract, recruit, develop and retain diverse people to deliver strategic value
- **Innovation:** the flow of ideas and information among people across the enterprise for product or operating model evolution (this can involve new technologies as well as new processes)

While there are detailed and numerous accounts in favor of systems thinking among HR practitioners, our general view is that effective human capital management requires a whole-systems approach, because of the complexity of people.

Business transformation professionals might suggest that the failure rate[10] on organizational change efforts is driven by a singular, rather than system-wide focus. Similarly, a psychologist might describe the importance of systems thinking at organizational level because of the nuance between the left (analytical) and right (intuitive) hemispheres of the human brain. Our definition of human capital management, and the need for it to address the systems identified above, is designed to capture the nuance contained in these practitioner examples; in a way that is broadly measurable by investors. Following an iterative method, optimal human capital management should seek to balance each of the systems for the benefit of all stakeholders.

6 We acknowledge that company outputs have consequences for other forms of capital, such as nature and other forms of physical capital. However, for the purposes of this research, we have chosen to focus on financial and human capital.

7 See: Younger, Mayer and Eccles: Enacting Purpose within the Modern Corporation, 2020.

8 See here for PWC workforce transformation strategies.

9 See: Graham et al, 2019.

10 According to McKinsey's transformation practice, here, 70% of business transformations fail. This can be due to: goals, lack of conviction, skills, alignment, systems and infrastructure (among others).

WHY DOES IT MATTER?

Structural and cyclical importance

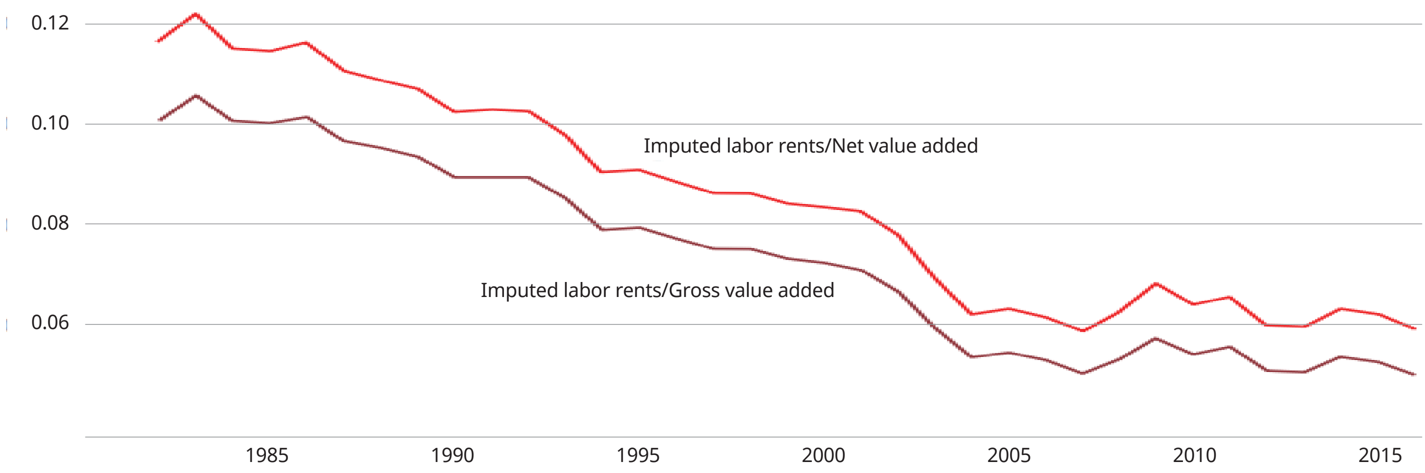
The bargaining power of labor

The developed market labor share of corporate value added had been in terminal decline for several decades up until the global financial crisis. Within that, 'labor rent' – or the excess value that accrues to labor through high wages – has also been shrinking, per Figure 6. It subsequently stabilized around the GFC, perhaps indicating the long term nadir in the bargaining power of labor or the long run normalization in wage premia but has latterly come under pressure as real wages have been impacted in the current environment. From a structural perspective, one wonders whether the importance of labor in the ability of companies to generate returns on other forms of capital – for example, human capital activating otherwise inert forms of tangible manufactured or financial capital – underpins the resilience that has been on display in the labor share over the last decade or so. We do not believe it is sustainable to reduce the bargaining power of labor into perpetuity for the vast majority of industries.

From a cyclical perspective, we must acknowledge the events of the last two years. Data from organizations like JUST Capital highlight that firms with strong balance sheets, good governance and better treatment of workers before the pandemic, were more resilient throughout it.[12] And as we saw with the emergence of the 'great resignation', when the world moved into its post pandemic recovery phase, workers responded by lifting their heads, considering work life balances and, in many cases, re-evaluating their careers. There are numerous reasons to justify this. Surveys point to a combination of pay, work / life balance, and purpose, among others all playing a part. The result, as demonstrated by Figure 7 and Figure 8 on the next page, was a significant climb in the proportion of companies concerned about labor shortages and wages, even as the 'great resignation' matured. Per BLS data too, monthly quit rates and job openings are still elevated. Wages, employment and unfilled vacancies remain above pre-pandemic levels, despite increasing layoffs.

Figure 6: Declining labor share of corporate value added[11]

Plots show the share of value added for labor in non-financial corporates.



Source: Stansbury and Summers, 2020. Rather than showing the labor share of value added itself, which is popularly quoted in discussions on human capital, the authors of this chart seek to illustrate declining worker power in macroeconomic terms by calculating the union wage premium, large-firm wage premium and industry wage premia to quantify the 'labor rent'. The premise for these authors was that firms share rents, or value, in this way with workers for three reasons: bargaining power though unions (or the threat of unionizing), firms being run in the interest of employee stakeholders, or firms paying higher wages to incentivize higher effort. We discuss these concepts more when we introduce employee-economic-value-added.

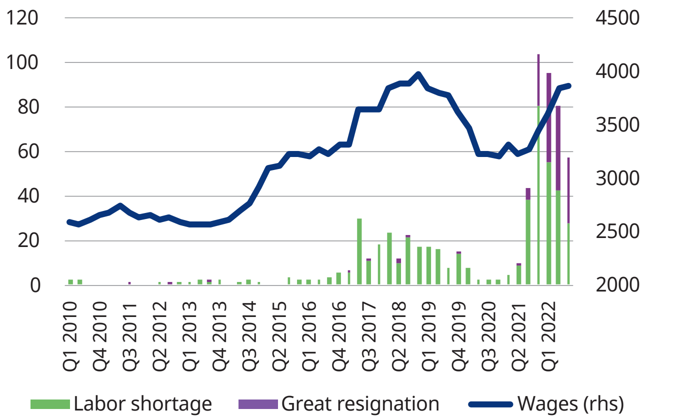
11 See: Stansbury and Summers: The Declining Worker Power Hypothesis, 2020. While our reference to this paper is focused simply on the declining portions of value added accruing to labor, it goes on to make some important points about inequality within the income distribution; "*we note that the decline of labor rents has also likely increased inequality in labor incomes: the declines in unionization and the real value of the minimum wage and the fissuring of the workplace affected middle and low-income workers more than high-income workers, and some of the lost labor rents for the majority of workers may have been redistributed to high-earning executives (as well as capital owners).*" They go on to note that another important finding from their research was that industries with higher wage premia have substantially and significantly lower quit rates – a function of the rents in these instances.

12 For example, see: Lester, Rouen and Williams: Financial Flexibility and Corporate Employment, 2021.

WHY DOES IT MATTER? (CONT'D)

Figure 7: Rising concern over wages

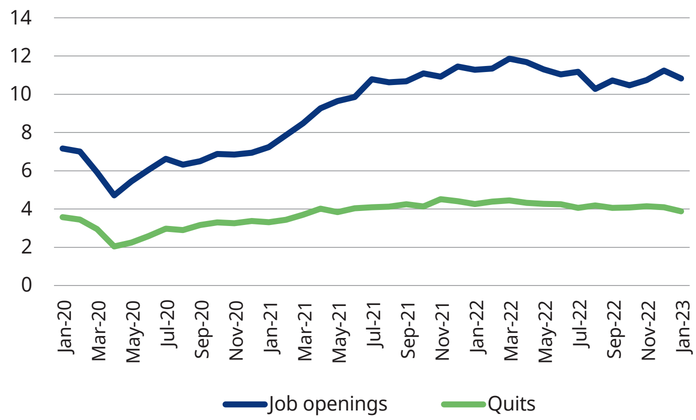
Chart shows the references to key terms on company conference calls peaking during great resignation.



Source: Bloomberg, Schroders.

Figure 8: Job quits still close to all-time highs

Chart has seasonally adjusted job-opening and quit rates in the US in millions.



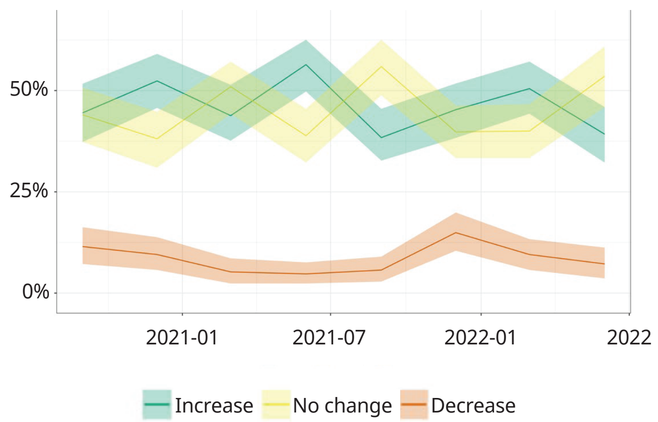
Source: BLS, Schroders.

The pace of the post COVID expansion in the global economy has slowed. Figure 9 highlights survey results of Chinese senior executives responsible for recruitment towards the end of last year. While there has been a slight tick down in the percentage of firms intending to grow hiring, the number looking to shrink has been constant. Figure 10 highlights US vacancies, moderating fast but still at historically high levels. Could the pendulum remain more in favor of labor than it has been over the last decade, even as central banks continue to tighten? It's worth bearing in mind too, that **recessions focus the mind even more on identifying the best talent**.

Workforce data provider Revelio Labs published in a newsletter that 2022 attrition rates in the United States were elevated relative to historic levels for much of the year.

Figure 9: Chinese hiring intentions

Chart shows response to question: compared with the current quarter, how will hiring change next quarter?



Source: UBS Evidence Labs, Schroders.

Figure 10: US job listings

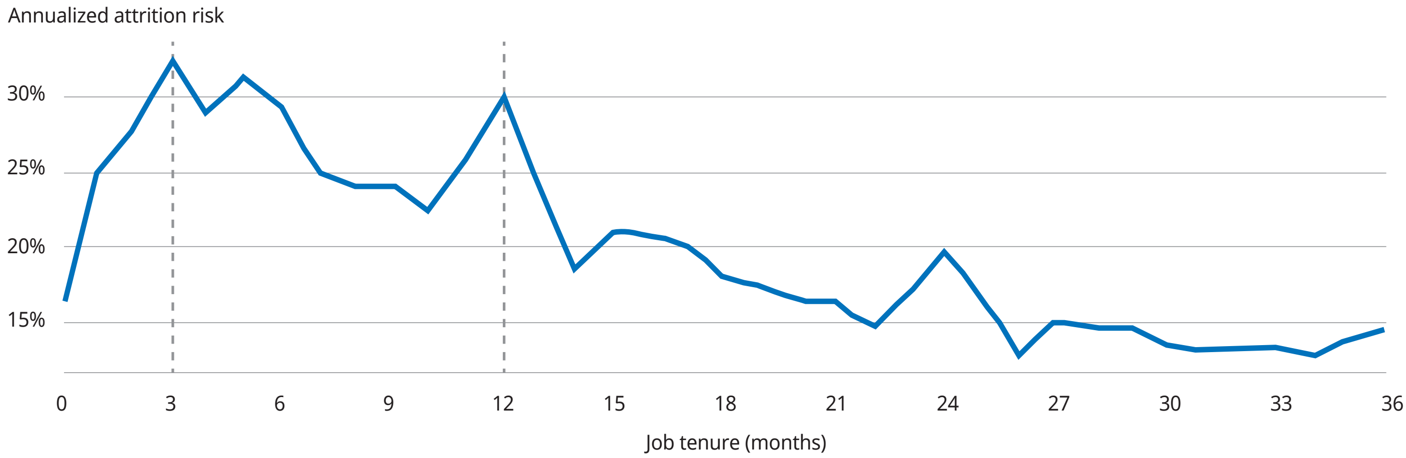
Chart has job listings by sector for the USA.

Source: UBS Evidence Labs, Schroders.

WHY DOES IT MATTER? (CONT'D)

Per Figure 11 below, **the attrition risk of workers peaks at three and then 12 months after hiring.** Given we rolled off the zenith in quit rates during spring/summer 2022, it is conceivable that this attrition risk presents itself in the near term. 12 months is an important yardstick for employee retention, after which time the probability of leaving falls, per the chart. However, this impending wave of attrition – if it emerges – could have profound consequences given the pay increases that were put through by many firms during the peak of the great resignation, particularly if we see higher numbers of 'boomerang employees' returning to firms they'd previously left at, again, higher rates of compensation. As we discuss more in our fourth report – "Codifying Best Practice" – there are also important nuances to understanding the reasons for churn. We learned anecdotally recently that as many as 65% of the senior level exit interviews at one global tech firm highlight the lack of career development as the motivation for leaving. It's not just as simple as pay. Firms need to be good human capital managers.

Figure 11: Attrition risk by job tenure



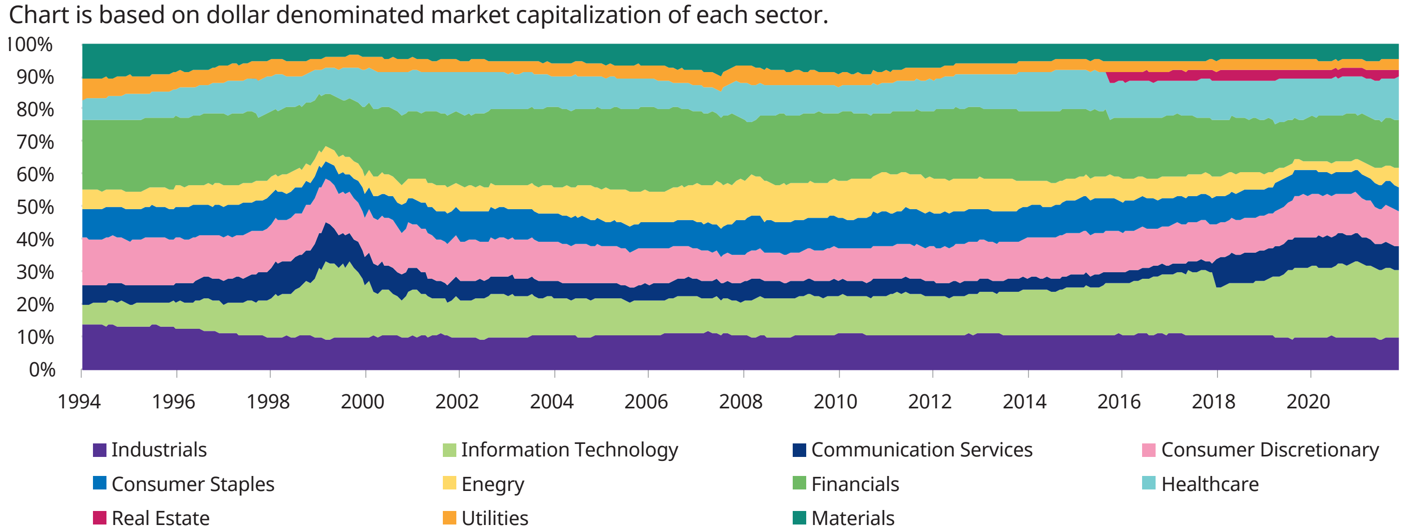
Source: Revelio Labs.

Stepping back to consider the evolution of the global economy over the last thirty years, proxied by equity markets, we note the **considerable growth in sectors where the IP is dominated by people.** Despite the meaningful rotation witnessed in 2022, human-centric sectors dominate the current market capitalization of the MSCI ACWI, as highlighted in Figure 12.

Cyclical fluctuations in hiring and value vs growth regime changes notwithstanding, Information Technology, Financials and Healthcare sectors approximate to half of ACWI market cap in dollars. As discussed in our empirical analysis, human capital plays a part in other sectors too, further supporting the argument as to its relevance.

Figure 12: Proportionate market cap of sectors in the MSCI ACWI through time

Chart is based on dollar denominated market capitalization of each sector.



Source: Refinitiv, Schroders. Data to November 2022.

Investment relevance

Margin of safety

Most companies claim that their people are their greatest asset but per the chart above, the significance of this has expanded as the relevance of balance sheet intangibles and the knowledge economy have grown. Human capital features like culture, trust or management quality have tended to be evaluated qualitatively with a view to understanding the 'intangible' strength of an organization and building confidence in its strategic and operational capabilities and potential. We like to think of human capital management in terms of margin of safety; albeit defined somewhat differently to how Ben Graham may have originally intended it. Graham's definition reads as follows:

"The function of margin of safety is, in essence, that of rendering unnecessary an accurate estimate of the future. If the margin is a large one, then it is enough to assume that future earnings will not fall far below those of the past for an investor to feel sufficiently protected against the vicissitudes of time."[13]

We are not arguing that human capital management assessments should become the new cornerstone of value investing. But when it comes to considering the resilience of business models, and hence the margin of safety, there is merit in understanding how companies manage their human capital, their cultures and the systems that underpin them. Simplistically, we argue this because decisions are taken by people.

In an organizational context, decisions are taken at all levels of the hierarchy. While C-suite is focused on strategic questions, operational decision making is usually devolved to middle management, whose proximity to the day-to-day and customers leaves them at the intersection of strategy and market forces. **Leadership therefore plays a critical role in modeling effective decision making. But the everyday choices that face employees are also influenced by culture** – and other human systems – while being reinforced and guided by corporate values, purpose and governance. They can have financial and sustainability consequences.

Take the case of an integrated oil & gas firm: FID processes involving long lived assets can have meaningful consequences, far beyond the likely duration of an ordinary CEO's tenure and incentive program. Such decisions affect both debt and equity sides of the balance sheet, as well as a range of stakeholders from both a financial and sustainability perspective. These processes can be heavily influenced by compensation cycles and company performance cultures.

While this is an obvious example, it is true of all types of organization no matter the length of their product cycles or the nature of their risk taking. Wherever trade-offs are necessitated by the juxtaposition of commercial opportunity and incentives set against external stakeholder outcomes, culture, governance and human capital management take on added importance. History is littered with infamous examples of such conflicts playing out to dramatic effect across multiple industries, whether it be through corner cutting in governance and compliance, miss- selling, excessive risk taking and so on.

Meanwhile, in environments that are somewhat further away from the cutting edge of capitalism and profit motives, such as hospitals, the importance of human capital systems is undimmed. Patient care outcomes in hospitals are still being more affected by actions of workers at the very bottom of the pecking order than one may have thought.[14]

13 The Intelligent Investor, Ben Graham.

14 In 2019 an FDA study, for example found that over 5% of clinically used duodenoscopes were contaminated. Reusable scopes are reprocessed after use but contamination and subsequent infection can persist. Apparently, 49% of the reports in the sample analysed identified infection 'potentially transmitted' by the device. Similarly, a US Senate publication from 2016 found that reusable duodenoscopes were directly linked to circa 25 different instances of antibiotic-resistant infections. We note that reprocessing involves manual and machine driven cleaning. Are the employees or contractors carrying out these tasks engaged, invested in and considered as drivers of patient care outcomes?

WHY DOES IT MATTER? (CONT'D)

All the while, there is a growing chorus of publications such as that recently by the MIT Sloan Management Review to argue that a hospital's purpose can and should extend all the way across its employment roster.[15] Are hospital support staff effectively engaged by the purpose of the hospital? Or, if they are subject to cost-driven management of their pay and hours, are their behaviors and actions likely to be affected in ways that, at the margin, have more severe negative consequences for outcomes? Suffice to say, we argue that the relevance of human capital can be applied to a range of different companies and sectors.

In each of the examples we have dug into, different human systems – culture or incentives, for example – play a role in reinforcing decision making and worker behavior. In an effective organizational structure, such employee action should always be consistent with company values, and reinforced by company purpose.

As the theory goes: purpose governs stakeholder relations; culture changes slowly; trust takes a considerable time to grow; and the three are then mutually reinforcing. Our conversations with experts and current or former CHROs reinforced these views, specifically noting their importance in talent retention and productivity. For example, the HR head of a large global technology firm explained:

> "...they [values] create stickiness by helping people feel validated and establishing how we work together in a way that sets us apart from the competition."

And yet these guide rails can each also be broken; cracked either swiftly by poor leadership decision making, or gradually subverted by systemic underinvestment and limited support of human capital.

Employee habits and rituals – repetitive behaviors – can be thought of as the active manifestation of the human systems at play in an organization. This is characterized by constant feedback loops revolving around trust and purpose. In combination with effective leadership, these loops create the attitudes and actions among employees that drive organizational effectiveness. Over time these systems feed human capital in a way that contributes to organizational resilience.

As it pertains to Ben Graham's theory of value investing, it is unarguable that valuation, balance sheets, ROCE profiles or even long product cycles afford investors and managers high margins of safety and time, supporting investment decisions. But where companies have built effective controls for measuring, monitoring and managing their core human systems, we believe they are likely to be more capable of navigating the future effectively, regardless of what is thrown at them, because they can rely on their management toolkit and their people doing right by the company and its stakeholders. In this way, analyzing a firm's human capital offers investors a dynamic and operational approach to margin of safety.

While our next report – "Sustainable Competitive Advantage" – assesses the empirical support behind the theory that human capital drives company performance over time, we have found evidence that it is incremental to a commonly used definition of quality, ROCE. For example, the optimal linear combination of human capital returns with ROCE as implied by historical returns lies with a 20% to 30% HCROI weighting and a 70% to 80% weighting to ROCE. We are not making a point here about quality vs value or any other investment style. Rather, we fundamentally believe that human capital management having a small incremental effect in addition to ROCE – which itself is a manifestation of one of the ways in which a business can create value – is a natural consequence of the way in which people create margins of safety. Human systems create habits and rituals which in time become part of the fabric of a company's competitive advantage; and thus over time they feed into the moat and long run returns.

As we think about the role people can play in generating an organizational moat, it is important to acknowledge that understanding the nature of the feedback loop underpinning a company's human capital management has long been a qualitative part of the investment process. Whilst this involves interrogating how firms invest in and nurture their employees, it can be aided by measuring outcomes via metrics like human capital returns, controlled against appropriate variables. The process as a whole can help long term investors gain greater clarity on margins of safety, *"rendering unnecessary an accurate estimate of the future"*. As discussed in the next report in this series, there is evidence to suggest that the effective management of human capital is financially material.

15 See MIT Sloan Management Review article: Unlock the Power of Purpose. An interesting question here would be to ask what the purpose of a hospital should be. If it's excellent patient care, then that's a non-monetary target. If it's growth and profitability, the story is altogether different. This outlines the importance of human capital in excelling not only in relation to financial performance goals, but also in relation to non-financial items, which can often be thought of as externalities.

Regulation

Emerging standards

On top of the investment logic pertaining to the importance of human capital, securities regulators are starting to acknowledge its systemic relevance. Whether it is the impending creation of the Taskforce for Social-related Financial Disclosures (TSFD), the continued growth of the Workforce Disclosure Initiative (WDI) or the Securities and Exchange Commission (SEC) and the European Financial Reporting Advisory Group (EFRAG) intended disclosure standards for social and human capital metrics, there are rumblings of progress.

While there is a range of data advocated by these different frameworks, we are most focused on the proposals of the Human Capital Management Coalition (HCMC) in the USA. The HCMC has petitioned for a standardized reporting framework which takes a balanced approach to human capital reporting by requiring a set of four foundational line-item metrics to complement principles-based data. The HCMC supports mandatory reporting of the following foundational disclosures:

1. **how many workers** (including employees and independent contractors) the company uses to accomplish its strategy;
2. **total cost of the workforce**, presented in a way that evidences a discernible through-line from the company's audited financial reports to issuer disclosures;
3. **turnover**, including management's actions to attract and retain workers and how changes in the ability to attract and retain workers affects the company's performance and strategy; and
4. **diversity data**, including diversity by seniority, sufficient to understand the company's efforts to access and develop new sources of human capital and any strengths or weaknesses in its ability to do so.

Figure 13 is drawn from a complementary petition on the inclusion of total workforce cost in financial reporting submitted to the SEC by the Working Group on Human Capital Accounting disclosure in the USA. It is accompanied by the following commentary:

> ***"To accurately value a company, investors must be able to distinguish investments from maintenance expenses. Three straightforward disclosure rules in this area would allow investors to draw that distinction. First, managers should be required to disclose, in the Management's Discussion & Analysis section of Form 10-K, what portion of workforce costs should be considered an investment in the firm's future growth. Second, workforce costs should be treated pari passu with research and development costs, meaning that workforce costs should be expensed for accounting purposes but disclosed, allowing investors to capitalize workforce costs in valuation models as appropriate. Finally, the SEC should require greater disaggregation of the income statement to give investors more insight into workforce costs."***

Figure 13: Proposed grid disclosure for reporting total workforce costs

Table displays the core data expected by the Working Group on Human Capital Accounting Disclosures

	Full-time employees	Part-time employees	Contingent Workers
Mean tenure			
Employee turnover			
Number of employees			
		Total compensation by category	
Salary			
Bonus			
Pension			
Stock awards			
Option awards			
Non-equity incentive compensation			
Pension & deferred compensation			
Healthcare			
Training			
Other			

Source: Harvard Law School Forum on Corporate Governance.

WHY DOES IT MATTER? (CONT'D)

Accordingly, the working group's proposed approach to the minimum required workforce disclosures is clear and far less onerous for companies – we believe – than many of the other frameworks and developing regulatory standards. In our view, the data points highlighted in Figure 13 above represent the next most important human capital disclosure topics for companies. Crucially, they are sufficient for us as investors to build views of a company's ability to generate value for and from its workforce, by interrogating the leverage achieved by companies on investment in their people, and the gain-sharing between labor and capital.

Considering the example of Alan Greenspan speaking to the importance of capitalizing IT spend, it is not implausible that accounting or regulators move at some stage towards recognizing the value delivered by what is arguably one of the largest 'assets' not to be registered on company balance sheets. That does not, however, have to be a central case for us to analyze human capital management more quantitatively, as a complement to pre-existing approaches. The impacts and dependencies associated with human capital management mean it is an excellent place to focus the mind when considering how companies generate returns for multiple stakeholders. Applying certain of the approaches that we describe in subsequent reports should, we believe, be additive to our understanding of how organizations can create value sustainably.

STEPPING BACK

There are multiple reasons to integrate the quantitative analysis of human capital management into investment, in addition to the fact that employees are a key stakeholder to most industries:

- **Human capital impacts and dependencies can have profound consequence for society and business;**
- **Human capital management systems can be assessed objectively to steer our understanding of the drivers of company value creation;**
- **People within an organizational context can deliver margins of safety through their habits and rituals that are shaped by human capital management – a process which creates company resilience;**
- **The knowledge economy continues to comprise a majority of global market cap, but the**
- **commoditization of physical assets confers a need to look to other possible sources of alpha.**

In the next report in this series, we dig into the ways in which investors can measure human capital management and its effectiveness, and we set out the case for its materiality.

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