# Chapter 5 Towards the elite theory of economic development (ETED)

Economics is the body of substantive generalizations on the workings of economic systems. (Stigler, 1952, p. 206)

Chapter 5 ties together the previously developed micro- and meso-level ideas about elite agency and begins the process of transitioning these to the macro-level with implications for general economic performance. The macro discussion of economic development emphasizes sustainable value creation and rent-seeking phenomena in matching parallel to the first-order value creation and risk origination and secondorder transfer activities of elite business models in relation to their stakeholders. The aggregate value creation of elites at the meso elite system level is consolidated as the conceptual cornerstone of this elite theory of economics. Analogous to the study of elite business models, elite agency is further understood in terms of its influence on macro-level development. Hence, in Section 5.1, existing theory is leveraged to further reveal the theoretical links and transmission mechanisms between firm-level value creation and macroeconomic development through the advancement of elements like the 'elite business model critical junctures' conjecture. Section 5.2 takes a similar approach but hones in on firm-level extractive value transfers and negative macroeconomic development by advancing elements like the typology of individual non-elite responses to value transfers. Section 5.3 further consolidates the ETED system conceptually through the advancement of sustainable value creation (SVC) measurements and the development of conceptual elements like elite cohesion and the 'extractive escalation dynamic'.

# 5.1 Theoretical support for value creation as the microfoundation of economic development

Value creation refers to first-order "productive" activities (see the examples listed in Table 2.1), as in Bhagwati (1982, p. 989): "To produce goods or services that enter a utility function directly or indirectly via increased production or availability to the economy of goods that enter a utility function". "Unproductive" activities, on the other hand, are second-order transfers where "direct output is simply zero in terms of the flow of goods and services entering a conventional utility function" or DUP ("directly unproductive, profit-seeking") which "can be pronounced 'dupe' activities, coming close to the spirit in which economists must view these activities!" (Bhagwati, 1982, p. 990). Whether Marx's stages theory of economic development, structural change theory focusing on urbanization, or neoclassical theories advocating unim-

peded free markets, many thought systems that seek to explicate desirable economic development stress value creation as a first-order productive economic activity. To the ETED, incentivizing micro-level transformation towards sustainable value creation is the most demanding challenge for policymakers because it requires political leadership to overcome the resistance of extractive vested interests (e.g., The Contest for Japan's Economic Future: Entrepreneurs vs Corporate Giants, Katz, 2024), a deep understanding of business models and their links to society, the impact of laws and regulations, as well as knowledge elites able to discern all of this and design effective structural reform with the attendant winning narratives.

The first section of Chapter 5 concerns itself once more with value creation business models and the nature of productive activities. It starts with a brief review of economic development theories and then tightens the conceptual link between development and the 'elite business model critical junctures' conjecture by offering specific examples (5.1.1). Next, innovation activities are appraised as a central tenet of economic and human development (5.1.2). The section closes by suggesting that all sustainable value creation can be ascertained, whether on- or off-balance sheet, because quantifying value transfers from one sub-set of society to another is possible (5.1.3).

#### 5.1.1 Elite business model critical junctures for economic development

Theories of economic development vary significantly. Marx saw the sequential stages of feudalism, capitalism, and socialism in terms of extraction and the broad brushstrokes of class struggle, but did not comprehensively delve into the specifics of elite business models. Neither does the modernization theory of Lipset (1959) that links a transition from traditional to modern social practices with democracy and economic development, or Rostow's The Stages of Economic Growth (1960), a "non-Communist" structuralist blueprint for modernization theory with its linear (six) stages of growth. Such economic development models see development occur in a mandatory sequence based on capital accumulation facilitated by international and domestic savings. Modernization theory has been criticized for being simplistic, as has international dependence theory that arose in the 1970s. The latter is an alternative left-leaning development theory that sees dependence as "a situation in which the economy of certain countries is conditioned by the development and expansion of another economy to which the former is subjected" (Dos Santos, 1970, p. 231), and is centered on denunciations of imperialism, neocolonialism, and external impediments as the causes of a failure to develop. Prebisch, one of its earliest exponents, complains of Latin America's role at "the periphery of the world economic system", and of an "out-dated schema of the international division of labour" devised to reduce underdeveloped countries to "producing food and raw materials for the great industrial centres" (1950, p. 1). Conveniently, dependency theory underemphasizes domestic factors, such as the extractive practices of local elite business models, which are central to the ETED.

The Smithian free market model focuses on exchange to achieve full value creation potential and realize "any potential value that resides in an economic system [...] facilitating the continual reallocation of resources to their more productive uses [...] and reorders the set of resources that are available for new combinations" (Moran & Ghoshal, 1996, p. 42). The Keynesian Harrod-Domar model of economic growth focuses on savings and capital investments with a coefficient that acts as a multiplier or accelerator for long-run growth (Solow, 1956, pp. 65-66). When fixed proportions are assumed for the factors of production (population/labor and savings/ capital), one is stuck in a constant returns to scale function that eventually hits diminishing returns or, even worse, is very unstable and "balanced on a knife-edge of equilibrium growth" (Sato, 1964, p. 380). By modeling capital accumulation (stock) per head dynamics, the economic exogeneous growth model, independently developed by Solow (1956) and Swan (1956), aims at the long run, with no rigidities or fixed factor proportions in the fashion of the neoclassical tradition in which it is embedded. Critically, in the Solow-Swan model, capital and labor production factor constraints break free through technological advances and productivity increases. Technological change—like labor force increases—is also conveniently assumed to be an exogenous variable in the model. From the 1980s, the neoclassical paradigm associated with Solovian steady growth and sustained equilibrium became ascendant over structuralist, linear stage models, both in the theory and policy arenas. The endogenous growth models that followed (Romer, 1986 and 1990; Lucas, 1988), and Schumpeterian growth theories and models (Aghion & Howitt, 1992) with a focus on the inner dynamics of the political economy, such as technology adoption rates, will be touched upon in the next section.

Institutionalists agree with the basics of neoclassical economics but view the theory as "unable to account for economic growth since it is only concerned with the operation of markets, not with the way markets develop overtime" (North, 1996, p. 342, as cited in Faundez, 2016, p. 386). The critical junctures hypothesis, an important contribution to development theory, references path dependency (David, 1985) of the institutional kind (Libecap, 2011): "institutional change which affects both economic and political development is initiated by differences during a certain critical historical juncture" (Acemoglu, Johnson, Robinson, & Yared, 2009, p. 1043). The 'elite business model critical junctures' conjecture (see Section 4.3.3) maintains that institutional change is endogenous. When inclusive, institutions are brought about by new elite business models, often those of Schumpeterian newcomers (such as the Manchester industrialists, Tesla, or BYD Auto), shaking up the system of established dominant coalitions (such as the London landowners or the internal combustion engine) and resulting in an admixture of new and old elites. Moreover, as previously discussed, this elite theory posits that the discrete development paths of the nations of the world accrue from the variance of the value creation positions of the business models in their national elite systems. Elites gravitate towards, come together, and agglomerate around specific elite business models that, once a threshold is reached, consolidate as a critical development juncture in a theoretical transition from the micro- to the macro-level through the meso-level elite system.

At critical junctures, elite business models in possession of 'the extraordinary lever' assert dominance and so chart a nation's path, affecting long-term developmental performance through the degree of their sustainable value creation and extractive transfers and how that adjusts over time. Given the inexorable pace of technological and social progress, without business model transformation, today's inclusive elites will become tomorrow's extractors. Returning to the example of the combustion engine, in Germany (despite the inventions of Karl Benz in the 1870s, the over 80 auto companies existing in the 1920s, and the Motorisierung policies of the 1930s), the business model only took off in the postwar era and today remains the chief pillar of Germany's political economy, even though its days now seem numbered. Japan's slowly eroding keiretsu main bank model is rooted in the Meiji Restoration of the late 19th century. The developmental consequences of the Soviet Union's Dutch disease, a model based on the discoveries of Ural oil in West Siberia and Tyumen in the 1970s, are expounded on in a Carnegie Endowment for International Peace report:

Between the end of World War II and the mid-1960s, the Soviet Union's economy was one of the most vibrant in the world. The country had successfully launched the first man into space and was competing with the United States in developing cutting-edge military technology. However, by the end of the 1980s, the economy was in a miserable state. (Ermolaev, 2017)

In the earlier example of Spain (Section 4.3.5), the decisive critical juncture came about in the 1960s through the innocuous policies of desarrollismo that ushered in the elite business models (and the subsequent incremental institutional change) of regulated energy and utilities, construction and tourism, and banking finance. Under the precepts of the paradigm of this work, these elite business models and supporting rules have further agglomerated via endogenous gradual reinforcement and insufficient transformation, negatively impacting on modern Spain's comparative prosperity in Western Europe. One might argue that the impact of elite business models is always greater than more visible, high-order institutional change, in this case the restoration of democracy in 1977 or accession to the EU in 1986. For instance, like Kim Beom-soo, Amancio Ortega, the founder of Inditex—the world's largest fashion group—has origins far from Spain's Madrid elite. Both have created immense value, but unlike his Korean peer, Ortega's amazing value creation journey is not a native Spanish story: the phenomenal success of Inditex has nothing to do with Spanish institutions—it happened despite its elite system—and everything to do with the institutions of globalization. Moreover, the company will make no contribution to an elite business model critical juncture in Spain and so the impact on economic development of Ortega<sup>80</sup> is currently not comparable to

80 A distinguished new figure in the Spanish establishment, the personal wealth of Ortega is deployed in the time-honored fashion of his incumbent elite peers and consistent with the country's path depen-

that of Kim: the Spaniard has built the world's most efficient and innovative fashion company, while the Korean endogenously nudges the national elite system and its institutional make-up towards higher value creation positions spurred by the evolution of technology.

The above discussion adds nuance and brings to life the 'elite business model critical juncture' conjecture. Value creation results from activities such as production and exchange (see the full list in Table 2.3) and includes, according to Baumol (1990, p. 893), "productive activities such as innovation". To have relevance for economic development, however, the waves of innovative value creation models must agglomerate and materialize in institutional change. Baumol's emphasis moves us to Schumpeter's (1911/2003) perspective and his comprehensive placement of innovation as the central theoretical foundation for value creation.

#### 5.1.2 Innovation as the central value creation activity for economic development

The innovation dynamics of capitalism emanate from intra-elite contests, the most important of which take place between incumbent and emerging elites. This is actually the view of Marx and Engels in their *Manifesto of the Communist Party*:

The bourgeoisie cannot exist without constantly revolutionizing the instruments of production, and thereby the relations of production, and with them the whole relations of society. [. . .] Constant revolutionizing of production, uninterrupted disturbance of all social conditions, everlasting uncertainty and agitation distinguish the bourgeois epoch from all earlier ones. All fixed, fast-frozen relations, with their train of ancient and venerable prejudices and opinions, are swept away, all new-formed ones become antiquated before they can ossify. (Marx & Engels, 1848/1969, p. 16)

In economics, innovation is understood as Solow's (1957, p. 312) formalization of technical change: "variations in output per head [not due] to changes in the available capital per head". Abramovitz (1993, pp. 217–218) was quick to point to empirical findings (like Solow's own) where labor and capital account for only 10% of growth, while technical change, or total factor productivity (TFP), accounts for 90%; due to its residual nature, innovation "hogs the whole show", yet is also a "grab bag" as well as "some sort of measure of ignorance". Degrees of ignorance, however, have receded as innovation has been incorporated into models as an endogenous variable. Technological changes provide increasing returns over time (Romer, 1986), where "vertical innovations, generated by a competitive research sector, constitute the underlying source of growth" (Aghion & Howitt, 1992, p. 323). The government's pivotal role in education

dent institutional make-up: real estate and regulated sectors (as suggested by Chamizo, 2021). This would suggest that Spain's elite circulation mode is one of 'infiltration' (see The Elite Circulation Matrix, Figure 1.1).

and research means that policymakers must ask "what are the best institutional arrangements for encouraging the production and use of new knowledge?" (Romer, 1994, p. 21). Moreover, economic productivity growth's relationship to innovation has also been probed (Aghion, Bloom, Blundell, Griffith, & Howitt. 2005), as have its institutional causes: the model of Chu, Cozzi, and Galli (2012, p. 742) puts the accent on "the asymmetric effects of patent rights on different types of innovation and the potentially different policy implications on economic growth and social welfare".

At the micro-level, innovation has been associated with investment in human capital. Dewar and Dutton (1986) point out that "extensive knowledge depth" embodied in human capital is essential for the two innovation types expressed in many value creation business models: incremental innovation (requiring moderate degrees of new knowledge) and radical innovation (requiring high degrees of new knowledge). Innovation must play a central role at firms (Christensen, 1997), especially when, as Moran and Ghoshal (1996, p. 41) claim, "all firms are not equal in their prospects for innovating or for exploiting the innovations of others" and in conceiving strategy as value creation and value appropriation for the long term. For Porter (1991, p. 111), innovation gives firms "considerable latitude in both influencing their environment and responding to it". Kirzner, and consistent with the alignment of this elite theory with fundamental aspects of the Austrian School, connects innovation with human agency as he rejects the RCT paradigm:

At the individual level Austrians have taken sharp exception to the manner in which neoclassical theory has portrayed the individual decision as a mechanical exercise in constrained maximization. Such a portrayal robs human choice of its essentially open-ended character, in which imagination and boldness must inevitably play central roles. (Kirzner, 1997, p. 64)

In a similar vein, Damodaran addresses a fallacy of risk at the firm level:

Risk management has to be defined far more broadly to include actions that are taken by firms to exploit uncertainty. In fact, risk management may involve increasing, rather than decreasing, exposure to at least some types of risks when a firm believes that increasing the risk will give it an advantage over its competitors. (Damodaran, 2005, p. 38)

Open-endedness, imagination, and boldness by decision makers undertaking uncertainty (Knight, 1921/2002) rather than optimizing positions along the lower reaches of the risk/return efficiency frontier (Markowitz, 1952; Sharpe, 1964) by prioritizing low risk exposure and moderate returns are the essence of innovative business models. Such are the business model leadership approaches that account for new resource combinations (Schumpeter, 1911/2003; Buchanan, 1980). Who then are the agents of innovation-based value creation?

Nicholas (2003, p. 1023) recounts how Schumpeter saw two types of organizations driving innovation: the proverbial "small entrepreneurial ventures as seedbeds of technological discovery" of The Theory of Economic Development (1911/2003) and "large firms with market power [that] accelerate the rate of innovation" in Capitalism,

Socialism and Democracy (1942/2000). Innovation by incumbent and emerging elites is the focal point of value creation by "creative destruction" <sup>81</sup>, ushering in:

the great economic and social process by which business, individual positions, forms of life, cultural values and ideals, sink in the social scale and finally disappear [seeing] the continual emergence of new economic and social forms and of continually raising real incomes of all social strata. (Schumpeter, 1911/2003, p. 255)

That is, development. "Creative Destruction" is Schumpeter's "essential fact about capitalism" (1942/2000, p. 83), and so "over the long run, the process of creative destruction accounts for over 50 percent of productivity growth" (Caballero, 2008, p. 1). The disruptive entrepreneurs of Schumpeter (1911/2003) and the "alert" ones of Kirzner (1997)—in this work seen as potential, emerging, or future elites—connect micro-level entrepreneurship with macro-level outcomes such as economic growth (Hoselitz, 1952; Aghion & Howitt, 1992; Holcombe, 1998; Acs & Szerb, 2007). Some of the intermediate linkages that have been identified include knowledge externalities and spillovers (Audretsch, 2007; Audretsch & Keilbach, 2008) given that entrepreneurship "serves as the vehicle of innovation and change" (Carree & Thurik, 2010, p. 588), and competition (Wennekers & Thurik, 1999, p. 30, Figure 1). This dynamic is not necessarily kind to incumbents since development that is based on innovation is an everunfolding process of disruption:

when one firm gains some advantage over others, that advantage becomes a target for all other firms to emulate [and] begins to erode with competition. In time, no firm is any better off, relative to the others, than when it started and the search for new advantages must begin again (if it ever ceased in the first place). As a result, yet another phase in this Schumpeterian cycle of creative destruction that accounts for the progress of most economic systems, is initiated. (Moran & Ghoshal, 1996, pp. 44-45)

Irrespective of whether they are the result of recent entrepreneurial entrants or long serving incumbents, innovative elite business models create so much value that their stakeholders can, in most cases, appropriate a significant amount without compromising the elite status of the principal. This is another reason why innovation brings about sustainable and inclusive economic development. Of course, to establish the overall sustainable value creation of an organization, one must also consider the other side of the coin and measure extractive value transfers.

81 Despite being popularized by and associated with Schumpeter, "the idea of 'creative destruction' enters the social sciences by way of Friedrich Nietzsche [as in "Whoever must be a creator always annihilates", see 1883/2006, p. 43]. The term itself was first used by German economist Werner Sombart, who openly acknowledges the influence of Nietzsche on his own economic theory. The roots of creative destruction are traced back to Indian philosophy, from where the idea entered the German literary and philosophical tradition" (Reinert & Reinert, 2006, p. 55).

#### 5.1.3 Ascertaining sustainable value creation with value transfers

Suppose that, instead of discovering a new commodity or service or production process, an innovating entrepreneur discovers a way to convince the government that he "deserves" to be granted a monopoly right, and that government will enforce such a right by keeping out all potential entrants. No value is created in the process; indeed, the monopolization involves a net destruction of value. The rents secured reflect a diversion of value from consumers generally to the favored rent seeker, with a net loss of value in the process. (Buchanan, 1980, p. 7)

It has been shown that value creation occurs via first-order productive activities (see the list in Table 2.3) such as agriculture, manufacturing, exchange, finance, and, as just discussed, innovation in any of its many forms such as incremental product improvements. At the micro-level of firms these activities are readily identifiable and pursued by competent management teams characterized by their 'knowledge'. Yet, as in the ETED's ontological 'value is created or transferred' assumption (see Figure A5.4a; also described in the 'value spectrum', see Figures 2.10, 2.11), value creation and extraction always go hand in hand. The hideous slave plantation system produced valuable cotton along with immense value extraction that was borne by labor—the compulsory stakeholder-victims prevented from exit. However, for many 21st century business models there is far less clarity on the value appropriated but not created. A technology monopolist may be innovative, but if the prices charged are higher than would be the case with the existence of competition and counterfactual 'equalized bargaining power equilibrium prices' (see Section 2.2.2), then extraction is also an intrinsic part of the model and the principal's residual income. Contemporary institutions are, however, either technically incapable or largely unconcerned about quantifying and addressing the value extraction question unless it becomes material in an intra-elite contest. As a result, what Bastiat (1845/1996) calls "plunder" and Olson (1993) and Tullock (1967) term "theft" is essentially legalized. Apple's initial "resounding victory" in the landmark antitrust case brought by Epic Games Inc. included the preservation of the tech giant's "restrictions for third-party software" because:

"While the court finds that Apple enjoys considerable market share of over 55% and extraordinarily high profit margins, these factors alone do not show antitrust conduct," the judge wrote. "Success is not illegal." (Higgins, 2021b)

Apple's original win in this intra-elite contest begs the question of whether it benefits from value appropriated but not created; what Elon Musk calls Apple's "secret 30% tax".82 The implication here is that the world's most valuable firm appropriates a chunk of the value created by app developers in its store (such as Epic or X Premium). As the "Success is not illegal" opinion suggests, such extraction logic does not figure in legal doctrine. For rent seeking to be a decision-making factor for leaders involved in intra-elite contests, and especially for it to become a technically feasible consideration in policymaking, it needs a strong conceptual applied framework; one that can extend the theoretical understanding of rent seeking, negative externalities, or extractive economic institutions into the realm of the law. "Microsoft's stunning courtroom victory over US regulators trying to block its acquisition" of Activision (Waters & Palma, 2023) is another recent example of a legal system's obliviousness to the potential and actual distortions of bargaining power differentials, value extraction, and the realities behind President Biden's remark that: "what we've seen over the past few decades is less competition and more concentration that holds our economy back. We see it in big agriculture, in big tech, in big pharma, The list goes on" (The White House, 2023). In tandem with suitable sustainable value creation frameworks, it is essential that SVC measurements are developed that can stand up in court on account of using standardized methodologies for collecting constituent data and interpreting the evidence (as is aimed at in Section 5.3). In order to disentangle value creation from extraction, the spotlight must be on quantifying tangible transfers from stakeholders to principals. As will be discussed in detail (see Section 5.3.1), the business model SVC measurements (VCp/VCr) presented in Table 2.4 are only feasible if transfer-IN (and transfer-OUT) amounts can be established as part of (and in relation to) P&L statement revenue and profits.

Value extraction, for the purposes of this theory and its application, occurs through value transfers. That is, transfers from one individual to another, from one stakeholder to a principal, from one subset of society to another (see a tentative rendition of the set of value transfer relationships in the political economy, Figure A5.14). These transfers were earlier conceptualized as value appropriated but not created (transfer-IN) and its opposite, value created but *not* appropriated (transfer-OUT) by business models with the micro-level value creation-appropriation (VCA) framework (see Chapter 2). By establishing value transfers, value creation can be ascertained. The constructive, positive assumption used in operationalizing sustainable value creation measurements at the micro-level is that the revenue/profits of a business model are a priori considered full first-order productive value creation and not a value transfer. That is, in the 'bona fide value appropriation' (positive) assumption, the starting point is that value appropriated is value created; and its practical implication is that 'revenue is value creation unless value transfer is proven' (see Figure A5.4a). That means that the burden of proof rests on establishing value transfers, which must be confirmed both conceptually and in monetary terms by empirical evidence of transfer-IN to the business model (see the process for the establishment of SVC metrics, Section 6.6.1). The theoretical bases of such extractive value transfers, how these are accounted for at the macro-level, and their impact on national development are further considered next.

## 5.2 Theoretical support for value transfers and responses to extraction

The second part of this section completes the literature review on rent seeking by first examining the theoretical foundations of why it matters (5.2.1). Yet the overarching purpose is to understand the structural and psychological factors of why value extraction exists at all. This is done by first examining the 'acceptance' responses of stakeholders that suffer from extractive transfers (5.2.2). The full range of responses to value extraction—including the 'exit' response—are then reviewed (5.2.3). This analysis of causes goes a long way towards explaining the economic development consequences of value transfers, a key theme of this work.

### 5.2.1 Why do rent seeking and value transfers matter both theoretically and in practice?

It is the purpose of this work to show that the distribution of the income of society is controlled by a natural law, and that this law, if it worked without friction, would give to every agent of production the amount of wealth which that agent creates. (Clark, 1899/1908, p. 3)

In practice "friction", essentially the result of power, i.e., "force", on both "the employer's side" and "on the worker's side" (Clark, 1903, p. 612) annuls the "natural law":

What we must admit, however, is that the principle of monopoly is a bad one, and that in the business world it is becoming too nearly dominant. Trusts are seeking to create monopolies of products, and trade unions are trying to establish monopolies of labor. (Clark, 1903, p. 599)

Rent seeking matters because it disrupts the path to economic and human development. John Bates Clark correctly qualifies inclusive development outcomes to the absence of this "friction". However, a political economy is characterized by deliberately introduced friction, typified by the manner and degree to which rent seeking occurs. In Tullock's quantitative examination of rent seeking, he outlines the costs, transfers, and redistributions "from losers to winners in activities such as regulation and monopolization" (Tollison, 2012, p. 73). The breadth of the distortions presented is astounding and their logic stunning.

Firms that are regulated are more likely to obtain government aid (Zingales, 2012). Rent seeking is akin to interventions that cause costs beyond the already onerous deadweight losses—see "The Measurement of Waste" (Harberger, 1964)—associated with price floors, price caps or quotas in Harberger triangles where a wedge is driven between the prices received by producers and the prices paid by consumers. Tollison (2012, p. 74) articulates the implications of "expenditures made to capture a transfer" such as lobbying: each of these expenditures is but a misallocation that "diverts resources away from positive-sum activities into zero- and even negative-sum efforts to capture transfers, resulting in social costs". Consistent with sector-specific research that confirms "large sums

of money [are spent] on lobbying and campaign contributions to influence legislative and election outcomes" (Wouters, 2020, p. 696) and other findings (e.g., Bhagwati & Srinivasan, 1982; Baldwin & Robert-Nicoud, 2007), "the resources spent in the pursuit of a transfer are wasted from society's point of view. These expenditures add nothing to social product (they are zero-sum at best), and their opportunity cost constitutes lost production to society" (Tollison, 1982, p. 576). Economists concur that extractive rent seeking results in resource misallocation, deadweight losses, allocative inefficiencies, and, to top it all off, will cause "socially undesirable consequences" (Buchanan, 1980, p. 8). This inquiry's firm-level SVC measurements (e.g., VCr) incorporate these costs—'cost created but not borne'—in their operationalization as the 'extractive' transfer-COST part of value transfer-IN (see Section 8.2.1 and Figures A5.5a and 6.7, the latter visualizing the framework for the classification logic for SVC metrics). Many of the primary constituent SVC metrics capture expenditures associated to transfers that are borne by third parties (i.e., deadweight losses, waste, negative externalities), thus recognizing the importance of this most unsustainable practice to development (such as elite business models based on pollution, opioid addiction, war). It should be remembered here that such value extraction—and any economic outcome for that matter—is primarily the result of the incentive system (Olson, 1984; North, 1990, 1994; Robinson, 2010) in the form of the license to operate.

Rent seeking is an expedient conceptual element because it is theoretically separable from value creation. The rent-seeking literature underpins the distinction between first-order productive activities (value creation) and second-order transfer activities (value extraction) outlined in Table 2.3 (providing a dualist typology of business model activities referencing value, consistent with this theory's ontological assumption). Tullock (1967), Krueger (1974), Buchanan (1980), Bhagwati (1982), and Baumol (1990) distinguish unproductive, value destroying, resource wasting, rent-seeking activities from profit-seeking ones such as "entrepreneurship in the competitive model", which "creates value such as new products and the allocation of resources to higher valued uses" (Tollison, 2012, p. 74). Unproductive activities, such as Bhagwati's (1982) "'dupe' activities" ("directly unproductive, profit-seeking"), see a minority, mostly comprised of the elite, profiting at the expense of general welfare (Olson, 1965/1971). In these situations, the minority exploits the majority. The societal costs in the US of the American Sugar Alliance were shown earlier, while Hufbauer and Elliott (1994) calculated the annual cost to consumers of "special" trade protections to be between US\$ 100,000 and US\$ 1 million per job saved. The Trump Administration's 25% tariff on steel imports implemented in March 2018 represented a consumer and producer cost of US\$ 900,000 per job saved, 13 times the average steelworkers salary (Long, 2019).

To ascertain the value extraction of trade barriers is straightforward, but what about the impact of other extractive activities that are stealthier but just as pervasive, such as Taleb's hiding of risk (2018) or the setting of standards? Michael Sarel, Head of the Kohelet Economic Forum, airs a very specific complaint: "Do you know that we have a standard for tea bags in Israel different from Lipton? It's ridiculous [. . .] The only reason is because that was exactly the barrier [The Wissotzky Tea Company] needed. They created a standard for Wissotzky" (Isaac, 2022). Stigler, in "The Pleasures and Pains of Modern Capitalism", recounts the multiplicity of value and risk transfers sought in each nook and cranny of the economy, making it clear how businesses avoid market dynamics and instead focus on the political non-market arena to earn their profits:

And so we face an embarrassing problem if we wish to return to a freer, more traditionally liberal society: the business community does not wish to be released from the public interventions to which it is subject. The merchant marine does not want unregulated, unsubsidized cargo ships; the steel industry does not want free imports; the construction industry does not want competitive interest rates. Each industry will agree on the desirability of making other industries freer and more competitive, but will assert that its own industry would become disorganized and perhaps even non-viable if the state withdrew. (Stigler, 1996, p. 139)

Rent seeking theory developed following Tullock's seminal paper: "The Welfare Costs of Tariffs, Monopolies, and Theft" (1967), while Krueger (1974) in "The Political Economy of the Rent-seeking Society" made explicit the political connection between institutions and value transfers. Murphy, Schleifer, and Vishny (1993, p. 409), in echoing Tullock, provide a precise understanding of rent seeking as "any redistributive activity that takes up resources", or, in political economy terms, as redistributive transfers that require wins in the non-market and narrative market contest arenas. Rentseeking theory has been taken up by the ETED and linked to micro-level value appropriation through the VCA framework (see Chapter 2).

As discussed in Chapter 2, at the micro-level, every specific elite business model is a bundle of value creation and extractive transfer activities, the proportions of which are quantifiable (by the VCr). For instance, hardwood from the Amazon creates value when it is transformed into furniture, but cutting down a primeval rainforest leads to the irrecoverable loss of unique assets for the nature stakeholder (and is a forced transfer of value from future generations to the present one). Tesla's unproductive, second-order value transfer rent-seeking activity seems as audacious as its first-order value creation:

Taleb accidentally bought \$4,333 in software and got in touch with Tesla to get a refund. According to the author, it was due to a "butt dial." He could not ask for a refund on the app in which the purchase inadvertently happened. When he went to a Tesla office to ask for a refund, Taleb had to wait eight days to get an answer. And it was "no." Well, a little worse than a simple no.

[In its reply, CustomerSpport@tesla.com noted:] This would be similar to the situation of paying for an addition to a house, deciding you don't like it, and then requesting a refund from the contractor. [. . .] The features received from the software that was purchased are listed in your Tesla and maybe of significant use to yourself. [. . .] Thank you for helping us accelerate the world's transition to sustainable energy."83 (Ruffo, 2020)

83 For the full story of the X exchange between a customer stakeholder (Nassim Taleb) and the supplier principal (Elon Musk), reflecting Tesla's bargaining power differential advantages enabled by data and elite business model rules, see: https://insideevs.com/news/393102/nassim-taleb-tweets-elonmusk-replies/

After Taleb revealed the conversation, Musk resolved the matter and tweeted. The general point is that on account of the rich theoretical foundations for a myriad of rent-seeking practices, it becomes essential to assess the monetary amounts of the value transfers of elite business models relative to their value creation. This is because these are integrated into a national elite system and become the meso-level aggregate reflection of transfer-IN/OUT activities carried out in an economy. For the assessment of a single elite business model at the micro-level, and eventually for the elite system at the meso-level, value transfers (transfer-IN) must be established as per the 'quantifiability of value transfers' (finance) assumption (Figure A5.4a). For value creation this process is at first straightforward as per the bona fide value appropriation' (positive) assumption—all value appropriation (revenue/profits) is treated as value creation at the outset. Moreover, value created but not appropriated (transfer-OUT) is then added. However, while making judgments based only on transfers is a natural impulse for the public, pundits, or politicians that are concerned about a sustainable future, a more balanced analysis is needed, as is typified by Yergin's appraisal of Rockefeller and the robber barons:

Yet, whereas many of the other robber barons amassed their wealth by speculation, stock and financial manipulation, and outright fraud—cheating their stockholders—Rockefeller built his fortune by taking on a youthful, wild, unpredictable, and unreliable industry, and relentlessly transforming it according to his own logic into a highly organized, far-flung business that satisfied the basic hunger for light around the world. (Yergin, 1991/2009, p. 39)

Because of the impact of rent seeking and the solid theoretical ground upon which it rests, it can be empirically ascertained at both the micro- and aggregate meso-level to support balanced estimates of the proportions of value creation and transfers, weighted normative action, and predictions of economic and human development. Estimating the sustainable value creation (through the VCr) of models as diverse as The Standard Oil Trust or ChatGPT is important and must be done in a balanced way. In the case of the former company, this means balancing the provision of light to humanity (value creation) against its 90% domination of the US refined oil market (an extractive value transfer). For the purposes of macro-level economic performance, the aim is to ascertain a meso-level (elite system) aggregate (of all elite business models). In the historical example above, that would entail ascertaining the value transfer-IN/OUT of the totality of Rockefeller interests, of other contemporary trusts in America like meat or steel, as well as those of the robber barons. The ensuing set of VCr data would then be combined and weighted with that of all other elite business models in that particular economy to yield the Elite Quality Rating (EQr), the 'bottom-up' (micro-to-meso level) elite quality measurement that complements the 'top-down' (macro-to-meso level) EQx (see Sections 6.2 and 6.3 as well as the overview of SVC measurements in Table 7.8).

In parallel, and just as important in establishing value transfer measurements is understanding the dynamics that can bring about the cessation of transfers in the context of the political economy (see the implications of the elite theory for the incentive system, Chapter 7). John D. Rockefeller's organization was first challenged by the antimonopoly Sherman Antitrust Act of 1890, and two decades later, in 1911, it was broken up because of the Supreme Court's ruling on Standard Oil Co. of New Jersey v. United States. The stakeholders at the short end of extraction had successfully engaged in a drawn out intra-elite contest (i.e., intra-elite power relation 4 in The Seven Intra-elite Power Relations, Table 3.2) ushering in inclusive institutional change.

Transformational institutional change can theoretically have a forward-looking quality in terms of preventing future extraction, as attested by the non-market checks and balances of the US Constitution of 1787 (elite power relation 2). Political economy foresight can also be the subject of fiction, as in Asimov's three "fundamental Rules of Robotics". These were meant as a call for preemptive institutional change to avoid extraction from the human race as a whole, and have recently reemerged into the public discourse with the realization that the AI is becoming ever more intelligent and capable. 84 With the introduction of the fourth law ("Zeroth Law"), this fictive proposal for preemptive institutional change became an "inspiration for many real-world roboticists and AI scientists like Joseph Engelberger and Marvin Minsky" (UNESCO & COMEST, 2017, p. 13). It remains to be seen to what degree the Rules of Robotics are translated into regulations and hard coded into, for instance, Anthropic's Claude or unmanned aerial vehicle (UAV) military aircraft. In fact, Asimov's rules are already deemed partially obsolete and insufficient and so new sets of increasingly specific laws have been proposed to constrain the AI in exercises that might not be all that suppositional if autonomous non-human AI elite agency ever arises (see hypothesis AI H2 in Table E.2).85

The advent of the hypothetical extractive AI notwithstanding, the very real question of why transfers persist as a chronic feature of the economy and institutional change is now addressed from another key perspective: non-elite responses to extraction.

#### 5.2.2 The non-elite 'acceptance' response to value transfers and its causes

Extraction should theoretically not exist under Smithian/Hayekian free markets, Fromm's assumptions on freedom (1994), or Biden's advocacy of a "competitive econ-

84 Asimov's three "fundamental Rules of Robotics" are: "One, a robot may not injure a human being under any conditions—and, as a corollary, must not permit a human being to be injured because of inaction on his part. [. . .] Two, [. . .] a robot must follow all orders given by qualified human beings as long as they do not conflict with Rule 1. [. . .] Three: a robot must protect his own existence, as long as that does not conflict with Rules 1 and 2." (Asimov, 1942, p. 100). To these, Asimov (1985) added a "Zeroth Law" which takes precedence over the original three: "A robot may not harm humanity, or, by inaction, allow humanity to come to harm".

85 Tegmark's (2023) suggestions include: "Don't teach it to code [. . . ;] Don't connect it to the internet [...;] Don't give it a public API [...;] Don't start an arms race".

omy" (The White House, 2023), yet it evidently does. Where exactly do these assumptions go wrong, or is the competitive free society nothing more than a mostly hollow narrative in practice, even in the 'Land of the Free'?

Inequality has been a historical constant (Scheidel, 2017) and being at the shortend of extractive transfer-IN is still an unceasing reality for many classes of stakeholders. These might include farmers, SMEs, savers, entrepreneurs of last resort, opioid addicts, certain EV owners, as well as taxpayers and, in some political economies, even bankers or mega entrepreneurs. The prevalence of extractive activities is not just a reflection of a given incentive system (Olson, 1984; North, 1990, 1994; Robinson, 2010), but in itself a further disincentive to value creation activities, especially those that involve risk taking (Figure 6.9) and innovation. For instance, subsidized electricity in Colombia deters the development of a modern power infrastructure (McRae, 2015). The theoretical puzzle is not why elites persevere with their extractive models; they are residual income maximizers, so even the shortsighted Olsonian stationary bandits that do not think in terms of sustainability or longer-term time horizons are rational agents given their (one might say misguided) preferences. It is tenable for principals to amass power and preserve or change institutions to implement value transfers away from value creators. The question is why their counterparts, suffering from extraction in a business model relationship, do not simply opt out.

Why do workers, firms, taxpayers, and all other stakeholders subjected to extractive transfers accept such practices? No matter what the power differentials are in a relationship, no one should rationally stick with a situation that makes one worse off. To understand this predicament, we must examine the 'impossible exit' conjecture, which exposes a critical rigidity of the economy and society. Why is it the case that stakeholders accept unfavorable or mere subsistence-level prices? Why are stakeholder relationships 'sticky', even in presumably free societies and markets? To address these questions, we will examine four causes of 'acceptance' that individually and jointly attempt to explain the stickiness of the extraction problem.

In 1649, the *Ulozhenie* law code, in effect until the 19<sup>th</sup> century, closed the main door to exit from extraction for Russian peasants with the application of state power and violence. This critical juncture, an "absolutist, interventionist [. . .] basis for state building", abolished the "statute of limitations on runaway peasants" who through their hereditary bondage could now, upon escape, be recovered by their owners, de facto an institutional change that "established complete enserfment in Russia" (Kivelson, 1993, pp. 735, 741, 750). Paths to compulsory resignation and embrace 'acceptance' responses are certainly less ruthless today, but are similar bargaining power differentials and value transfer proportions essentially still at play? Can a transportation company cease to fill its trucks with gas if exorbitant prices are determined by the OPEC+ oil cartel? Can Australia afford life without Google in a situation where "Google has threatened to close its search engine in Australia if the government proceeds with a plan to force Big Tech groups to pay news providers for their content" (Ruehl, 2021)? To what extent can Colombian governments stop subsidizing electricity? When one receives the new Microsoft Services Agreement e-mail, is there truly a choice to "not agree" and "choose to discontinue using the products and services, and close your Microsoft account before these terms become effective"?86 Could the Bush and Obama Administrations have chosen not to develop and support the US\$ 700 billion TARP to buy and insure distressed assets to stabilize the financial sector?

The primary cause for the first individual non-elite response to transfers and the persistence of extractive models—(i) 'acceptance'—is the lack of other options. The less powerful party whose value creation is appropriated in the context of the principal-stakeholder relationship may have no viable alternative. Opting out is simply not a choice and resignation the only way to go on with business or life. This situation applies to stakeholders in many markets such as Internet search engines, rare earth minerals, energy, medicines, or fast fashion sweatshops. It is a state of affairs where power differentials and business model rules successfully eliminate substitutes. Violence, or its threat, establishes bargaining power differentials that remove alternatives, as the example of hereditary Russian serfdom or "forced or, more generally, of compulsory labor", defined by the International Labour Organization (ILO) as "all work or service which is exacted from any person under the menace of any penalty and for which the said person has not offered himself voluntarily" (International Labour Organization, 1930). Nassim Taleb got redress from Tesla because of his power in the narrative market, but the situation is different for those without a massive X (formerly known as Twitter) following. The extractive party sources the necessary bargaining power advantages via 'political economy know-how' and/or 'knowledge' (see Figure 2.3), while the ensuing value transfers are evidenced by prices (including wages) significantly deviating from the counterfactual competitive 'equalized bargaining power equilibrium prices'.

A second cause for the 'acceptance' of extractive transfers is that the aggrieved parties expect to gain from transfer-IN in another of their relationships; value appropriated but not created elsewhere in the business model might match or exceed the value of the forced transfer-OUT in the specific loss-making relationship. The perverse reckoning behind accepting extraction through such an embrace is premised on positive 'net value extraction'. 87 Ultimately, the stakeholder is ahead because larger transfer-IN value is appropriated from third parties than is coerced away though extractive transfer-OUT from the principal. That is, 'compensatory' transfer-IN is imposed on others. For instance, a transportation company boss might calculate that while gas prices are excessive, the taxpayers subsidize freeways and many of his employees

<sup>86</sup> Reddit user 'deepasleep' writes: "That's why they've been so aggressively pushing to make everything a subscription. You will own nothing and be forced to pay them in perpetuity to access your data." See: https://www.reddit.com/r/privacy/comments/1f0tq5a/microsoft\_your\_services\_agreement\_ made\_clearer\_if/

<sup>87</sup> See Table 2.4, equation (3.3): net value extraction = value transfer-IN - value transfer-OUT;  $NVe_t = Vt_t^{in} + Vt_t^{out}$ .

loading the trucks are low-wage illegal immigrants whose passports he holds and to whom he pays below equilibrium wages. That is, when deconstructing the value chain, some economic agents suffering transfer-OUT by an elite business model might expect to come out ahead, thereby becoming positive net value extractors. Again, and consistent with the 'universal extraction propensity of life' law of nature upon which the socio-economic 'universal value extraction propensity of humans' premise sits (see Figure A5.4c), transfers are a goal of elite and non-elite business models alike.

A third and more extreme cause of acceptance is when stakeholders remain in a negative net value extraction relationship because of an amalgamation of psychological factors, such as the expectation of receiving better residual income in the future. In the extreme case of slavery, labor is brutally extracted. Indeed, everything is taken away through such coercion other than life itself (and possibly the lives of other family members). Not all slaves opt out, try to escape, or commit suicide<sup>88</sup> (although many do). Clearly, slavery still tragically persists as a business model in the 21st century. The Global Slavery Index reported that "an estimated 50 million people were living in modern slavery on any given day in 2021" (Walk Free, 2023), while an earlier edition stressed that "it exists in every corner of the world yet is seemingly invisible to most people" (The Minderoo Foundation, 2018). Those on the receiving end of such punishing value transfers might be coerced (through outright violence), but often endure it in resignation in the hope that circumstances will change for them or their offspring. That is, some of the surplus value that they create will not be extracted away and be theirs to keep at some point in the future. The psychology of hope is formidable. There are also other psychological and behavioral-based reasons for 'acceptance' in its resignation and embrace variants, but in all cases, the extractive transfer-IN that today exists in fast fashion workshops, cocoa plantations, or on high seas fishing boats, constitutes a residual income transfer mechanism from the stakeholders (the workers) to the elite (and non-elite) business model principals.

A fourth cause of 'acceptance' is ignorance. For principals, preempting or overcoming resistance responses (such as 'exit', 'informality', or 'challenge', see the explanations in Section 5.2.3) is expensive. A more efficient strategy is making the business model value transfer mechanisms opaque (the identity of the beneficiaries need not be secret at all). That is, by not articulating extraction in the first place and circumventing narratives that would make it all too explicit. Marx (1844/2009) claims in the introduction to A Contribution to the Critique of Hegel's Philosophy of Right that: "Religion is the sigh of the oppressed creature, the heart of a heartless world, and the soul of soulless conditions. It is the *opium* of the people." Whether out of resignation or in sincere embrace, the 'acceptance' of transfers is discerned in terms of a narra-

<sup>88</sup> Can moral positions on suicide be linked to the elite value appropriation perspective? In both Jewish and Christian traditions "suicide is implicitly condemned in the commandment not to commit murder (Exodus 20:13)", while the "Qur'an is more explicit in its injunction against suicide (Surah 4:29)" (Cook, 2014, pp. 254-255).

tive-induced sleep where incognizance is mixed with other psychological factors like the abstract anticipation of hypothetical or metaphysical events beyond the present reality of the political economy.

Opacity also results from limited cognitive bandwidth, exemplified by the Tesla users who inadvertently buy software and will never know that they did not notice. Buchanan (1980, p. 9) explains another cognitive bias surrounding value transfers: "Few questions will be raised concerning the emergence of rent seeking when governmental action creates and supports monopoly positions and effectively prevents entry". Paradoxically, these biases, or the narrative-induced slumber, preserve value as it is being transferred. If the extracted are unaware that value extraction is taking place, the total social loss is reduced: "A successful bank robbery will inspire potential thieves to greater efforts, lead to the installation of improved protective equipment in other banks, and perhaps result in the hiring of additional policemen. These are its social costs, and they can be very sizable" (Tullock, 1967, p. 231).

Efficient capital allocation processes are central to economic development. A topical illustration of the resigned 'acceptance' response is the business model of negative interest rates. Fischer records that the European Central Bank (ECB) "lowered its deposit rate into negative territory three times since June 2014, most recently to minus 0.30 percent in December" (2016, p. 40). Any analysis of the negative interest rate elite business model must start with Hicks' elemental observation:

If the costs of holding money can be neglected, it will always be profitable to hold money rather than lend it out, if the rate of interest is not greater than zero. Consequently the rate of interest must always be positive. (Hicks, 1937, pp. 154-155)

What is the explanation for the 'acceptance' of a model that widely and negatively impacts nearly everybody in society and that in theory ought not to exist (below-zero interest rates)? Fischer lists the factors that have been cited for the "decline in the long-run equilibrium real rate":

The first is persistent weakness in aggregate demand. A second is the slowdown of productivity growth. A third is demographic trends. A fourth is high saving rates in many emerging market countries, coupled with a lack of domestic investment opportunities in those countries the global savings glut hypothesis advanced by Ben Bernanke (2005) about a decade ago. (Fischer, 2016, p. 39)

The ETED explanation for the real, and even nominal, negative and ultra-low interest rates that persisted in many parts of the advanced world from 2008 until 2022 lies elsewhere; at the intersection between the political economy, institutional change, and an unprecedented elite business model that obscured value transfers through the mainstream economics narrative of the need for lower borrowing costs to enable recovery. There are clearly distributional effects associated with low or negative interest rates. If one was to 'follow the money' (cui bono), who were the winners? Firstly, elite business models that rely on rising asset prices, such as real estate or cryptocurrencies. Secondly and thirdly, heavily indebted governments benefit, as do "zombie"

firms (Caballero, Hoshi, & Kashyap, 2008; Banerjee & Hofmann, 2018). Fourthly, one would have to include the financial institutions living off subsidized money, like those in Japan that overindulged in risk on the back of an artificially enlarged credit supply (Hong & Kandrac, 2018), as well as their counterparts elsewhere such as Silicon Valley Bank or Credit Suisse who, buoyed by access to cheap financial resources, abdicated their responsibility to diligently price risk. Who then were the losers? When the overall economic pie does not increase and elites prioritize the 'same size of the slice' bias, all those in society who are not beneficiaries of the business model residual income streams lose out. The redistributive effects of negative interest rates in the years following 2008, and the ensuing misallocation of capital, resulted in massive transfers away from the asset-poor young and elderly pensioners to the asset-rich old. These transfer business models continued even when the consequences caused by mispriced money and risk—the initially hidden and subsequently exploding levels of inflation and resurgent asset bubbles—were apparent. Fischer's factors for the downward trend in interest rates all have impeccable academic merit, but does he miss the forest for the trees?

Once interest rates rose with the post-COVID advent of inflation, the financial institutions with a strong franchise and market power concocted a novel form of transfer: "lenders got higher yields for their deposits at the Fed but kept rates lower for many savers, the review of Federal Deposit Insurance Corporation data showed" (Gandel & Franklin, 2024). What is the exact amount of value appropriated but not created in this case? According to the same authors, "US banks made a \$1tn windfall from the Federal Reserve's two-and-a-half-year era of high interest rates, an analysis of official data by the Financial Times has found".

The ability to resist extraction is critically limited by ignorance and opacity, implying the failure of knowledge elites to shed timely light on the transfers at hand. The Financial Times piece cited in the above paragraph is essentially two years too late. The 'value transfers replace value creation at maturity' conjecture (associated with the 'elite power vs value creation gap' hypothesis, see Figure 4.5) is largely enabled by the shortcomings of knowledge elites. The elite business model of negative interest rates creates both winners and losers but is a negative-sum game that does not enlarge the pie. The general point is that obliviousness, associated with knowledge asymmetries abetted by feeble or venal knowledge elites, is often the necessary condition for the establishment and continuation of extractive business models and institutions (i.e., the undermining of checks and balances where these play a role, see intra-elite power relations 5 and 6 in Table 3.2). When the 'acceptance' response to extraction by non-elite individuals and firms happens in resignation, it is mostly outside the context of elite/non-elite dialectics and reflects an unsettling quietness in the relationship; when it happens in embrace, it proceeds with trust in the elite that could be reciprocal (see the paternalistic 'elite agency on behalf of non-elites' political option in Section 8.1.3, Figure A5.8). With a better understanding and popularization of extraction mechanisms on the other hand, individuals and firm stakeholders will be better equipped to realize either the 'exit' and

'informality' responses, or to resist and choose individual 'challenge' responses to their loss of hard-earned value and income (the struggle and participation variants of the latter response can aggregate into discrete and constructive non-elite political options, see Section 8.1.3). Without question, and as in Tullock's example, responses other than 'acceptance' would intensify if non-elites apprehended these transfers (aided by knowledge elites) as a form of "robbery".

#### 5.2.3 The full range of individual non-elite responses to value transfers

Faced with transfer-IN as an institutionally sanctioned form of robbery, the response of those trapped in sticky business model stakeholder relationships is not always (i) 'acceptance' and to endure at the margins of a business model in survival mode. Three additional individual micro-level response types associated with variations of the 'impossible exit' conjecture are now discussed: (ii) 'exit', (iii) 'informality', and (iv) 'challenge'. These four responses to extraction are summarized in Table 5.1 and visualized in Figure A5.8.

'Exit' can mean making a fresh new start, for example, by guitting a job and becoming a freelancer or going into personal or business bankruptcy. The latter avenue becomes likelier with shorter statutes of limitations on debts. 'Exit' might also mean emigration; America has grown from these individual responses to extraction, from the arrival of the Mayflower in 1620 to the caravans arriving at the Mexico-US border today. The elite theory has worked on the assumption of neoclassical utility maximization for elite agency. But a part of the edifice so far constructed in this inquiry would collapse if the RCT paradigm and the freedom to exit (see Section 8.2) cannot be assumed to exist for non-elite stakeholders suffering from extractive transfers. Neoclassical utility does not extend to such stakeholders if they cannot simply opt out in pursuit of their own utility maximization. Instead, the conjectured 'impossible exit' has a priori the non-accepting counterparties of elite business models acquiescing to extraction. That is, 'acceptance', an unproductive response steeped in exploitation, even potentially in a tragic *resignation*, in lieu of the pursuit of alternative avenues to maximize utility. The absence of institutional arrangements to enable an escape—a new start—in many political economies, coupled with continued extractive business models causes liberal, free market, free exit assumptions to be untenable. Moreover, without a sanctioned freedom to exit (see Section 8.2.1), when a productive new start is unavailable, a non-institutionalized form of 'exit' emerges: withdrawal.

History has been shaped by those realizing a new start, and not only in the case of America. Cossack ethnogenesis has been constructed as starting with militarized peasants who established self-governing communities in the steppe hinterlands of the Caspian and Black Seas to escape serfdom in Russia or Poland. Lattimore discusses peasants escaping the statist business model of grain and, as a consequence, "wavering between devolution toward the economy of the steppe and evolution toward the

economy of China" (1937, pp. 543, 548). Exit from the state taxation of agriculture is described in James Scott's Against the Grain: A Deep History of the Earliest States and explains "secondary primitivism" (Clastres, 1974), or "going over to the barbarians" which "is far more common than any of the standard civilizational narratives allow for [. . .] far from being seen as regrettable backsliding and privation, it may well have been experienced as a marked improvement in safety, nutrition, and social order. Becoming a barbarian was often a bid to improve one's lot" (2017, p. 232). In this light. Beckwith recounts a relevant swath of human history:

There was a constant drain of peoples escaping from China to the realms of the eastern steppe, where they did not hesitate to proclaim the superiority of the nomad lifestyle. Similarly, many Greeks and Romans joined the Huns and other Central Eurasian peoples, where they lived better and were treated better than they had been back home. (Beckwith, 2009, p. 76, as cited in Scott, 2017, pp. 232-233)

A modern form of Clastres' "secondary primitivism" is the withdrawal 'exit' response of Japan's over one million "being confined" hikikomori (1.2% of its population according to Rooksby, McLeod, and Furuhashi, 2020) or China's "lying flat" tang ping. The mindset of "lying down instead of being a productive member of society" is further portrayed below:

Luo explained how he was living a low-desire, zero-pressure lifestyle without stable employment, while staying with his parents in Zhejiang province. When he was feeling up for it, he would travel three hours to Dongyang, Zhejiang, where the world's largest film studio is located. He found work there that he considered perfect - acting as a dead body in movies. (Ji, He, & Peach, 2021)

In other cases, 'exit' is the more extreme form of withdrawal and involves a hard and sometimes deadly departure from the social order. In many countries, despair at the unbearable levels of extractive transfers is often reflected in economic distress, substance abuse (see the opioid epidemic in Section 8.2.1) or, when cultural and religious norms fail, suicide. Case and Deaton's Deaths of Despair and the Future of Capitalism (2021) and the official US Congress Joint Economic Committee's Long-Term Trends in Deaths of Despair (2019), document this awful and pervasive phenomenon among middle-aged non-Hispanic whites that is responsible for the unprecedented shortening of life expectancy in the US. This is currently at its lowest level since 1996 and, for the first time in history, it has fallen below China's (see Arias, Tejada-Vera, Kochanek, & Ahmad, 2022; The World Bank, n.d.-d). The antinatalism stance on procreation "that we should not produce any more lives that are bad (quality of life) or can be bad (risk)" (Häyry & Sukenick, 2024, p. 238) and "that it would be preferable for our species to die out" (Benatar, 1997, p. 353), is a radical and absolute form of 'exit' for nonelites (partially arising form not being able to 'exit' extraction in the here and now) that would also wreck and hence deny 'the extraordinary lever' to elites (many of whom, such as Pope Francis or Elon Musk, publicly counter this pessimistic position). However, not everybody decides on such absolute forms of 'exit' and the instinct for self-preservation and the urge to preserve one's lineage keeps most people in 'acceptance' and at the short end of extraction.

A third individual response to extraction is also problematic: to hide value creation activities through the informal economy. The (iii) 'informality' response has value creators devise strategies to avoid being taxed or otherwise penalized at the losing end of transfer-IN by extractive elite business models. Legitimate activities go underground (De Soto, 1989). This is a reversal of the earlier scenario on knowledge asymmetries as non-elite value creators keep their value appropriation activities (and even their value creation models) opaque and elites are left ignorant. This is often more efficient than the extractive alternatives. Obviously, one is better off if the thieves don't know that there is something of value to steal in the first place. Hart (1970) is credited with starting the study of informality with his analysis of small-scale entrepreneurs in Ghana that conceived them not as parasites but as legitimate and productive value creators. Pisani and Ovando Rivarola (2019), in their lucid analysis of the determinants of the informal economy in Paraguay, reference the research of Portes and colleagues, differentiating value creation from value extraction and pointing out how legal institutions are circumvented to prevent transfer-OUT:

Portes distinguishes between licit and illicit processes and transactions in determining informality. In essence, the informal economy consists of market transactions that avoid government regulation, oversight, and/or taxation, though these same transactions may be conducted legally under the full auspices of government monitoring (Portes, Castells, & Benton, 1989). So, informal transactions are technically illegal. Yet, informal transactions and work activity is not said to be criminal since the product (good or service) or work itself is legal, but it is generally undertaken outside the scrutiny and legal bounds of government mandated regulation and legislation (Portes & Schauffler, 1993). Hence, such everyday products and activities as food and street vending, automotive and tire repair, personal and domestic services are common and informal nearly everywhere. (Pisani & Ovando Rivarola, 2019, p. 28)

Pisani and Ovando Rivarola (2019, pp. 30–33) supply the perspectives on 'informality' that emerge from the literature, including: neo-Marxist (capitalism is the problem), structuralist (the problem is endemic to emerging markets, growth is the solution), practitioner (micro-interventions in the economy are the solution), and legalist (the state is the problem). The development problem is both immense and quantifiable. For instance, in Williams and Youssef's (2014) study of Latin America, economies are at best semi-formal (i.e., 40% informal employment) while many countries exhibit outright informal economies (with over 70% of employment underground). Pisani and Patrick (2002) nonetheless qualify such findings when assessing 'informality' as a "bright spot" in Central America as, for instance, in the way that the underground economy liberates entrepreneurs, many of last resort, in their quest to create value. However, far from being the exclusive domain of emerging economies, 'informality' is a non-elite response to value transfers everywhere: for example, the boom in cryptocurrencies is a reaction to the low interest rates and growing inflation rates of extractive monetary policies:

[A 2% inflation rate] means the organised loss of all value in about 30 years, coincidentally the time of the long government bond. If this is all they can do, why do we still have them? Even cryptocurrencies may prove better stores of value. No wonder they are doing all right. (Dalhuisen, 2021)

The above reflection points as much to extraction as it does to the elite capture of a non-elite narrative (decentralized finance). The intrinsic danger with 'informality' is that many participants—whether they are workers, SMEs, or investors—become beholden to non-state elites (i.e., where business elites are unchecked by political elites as per intra-elite power relation 4), some of which are plainly criminal organizations. Leaving aside the stealth and flexibility advantages for the value creating individual or firm that 'informality' provides, informal transactions and grey markets are always precarious and more *inefficient* than their institutionally sanctioned counterparts (as cryptocurrency exchanges illustrate). Property is also less protected (as the fate of numerous crypto projects shows). Thus, the informal economy lacks incentives for longterm investments and does not allow value creators to scale (unless they engage in institutional arbitrage or create parallel institutional arrangements, using blockchain, for instance). The amount of potential value creation not realized because of 'informality' in its *inefficient* variant is a social tragedy. So are, to different degrees, all of the responses to extractive value transfers and their consequences (summarized in Table 5.1) other than the constructive variants of the fourth response to extraction, the 'challenge' response.

In the 'challenge' response, while the principal-stakeholder relationship may be accepted, the extractive transfers are not. As discussed in Proposition 19 ('Non-elite agency can constrain value extraction through participation in intra-elite contests'), when a critical mass of individual (iv) non-elite discontent 'challenge' responses of the political struggle variety pile up, these might trigger the onset of overt 'non-elite vs elite struggle'. More constructively, individual 'challenge' responses might be channeled into political participation variants where non-elites take sides in intra-elite contests, for instance, through shared narratives. In this scenario, non-elite groups might cooperate tactically (i.e., consider only the interests of their own group), or strategically (i.e., seek to instigate generally inclusive institutional change or advance value creation narratives). How the 'challenge' responses of individuals accumulate and provide political options in the elite/non-elite dialectics of the political economy is discussed through the lens of non-elite interests in Section 8.1.3.89 The struggle variant, especially when violently manifested through insurrections or rebellions, is deemed to be comparatively riskier for non-elites and commonly ineffective. Individual 'challenge' responses that lead to diverse variants of political participation in intra-elite contests are usually more productive, though they require elite transformational leadership on the opposing side.

89 Note that with individual (ii) 'exit' and (iii) 'informality' responses the elite/non-elite relationship ceases to exist, basically precluding Hegelian (1812/2010) synthesis or resolution.

**Table 5.1:** A typology of individual non-elite responses to extractive value transfers by elite business
 models.

Non-elite individual response types	Description of non-elite individual responses to extractive value transfers	Individual responses: evidence
(i) 'Acceptance'	The 'acceptance' response is mostly one of (a) resignation to extraction. Based on the 'impossible exit' conjecture it is primarily premised on a trap-like lack of alternatives. At times 'acceptance' is facilitated by compensation considerations where transfer-IN from other stakeholders exceeds the coerced transfer-OUT affected by the principal. Psychological factors such as the survival instinct, knowledge asymmetries, and ignorance may play an important part, as do narratives and religion. Non-elites might also (b) embrace extraction and place their trust in elites as in the 'elite agency on behalf of non-elites' assumption (Section 8.1.3) when they perceive extraction to be limited or legitimate.	(a) Resignation: subsistence business models; inequality; general but contained discontent; high supervision costs for demotivated labor.  (b) Embrace: stability in stagnation or decline; loyal subjects; narrative believers.  Note: The (i) 'acceptance' response may morph into any of the other three alternative individual responses to extraction and even become (ii) 'exit' as the 'impossible exit' restraint weakens.
(ii) 'Exit'	The 'exit' response is the cessation of the elite/non-elite relationship by the stakeholders suffering extraction. It ranges from the problematic (a) withdrawal from productive activity, including a hard departure from the social order, with behavior aimed at self-destruction or the destruction of others, to the positive (b) new start under different business model rules (which requires the enabling freedom to exit, Section 8.2.1).	<ul> <li>(a) Withdrawal: Leisure; videogame addiction; voluntary unemployment; suicide; crime; substance abuse; emigration (e.g., from Syria).</li> <li>(b) New start: Job departure; entrepreneurship; debt forgiveness; bankruptcy; immigration (e.g., to America).</li> </ul>
(iii) 'Informality'	The 'informality' response type is associated with the underground informal economy and reverse knowledge asymmetries that hide non-elite value creation activity and so protect the creators from extraction by elites. It ranges from (a) efficient to (b) inefficient, and might resemble a partial 'exit response' where value creation continues to be pursued outside of the institutional framework.	<ul> <li>(a) Efficient: low transaction cost, semiscalable and fragmented markets for labor, goods and services, and capital.</li> <li>(b) Inefficient: high transaction cost, nonscalable markets for labor, goods and services, and capital hampered and diminished by ad hoc deinstitutionalized arrangements.</li> </ul>

Table 5.1 (continued)

Non-elite individual response types	Description of non-elite individual responses to extractive value transfers	Individual responses: evidence
(iv) 'Challenge'	The 'challenge' response has non-elites assertively confronting elites. To have inclusive impact, it requires non-elite coordination leadership with clear proposals benefiting from knowledge elite input for institutional change that constrains extraction by elite business models. It ranges from (a) destructive political struggle, escalating to overt 'non-elite vs elite struggle', to (b) constructive participation, including shared narratives and other initiatives seeking strategic and tactical participation in intra-elite contests via the political process to induce inclusive institutional change (for the political options available to non-elites, see Figure 8.2).	<ul> <li>(a) Struggle: degrees of violence including insurrection, revolution, terrorism; political impasses and polarization; non-elite suffering, even in the absence of violence, such as declining life expectancy.</li> <li>(b) Participation: strategic and tactical participation in intra-elite contests is evidenced by shared narratives; inclusive institutional change; economic growth; and human development.</li> </ul>

The discussion of non-elite political options to extraction in Section 8.2 shows how the (b) embrace variant of (i) 'acceptance' and the two (iv) 'challenge' variants of (a) struggle and (b) participation aggregate into non-elite political agency. All of the other individual responses do not. These are: the (a) resignation variant of (i) the 'acceptance' response; the (a) withdrawal and (b) new start variants of (ii) the 'exit' response; and the (a) efficient and (b) inefficient variants of (iii) the 'informality' response (see Figure A5.8). While 'informality' is the most ingenious of the four individual responses and has a low transaction cost efficient form, 'acceptance' through resignation is the most common and goes a long way to explain the feasibility and prevalence of extractive elite business models as well as suboptimal economic development outcomes. 90 The 'exit' response is most constructive through the (b) *new* start option when there is an institutionally sanctioned freedom to exit (see Section 8.2) from forced transfers, but is also a most destructive route for economic development when there is not, leading to (a) withdrawal. This enabling freedom to exit will be shown to be critical (Figure 8.5), as it steers individuals away from the hard withdrawal 'exit' option. It also deactivates the trap-like 'impossible exit' rigid-

<sup>90</sup> The non-elite "hope for a better life in the hereafter or for deliverance in a messianic future" (Cohn, 1970, cited in Goldstone, 1982, p. 188) is an embrace response, although many will consider it resignation.

ity of the economy by increasing the bargaining power of non-elite value creators, thereby facilitating their rejection of extractive arrangements.

At present, the US government is at pains to explain the skyrocketing "deaths of despair" trend (United States Congress Joint Economic Committee, 2019, p. 10). Any solution is conceptually simple: first, recognize the underlying economic reality of extractive value transfers which requires a modicum of elite soul searching (i.e., transformational leadership at the elite system level with significant inputs from knowledge elites) and elite cohesion; second, reform laws and regulations (i.e., institutional change) to facilitate low-cost 'exit' responses by non-elites trapped in extractive relationships such as pay-day lending, 91 low-paying jobs in monopsony labor markets, subpar access to healthcare with no viable alternatives, recourse mortgages, or student loans<sup>92</sup>. Note that these models need not necessarily be made illicit, but the essential freedom to exit must be granted to their non-elite stakeholders. Rather than taxpayer-funded bailouts this might require measures like jubilee debt cancelations, certainly not a novel solution, as "for thousands of years, economic polarization was reversed by cancelling debts and restoring land tenure to smallholders who cultivated the land" (Hudson & Goodhart, 2018, p. 7), as is expounded on in Section 8.2.4. Without the path to a new start, countless more citizens bereft of the exit option will continue to despair about their lot and withdraw from productive life.

# 5.3 Additional conceptual elements for the consolidation of the ETED system

The closing section of this chapter develops a series of heterogenous auxiliary insights and requisite tools for this inquiry's theory making. It starts with a key section that revisits the sustainable value creation (SVC) measurements of the business model to further hone in on the conceptualization and operationalization of extractive value transfers (5.3.1). Hence, the inquiry next moves into the applied realm of capital allocation as the VCp/VCr become the original inputs for 'The Five Sustainable Value Creation (SVC) Valuation Frameworks' (5.3.2). Two frameworks are proposed for equity (Figure A5.6a), two for debt (Figure A5.6b), and a fifth for firms (Figure A5.6c). These are derived from the SVC functions (with their VCp/VCr inputs) to produce SVC out-

<sup>91</sup> The Pew Charitable Trusts makes inclusive "recommendations for regulations and product designs" for payday loans, see: https://www.pewtrusts.org/en/research-and-analysis/articles/2023/06/07/ what-does-the-research-say-about-payday-loans

<sup>92</sup> On the 'trap' of student loans, The Education Data Initiative at EducationData.org finds that "11% of new graduates default in the first 12 months of repayment", a problem that "affects 9 million borrowers and their families"; with every passing year an additional million default, all of who will have tanked credit scores and so "may not be eligible to receive other types of loans, such as home and auto loans. It can take years to undo the damage" (Hanson, 2022).

puts (such as SVC cost of equity, SVC cost of debt, SVC credit risk spread) to be applied in line with the central approaches of finance practice (such as the Capital Asset Pricing Model (CAPM), the Weighted Average Cost of Capital (WACC), and the credit agencies' methodologies for credit rating).

The subsequent sub-sections shift gear, firstly with a focus on the elaboration of the elite cohesion conceptual element that is established as a precondition for development, but only if it exists in conjunction with its antithesis, the elite separation of powers (5.3.3). The balance of these two conceptual elements is the core of the 'intraelite quality contest' dilemma. In the spirit of the conceptual consolidation of this chapter. SVC measurements provide signals for elites to engage in elite system transformational leadership that are consistent with the endogenous institutional change position that reform must come from inside the elite system and leverage intra-elite contests. Without transformation towards increased value creation, the 'extractive escalation dynamic' takes root in society and induces negative development (5.3.4). In closing, links are drawn between the theory of capitalism, its present incantation, and the potential of any type of business or political system for value creation (5.3.5).

#### 5.3.1 Further steps in the conceptualization and operationalization of value transfers

To recap, Proposition 11 posited that elite business models operate at measurable sustainable value creation positions on a conceptual 'value spectrum' (Figure 2.10) which is operationalized by the Value Creation Position (VCp), an SVC measurement that also provides the basis for the enhanced Value Creation Rating (VCr). The VCp assesses the relative proportion of revenue (or profits) associated to net value creation and extractive value transfers (transfer-IN) of a business model. The chief measurement challenge for the VCp is the assessment of revenue (or profits) attributable to extractive value transfer-IN (value appropriated but *not* created). Inclusive value transfer-OUT (value created but *not* appropriated), which unlike transfer-IN is not captured by financial statements, is not considered for the VCp, but is the differential element of the VCr. The latter is thus a more comprehensive sustainability measurement, as it establishes the overall value contribution of a business model, including uncaptured value, to the economy and society at large. For both the VCp and VCr measurements the value transfer-IN of the principal business model must be ascertained.

As was discussed in Section 2.3.2, it matters if the party that sees value created but *not* appropriated (transfer-OUT) has higher/lower bargaining power than the counterparty benefiting from said transfer. If the party with higher bargaining power (e.g., the principal, an elite) is at the receiving end of value created but *not* appropriated, then the transfer-OUT is deemed to be inclusive, an uncoerced contribution, a positive externality, and a public good (such as innovation spillovers, circular production processes, or fair trade prices). If, on the other hand, the party experiencing transfer-OUT is the one with lower bargaining power (e.g., a stakeholder to the principal, a rival elite), the value transfer to the beneficiary transferee (benefiting from transfer-IN) is deemed to be extractive, coerced, an involuntary tax, a negative externality, and a public bad (such as monopoly rents, depleted soil, or inflation). Hence, as far as the transferor is concerned, transfer-OUT is always inclusive value created but not appropriated, while if one takes the beneficiary transferee perspective, it can either be inclusive (e.g., society benefiting from valuable innovation spillovers) or extractive (e.g., higher prices benefiting cartels). In any event, the counterparty of a transfer-OUT technically has an equivalent transfer-IN and vice versa. In this inquiry, this is important for operationalizing and classifying value transfer SVC metrics. For inclusive (where the transferee has higher bargaining power) value transfers in the principal-stakeholder relationship this is framed as transfer-OUT; for extractive transfers (where the transferee has lower bargaining power) it is framed as transfer-IN.

It must be re-emphasized that despite the ETED's criticisms of rent seeking and extraction as roadblocks to development and its calls for the quantification of extractive transfer-IN, both the theory and operationalization of SVC measurements are constructive, as is seen in the underlying assumptions for socio-economic relations, the implications for financial analysis, and even in the understanding of how value constrains and links to human behavior (refer to in Figures A5.4b and A5.4c). First, this is because by necessitating the quantifiability of all transfers (see the discussion later in this subsection), specific transfer-IN activities at a firm are properly weighted and counterbalanced against value creation (net value creation and value transfer-OUT). Transfer-IN (including the 'extractive' type of 'cost created but not borne', the transfer-COST expounded on in Section 8.2.1, Figure A5.5a) does not preclude the existence of proportionally greater amounts of value creation activities at present (captured both on/off-P&L) or in the future (captured in firm valuations). Secondly, and in the longer run, the 'alternating value extraction and creation' conjecture (see Section 2.3.1) allows secondorder value transfers today when they are a precondition for value creation tomorrow. Thirdly, the 'bona fide value appropriation' (positive) assumption (see Figure A5.4a) holds that all activity registered in a firm's financials is value creation (net value creation) until proven otherwise (i.e., as evidenced by transfer-IN). Thus, under the derived 'revenue is value creation unless value transfer is proven' (constructive) implication, in the absence of extractive value transfer-IN activity, all P&L statement revenue (or profits) is deemed to be first-order value creation (again, net value creation). Fourthly, there is the basic injunction to establish the value creation amounts not accounted for in the P&L by quantifying inclusive transfer-OUT contributions that are central to the most comprehensive firm-level SVC measurement (VCr).

This work has repeatedly stressed that both value creation and extraction activities go hand in hand, play out in specific business models, and can be measured. When the valuation of Apple topped a scarcely believable \$3 trillion, The Wall Street Journal headline read: "Apple at \$3 Trillion Isn't All About Apple" (Gallagher, 2022). Clearly, the elite business model of Apple reaps benefits from its extraordinary value

creation (from Apple silicon to *Ted Lasso*), but also from monetary policy, a nonneutral carbon footprint (at least until 2030), and especially the monopolistic power of its App Store platform that allows a "secret 30% tax". To what proportion is Apple inclusive and extractive? That is the fundamental micro-level sustainable value creation question of this theory, addressed firm-by-firm and metric-by-metric by assessments of transfer-IN/OUT as inputs for the VCp and VCr measurements.

How much value do principals create and how much value is appropriated from key stakeholders (including the nature stakeholder) as it is converted into revenue/ profits ('money')? A specific case, of the manufacturer U.S. Steel, is now used to illustrate the SVC measurement assessment process (further elaborated on in Section 6.1.1). At the outset, the goal is to establish the proportion of the firm's revenue or profits that is verifiably attributable to transfer-IN activities (a process that will first yield a proportion as depicted in the business model 'value spectrum' of Figure 2.11 for revenue, and in Figure A5.5a for profits). For U.S. Steel, the import tariffs placed on foreign competitors and the incremental revenues generated from related price increases in the American market are critically profitable second-order transfer activities. That is, additional revenue is transferred from a very specific group of stakeholders: customers. Tariff-induced higher steel prices constitute value appropriated but not created by the steelmaker. Far from a theoretical disquisition, calculating such transfers using a SVC metric is straightforward and can be done by accountants, business valuation and finance specialists, credit rating professionals, or sustainability analysts. S&P Global Market Intelligence assessed the spectacularly positive impact that tariffs had on the bottom line of U.S. Steel, which:

made a net loss of \$1.64 billion [in 2015] and hemorrhaged a further \$440 million in 2016, [but then came] Trump's tariffs that truly sparked the revival. A profit of \$1.12 billion in 2018 marked the company's best performance since the end of the commodity super cycle in 2008. (Brennan, 2019)

U.S. Steel's business model, like that of any firm, engages in first-order value creation and in second-order extractive value transfer activities, both of which are in principle independently quantifiable with the appropriate framework and measurements. The full impact of tariffs, calculated in dollar terms, would be captured by a 'gains from import tariffs' SVC metric to conceptually determine the transfer-IN phenomena (and unbundle it from related business model activities). Multiple metrics are required for the SVC measurements, each quantifying extractive transfer activities such as 'subsidies' (transfer-IN) or inclusive transfers such as 'capital expenditures as a percentage of revenue' (transfer-OUT). Metrics that establish value transfers are also discussed in Section 6.6.1 (see also Figure 6.6 on the calculation process for sustainable value creation measurements) with ten examples provided in Tables 6.1 and 6.2. Upon the quantification of the material value transfer-IN amounts of a firm, expressed by a comprehensive set of conceptually relevant metrics, the VCp can be calculated, see Table 2.4, equation (4.1).

Again, for U.S steel, import tariffs might be the main but not the only form of transfer-IN (there might also be direct subsidies or a failure to fully offset its carbon emissions exposure). The approximation of a principal's total amount of transfer-IN is the sum of all discrete transfer-IN amounts, each captured by a unique SVC metric, that is always attributable to specific stakeholders—the counterparties suffering extractive transfer-OUT (in this case, customers, taxpayers, and nature). U.S. Steel's business model will certainly also include activities where value is created but not appropriated, creating transfer-OUT in the form of innovation spillovers, supply chain resilience, and well-paying union jobs (in this case, the stakeholder beneficiaries are society at large, customers, and labor). This logic is articulated in equation (3.6), while the transfer-IN/OUT amounts are in turn the aggregation of the firm metrics as per equations (3.7) and (3.8). Upon the quantification of all the value transfer-IN and transfer-OUT amounts of a firm, and on the basis of respectively constituent metrics, the VCr can likewise be calculated, see Table 2.4, equation (4.2). The calculation procedure to transform the transfer-IN/OUT SVC metrics inputs into SVC measurement outputs (VCp/VCr) is basically a three-stage process (set out in Figure 6.6).

SVC metrics are assessed by referencing financial statements, third-party suppliers of metrics, set calculations, survey responses, and other sources. For instance, the actual amount of the 'gains from import tariffs' for U.S. Steel (again, a transfer-IN) is inferable from set calculations based on diverse data such as assessments of stakeholders at the receiving end (the coerced transfer-OUT from the counterparties). Reuters refers to this transfer amount in the headline: "Trump metals tariffs will cost Ford \$1 billion in profits, CEO says" (Carey & Shepardson, 2018). This illustrates that putting a figure on a transfer-OUT (from the stakeholder, Ford) that equals the transfer-IN (to the principal, U.S. Steel) in the context of specific principal-stakeholder transactions is feasible (see the mirroring in Figure 2.9). In this case, the actual steel purchases made by Ford (costs) from U.S. Steel (revenues) form the basis to determine the specific amount of transfer-IN that U.S. Steel has extracted from Ford because of the first Trump Administration's tariffs (the total transfer-IN of the 'gains from import tariffs' metric would also encompass the other customers of U.S. Steel). In addition to considering the customer stakeholders (Ford and others), equation (3.6) requires that the complete bundle of transfer-IN/OUT principal-stakeholder relationships be reviewed (Figures 2.9 and A5.13a render business model stakeholders across the value chain). In the earlier example of Apple, such an analysis would uncover inclusive transfer-OUT from its very substantial technology spillovers (to the benefit of employee stakeholders who receive training or customer stakeholders whose efficiency increases above and beyond the prices they pay for the devices) or increased valuations (to shareholders profiting from above market returns on their investment). The flip side, which is incorporated into both the VCp and VCr, are Apple's extractive transfer-IN amounts such as carbon emissions (from the nature stakeholder) or monopolistic activities (from supplier stakeholders via the App Store).

A key methodological issue is the quantification in monetary terms of the SVC metrics reflecting all material transfer-IN/OUT in principal-stakeholder relationships. This, the *de facto* pricing of everything, is essential for conceptually addressing sustainability, as all businesses in a society are ultimately interconnected. Nicolai Tangen, the CEO of Norges Bank Investment Management, responsible for running the Norwegian Sovereign Wealth Fund, is in a position to take a comprehensive view and states: "If you have one part of the portfolio that is polluting and destroying the environment, you're going to be hit in another part of the portfolio" (Milne, 2022). In short, extractive transfer-IN activities in one sector of the economy reverberate across many other sectors. This work suggests that such interconnectedness and unity is best addressed by establishing quantifiable monetary equivalence brought about by prices to support managerial, investment, and policy-making decisions for sustainable value creation and ultimately transformational leadership (see Figure A5.4a).

In addition to the fundamental (i) 'value is created or transferred' (ontological) assumption and the (iii) 'bona fide value appropriation' (positive) assumption, a further vital piece is now advanced to complete the pragmatic understanding of socioeconomic relations in this theory: the (ii) 'quantifiability of value transfers' (financial) assumption (see Figure A5.4a). Prices are the means to quantification (for example, by using a cap-and-trade system for carbon credits) and the necessary standard to feasibly assess value transfers and cut across the diversity of principal-stakeholder relationships (overriding the objection that value cannot truly be measured by prices, e.g., Mazzucato, 2018). The bundle of relevant transfer-IN/OUT activities of a business model need to be determined and expressed in prices, whether these are determined by third-party suppliers of data and commercial metrics (see Table 6.1 and Figure 6.6), or self-reported by boards through self-assessment surveys (see Sections 6.6.1, 6.6.3, and Table A3.6). Once value is converted into monetary terms, Tangen's interconnections across business model activities can be made explicit. Most prescient for decision-making, once calibrated and weighted (Figure 6.6), these can be offset as one sustainability objective is traded-off for another. This core and holistic implication (Figure A5.4b) results from the three assumptions advanced for socio-economic relations (Figure A5.4a) and is necessary for the conceptualization and operationalization of sustainable value creation and transformational leadership. In short, the (ii) 'quantifiability of value transfers' assumption and the (c) 'weight and offset value transfers' implication are not just applicable for decision-making at investment houses or sovereign wealth funds, but also become the master key for transformational business, political, and knowledge elites, as well as for the concerned public wishing to influence intra-elite contests. As a result, sustainable value creation becomes a tractable optimization problem.

The paramount conceptual element of offsetting, which resembles applied consequentialist cost-benefit analysis (see Frank, 2000), is utilized in this inquiry to solve the practical aspects of the optimization problem and is rooted in the reality of economic trade-offs. In Campbell and Kelly's words (1994, p. 422):

Trade-offs are central to economics, as they are to life. They are at the heart of economics because neither the decision-maker nor society can have everything it wants. We look at the tradeoffs that must be made when the criteria that are used to govern social decisions cannot all be fully satisfied.

In this work's paradigm, offsets establish trade-offs between the activities of business models based on their monetary quantification (e.g., the proactive linking of monopoly rents and CO<sub>2</sub> emissions, as in next paragraph). Taken in isolation, the single value creation/transfer activity that is part of the business model bundle cannot coherently be maximized (the prescriptive position for value creation activities) or minimized (the prescriptive position for value transfer activities). Instead, a totality perspective is taken<sup>93</sup>. Firm activities are thus offset using strategic decision-making (keeping an eye on long-term risks and valuations) in line with institutional requirements, based on the activities' respective pricing and the ensuing monetary amounts (heeding the 'quantifiability of value transfers' finance assumption). At times, the process of offsetting requires negotiated (elite) bargains. The transformational leadership needed for offsetting is viable thanks to the set of SVC metrics used to assess a business model. Again, a metric is the basic indivisible unit of a business model that signifies and quantifies a particular value creation and transfer activity. Upon the aggregation of the SVC metrics, the entirety of a model's impact (on development) is deducible. The counterbalancing offsetting mechanisms—implemented from outside the model by policy or from the inside by transformational leadership—constructively acknowledge and address the negative aspects of trade-offs by optimizing the sustainable value creation of the model as a whole.

Consequently, questions such as "how many carbon offsets are required to compensate monopoly rents?" or "what price ought tobacco firms pay for each cigarette butt liable to pollute Spanish beaches"94 or "how large should technology spillovers be to make up for monopoly rents?" have numeric answers that can be deduced for the purposes of practice. The Financial Times' article, "City Investors Putting UK Security at Risk over ESG, Ministers Warn", points out that "Andrew Griffith, the City minister, and James Cartlidge, the defence procurement minister, said it is 'perverse' for institutions to be shunning or divesting from defence and security companies at a time of war in Europe" which "risks starving the industry of capital at competitive valuations" (Pfeifer, 2023). As security is an inclusive transfer, should military hardware not be included and priced as a positive contribution in current ESG frameworks? Evidently, managers, investors, scholars, and citizens might raise a multitude

<sup>93</sup> This matches Edmans' proposal (2024, p. 13) for "rational sustainability" that factors in "diminishing returns and trade-offs" and "recognizes that sustainability factors are subject to the same laws of gravity as everything else. It encourages us to look at the big picture - rather than getting engrossed with the benefits, to step back and consider the costs."

<sup>94</sup> See Spanish legislation, Ley 7/2022, de 8 de abril, de residuos y suelos contaminados para una economía circular (BOE, 2022, p. 66).

of analogous questions about the micro- and macro-level impacts and trade-offs of multiple business activities just as policymakers do in the context of weighted structural reforms (see Section 7.1.1). Pigouvian tax/subsidies (Pigou 1920/1932) use prices to address the internalization of specific negative/positive externalities, and they can likewise be used to offset transfer-IN/OUT. The pricing of value (and risk) transfers implicit in specific business model activities in relation to counterparty stakeholders is a feasible approach to ultimately attain generalized sustainable value creation. From an economic and human development perspective, SVC measurements (such as the VCr) based on quantifiable transfer-IN/OUT metrics are designed to benchmark elite (business model) transformational leadership (see Table 7.2) and guide structural reforms aimed at an economy's incentive system (Section 7.1.4).

To have impact, SVC measurements and their related tools and frameworks must be intuitive. As discussed in Chapter 2, the value creation position (VCp) is operationalized (and normalized on a notionally common scale) using a percentage range. A putative 0% represents full value transfer-IN (i.e., all the firm's revenue or residual income is derived from transfers and value appropriated but *not* created), while 100% represents full value creation by the principal with no transfer-IN (i.e., absolutely no value appropriated but *not* created is taken from any stakeholder). On the 'value spectrum', it is easy to see where a firm, elite, or non-elite sits between the two extremes of 0 and 100 (total value extraction or pure value creation by firms is rare). 95 The four scores estimated in Figure 5.1a provide a conceptual rendition of the VCp and VCr SVC measurements. They are rendered for a second time in Figure 5.1b to provide a clearer grasp by adding their respective equations (4.1a) and (4.2a). The top rows (a) visualize an inclusive business model (with high degrees of value creation), while the bottom rows (b) set out an extractive business model (with high degrees of extractive transfers). For each of these two models, the VCp scores are provided (in the left column), as are the VCr scores (in the right column). Net value creation and value transfer-IN (jointly accounting for revenue), as well as value transfer-OUT, are visually depicted for each of the four renditions to facilitate understanding of these two SVC measurements.

The two depictions of VCp on the left of Figures 5.1a and 5.1b (with their respective scores of 80% and 40%) describe prototypical inclusive and extractive firms, with the business model respectively relying on value creation (top left) and on extractive

<sup>95</sup> This operationalization, both anchored and constrained by the P&L statement, limits total value extraction (transfer-IN) to the amount of revenue (or profits), a restriction that all too often does not bear out in practice when, for instance, value is destroyed and the costs borne by the third parties exceed the revenue appropriated from them (see Figure A5.5a and Figure A5.5b, as well as the Purdue Pharma case in Section 8.2.1). Expanded details on this matter are provided from Section 6.6.1 onwards.

transfers (bottom left). 96 The two depictions of VCr on the right side of both figures (with their respective scores of 1.20 and 0.70) describe the same inclusive (top right) and extractive (bottom right) prototypical firms. The important conceptual distinction between the VCp and VCr scores is that for the latter the transfer-OUT amounts from SVC metrics have been ascertained and added into the calculations as inputs. The VCr is thus distinct from the VCp on account of requiring an assessment of the principal's transfer-OUT amounts. 97 Transfer-OUT metrics must quantify value in monetary terms, and price value creation that is not monetized (or monetizable) by the business model (as it is off-P&L and not reflected in any financial statement). Thus, transfer-OUT makes value created but *not* appropriated explicit. To do so, price equivalencies must be rendered and corresponding judgments made. For instance, for offsetting carbon emissions, for paying wages that exceed standard market rates, for generating innovation spillovers, and for a plethora of other value benefits provided to stakeholders—including to society at large—often conceptualized as positive externalities (see Buchanan & Stubblebine, 1962; Bresnahan, 1986; Ayres & Levitt, 1998).

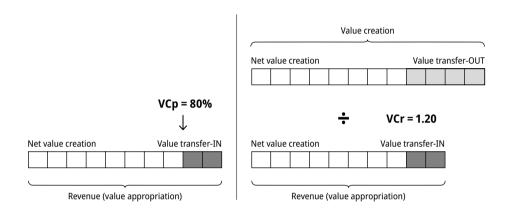
It helps to imagine the beneficial spillover effects of value creation as positive externalities, like municipal parks. Again, externalities, one of the keys to economic and human development, are "situations in which one person's actions directly affect another person's welfare" and that "affect the overall size of the utility pie" (Bueno de Mesquita, 2016, p. 100). The question of externalities, part of theoretical welfare economics (Pigou 1920/1932; Coase, 1960; Buchanan & Stubblebine, 1962; Baumol, 1972), is integrated into this inquiry through elite business model positive externalities operationalized as inclusive transfer-OUT (where the principal transferors of value created but not appropriated are emitters of value and stakeholders are its recipients) and negative externalities operationalized as extractive transfer-IN (where the principal transferees of value appropriated but not created are absorbers of value, while stakeholders are the transferors who pay). Of particular interest are positive externalities that are widely spread or otherwise appear elusive. The classical example is that of high-speed computers as a positive externality representing "a very large social gain to computerization that was not captured by manufacturers of computers" (Bresnahan, 1986, p. 742). The same is true for innovations as diverse as Wikipedia or penicillin and may also be the case for rapidly evolving AI. On the other hand, the consummate firm that captures and stores more carbon and other greenhouse gases than it

96 Table 2.4 explains the VCp equation (4.1): VCp(revenue) = [revenue - transfer-IN(revenue)] / revenue;  $VCp_t^{R'} = \frac{R_t' - Vt_t^{R'} in}{R_t'}$ . To reconcile Figure 5.1a with equation (4.1), use the following formulation of equation (2.3"); revenue = net value creation + transfer-IN(revenue).

97 Table 2.4 explains the VCr equation (4.2): VCr(revenue) = [revenue - transfer-IN(revenue) + transfer-OUT(revenue)] / revenue;  $VCr_t^{R'} = \frac{R_t' - Vt_t^{R'in} + Vt_t^{R'out}}{R_t'}$ . To reconcile Figure 5.1a with equation (4.2), use equation (2.3"): net value creation = revenue – transfer-IN(revenue).

#### Value Creation Position (VCp) Value Creation Rating (VCr) 'The proportion of value creation over revenue' 'The proportion of extractive value transfers over revenue (value appropriation)' 'A proportion of inclusive vs extractive value transfers'

#### (a) Inclusive business model (high value creation)



#### (b) Extractive business model (high value transfer)

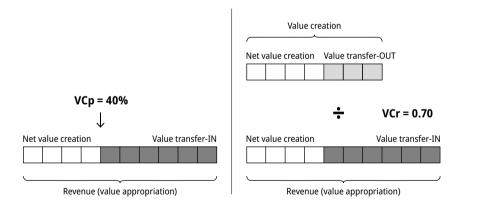


Figure 5.1a: A conceptual rendition of value creation and value extraction business models with their respective Value Creation Position (VCp) and Value Creation Rating (VCr) scores.

# Value Creation Position (VCp) equation Value Creation Rating (VCr) equation $VCp_t^{R'} = \frac{R_t' - Vt_t^{R'in}}{R_t'}$ $VCr_t^{R'} = \frac{R_t' - Vt_t^{R'in} + Vt_t^{R'out}}{R_t'}$ (a) Inclusive business model (high value creation) Value creation Net value creation Net value creation Value transfer-IN Value transfer-OUT VCp = 80%**VCr = 1.20** Net value creation Value transfer-IN Net value creation Value transfer-IN Revenue (value appropriation) Revenue (value appropriation) (b) Extractive business model (high value transfer) Value creation Value transfer-IN Net value creation Net value creation Value transfer-OUT VCp = 40% VCr = 0.70Value transfer-IN Value transfer-IN Net value creation Net value creation

Figure 5.1b: An equation-based conceptual rendition of value creation and value extraction business models with their respective Value Creation Position (VCp) and Value Creation Rating (VCr) scores.

Revenue (value appropriation)

Revenue (value appropriation)

emits, receives ISO 14064-1 certification, and then sells carbon credits through the European Union Emissions Trading System (EU ETS), possesses the hard evidence for a quantifiable metric that attests to the positive externality that it generates.

From a value creation-appropriation (VCA) framework perspective, positive externalities are value transfer-OUT and represent value captured by stakeholders that are often contractual parties to the elite business model. The sizable amount of inclusive transfer-OUT is a central reason why value creation business models are so essential to progressive economic and societal development. Conceivably, the more value that a business model creates, the higher the likelihood of value transfer-OUT:

Value creation, rather than value appropriation, lies at the heart of effective firm strategies. Strategies that focus on creating new value undoubtedly led to some of that value spilling over to other firms and to society as a whole. (Moran & Ghoshal, 1996, p. 45)

The transfer-OUT process is deemed to be inclusive when the transferor enjoys a power differential advantage over the transferee (see earlier in this sub-section and Section 2.3.2). But why is there inclusive transfer-OUT at all by elites given their skewed bargaining power differential advantage over non-elite stakeholders? One answer to this question is that some positive externalities might be impossible to capture while others may leak unintentionally. The prices of Big Tech's products and services have over the years not come close to the value they deliver to many customers. This could mean continued price increases if these business models decide to double down on monetization rather than sustain their transfer-OUT. In other cases, transfer-OUT is part of a rational strategy aimed at the consolidation of positions in the market, nonmarket, or narrative market arenas for intra-elite contest purposes. The reckoning here could be that the inclusive transfer-OUT strengthens elite/non-elite cohesion, or a particular business model that becomes a source of power for an elite and provides residual income for a non-elite group. For instance, the value spillovers of staging the Olympics sees construction companies in tactical partnerships with sports enthusiasts and their clubs when preparing a city's candidacy. Hence, transfer-OUT amounts might be conscientiously left on the table by elite principals for a variety of reasons consistent with their power and residual income interests. Yet there are evidently also genuinely noncoerced, altruistic, and deliberate non-utility maximization motivations—at times anchored in ethics or religion—that run counter to Proposition 5's assertion that elite behavior is rational and predominantly driven by a residual income maximization utility function. In an era where massive amounts of rent seeking occurs in the educational sector (as evidenced by defaulting student loans in the US, see Brennan & Magness, 2019; Hanson, 2022), consider Germany's social contract for its vaunted dual-track vocational training system (Euler, 2013) where most of the value created remains in the hands of the less powerful, broad non-elite constituencies—apprentices and participating firms, many of them SMEs. Elite coalitions that constrain their own value appropriation, even when motivated by minimizing their risks and creating a sustainable future for their models, are consistent with the 'inextinguishable value creation option of elites' (Section 2.2.1 and Figure 5.4c) and with the set of ethical principles associated with the normative aspects of the ETED (Chapter 8).

Establishing the transfer-IN/OUT and eventually the VCr of elite business models supports legal and economic reform and judgment on macro policy, for instance, by shedding light on whether 'progressive elite circulation' is occurring (see Section 1.3.2). The relevance of such discernments, vital for elite system transformational leadership (Table 7.2), becomes evident in the review of Russia's post-Soviet elite below:

Some consider the oligarchs to be the engine of Russia's economic recovery and institutional reform since 1999 (Boone & Rodionov, 2002; Aslund, 2004). As oligarchs are the only currently feasible counterweight to the predatory and corrupt Russian bureaucracy, they are a unique constituency that is both willing and able to lobby for development of market institutions. They are also the only Russian owners who can afford to invest and restructure Russian industries in a very hostile business environment. To others, the oligarchs have weakened Russia's economy by stripping assets from Russian firms and sending money abroad and also by bringing the ideas of private property and corporation into disrepute. In addition, the oligarchs have also arguably weakened Russia's democratic institutions, by causing tremendous inequality and through their capture of federal and state politics (Stiglitz, 2002; Goldman, 2004; Hoff and Stiglitz, 2004). (Guriev & Rachinsky, 2005, p. 131)

As a result of their comprehensive examination, Guriev and Rachinsky (2005, p. 149) conclude that: "Both negative and positive stereotypes about Russian oligarchs are true", conceding that they might "run their empires more efficiently than other Russian owners" or the former Soviet elites. By using a systematic quantification of the conceptual transfer-IN/OUT criteria (the SVC metrics the authors conceptually suggest are 'efficiency' or 'investments' as transfer-OUT and 'capital flight' or 'institutional capture' as transfer-IN) a VCr is estimable, thus providing prescriptive possibilities for policymaking and weighted structural reforms (see Table 7.1).

Clearly, political economies where elite business models engage in excessive amounts of extractive transfer-IN stunt economic development. The costs and risks generated by the principals of these models are transferred to stakeholders via their activities, at times by higher prices and on other occasions as negative externalities. If a principal's P&L benefits from transfer-IN revenue/profit, this inquiry's imperative calls for the incremental gain (and risk reduction) to be established and operationalized with an appropriate metric. Admittedly, some of these amounts might be unquantifiable by metrics for a variety of reasons: association with market failures, conceptual elusiveness resulting in data unavailability, the intentional hiding of some activities (see Taleb, 2018, on hiding risks), or implicit principal-stakeholder relationships that are not direct or contractual. Quantifying Baumol's (1972, pp. 310–311) "laundry whose output is damaged by smoky air" is relatively easy in comparison. Hidden or not, a complicating leitmotiv of this inquiry's paradigm is that such extractive transfer-IN activities are often indispensable, both for the business model's overall performance and general human development. Still, the essential fact of development is the different degrees to which

elite business models rely on extractive practices or leave part of the value they create on the table for non-elite appropriation.

The inclusive economic development problem is therefore first one of measurement, which the Pigouvian tax/subsidies approach to resolving externalities considers key (Buchanan & Stubblebine, 1962; Baumol, 1972). The journey starts here by ascertaining the irreducible elements of firm-level value creation/extraction, i.e., the SVC metrics. The challenge becomes how to incorporate into the standardized SVC measurements most of the material extractive/inclusive transfer-IN/OUT activities that constitute a business model, even when many corresponding metrics are by nature hard to pinpoint (as many negative/positive externalities or public goods are). If successful in estimating these (the methods are further expounded on in Section 6.6.1), SVC measurements like the VCr or VCp will fairly reflect sustainable value creation as theorized in this work. By approximating the actual value creation and value transfers of business models, the inclusive/extractive factors that many ESG measurements obviate (such as trade barrier gains, regulatory protections, innovation spillovers, subsidies, competitive markets, or monopoly power) will be addressed. As all of these elements are systematically applied, it becomes possible to understand the full impact of a firm on the economy, while the resultant measurements can also be used to optimize capital allocation processes for sustainable development through novel valuations of equity, debt, and firms as is discussed next.

### 5.3.2 Five valuation frameworks for sustainable capital allocation

Similarly, question 12 of the specimen exam for the CFA UK Level 4 Certificate in ESG Investing is "What impact will a high ESG rating have on a company's cost of capital?" The answer key gives the correct response as "A: A lower cost of capital". (Edmans, 2023, p. 20)

'The Five Sustainable Value Creation (SVC) Valuation Frameworks' for finance introduced in this section are a set of decision-making tools for the allocation of capital. Two of these are aimed at enterprise value and equity; two are aimed at debt; and the fifth is intended for firm valuations using WACC. All five rely on generally accepted methods of finance to compute different aspects of an SVC firm valuation. An 'SVC valuation' is thus an adjusted price of a private enterprise or publicly traded equity, a rated or non-rated debt, or of a firm, which can be applied to an asset, project, liability, or financial instrument to expresses the inclusive value creation and extractive value transfers of the underlying business model. Bancel, Glavas, and Karolyi (2023) show that "the discount rate is the key parameter adjusted in valuations based on the discounted cash flow approach". This sub-section might also remind the reader of the Nordhaus-Stern discount rates for sustainability controversy regarding climate policies, government projects, and economic modeling<sup>98</sup> (see Dasgupta, 2007; Schoenmaker & Schramade, 2024). Edmans position is clear when he states that it is a "myth" that "Sustainability Risks Increase the Cost of Capital (No. sustainability risks lower expected cash flows)" (2023, p. 17) and clarifies his stance further:

Remember that a project's cost of capital depends only on market risk. Diversifiable events can affect project cash flows but they do not increase the cost of capital [...] Don't give in to the temptation to add fudge factors to the discount rate to offset things that could go wrong with the proposed investment [...] Adjust cashflow forecasts instead (Brealey, Myers, Allen, & Edmans, 2022, cited in Edmans, 2023, p. 14).

On the other hand, this inquiry's more assertive position is that cash flow reductions are best (and a priori can only be) addressed with the sustainable value creation risk factor with which they associate. The premise is that the risks associated with extractive value transfers (as measured by the VCr) are company-specific but non-diversifiable (just like market risk is non-diversifiable) and therefore firms engaged in sustainable value creation will enjoy lower costs of capital.

The original input to the valuation frameworks is the VCr, and this chief firm-level SVC measurement adjusts the discount rate. The discrete calibrated and weighted metrics that make up the VCr ought to cover all materially relevant value (and risk) creation and transfer activities of a business model (Section 6.6.1 is devoted to the SVC metrics that establish value transfers). Figure 5.3 in this chapter's summary illustrates the relationship between the VCr and the five sustainable value creation valuation frameworks (SVC valuations).

The five SVC valuation frameworks and their pertinent equations, logic, and enabling conceptual elements are summarized in Table 5.2 before being further specified. Readers may also refer to the appendices for the corresponding graphical overviews: the two sustainable value creation valuation frameworks for enterprise value are presented in Figure A5.6a; the two for debt are depicted in Figure A5.6b; and the framework for firms, based on SVC costs of capital and debt, is visualized in Figure A5.6c.

98 Nordhaus' (1994) high discount rate (of 4.3%) and Stern's (2006) low discount rate (of 1.4%) have discrete ramifications for policies on climate change: Nordhaus "rationalises postponing necessary climate investments" while Sir Nicholas Stern's The Review of Economics on Climate Change argues that a "lower discount rate makes the far future look more important today, and supports greater futureoriented investment" (Schoenmaker & Schramade, 2024, p. 1). The non-technical, judgmental nature of establishing such discount rates points to them being "ethical and political issues more than economic ones" (Godard, 2008, p. 39), as is articulated by Dasgupta's criticism of the Stern Reviews' conclusion as containing particular "views on intergenerational equity; it isn't driven so much by the new climatic facts the authors have stressed" (2007, p. 4). As Schoenmaker & Schramade (2024, p. 6) note: "Measurement and valuation of social and environmental impacts is work-in-progress. Not all impacts can (yet) be measured and put in monetary terms in a reliable way."

 
 Table 5.2: Summary of 'The Five Sustainable Value Creation (SVC) Valuation Frameworks' for equity, debt
 and firms.

Sustainable value creation (SVC) valuation framework	Purpose	Description of calculation approach	Conceptual elements Equations
(SVC-VF.1) 'The SVC- adjusted enterprise valuation framework' for private firms	Compute the 'VCr revenue multiple adjustment' (VCr <sup>m</sup> ) and the 'VCr enterprise value adjustment' (VCr <sup>EV</sup> ) to establish the 'SVC enterprise valuation' for private firms (EVm'; EV').	The 'VCr enterprise value adjustment functions' $(fVCr^m/fVCr^m)$ have the VCr as their input and the 'VCr multiple adjustment' $(VCr^m)$ and 'VCr enterprise value adjustment' $(VCr^EV)$ as their outputs. These then become the inputs of the revenue multiple-based enterprise value $(EVm)$ and the enterprise value $(EV)$ equations for the two SVC-adjusted enterprise valuation approaches $(EVm'; EV')$ .	<ul> <li>'VCr enterprise value adjustment functions': fVCr<sup>m</sup>/fVCr<sup>EV</sup></li> <li>'VCr revenue multiple adjustment': VCr<sup>m</sup></li> <li>'VCr enterprise value adjustment': VCr<sup>EV</sup></li> <li>Equation (5.1a) 'SVC revenue multiple-based enterprise value':         EVm' = Revenue * (Revenue Multiple * VCr<sup>m</sup>)     </li> <li>Equation (5.2a) 'SVC-adjusted enterprise value': EV' =         (Equity Value * VCr<sup>EV</sup>) + Net Debt     </li> </ul>
(SVC-VF.2) 'The SVC cost of equity valuation framework' for public firms	Compute the 'SVC cost of equity' $(k'_E)$ to establish the 'SVC equity valuation' for public firms $(SVC'_E)$	The 'SVC risk premium function' for equity has the VCr as its input and the 'SVC risk premium' $(r_{SVC})$ as its output, which then becomes an added input to CAPM; the resulting 'SVC cost of equity' rate $(k_E')$ becomes the discount rate for the DCF-based 'SVC equity valuation' $(SVC_E')$ , a net present value (NPV) of equity.	- 'SVC risk premium function' for equity: $fr_{SVC}$ - 'SVC risk premium': $r_{SVC}$ - 'SVC cost of equity': $k_E^c$ - 'SVC equity valuation': $SVC_E^c$ - Equation (6.1a) 'SVC cost of equity': $k_E^c = r_f + \beta_E * (r_m - r_f) + r_{SVC}$ - Equation (6.2a) 'SVC equity valuation': $SVC_E^c = \frac{CF_1}{(1 + k_E^c)^1} + \dots + \frac{CF_n}{(1 + k_E^c)^n}$

Table 5.2 (continued)

Sustainable value creation (SVC) valuation framework	Purpose	Description of calculation approach	Conceptual elements Equations
(SVC-VF.3) 'The SVC- adjusted credit rating valuation framework' for credit- rated debtors	Compute the 'SVC risk premium for credit rating' ( $r_{SVC,D}^{cr}$ ) to establish the 'SVC debt valuation' for rated debtors ( $SVC_D^{cr'}$ )	The 'SVC risk premium function for credit rating' $(f_{SVC,D}^{cr})$ has the VCr as its input and the 'SVC risk premium for credit rating' $(r_{SVC,D}^{cr})$ as its output, which is then applied to the credit rating cost of debt to produce the 'SVC-adjusted credit rating cost of debt' $(k_D^{cr})$ . This cost of debt becomes the discount rate of debt cash flows resulting in the 'SVC-adjusted credit rating debt valuation' $(SVC_D^{cr})$ ', i.e., the NPV of debt.	<ul> <li>"SVC risk premium function for credit rating": fr<sup>cr</sup><sub>SVC,D</sub></li> <li>"SVC risk premium for credit rating": r<sup>cr</sup><sub>SVC,D</sub></li> <li>"Credit rating spread": CS<sup>cr</sup><sub>i</sub></li> <li>"SVC-adjusted credit rating cost of debt": k<sup>cr</sup><sub>D</sub></li> <li>"SVC-adjusted credit rating debt valuation": SVC<sup>cr</sup><sub>D</sub></li> <li>Equation (7.1a), "SVC-adjusted credit rating cost of debt": k<sup>cr</sup><sub>D</sub> = r<sub>f</sub> + CS<sup>cr</sup><sub>f</sub> + r<sup>cr</sup><sub>SVC,D</sub></li> <li>Equation (7.2a), "SVC-adjusted credit rating valuation": SVC<sup>cr</sup><sub>D</sub> = CF<sub>1</sub> (1 + k<sup>cr</sup><sub>D</sub>) + + CF<sub>n</sub> (1 + k<sup>cr</sup><sub>D</sub>)</li> </ul>
(SVC-VF.4) 'The SVC cost of debt valuation framework' for debtors	Compute the 'SVC cost of debt' $(k'_D)$ to establish the 'SVC debt valuation' for debtors $(SVC'_D)$	The 'SVC risk premium function for debt' $(fr_{SVC,D})$ has the VCr as its input and the 'SVC risk premium for debt' $(r_{SVC,D})$ as its output. This is then added to the standard cost of debt formula. The resulting 'SVC cost of debt' rate $(k'_D)$ becomes the discount rate for the DCF-based 'SVC debt valuation' $(SVC'_D)$ , an NPV of debt.	- 'SVC risk premium function for debt': $fr_{SVC,D}$ - 'SVC risk premium for debt': $r_{SVC,D}$ - 'Credit rating spread': $CS_i$ - 'SVC cost of debt': $k'_D$ - 'SVC debt valuation': $SVC'_D$ - Equation (8.1a), 'SVC cost of debt': $k'_D = r_f + CS_i + r_{SVC,D}$ - Equation (8.2a), 'SVC debt valuation': $SVC'_D = \frac{CF_1}{(1+k'_D)^1} + \ldots + \frac{CF_n}{(1+k'_D)^n}$

Table 5.2 (continued)

Sustainable value creation (SVC) valuation framework	Purpose	Description of calculation approach	Conceptual elements Equations
(SVC-VF.5) 'The WACC-based valuation framework' for firms	Compute the 'SVC WACC' ( WACC'') to establish the 'SVC firm valuation' for firms (SVC'')	The 'SVC cost of equity' rate $(k_E')$ and the 'SVC cost of debt' rate $(k_D')$ (or alternatively, the 'SVC-adjusted credit rating cost of debt', $k_D^{cr'}$ ), are used to calculate the weighted discount rate ( <i>WACC''</i> ) for the 'SVC firm valuation' ( <i>SVC'''</i> ), i.e. the full sustainable value creation adjusted NPV of the firm.	- 'SVC WACC': WACC'' - 'SVC firm valuation': SVC''  - Equation (9.1a), 'SVC  WACC': WACC'' = $(\frac{E}{V} * k_E^c) + (\frac{D}{V} * k_D^{cc'}   k_D')$ - Equation (9.2a), 'SVC firm valuation':  SVC'' = $\frac{CF_1}{(1 + WACC'')^1} + \dots + \frac{CF_n}{(1 + WACC'')^n}$

Further to the summary above, the logic, conceptual elements and their operationalization as the equations of the five valuation frameworks are now further stipulated. The starting point for all the SVC valuation frameworks is the VCr. This measurement is the primary input to the functions whose outputs are SVC adjustments that in turn become the original inputs to established valuation methods. Hence, this inquiry's conceptual element of sustainable value creation is, via its VCr measurement and its focus on extractive value transfer-IN and inclusive value transfer OUT, incorporated into existing financial valuation frameworks.

The process of linking sustainable value creation and financial valuations starts with conceptual elements that are fit for purpose and then moves on to their operationalization. The SVC functions are central to the implementation of SVC valuations because the outputs are introduced to standard valuation methods and ultimately yield SVC-adjusted valuations. That process, and the functions themselves, must be transparent, a requirement that includes revealing their underlying weighting and algorithms.<sup>99</sup>

<sup>99</sup> The calculations for the VCr—the primary input to SVC valuations—are based on extractive/inclusive transfer-IN/OUT metrics that are likewise subject to weighting (see Table 6.2, Section 6.6.1, and Table 6.6) and, as a resource and incentive for transformational leadership, must likewise be transparent and open to scrutiny.

As part of 'The SVC-adjusted enterprise valuation framework' for private firms (SVC-VF.1) there are two 'VCr enterprise value adjustment functions'  $(fVCr^{EVm}/fVCr^{EV})$ ; one produces the input for a revenue multiple-based adjustment to the enterprise value, while the other one produces an adjustment of the equity value, from which the enterprise value can be derived by adding net debt. 'The SVC-adjusted credit rating valuation framework' for credit-rated debtors (SVC-VF.3) has the 'SVC risk premium function for credit rating' ( $f r_{SVCD}^{CR}$ ), the output of which will affect the credit rating cost of debt. These three functions will undergo an interactive development process with either a simple linear weighting or more sophisticated non-linear configurations.

The 'SVC risk premium function' for equity ( $fr_{SVC}$ ) of 'The SVC cost of equity valuation framework' for public firms (SVC-VF.2), and the 'SVC risk premium function for debt' (fr<sub>SVC,D</sub>) for 'The SVC cost of debt valuation framework' for debtors (SVC-VF.4) will also undergo cycles for their development and the calibration of premia and are expected to become more complex, multi-factor, and non-linear. This might entail weighting them with factor models that reflect a certain conceptual understanding or even the underlying data structures (e.g., of publicly listed firms) to best model sustainable value creation. That is, the (endogenous) empirical determination of SVC risk premia (for equity and debt, respectively  $r_{SVC}$  and  $r_{SVC,D}$ ) rather than an explicit (exogenous) determination. Computational approach options here include the Fama-MacBeth regression (Fama & MacBeth, 1973); the Fama and French (2015) factor model; Merton's interest rate risk structure (1974) for debt valuation; and even machine learning for function approximation using neural networks.

Further to the introduction of their cornerstone functions, the five valuation frameworks are reviewed by referencing their respective equations (grouped into five sets, 5/9 to 9/9, following the nomenclature of the equations in Table 2.4).

### Equations for enterprise valuation (5/9)

'The SVC-adjusted enterprise valuation framework' for private firms (SVC-VF.1)—see the overview in Figure A5.6a—offers two routes for valuing enterprises: one based on the revenue multiple (it could be EBITDA or industry-specific multiples, such as the number of subscribers); and the second based on the standard equity value plus the net debt equation. These two routes respectively become the 'SVC revenue multiple-based enterprise value' equation (5.1), and the 'SVC-adjusted enterprise value' equation (5.2). The SVC-adjusted equations have as their inputs the 'VCr revenue multiple adjustment'  $(VCr^m)$  and the 'VCr enterprise value adjustment'  $(VCr^{EV})$ , which are the outputs of two versions of the 'VCr enterprise value adjustment functions' ( $fVCr^m/fVCr^{EV}$ ). The  $VCr^m$ is in turn applied to derive enterprise value in the 'SVC revenue multiple-based enterprise value' in equation (5.1), and the 'VCr<sup>EV</sup> to do so in the 'SVC-adjusted enterprise value' equation (5.2). The revenue and other multiples for the practice of private firm valuations are derived from the average trading multiples of listed comparable firms in the same industry and country and of similar size, as well as from multiples in recent

M&A transactions. These two equations (5.1) and (5.2) respectively yield two valuations (EVm; EV') that represent two routes to ascertain the sustainable value creation of enterprises. The two valuation approaches are intended to be used for private firms and though both can also be used for publicly traded firms, the next valuation framework for equity (SVC-VF.2) is deemed to be more suitable for these.

### Equations for cost of equity valuation (6/9)

The second valuation framework for equity is 'The SVC cost of equity valuation framework' for public firms (SVC-VF.2)—the overview is also provided in Figure A5.6a—and introduces a novel conceptual element: the 'SVC risk premium' for equity. This 'SVC risk premium'  $(r_{SVC})$  is added to the CAPM (Capital Asset Pricing Model) equation to yield the 'SVC cost of equity' rate  $(k_F')$ . The CAPM is a method that has solved (see Treynor, 1961; Sharpe, 1964) a "fundamental question in finance" i.e., "how the risk of an investment should affect its expected return" (Perold, 2004, p. 4). The cost of capital or the expected return is established on the basis of non-diversifiable risk (also called market risk or systematic risk) that is represented by 'beta' ( $\beta$ ). The beta coefficient is thus a risk adjustment that reflects the sensitivity of a firm, investment, or asset (i.e., the return) to market risk (i.e., the overall market return) and hence is the ultimate determinant of the cost of equity (and capital). In a standard CAPM formulation, the cost of equity (and also the expected return required by equity investors) equals the risk-free rate  $(r_f)$  plus the beta coefficient multiplied by the market risk premium. The market risk premium is the expected market return minus the risk-free rate  $(r_m - r_f)^{100}$  The 'SVC risk premium'  $(r_{SVC})$  for equity results from the 'SVC risk premium function' for equity ( $fr_{SVC}$ ). In a simple version, this key function could derive a multiplier factor from a cubic function or other with min/max limits, and apply it to the risk-free rate. 101 As has already been mentioned, a desirable and more sophisticated version would reference underlying data structures (as in Fama & MacBeth, 1973; Merton, 1974; Fama & French, 2015). The 'SVC cost of equity'  $(k'_E)$  adds the 'SVC risk premium' ( $r_{SVC}$ ) to CAPM as depicted in equation (6.1):

'SVC cost of equity' = risk - free rate + beta(market risk) \*market risk premium + 'SVC risk premium'

$$(6.1)$$

$$k'_{E} = r_{f} + \beta_{E} * (r_{m} - r_{f}) + r_{SVC}$$
 (6.1a)

**100** CAPM equation for reference:  $k_E = r_f + \beta_E^* (r_m - r_f)$ 

**101** Possibilities include a linear formula such as  $Linear\ r_{SVC} = r_f * min\{max\ [1 - 0.9 * VC_r; -0.8]; 1\}$  or a cubic formula Cubic  $r_{SVC} = r_f^* \min\{\max[(1 - VC_r)^3; -0.8]; 1\}$ . The latter might be more appropriate if it succeeds in incentivizing transformational leadership on account of the acceleration effects brought about by the increasing marginal rate premium/discount.

The 'SVC risk premium' for equity  $(r_{SVC})$  and its inclusion in the calculation of the cost of capital is the link between capital allocation processes and economic development. Its realization in practice will involve alignment with the institutions whose mandate is to incentivize growth and human development and who have their eyes on the efficient allocation of capital, such as the SEC, the European Financial Reporting Advisory Group (EFRAG), or the BIS (Bank for International Settlements) and its Basel Committee on Banking Supervision (BCBS). Alignment is likewise necessary with institutions that focus on sustainability (see Section 7.2.5), such as the sustainability disclosure standards of the International Sustainability Standards Board (ISSB) that operate under the umbrella of the International Financial Reporting Standards (IFRS) Foundation and complement the IFRS standards of the International Accounting Standards Board (IASB).

The 'SVC cost of equity'  $(k_E^r)$  derived from the 'SVC risk premium' is the rate used to compute the sustainable value creation valuation of equity, i.e., the 'SVC equity valuation' (SVC'). Following in the steps of Irving Fisher, valuation methods have concentrated on establishing present value: "The value of any property, or rights to wealth, is its value as a source of income and is found by discounting that expected income" (1930/1961, p. 12). Except for the first SVC valuation framework (SVC-VF.1), all of the other four rely on discounting cash flows to achieve the present value of sustainable value creation and transfers. They thus employ the standard discounted cash flow (DCF)<sup>102</sup> valuation methods (Williams, 1938; Gordon, 1959) of finance. The 'SVC equity valuation'  $(SVC'_E)$  is a DCF method that obtains the present value of cash flows by discounting these with the 'SVC cost of equity'  $(k'_E)$  rate obtained as is described by equation (6.2):

'SVC equity valuation' = cash flow year  $1/(1 + \text{'SVC cos to fequity'})^{\wedge}$  year  $1 + \dots$ + cash flow year n / (1+'SVC cost of equity') \(^{\text{year}}\) year n (6.2)

$$SVC' = \frac{CF_1}{(1 + k_E')^1} + \frac{CF_2}{(1 + k_E')^2} + \dots + \frac{CF_n}{(1 + k_E')^n}$$
 (6.2a)

To sum up, the non-debt valuation frameworks proposed in this inquiry—'The SVCadjusted enterprise valuation framework' for private firms (SVC-VF.1) and the 'The SVC cost of equity valuation framework' for public firms (SVC-VF.2)—are designed to establish sustainable value creation for private and public firms. By doing so, these valuations can inform the capital allocation processes in finance. Next, the two SVC valuation frameworks for debt are explained.

**102** Standard discounted cash flow (DCF) valuation method for reference:  $DCF = \frac{CF_1}{(1+k_E)^1} + \frac{CF_2}{(1+k_E)^2} + \dots$ 

### Equations for credit rating cost of debt valuation (7/9)

Further to the first two valuation frameworks aimed at the sustainable value creation of private and public enterprises, the third framework (of Table 5.2) targets the SVC valuation of debt. 'The SVC-adjusted credit rating valuation framework' for creditrated debtors (SVC-VF.3)—an overview of which is provided in Figure A5.6b—rests on the 'SVC risk premium for credit rating'  $(r_{SVC,D}^{cr})$ . It complements 'The SVC cost of debt valuation framework' for debtors described in the fourth valuation framework (SVC-VF.4) which has a different basis, the 'SVC risk premium for debt'  $(r_{SVC,D})$ . <sup>103</sup>

Credit ratings calibrate the market risk premium of debt instruments that impact the cost of debt, i.e., the interest rate on new debt (before tax) implicit in any debt instrument. To the SEC, credit ratings are "an assessment of an entity's ability to pay its financial obligations [that applies] to debt securities like bonds, notes, and other debt instruments [and] also are assigned to companies and governments [but not] to equity securities like common stock" (SEC, 2017). The 'SVC risk premium function for credit rating'  $(f r_{SVCD}^{cr})$  has the VCr as its input and the 'SVC risk premium for credit rating'  $(r_{SVC,D}^{cr})$  as its output. This is then introduced into the 'credit rating cost of debt' equation  $(k_D^{cr} = r_f + CS_i^{cr})$  that uses a credit rating spread  $(CS_i^{cr})^{104}$  to reflect the credit rating. The credit ratings of the agencies are based on their methodologies and issued on a scale that grades going up or down by notches as the discrete sustainability assessment of a debtor's probability of default.

The rating agencies, including the three leaders—Standard & Poor's (S&P), Moody's Investor Services, and Fitch Ratings—"use broadly similar methodologies in arriving at their credit rating determination" with their analysis honing in on "business risk" and "financial risk" (Santos, n.d., pp. 45–46). These credit ratings are widely used 105 and based on sophisticated methodologies and models with appended credit-

103 Collaboration with credit rating agencies will determine how distinct the 'SVC risk premium function for credit rating' (frer<sub>SVC,D</sub>) and 'SVC risk premium function for debt' (fr<sub>SVC,D</sub>) functions are in practice and hence if there are any differences between the two SVC risk premia for debt  $(r_{SVC,D}^{cr}|r_{SVC,D})$ .

**104** Since firms have only one cost of debt, the credit spreads  $CS_i^{cr}$  and  $CS_i$  should be the same. A common example where one would try to estimate the CSicr is when trying to compute the cost of debt of a rated firm with no traded bonds. In such a case, no yield to maturity (YTM) can be computed, and so one can instead estimate a credit spread  $CS_i^{cr}$  for that rated firm based on the actual spreads  $CS_i$  of comparable companies with the same rating. This widely used technique implies that  $CS_i^{cr}$  and  $CS_i$ should be identical (see Damodaran, 2012, p. 211). Given that the risk-free rate  $(r_f)$  and cost of debt should be identical in the two equations 7.1a  $(k_D^{cr'})$  and 8.1a  $(k_D')$ , the two risk premia should also be equal in theory. However, as the  $CS_i^{cr}$  is an estimation of the  $CS_i$  of the firm, it will not equal the actual CSi. The main reason for this is that credit ratings do not dynamically fluctuate based on market sentiment but are periodically reviewed and updated by professionals. Therefore, in practice, the rating of a firm might not always be up to date and thus, in such a case, the  $CS_i^{cr}$  would not equal the actual  $CS_i$ of the firm one is trying to value (based on commentary by Nils Unell, January, 2024).

105 Deloitte Touche Tohmatsu Limited use credit ratings in their private debt valuation practice, see: https://www2.deloitte.com/content/dam/Deloitte/lu/Documents/financial-advisory/lu\_deloitte-vluationconference\_private-debt-valuation\_032016.pdf

relevant quantitative and qualitative factors 106, 107. These additional factors (different agencies use terms like "modifier" or "consideration") are applied at discrete stages of the various rating methodologies, modifying intermediate results and ultimately the credit ratings themselves by incrementing or decrementing these with notches. The credit rating, the output of such rating agency models, becomes the basis for the 'credit rating spread' ( $CS_i^{cr}$ ). Credit spreads are important elements in finance used to determine the cost of debt, which is the risk-free rate plus the credit spread. 108 The extent to which "credit ratings correlate negatively with the cost of debt" can be empirically ascertained, as was done in "The Cost of a Notch" (Vazza, Kraemer, & Gurwitz, 2019). In the application of 'The SVC-adjusted credit rating valuation framework' for credit-rated debtors (SVC-VF.3), the 'SVC-adjusted credit rating cost of debt'  $(k_D^{cr'})$ will differ from the credit rating cost of debt  $(k_D^{cr})$ , even as the agency's credit rating spread for debt  $(CS_i^{cr})$  is maintained, because of the addition of the 'SVC risk premium for credit rating'  $(r_{SVC,D}^{cr})$ . The 'SVC-adjusted credit rating cost of debt' is described in equation (7.1):

'SVC – adjusted credit rating cost of debt' = risk – free rate + 'credit rating spread' + 'SVC risk premium for credit rating'

(7.1)

$$k_D^{cr'} = r_f + CS_i^{cr} + r_{SVCD}^{cr}$$
 (7.1a)

The 'SVC-adjusted credit rating valuation for debt' ( $SVC_D^{cr'}$ ) utilizes a DCF method described in equation (7.2). The rate to discount cash flows it uses to reach the net present value (NPV) is the 'SVC-adjusted credit rating cost of debt'  $(k_D^{cr'})$  rate obtained from equation (7.1)<sup>109</sup>. Potential users of this third valuation framework include rated firms

106 For examples of Moody's Investor Services and Fitch Ratings' use of modifiers and factors in their rating methodologies see: https://www.fitchratings.com/research/sovereigns/fitch-ratings-publishesexposure-draft-for-sovereign-rating-criteria-08-06-2022; https://www.moodys.com/sites/products/Pro ductAttachments/Exhibit2.pdf

107 Modifiers based on ETED conceptual elements, such as an elite quality modifier for country risk derived from the EOr or EOx, could possibly be integrated into the Corporate Industry and Country Risk Assessment (CICRA) section of S&P's business risk methodology or as an appended factor in Moody's methodology (as per Unell, 2023).

**108** Cost of debt equation for reference:  $k_D = r_f + CS_i$ 

109 An alternative to the 'SVC-adjusted credit rating cost of debt' approach would be the 'SVCmodified credit rating cost of debt', though this would require cooperation with rating agencies and access to credit rating models. An 'SVC modifier for credit rating function' (fVCr<sup>CRX</sup>) would have, as its output, an 'SVC-modifier for credit rating' (VCr<sup>CRx</sup>) that would be introduced into the credit rating models to yield an 'SVC-modified credit rating' (CR\*). Based on the agencies' methodologies, the 'SVCmodified credit rating' would then be converted into a new credit rating spread, the 'SVC-modified credit rating spread' (CS<sub>i</sub><sup>crx</sup>). Lastly, this spread would be plugged into the standard cost of debt formula  $(k_D^{crx} = r_f + CS_i^{crx})$  for the 'SVC-modified credit rating cost of debt'.

that do not have traded bonds (a rating might help them to meet regulatory requirements), 110 or firms that have neither traded bonds nor are rated by credit rating agencies but construct synthetic ratings to compute the cost of debt (Damodaran, 2012) or are rated by banks.<sup>111</sup> 'The SVC-adjusted credit rating valuation framework' for creditrated debtors (SVC-VF.3) does, in consistency with the credit rating methodologies that it uses as baseline, provide new and relevant information on the 'likelihood of default' of a debt instrument. The assumption here is that the risk of insolvency associates with the amount of sustainable value creation and unsustainable value transfers inherent in the business model activities that underlie a firm's cash flows.

### Equations for cost of debt valuation (8/9)

'The SVC cost of debt valuation framework' for debtors (SVC-VF.4)—an overview of which is also provided in Figure A5.6b—also renders the SVC debt valuation. Its mechanics start by applying the 'SVC risk premium function for debt' ( $fr_{SVC,D}$ ), where the VCr is the input and the 'SVC risk premium for debt'  $(r_{SVC,D})$  is the output. This output is then added to the standard cost of debt formula based on the risk-free rate plus a credit spread  $(CS_i)$  which is the additional rate investors require to be compensated for to cover the risk of default of the particular debtor. These additions yield the 'SVC cost of debt' rate  $(k'_D)$ , as per equation (8.1):

'SVC cost of debt' = risk - free rate + credit spread + 'SVC risk premium for debt')

(8.1)

$$k_D' = r_f + CS_i + r_{SVCD} \tag{8.1a}$$

The 'SVC debt valuation' ( $SVC_D$ ) is also a DCF method and described in equation (8.2), see Table 5.2. The rate to discount cash flows it uses to reach the present value is the 'SVC cost of debt' rate, previously obtained from the 'SVC cost of debt' equation (8.1).

In short, the third and fourth (SVC-VF.3 and SVC-VF.4) valuation frameworks arrive at the SVC debt valuation via two discrete costs of debt approaches  $(k_D^{cr'})$  and  $k_D'$ . These are respectively based on the 'SVC-adjusted risk premium for credit rating'  $(r_{SVC,D}^{cr})$  and the 'SVC risk premium for debt'  $(r_{SVC,D})$  adjustments. Either one of the two costs of debt can then be used to discount debt cash flows with the standard DCF method to respectively obtain the SVC debt valuation as the 'SVC-adjusted credit rating debt valuation' ( $SVC_D^{cr}$ ) or the 'SVC debt valuation' ( $SVC_D'$ ). In practice, at any given point in time, and notwithstanding the two discrete costs of debt approaches presented here, there is a de facto single current cost of debt for the firm that is established at the time of the credit agreement negotiation with the particular creditor

<sup>110</sup> See: https://www.finma.ch/en/authorisation/rating-agencies/

<sup>111</sup> See Credit Suisse's ratings overview of Swiss firms: https://www.credit-suisse.com/media/assets/ corporate/docs/about-us/media/media-release/2014/08/000000022792.pdf

with whom the firm incurs the liability. These liabilities assume the form of loans or bonds, the latter being a debt security. For the single liability, the cost of debt will depend on market conditions like maturity dates, market sentiment, political events, tax benefits and, critically, central bank policy rates like the ECB's Refinance Rate, the People's Bank of China (PBOC) Medium-term Lending Facility (MLF), or the Fed's Federal Funds Rate (FFR). Once the debt securities are publicly traded, the cost of debt is the computed yield to maturity (YTM) of these securities. The legal covenants used in debt instruments affect their perceived risk and hence determine the cost of debt. They include collateral requirements, restrictions on further debt or dividends issuance, negative pledge clauses, or change of control provisions. The respective discrete implications of SVC valuation adjustments for firms with debt securities 112 and firms with only non-negotiable financial instruments, is an item for further analysis. 113

Either two of the approaches outlined here; the addition of an 'SVC risk premium for credit rating'  $(r_{SVCD}^{cr})$  or an 'SVC risk premium for debt'  $(r_{SVCD})$ , might be used to establish the cost of debt for the financial liability at hand. The actual approach and the ensuing cost of debt would be determined with the creditor based on the market conditions that affect valuations and are subject to the provisions of the legal covenants negotiated. In the same fashion as the SVC valuation frameworks for enterprise and equity (SVC-VF.1 and SVC-VF.2), the two SVC valuation frameworks for debt (SVC-VF.3 and SVC-VF.4) keep their sight firmly on the economic and human development imperative of this inquiry by providing benchmarks for the allocation of capital

112 See IMF definition: https://www.elibrary.imf.org/display/book/9781475510102/ch002.xml

113 The market value for debt securities—and hence the YTM—are in a state of continuous change and so the cost of debt constantly fluctuates (similar to the cost of equity due to evolving beta coefficients). On the other hand, some firms without debt securities borrow through non-traded, nonnegotiable financial instruments (such as bank loans). Since their debt is not subject to dynamic market pricing, their debt YTM is much more stable and equals the weighted interest rates on the firm's loans (the private firm loan YTM is only known to those with access to the credit agreement terms). The interest rates on non-traded debt, generally structured as base rate plus margin, usually only change under two circumstances during a loan's tenure: when the base rate (a benchmark like the Swiss Average Rate Overnight, SARON) varies; or if the stipulated leverage thresholds (for example, based on the net debt to EBITDA ratio) are reached as outlined in the credit agreements. Since the cost of debt for firms without debt securities is not dynamically priced (notwithstanding base rate movements), market sentiment and external factors only impact it when new debt is raised (based on exchanges with Nils Unell in January, 2024).

114 The formulas for the cost of debt presuppose the availability of firm credit spreads ( $CS_i$ ). In the case of firms with traded debt securities, which are typically rated, the CS<sub>i</sub> is easy to compute (the YTM of the bonds). Non-rated traded bonds are uncommon and usually either non-investment grade or issued by small municipalities. Computing the credit spreads  $(CS_i)$ , and thus the cost of debt for non-rated debtors without traded bonds is comparatively more complicated. Current methods include analyzing past borrowing history or estimating a synthetic credit rating from the firm's financial ratios (as in Damodaran, 2012).

based on sustainable value creation (via its primary input, the VCr measurement and its constituent SVC metrics).

### Equations for firm valuation (9/9)

In the Modigliani and Miller theorem, "the average cost of capital to any firm is completely independent of its capital structure" (1958, pp. 268–269), which articulates the relationship between firm value and its financing. Firm financing can be through equity or debt and its cost of capital is the weighted average cost of capital (WACC), a generally accepted method of finance widely applied in academia and pervasive in practice. The conceptual elements used for the SVC valuation of debt and equity are here supplemented by the WACC formula in the 'The SVC WACC-based valuation framework' for firms (SVC-VF.5), an overview of which is provided in Figure A5.6c.

The cost of equity input in the 'SVC-WACC' equation (WACC") is the 'SVC cost of equity'  $(k'_E)$ . The CAPM approach automatically aligns the calculation of the cost of equity to real-time market conditions, as it is sensitive to volatility, risk premiums, and expected returns. This is different for the cost of debt. Firms issue multiple bonds and take out multiple loans over the years. Their cost of debt is the effective weighted interest rate paid for all the debts, and so one can imagine the entire list of borrowed funds in both of their forms—as loans and bonds. For SVC valuation purposes, each liability has either the 'SVC risk premium for credit rating'  $(r_{SVC,D}^{cr})$  or the 'SVC risk premium for debt'  $(r_{SVC,D})$  adjustments applied. The choice made here will be informed by the original cost of debt determination approach and must take into account current market dynamics. For instance, the original credit rating assessment would need to be updated to reflect upgrades or downgrades in accordance with the firm's actual financial situation. The SVC debt valuation is straightforward in the sense that for whichever cost of debt determination approach the firm uses, the 'SVCadjusted credit rating cost of debt'  $(k_D^{cr'})$  or the 'SVC cost of debt'  $(k_D')$  is added.

Jointly, the sustainable value creation cost of equity and debt rates—which conceptually account for the weighted value creation and transfer-IN/OUT of the business model on account of the primary input, the VCr— yield the new cost of capital of firms, the 'SVC WACC' (WACC"), the output of equation (9.1):

SVC - WACC' = [(equity / value) \* SVC cost of equity'] + [(debit / value)]

\*'SVC – adjusted credit rating cost of debt' (or) 'SVC cost of debt'

(9.1)

$$WACC'' = \left(\frac{E}{V} * k_E'\right) + \left(\frac{D}{V} * k_D^{cr'} | k_D'\right)$$
(9.1a)

The WACC rate is the average cost of the diverse sources of equity and debt for financing that a firm uses to fund itself. The WACC" represents a firm's expected average cost of financing itself, i.e., the blended sustainable value creation rate that a firm

pays to its capital providers. Used in the DCF financial modeling method, WACC establishes the NPV of estimated future cash flows. The 'SVC firm valuation' (SVC") is derived from applying to the firm's cash flows the WACC" rate of equation (9.1) analogously to what is done with the other DCF-based equations (6.2), (7.3), and (8.2) as per equation (9.2):

'SVC firm valuation' = cash flow year 
$$1/(1 + \text{ 'SVC WACC'})^{\wedge}$$
 year  $1 + \dots + \text{cash flow year } n/(1 + \text{ 'SVC WACC'})^{\wedge}$  year n (9.2)

$$SVC'' = \frac{CF_1}{(1 + WACC'')^1} + \frac{CF_1}{(1 + WACC'')^2} + \dots + \frac{CF_n}{(1 + WACC'')^n}$$
(9.2a)

Table 5.2 summarized the five valuation frameworks for the sustainable value creation of enterprise and equity, debt, and the firm. Table 5.3 now lists and describes them (in the format of the SVC measurements used in Table 2.4).

Table 5.3: Equations for 'The Sustainable Value Creation (SVC) Valuation Frameworks' for equity, debt, and firms (a continuation of the equation set of Table 2.4).

Ref.	Equation set	Description	
5/9	Equations for 'The SVC-adjusted enterprise valuation framework' for private firms (SVC-VF.1)		
5.1	'SVC revenue multiple-based enterprise value' = Revenue * (Revenue Multiple * 'VCr revenue multiple adjustment')	The 'SVC revenue multiple-based enterprise value' approach employs the conventional enterprise value equation based on multiples	
5.1a	EVm' = Revenue* (Revenue Multiple* VCr <sup>m</sup> )	(e.g., of revenue) that reference, in the form of a ratio, similar firms. The multiple undergoes a VCr-based adjustment that is the output of the 'VCr enterprise value adjustment function' $(fVCr^m)$ .	
5.2	'SVC-adjusted enterprise value' = (Equity value * 'VCr enterprise value adjustment') + Net Debt	The 'SVC-adjusted enterprise value' employs the conventional enterprise value approach based on equity value and net debt (debt minus cash and equivalents). The equity component undergoes a VCr-based adjustment that is the output of the 'VCr enterprise value adjustment function' (fVCr <sup>EV</sup> ).	
5.2a	EV' = (Equity Value * VCr <sup>EV</sup> ) + Net Debt		

Table 5.3 (continued)

### Ref. Equation set Description Equations for 'The SVC cost of equity valuation framework' for public firms (SVC-VF.2) 6/9 The 'SVC cost of equity' ( $k_F'$ ) is the cost of equity 6.1 'SVC cost of equity' = risk-free rate + beta(market risk) \* market risk premium + 'SVC risk premium' rate adjusted for sustainable value creation and is based on CAPM, to which an additional return 6.1a $k_F' = r_f + \beta_F * (r_m - r_f) + r_{syc}$ is appended, the 'SVC risk premium' for equity $(r_{SVC})$ , making equity financing more expensive (or more affordable). The 'SVC risk premium' $(r_{SVC})$ rate is the output of the VCr-based 'SVC risk premium function' for equity ( $fr_{svc}$ ). The standard CAPM cost of equity equation is: $k_F = r_f + \beta_F * (r_m - r_f)$ 6.2 'SVC equity valuation' = cash flow year 1 / (1 + The present value of equity adjusted for 'SVC cost of equity') ^ year 1 + . . . + cash sustainable value creation, the 'SVC equity flow year n / (1 + 'SVC cost of equity') ^ year n valuation' $(SVC_E')$ is derived from applying the discounted cash flow (DCF) method to equity 6.2a $SVC_E' = \frac{CF_1}{(1+k_E')^1} + \frac{CF_2}{(1+k_E')^2} + \dots + \frac{CF_n}{(1+k_E')^n}$ cash flows. The 'SVC cost of equity' $(k_E')$ is the discount rate, which in turn is derived from adding the 'SVC risk premium' for equity $(r_{SVC})$ to the standard cost of equity formula. The standard discounted cash flow (DCF) valuation $DCF = \frac{CF_1}{(1+k_F)^1} + \frac{CF_2}{(1+k_F)^2} + \dots + \frac{CF_n}{(1+k_E)^n}$ Equations for 'The SVC-adjusted credit rating valuation framework' for credit-rated debtors 7/9 (SVC-VF.3) 7.1 The 'SVC-adjusted credit rating cost of debt' 'SVC-adjusted credit rating cost of debt' = riskfree rate + 'SVC risk premium for credit rating' $(k_D^{cr'})$ is the cost of debt rate adjusted for sustainable value creation and is based on the 7.1a $k_D^{cr'} = r_f + CS_i^{cr} + r_{SVC,D}^{cr}$ cost of debt formula to which an additional yield is appended, the 'SVC risk premium for credit rating' $(r_{SVC,D}^{cr})$ (if negative it is a negative yield), making debt financing more expensive (or more affordable). The 'SVC risk premium for credit rating' $(r_{SVC,D}^{cr})$ is the output of the 'SVC risk premium function for credit rating' $(fr_{SVC,D}^{cr})$ based on the VCr. The standard cost of debt

formula is:  $k_D = r_f + CS_i$ 

### Ref. Equation set

### 7.2 'SVC-adjusted credit rating debt valuation' = cash flow year 1 / (1 + 'SVC-adjusted credit rating cost of debt') ^ year 1 + . . . + cash flow year n / (1 + 'SVC-adjusted credit rating cost of debt') ^ year n

$$\overline{7.2a} \quad SVC_{D}^{cr'} = \frac{CF_{1}}{\left(1 + k_{D}^{cr'}\right)^{1}} + \frac{CF_{2}}{\left(1 + k_{D}^{cr'}\right)^{2}} + \dots + \frac{CF_{n}}{\left(1 + k_{D}^{cr'}\right)^{n}}$$

### Description

The 'SVC-adjusted credit rating debt valuation'  $(SVC_D^{cr'})$  is the present value of debt adjusted for sustainable value creation and is derived from applying the DCF method to debt cash flows using the 'SVC-adjusted credit rating cost of debt'  $(k_D^{cr'})$  discount rate, which in turn is derived from adding to the standard cost of debt formula, the 'SVC risk premium for credit rating'  $(r_{SVC,D}^{cr})$ .

### 8/9 Equations for 'The SVC cost of debt valuation framework' for debtors (SVC-VF.4)

- 8.1 'SVC cost of debt' = risk-free rate + credit spread + 'SVC risk premium for debt'
- 8.1a  $k_D' = r_f + CS_i + r_{SVC,D}$

The 'SVC cost of debt'  $(k'_D)$  is the cost of debt rate adjusted for sustainable value creation and is based on the standard cost of debt formula, to which an additional yield is appended, the 'SVC risk premium for debt'  $(r_{SVC,D})$  (if negative it is a negative yield), making debt financing more expensive (or more affordable). The 'SVC risk premium for debt'  $(r_{SVC,D})$  is the output of the 'SVC risk premium function for debt'  $(fr_{SVC,D})$  based on the VCr.

- 8.2 'SVC debt valuation' = cash flow year 1 / (1 + 'SVC cost of debt') ^ year 1 + . . . + cash flow year n / (1 + 'SVC cost of debt') ^ year n
- 8.2  $SVC'_D = \frac{CF_1}{(1+k'_D)^1} + \frac{CF_2}{(1+k'_D)^2} + \dots + \frac{CF_n}{(1+k'_D)^n}$

The 'SVC debt valuation' ( $SVC_D'$ ) is the present value of debt adjusted for sustainable value creation and is derived from applying the DCF method to debt cash flows using the 'SVC cost of debt' ( $k_D'$ ) discount rate, which in turn is derived from adding to the standard cost of debt formula, the 'SVC risk premium for debt' ( $r_{SVC,D}$ ).

### 9/9 Equations for 'The SVC WACC-based valuation framework' for firms (SVC-VF.5)

- 9.1 'SVC WACC' = [(equity / value) \* 'SVC cost of equity'] + [(debt / value) \* 'SVC-adjusted credit rating cost of debt' (or) 'SVC cost of debt']
- $9.1a \quad WACC'' = \left(\frac{E}{V} * k_E'\right) + \left(\frac{D}{V} * k_D^{cr} \times |k_D'|\right)$

The 'SVC WACC' (WACC'') is the weighted average cost of capital adjusted for sustainable value creation based on the standard WACC formula: the proportion of firm equity to firm value is multiplied by the 'SVC cost of equity' ( $k_E'$ ); and the proportion of firm debt to firm value is multiplied by the 'SVC cost of debt' ( $k_D'$ ) or alternatively by the 'SVC-adjusted credit rating cost of debt' ( $k_D^{cr}$ ). The standard weighted average cost of capital formula is:

$$WACC = \left(\frac{E}{V} * k_E\right) + \left(\frac{D}{V} * k_D\right)$$

Table 5.3 (continued)

Ref.	Equation set	Description
	'SVC firm valuation' = cash flow year 1 / (1 + 'SVC WACC') ^ year 1 + + cash flow year n / (1 + 'SVC WACC) ^ year n $SVC'' = \frac{CF_1}{(1 + WACC'')^1} + + \frac{CF_n}{(1 + WACC'')^n}$	The present value of a firm adjusted for sustainable value creation ( $SVC''$ ) is derived from applying the DCF method to firm cash flows. The 'SVC WACC' ( $WACC''$ ) is the discount rate, which in turn is derived from the 'SVC cost of equity' ( $K_E'$ ), and, for the cost of debt, from either the 'SVC cost of debt' ( $K_D'$ ) or the 'SVC-adjusted credit rating cost of debt' ( $K_D''$ ).

The discussion of the five SVC valuation frameworks, each with their attendant equations, underlines the main objective of the SVC measurements in general and the VCr in particular: practical impact on economic and human development. Organizations and their executives, owners, and investors might reference and integrate these valuations into their financial toolset to achieve both their sustainability objectives and a more competitive cost of capital, including efficiently priced debt. The five SVC valuation frameworks, all originating from the VCr and with functions deriving adjustments and risk premia, seek to provide a fair and feasible expression of value and risk rooted in the ontological assumption of the nature of socio-economic relations in this work that 'value is created or transferred'. In consequence, they express the weighted value transfers inherent in value appropriation. The valuation frameworks complement existing decision-making tools such as credit ratings, while also being linked to decision-making frameworks (e.g., see the set in Figure A5.6).

The SVC measurements (in Table 2.4) and the SVC valuation frameworks (see Tables 5.2 and 5.3 in this sub-section) operate at the micro-level and must now be taken up at the meso-level from an elite system perspective in order to return to this work's economic development mandate. This begins with an examination of a coincidence of opposites, where two antagonistic conceptual elements that are characteristic of the elite system shape the inclusive/extractive proportions and nature of elite business models: the cohesion of the elite system and its separation of powers.

### 5.3.3 The conceptualization of elite system cohesion balanced with the separation of powers as a precondition for development

For instance, many of the leaders married their classmates or friends of their sisters, brothers and cousins, invited one another into political parties, formed community-based organizations together, recruited one another into the public service and even formed private business investment agencies as friends, colleagues and inter-ethnic/racial elite groups. [. . .] a broad-based schoolmate camaraderie evolved which later enabled easy networking relationships. In this way, education was a key factor and underpinned the coalitions that emerged later, and contributed to Botswana's development [. . .] Familiarity with each other enabled the emerging Botswana national elite to form a successful "grand coalition" which in turn contributed to political, social and economic stability. The 'grand coalition' has become a critical success factor in Botswana and stands in sharp contrast with countries such as Burundi, Ethiopia, Kenya, Lesotho, Malawi, Rwanda, Somalia, Sudan, Zambia, Zimbabwe, and many other African countries, where ethnic and racial conflict and in-fighting created unstable governments and hampered development. (Sebudubudu & Molutsi, 2011, p. 11)

Elite cohesion is paramount for the general development of countries as diverse as Botswana or Switzerland. The quote above explains the reason for unity in the former while the latter "continues to be characterized by a cohesive elite whose members simultaneously occupy political and economic positions" (Bühlmann, David, & Mach, 2012, p. 727), a finding confirmed despite "a strongly decentralized system and a particularly internationalized economy" (Rossier, Ellersgaard, Larsen, & Lunding, 2022, p. 316). Cohesion is essential to the objectives of the core coalition or knowledge elite coalitions, as is portrayed by Putnam (1977, p. 409): "The prospects for technocracy also depend in part on the cohesiveness of technocrats". During its Golden Age (between 1915 and 1960), the Hollywood elite business model—like the military—mirrored the reigning elite cohesion while also prompting social cohesion, with business and knowledge elites conjoined by political institutions as movie-going became one of "the most central American civic rituals" (Decherney, 2005, p. 22). On other occasions, an "elite settlement" is crafted ad hoc to deliberately usher forth the "fundamental transformation of elite structure from the condition of disunity to that of consensual unity" (Burton & Higley, 1987, p. 306). In "Causes of Revolution", Gottschalk examines the weakness of elite groups "which may be caused by disputes among themselves" (1944, p. 1). A lack of elite cohesion and deinstitutionalized intra-elite conflicts are also problematic for Goldstone, who sees them as "the ingredients for a full-scale revolution" (1982, p. 200). However, cohesion can also be excessive and stifling if it is not in a productive balance with a comprehensive separation of powers. Its workings are also put to the test when elite systems face existential threats, as two historical examples illustrate.

The first is the French Revolution, the origins of which can be traced not to nonelite agency but rather to the revolt of the 144 "notables" of Louis XVI against their very own royal absolutist system. This elite coalition demanded broader representation on financial matters, and while their refusal to support the king's fiscal reform and tax levies was indeed a "reactionary defense of privilege", it also supplied arguments such as "no taxation without representation" that led to the system's demise (Gruder, 1982, p. 263). A fatidic intra-elite contest ensued and escalated, leading to a state that Higley (2021) terms "disunified elites", and eventually cracked the elite system open to the madness of Robespierre and others. The second example illustrates the opposite and showcases the preservation of elite cohesion in the German Revolution of 1848–1849. Despite considerable popular non-elite pressure and the efforts of incipient elite coalitions famously represented by the 809 delegates to the Frankfurt National Assembly at the *Paulskirche*, the Prussian king, Friedrich Wilhelm IV, was able to reject the imperial crown offered to him (with democratic strings attached) by the National Assembly's Kaiserdeputation on April 3, 1849. This was possible because the Prussian system had stayed intact and retained its elite coordination leadership. As a result, at this critical juncture in (world) history, incumbent elites preempted emerging elites from realizing the narrativized preferences they shared with nonelites (see Figure 3.5) for German unification and democracy through a constitutional monarchy, the Frankfurter Reichsverfassung. In France, the elite system of Louis XVI lost cohesion as a result of his inclusive transformation attempts and so collapsed. The elite system of Friedrich Wilhelm IV and local princes elsewhere in Germany retained cohesion and rejected transformational demands, emerging from the confrontation even more powerful.

Hobsbawm (1962/1996) analyzes how narratives that are more in tune with changing social and economic realities drive revolution. Davies' theory on revolutions contends that these "are most likely to occur when a prolonged period of objective economic and social development is followed by a short period of sharp reversal" (1962, p. 5). Yet, when facing a situation of objective or subjective discontent before an approaching tipping point, cohesive elites can avoid turmoil by dialing down or even temporarily turning off their value extraction pumps and letting the storm of non-elite anger pass. Today, excessively extractive elite business models remain a recognized social and political economy problem and are subjected to criticism in the public discourse. Part of the quandary is when value transfers erode elite cohesion, not to mention all other forms of social cohesion. In his column for The Financial Times. Wolf (2018) condemns rents as "rewards over and above those required to induce the desired supply of goods, services, land, and labor". In Forbes, Marotta (2013) defines rents in Tullock's (1967) theft terms as ownership of "someone else's surplus in the end". The Economist (2014) looks at the macro picture—the economic pie—and uses Porter's imagery to typify rent seeking as "grabbing a bigger slice of the pie rather than making the pie bigger". Mazzucato's work (2018, 2019) distinguishes between the "earned income" of "makers", derived from real value creation activities like innovation, and the "unearned income" appropriated by "takers". Value extraction is repudiated because 'takers' create two types of losers: the stakeholders that unwillingly suffer direct transfer-OUT, and society at large through the decline of the production function. Counterproductive responses to extraction such as 'informality' (reviewed in Table 5.1) then combine with the misallocation of resources and perverse incentive structures, leading to value destruction and the absence of its creation (see Section 5.2.1).

Discontent about rent seeking and extractive business models also emanates from narrative dissonance, a deep two-pronged sense of wrong: losers should not have lost (why should value creators be unable to appropriate the value they have created, or pay for the risks they have not taken); and development that is below potential (why should all members of society not have higher incomes or a better quality of life). The Council of Europe (2007) has a "social cohesion strategy" that provides a set of indicators, the underlying aspiration being "the capacity of a society to ensure the welfare of all its members, minimising disparities and avoiding polarisation". The concentrated focus of this elite theory is on extractive transfers that spill over tolerable thresholds—both objective and subjective—as these erode social cohesion. Such transfers are seen as the root cause of intensified unproductive individual non-elite responses and the related aggregate political options that these foster (see Sections 5.2.2, 8.1.3, and 8.2.4 on sustainable redistribution) with detrimental consequences for development and competitiveness.

Public sentiment becomes increasingly confused and strained when reality runs counter to the narratives of fairness upon which most societies are founded. As a result, elite/non-elite cohesion is damaged, a crucial construct that together with elite cohesion and non-elite cohesion constitutes this inquiry's conceptualization of 'social cohesion': what Stanley refers to as "the willingness of members of a society to cooperate with each other in order to survive and prosper" (2003, p. 5), and Chan, To, and Chan define as "a state of affairs concerning both the vertical and the horizontal interactions among members of society" (2006, p. 298). The deterioration of elite/non-elite cohesion entails systemic risk if, and only if, it erodes intra-elite contest rules and leads to the questioning of the legitimacy of business model rules at the elite system level. Consistent with the earlier historical examples of Louis XVI and Friedrich Wilhelm IV, the general truism pointed out by Brown's study of Southeast Asian nations (1993) is that "political stability depends primarily upon the effectiveness with which élite cohesion is maintained" (1993, p. 111). Polarization, even in present-day America and Europe, is not primarily an elite vs non-elite matter but an intra-elite issue. Divisions within the elite are what stoke rifts and create discord in the non-elite. A key question is whether nonelite political options of the confrontation type (Figure A5.8), which also reflect fractures in elite cohesion, end up strengthening or weakening the elite system. If the latter, the outcome is increased transaction costs for elites and eroded intra-elite trust, while the overall coordination capacity of the nation can fall precipitously.

The predicament is thus as follows: terminating extractive elite business models requires elite transformational leadership, that when undertaken, even when fueled by non-elite discontent (see Louis XVI), can short-circuit elite cohesion. The transmission mechanism by which all of this occurs is the stress, and even the existential challenge, to which intra-elite contests subject many elite coalitions. Some emerging elites sense an opportunity in growing discontent to advance their interests and take shortcuts to amass power, including by stirring up non-elites, while others calculate that since the pie is shrinking, whatever is needed to reduce the number of elite coalitions is welcome, from declarations by the IMF (Johnson, 2009) to contemporary equivalents of Roman-style proscriptions. In the worst-case scenario, the door opens for an intra-elite free for all where elite identity is at stake and the contest becomes one of survival for specific elite coalitions and their individual members. Intra-elite contest rules cease to apply and there are no power differentials in the elite system—there is

no longer a core coalition—able to substitute for institutions when power becomes so fragmented. With the deinstitutionalization of the political economy's intra-elite contests, the elite separation of powers becomes anarchic along with the existing threetier set of intra-elite checks and balances. To make matters worse, sensing the breakdown of the elite system, a plethora of emergent elite coalitions with great drive and little to lose join the fray literally out of nowhere. This leads to the intensification of conflict, which can only be stopped when elite system leadership rebuilds cohesion and the primacy of intra-elite contest rules.

"Elite overproduction" is a state deemed by Turchin as "inherently destabilizing" where "more elites and elite aspirants than the society can provide positions for" results in a "frustrated" and "radicalized" class of "counter-elites" (2013, p. 244). Technically, such would-be elites are not surplus elites but rather members of the managerial, technical, and creative class (see Figure 8.1). The numbers in this stratum (the priest aiming for the cardinal robe, the zealous military officer, the start-up founder, the Ivy League graduate in a Wall Street firm dreaming to be inducted a partner) have always exceeded by a large margin the membership slots in elite business model coalitions. Also of relevance is that the agency of value creation elites produces new elite positions. However, the game is zero-sum and results in *End Times* (Turchin, 2023) when intra-elite contests revolve around transfer business models that abscond first-order value creation and focus on the non-market and narrative market arenas. Competition for extractive rents is the primary reason for the deinstitutionalization of intra-elite contests rules and diminished elite cohesion.

Regardless of the causes, when elite cohesion fractures and the political system fragments or dramatically polarizes, the consequences can be grave, though events like the second fall of Afghanistan to the Taliban, the US Civil War, or the collapse of the Louis XVI system are rare. Elites are usually keenly aware of what is at stake in a noncooperative game. One might recall the modest impact on the Putin elite system's functional cohesion caused by the Wagner Group's failed insurrection in June 2023. On the other hand, elite systems can suddenly lose unity and collapse. For over two decades, the challenges to the Qing Dynasty by Chen Tianhua, Sun Yat-sen, and other republican visionaries were foiled. Yet, as Rhoads (2000) recounts, in October 1911, the modest Wuchang Uprising sparked the Xinhai Revolution, and within four months China's twothousand-year-old imperial system ended with the deposition of the Xuantong child emperor (Puyi) and the founding of Asia's first republic on 12 February, 1912.

Elite cohesion is a precondition that lies at the heart of institutional order. It is likewise critical for established and emergent elite coalitions seeking transformation. Jewish elites across Europe achieved newfound cohesion around the modern political Zionism narrative, articulated for instance by Theodore Herzl in the pamphlet Der *Judenstaat* (1896). Vall-Prat (2022) explains the elite split in Spain that saw the formation of a specific regional elite in Catalonia at the end of the 19<sup>th</sup> century around the business model of industrialization. However, the lack of subsequent elite cohesion, coupled with a notorious lack of elite system leadership and deinstitutionalized intra-elite contests explains why Catalonia, despite the national trauma narrative of its September 11 (the 1714 defeat in the Siege of Barcelona, with the attendant loss of centuries-old institutions and the corroboration that the beloved Catalan language would be stateless and exposed to the vagaries of Madrid) that galvanizes a significant proportion of its elites and non-elites, has consistently failed to attain statehood despite the unremitting attempts of one generation after another over the last three centuries. When faced with the formidable leadership and cohesion (at least on this issue) of the Spanish elite system, the Catalan elites are amateurs with meager chances of success.

Elites retain their coordination capacity and transaction cost advantages for as long as no major coalition reneges (for too long) on the system's intra-elite contest rules. If the system fails to swiftly deal with reticent non-cooperative elite players after they break ranks, then serious problems will promptly follow. Coup d'états in political and other arenas (e.g., the events at OpenAI and Microsoft in November, 2023) are the culmination of non-institutionalized contests aiming to reshuffle the membership of a coalition or the elite system itself, at times seeking the replacement of the core elite coalition. But even then, as long as elites remain united and genuine defectors are few or conflicted, the incumbent arrangements prevail. The establishment will also override most non-elite challenges, including opportunistic moves from defecting elite coalitions, some of whom may try to leverage social conflict and discontent. Elite cohesion requires the maintenance of generally accepted intra-elite contest rules (see Figure 4.3) and effective elite system leadership (see Table 7.2). The latter is critical, as a separation of powers without elite cohesion leads to situations like "vetocracy" which, in the case of the US, Fukuyama defines as a "situation in which it was easier to stop government from doing things than it was to use government to promote the common good" (2016, p. 58). Institutions are essential, but they don't function well without elite cohesion. The bleakest scenario for failing elite cohesion is civil war, an extreme form of deinstitutionalized intra-elite conflict, almost never the direct result of non-elite demands (even if narratives might disingenuously frame the conflict as the realization of non-elite aspirations, as in many a *Kulturkampf*).

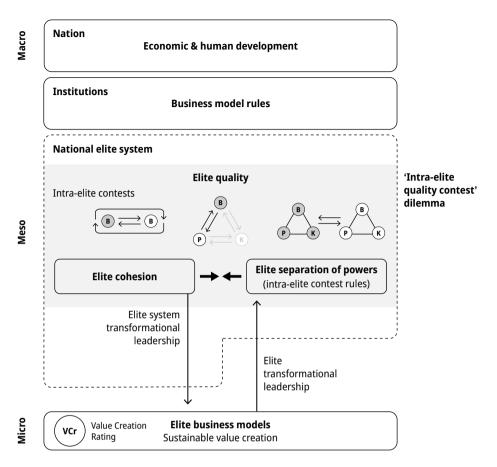
In short, elites that circle the wagons will prevail, no matter how shrewd the dissenting elite's conspiracy or obstinate the non-elite resistance. The 'elite cohesion underpins social order' conjecture posits that the social order necessary for development will be maintained for as long as elites preserve their natural coordination capacity advantage in the face of internal elite system or non-elite challenges and discontent.<sup>115</sup> Moreover, it also implies that the cohesion of the elite is more important for economic and human development than other forms of social cohesion. One reason for this is the hypothesis

115 National elite cohesion is at times desired and influenced by outsiders that have a relationship with the country. This is obvious in the provision of financial facilities by the IMF or World Bank, or by Western military support to Ukraine that would have been difficult if President Zelenskyy did not have the support of the country's cohered elite. Cohesion can also be fleeting and tactical as in the case of the elite pact to install Mario Draghi as Italian Prime Minister in 2021, an interim state of elite cohesion that was driven, at least in part, by EU funding considerations.

that elite cohesion precedes, and will usher in, elite/non-elite and non-elite cohesion. Of course, if viewed through an economic development lens this can be highly unsatisfactory; as long as the elite system perseveres the political economy will endure, even if it is with a dwindling and suboptimal production function punctuated by social mayhem. For instance, elite homogeneity, which fosters cohesion, is found by Hartmann (2007b) to associate with inequality in Europe. Still, while a nation may be mired in troubles, when its elite system collapses everything gets worse. Elites know this very well and cynically play the 'me or the flood' card to sustain the status quo.

Given the primacy of elite cohesion, should we conclude that elites are able to ride roughshod over non-elite challenges, with no incentive to end extractive microlevel elite business models? The answer to this question is a resounding no. The costs of maintaining extractive elite business models, especially over the long run, are inordinate: lower levels of human and economic development, stagnation or regression, waves of emigration (by dispossessed non-elites or the expert class), the displacement of many elites (their wealth mostly intact but their status gone), and the weakening of the nation in the international system (as well as being potentially reviled by the objective mantle of history, which might be of concern to some elites). Olsonian stationarity does then matter, but not all elites are thus capable, as is evident if one contrasts the fates of elite dynasties in China, Russia, or Iran over the last century with those of the US, Japan, or France. Consistent with endogenous institutional change (see Section 4.3.5), the sustainability of the system is in the interests of elites and is achieved by engaging in elite transformational leadership while the core elite coalition pushes 'from-core' (see Tier 5, Figure A5.11b) for elite system transformational leadership (see Table 7.2 for the varieties of leadership; Figures A5.12a and A5.12b). Every single business model invariably contains both value creation and extractive transfer activities: the stronger that those with a higher proportion of the former are (as reflected in the VCr) the greater the elite quality, the institutional quality, and the overall economic, social, and human development of a nation. Incentives for inclusive business model rules must originate from within the elite system, i.e., be instigated by business model insiders in competition with rivals. But how do these drivers of positive change emerge and succeed?

The preconditions for an inclusive political economy are elite cohesion (as discussed in this sub-section) and a comprehensive (five-tier) elite separation of powers (illustrated in Figure 3.10). Both of these seemingly irreconcilable elements must go hand in hand. Resolving this dilemma requires the creative tension that comes with a union of the opposites, akin to the balance that is found in coincidentia oppositorum as philosophically articulated in McGilchrist (2021). Figure 5.2 depicts what is referred to here as the 'intra-elite quality contest' dilemma: elite quality emerges from intraelite contests framed by a robust elite separation of powers (here, the simplified three tier rendition) that is bound together rather than stymied by the right levels of elite cohesion.



**Figure 5.2:** The 'intra-elite quality contest' dilemma: Elite cohesion and the separation of powers as joint preconditions in opposition to and in balance with each other for development.

An illustration of how one 'intra-elite quality contest' dilemma was mastered is the Great Depression critical juncture. President Roosevelt had long been deeply embedded in the US elite system when he responded to the aftermath of the 1929 financial crash with the 1933 Glass-Steagall legislation and the 1935 Banking Act amendments that decisively reformed the elite business model rules of finance. Winthrop Aldrich, the president of Chase Bank, was the US President's point man in Wall Street. He was the consummate insider and started an intense intra-elite conflict within the parameters of intra-elite rules. Despite the high stakes and the stress placed on elite coalitions, the system retained elite cohesion and institutional change was affected within the intra-elite contest rules. Tabarrok (1998, p. 8) describes this effective example of elite transformational leadership of the business model:

Aldrich denounced the connection of investment banking and commercial banking as "almost inevitably leading to abuses." He threw his support behind the Glass bill to separate commercial

banks and their security affiliates, but he argued that the bill did not go far enough. [...] The New York Times made Aldrich's announcement front page news on March 9 with the headline "Aldrich Hits at Private Bankers in Sweeping Plan for Reforms." The Times noted that Aldrich, "who is a representative of the John D. Rockefeller interests," was attacking "some of Wall Street's most powerful figures and their particular interests." More than anyone else, the Aldrich program "strikes directly at the position of J.P. Morgan and Company."

President Obama, on the other hand, was an elite system outsider who, when faced with an analogous financial crash, did not work towards FDR-like deep-seated institutional change aimed at reforming elite business model rules while maintaining elite cohesion (this would have undone President Clinton's financial liberalization a decade earlier, see Section 4.2.4). His administration eschewed the dilemma, took no risks, and did not reinforce the checks and balances (in intra-elite power relations 1, 4, and 5) to articulate an intra-elite contest to make space for elite transformational leadership. The response to the 2008 financial crisis was therefore the timid 2010 Dodd-Frank Wall Street Reform and Consumer Protection Act that left the incumbent elite business model intact. To Silicon Valley luminary Andreessen (2023a), the separation of powers went missing as the lawmaking process "was coopted by the [...] big banks. The result is that the same banks that were 'too big to fail' in 2008 are much, much larger now".

### 5.3.4 The conceptualization of the 'extractive escalation dynamic' conjecture as the end of development

Having established the transition mechanism function of the meso-level elite system for sustainable value creation, the processes by which micro-level transfer-IN elite business models impact and reverberate throughout the economy are now considered. The attractive returns from any single extractive elite business model are hugely detrimental to an economy as it quickly engenders an avalanche of similar requests. The pursuit of rents then eventually characterizes the contests across the political economy and, through its impact on a nation's culture, the non-elite predisposition for value creation (see Epilogue).

Further to the discussion on agglomeration, "an increase in rent-seeking activity may make rent-seeking more (rather than less) attractive relative to productive activity" resulting in an equilibria that the economy settles on (Murphy, Schleifer, & Vishny, 1993, p. 409). The grants of rights, licenses, regulations, barriers, subsidies, and the like (see Table 2.3) are keenly sought after the signal is sent that a value extraction model is institutionally feasible and legitimate. Baumol's (1990) "unproductive, and destructive" entrepreneurial energies and investments will flow into the political non-market and narrative market arenas. As the race to the bottom towards an 'extractive end point' gathers pace, narratives and institutional change in support of extractive models proliferate. Compensation is a preferred theme for such narratives, and quite effective in fostering institutional change:

The political process often compensates the losers from technical change or international competition in an economically inefficient way, namely by subsidizing or protecting declining industries instead of encouraging the movement of resources to other more productive uses. (Dixit & Londregan, 1995, p. 856)

How extractive elite business models multiply and spread throughout the body of the economy is well illustrated by the earlier example of the Trump Administration's tariffs on steel imports. As a result of this protectionist move, the American Keg Company could not price its products competitively in its domestic market as German and Mexican importers were able to use cheaper steel to produce their products. It therefore lobbied for tariffs on kegs and although it failed—unlike the American "nails and bumpers" sector whose lobbying bagged the tariff—made-in-America kegs still "got protection under a different US trade law called antidumping" (Bown, 2020).

Such 'cascading protection' is a version of the 'extractive escalation dynamic', a conjectured general political economy trap. These extractive sub-optimal equilibria see value transfer business models agglomerate around them and carve out a path dependency (see Section 5.1.1, the 'elite business model critical junctures' conjecture) that once in place is hard to reverse. Elites, especially risk-averse coalitions, become markedly less capable in terms of 'knowledge' and attach their business models to the societal narratives of the day rather than to value creation while resisting all transformation. With pervasive rent seeking, no coalition will rock the boat; elite cohesion becomes excessive (see Section 5.3.3) and is maintained on the back of 'political economy know-how', resulting in economic paralysis and deep if ultimately fruitless social discontent. In Lebanon, even after "Beirut's Deadly Blast Reignites Anger Against Lebanon's Ruling Elite" (Collard, 2020), nothing changed. Acemoglu and Robinson (2019b, p. 23) describe "feedback loops", where extractive/inclusive economic and political institutions bring about vicious/virtuous cycles.

Inclusive, virtuous escalations of value creation models are likewise possible and evidently desirable, as the example of China's special economic zones (SEZs) at the end of the last century demonstrates. In this case, a policy of experimentation was implemented by both top-down measures from political elites and bottom-up efforts from emerging business elites, with institutional arrangements that evolved as market signals were relayed to receptive government ears (Zeng, 2012, pp. 5-7). As a result, a chain reaction of value creation transformed Shenzhen, the inconsequential fishing village of yore, as described in *Forbes*:

It is said that 90 percent of the world's electronics are made in Shenzhen. With tens of thousands of factories, 5,000 product integrators, and thousands of design houses, this city has become a one-stop-shop for anything consisting of circuits, chips, LEDs, and touchscreens. Shenzhen is also home to 20% of China's P.h.Ds, has the country's highest rate of business owners, and has produced more billionaires than anywhere else in China. In 2014, The Economist declared Shenzhen to be the best place in the world for a hardware innovator to be. (Shepard, 2016)

A core insight of the ETED is that an 'inclusive escalation dynamic' occurs in nations where preferences in the elite system are inclined towards value creation business models, ushering in economic growth and human development. Conversely, political economies stagnate at sub-optimal equilibria when emerging elites seek to emulate the dominant extractive elite business models of incumbents (see the endosmosis mode of elite circulation in Figure 1.1) and make no attempt at transforming them towards higher sustainable value creation. The allocation of incentives and resources away from value creators marginalizes their activities and diminishes their potential contribution to society (see the unproductive individual responses to extractive value transfers in Table 5.1). In extreme cases, political economies will even manage to jettison the informal underground economy (e.g., Tunisia's notorious attempts to stop street vending). With no value creation opportunities at home, citizens increasingly look for 'exit' responses, including migration, which further aggravate the decline of the production function.

Acemoglu (2006, p. 515) has modeled an economy where "groups with political power, the elite, choose policies to increase their income and to directly or indirectly transfer resources from the rest of society to them". Such an 'extractive escalation dynamic' will eventually hit a dead end, as did the Medici vicious circle. Even the sublime artworks that the Florentine potentates commissioned must have been little consolation to the non-elites and elites alike that were caught in a spiral of economic and human development underperformance: Florence went "from one of the most industrialized and powerful cities in Europe to a marginal province of a foreign empire" (Zingales, 2017, p. 120). Innovation, as discussed in Section 5.1.2, is one of the value and risk creation activities most affected by extractive transfer-IN. Innovation activities "are typically long-term and involve slow accumulation of capital" and will disappear first when rent seekers are given "plenty of opportunities for future expropriation" because value creators are then put in an impossible bind: "for if a project succeeds, the returns are expropriated, whereas if it fails, the innovator bears the cost" (Murphy, Schleifer, & Vishny, 1993, p. 413). Beinhocker highlights the complexity economics perspective where the idealized version of the market rests on an "evolutionary search mechanism that incentivizes deductive-tinkering leading to differentiation and then provides a fitness function on which economic selection can than act" (2006, p. 294). The extractive practices of elite business models require institutions and incentive structures that simply short-circuit such an evolution that stops innovation in its tracks.

The end game of value extraction is a materially impoverished, demoralized society where non-elites and elites alike are disincentivized from creating value and undertaking risk. Tullock (1967, p. 239) describes the generalized exit response in such a scenario: "One way of minimizing loss by theft is to have little or nothing to steal. In a world in which theft and plunder were legal we could expect this fact to lead to a reduction in productive activities and a great expansion in leisure". Ad absurdum, extractive cascading dynamics reach a point where economies slide into situations where literally nobody attempts to create value and everybody attempts to steal from the other. Referring once more to Lu Xun's analogy: "Wanting to eat men, at the same time afraid of being eaten themselves, they all eye each other with the deepest suspicion" (1918/1985, p. 47). The Chinese author here masterfully describes the psychological state of a society at the 'extractive end point'.

However, despite massive extractive transfers, most societies do not collapse because the 'extractive end point' is seldom reached due to the remnants of elite cohesion (see Section 5.3.3) and the individual non-elite responses of 'acceptance' and 'informality' (rather than 'exit' or the destructive 'challenge' forms of struggle, see Table 5.1). David Pilling, the Africa editor at *The Financial Times* (2023), describes an example of such sub-optimal equilibrium: "Eskom is a study in miniature of what has gone wrong with South Africa. A power utility that cannot keep the lights on, it is gradually draining the country's economy of its lifeblood. It is riddled with corruption, desperately inefficient and daily losing expertise". Surely, even extractive elite agency of the lowest quality can deploy high quality narratives, the opium that ensures a minimum supply of genuine value creators. Otherwise, and without these non-elite contributors, a society of thieves will soon end up with nothing to steal. The cannibalistic society of Lu Xun is in contradiction with itself: everybody might aspire to "eat men" but obviously not everybody can be a cannibal. Narratives opposing such cannibalism constrain the 'universal value extraction propensity of humans' at the non-elite level (see Figure A5.4c) and preserve the social order. Of course, another way to maintain the domestic order is to eat men from other polities through crossborder extractive business models (such as war or colonialism, a discussion that is expanded on in Section 7.3 on elite agency in the international context). In any event, an equilibrium hovering just above the 'extractive end point' should not be an aspiration or be at all confused with development.

A political economy approximating society's 'extractive end point'—a society of thieves—is characterized by elites enjoying the value transfer-IN and transfer-COST of captured rents, while lower down the ladder, non-elites engage in unproductive or leisure activities and seek their own rents in socially wasteful appropriation contests between themselves. The latter includes competition for limited civil service jobs handed out in nepotistic fashion, small businesses that survive on patronage and the clientelistic practices of "asymmetric but mutually beneficial relationships of power and exchange" (Roniger, 2004, p. 353), or job markets distorted by labor unions with links to criminal enterprises (see the labor racketeering discussed in Jacobs & Peters, 2003). Even further down the ladder, one finds pervasive petty and not-so-petty criminality that redistributes from the very poor to the moderately poor (and a few rich

bosses), emigration, 116 'informality' of last resort, possibly a modicum of welfare and charity, and other non-elite responses that keep the system from imploding. As extractive escalation dynamics fester, the ramifications on culture endure over time to the degree that non-elites may come to detest value creation. 117 Nearly everyone in society is hurt in one way or another in a society subsumed by extractive agency. Many coalitions in the elite system also lose when their peers persevere with extraction. Others squander their own value creation potential (e.g., the East German Sozialistische Einheitspartei Deutschlands ruling party cadres, Habsburg aristocrats, or even the banks that benefited from loose monetary policy), distracted by pouring their energies and wits into capturing extractive rents.

The extractive escalation dynamic will come to a rest at a given sub-optimal equilibrium point. As discussed, most systems settle on stability slightly before social disintegration—the hypothetical 'extraction end point'—with most wishful rent seekers unable to realize theft and plunder becoming resigned to a modus vivendi characterized by marginal value creation and value created but *not* appropriated. This is the definition of underdevelopment, and it is endogenous. As a matter of course, any society, no matter how dysfunctional, must have productive first-order value creation lest it revert to the conditions of primitivism. For any value transfers to occur, the stakeholders of elite business models and non-elite groups must first, through their labor, have engaged in productive activities, no matter how modest. This is the value that will then, to different degrees contingent on elite power and reflecting the development momentum of a particular country, be extracted away. Such extracted groups include entrepreneurs of last resort like the 26-year-old Tarek el-Tayeb Mohamed Bouazizi, the Tunisian street vendor who self-immolated on December 17, 2010, unable to bear the extractive escalation dynamic that materialized in the confiscation of his small wheelbarrow of produce by the police. His tragic 'exit' response was the spark that ignited the futile Arab Spring.

116 Emigration is a gift to the extractive elites in the country of origin, the very people that cause this 'exit' response. Individual non-elite 'challenge' responses become less likely, as do both the political confrontation and cooperation options (on aggregate), including the participation of non-elites in intra-elite contests (see Figure A5.8). As a result, the pressure on extractive elites to reform loses steam and salience. On the other side of the phenomenon, immigration is likewise a gift to elites in the recipient country as it increases the supply and reduces the cost of many types of labor, often at the expense of the most vulnerable and less skilled of local non-elites.

117 Welzel theorizes on the "cultural norms toward greater emphasis on responsive and inclusive elites" (2002, p. 269). Conversely, elites steeped in sustainable value creation can foster non-elite cultural transformations towards imaginative value creation and Lebensfreude-filled mindsets. Singapore is the quintessential example of a successful elite-guided cultural transformation that has been gently and systematically instilled over generations centered on the notion of a "social national identity" where previously there was none: "Singaporeans desired opportunities to make a good living and realise their potential, regardless of their background", a longing that was first sparked and then actualized in top-down fashion by enlightened elites stressing social cohesion. See: https://www.sg101.gov.sg/ social-national-identity/sharedidentity/

### 5.3.5 Understanding capitalism and its derivations and alternatives through the lens of the ETED

For advanced economies, the World Economic Forum proposes what is essentially a path out of value extraction practices through the notion of stakeholder capitalism, where "long-term value is most effectively created by serving the interests of all stakeholders" (Moynihan & Schwab, 2020, p. 3). Joining together the terms 'stakeholder' and 'capitalism' implicitly points to capitalism being associated—at least in the mind of the public—with extraction from stakeholders. We have already examined how elite business models generate residual income through their value creation and appropriation activities, including through value appropriated but *not* created (transfer-IN). Such second-order value (and risk) transfers include subsidies, regulations, tariffs, monopolies, repressed interest rates, and political-bureaucratic jobs with compensation and privileges above equivalent alternatives (see Table 2.3). Bastiat (1845/ 1996), Tullock (1967), and Olson's (1993) loaded "plunder" and "theft" notions perfectly fit the description of various extractive rent-seeking modalities. Meanwhile, capitalism's theoretical and idealized version has no rents, no plunder, no theft, and no extractive activities, and the market process "ensures that any economic rents that appear will be dissipated by the forces of competitive entry" (Buchanan, 1980, pp. 8–9). In other words, stakeholder capitalism addresses the fact that real world capitalist economies do not fit capitalism's original paradigm (Bartels, 2008; Stockman, 2013; Nader, 2014, Reich, 2015; Standing, 2016; Holcombe, 2018; Tepper, 2018; Williams & Khanna, 2020; Sharma, 2024b); what we generally refer to as capitalism is clearly not capitalism as it was originally conceived. Varoufakis asserts that "capitalism today is being toppled by a new economic mode: techno-feudalism" (2021). Giblin and Doctorow introduce the concept of "chokepoint capitalism" where elite business models "lock in suppliers and customers and lock out competitors" through a whole "bestiary" of laws (2022, p. 200). So, to what extent are purportedly capitalist political economies still capitalist? This puzzling situation is of concern to academia as is lucidly described in the abstract of the article "Capitalism, Cronyism, and Management Scholarship: A Call for Clarity" (Klein, Holmes, Foss, Terjesen, & Pepe, 2021):

Capitalism, characterized by private ownership, coordination through markets, and decentralization, is blamed for a variety of economic, environmental, and social ills. These critiques often confuse capitalism with cronyism, a system of government favoritism toward particular firms. We show how this confusion harms management research, teaching, and practice.

Sharma's reflection on "Where Capitalism is Working" (2024a) sees Switzerland, Taiwan, and Vietnam as systems that "show that giving people more economic freedom is still humanity's best hope for economic and social progress". Would a return to the theoretical roots and freedoms of capitalism solve the many complications of economic and human development by reining in the dominance of transfer-IN models that rely on second-order value extraction activities? In the value-free inquiry that

characterizes this work's paradigm and looks at the world 'as it is', a system that organizes productive activities and allocates capital and data must primarily be assessed not in relation to its foundational narrative but strictly in terms of its tolerance for rent seeking. That is, the strength of the extractive embrace evidenced by value transfers that are afforded by power; a system is inclusive, capitalist or not, to the degree that it limits extraction and transfer-OUT away from its value creation stakeholders and non-elites (see the test for political and business systems from a non-elite standpoint in Figure 8.3).

The various conceptual refinements in this chapter have tightened the theoretical system of the ETED while establishing a normative development model independent of whether an economy is capitalist, communist, socialist, Catholic, Protestant, Islamic, Confucian, or is best described by any of the world's classified business systems (Hall & Soskice, 2001; Hall & Gingerich, 2009; Witt, Kabbach-Castro, Amaeshi, Mahroum, Bohle, & Saez, 2018). As a result, the world's business and political systems will be scrutinized in Section 8.1.5 through the optics of elite quality by employing the dialectical device of contraposing democracy with authoritarianism, the leitmotiv of this inquiry being that all variations are a priori valid to the elite theory on the condition that the elite system operates on the long-run premise of sustainable value creation business models. The ensuing operationalization of elite quality in Chapter 6 paves the way for falsifiable hypotheses on matters of human and economic development.

### **Summary of Chapter 5**

### Towards the elite theory of economic development (ETED)

Part II of this book supplies a further approximation of the elite theory of economic development from two different angles. While Chapter 4 focused on elite agency constrained and enabled by power and institutions, Chapter 5 is an integrative effort designed to fill lacunae in the inquiry and tighten the overall discourse.

Section 5.1 starts the chapter by considering various aspects of the value creation of elite business models as the micro-level source of economic and human development. It begins with a foundational conjecture for economic development theory, a derivation of the critical junctures hypothesis centered on the elite business model (5.1.1). Innovation activities are then reviewed as the engines of value creation and essential to economic and human development (5.1.2). The section closes by asserting that value can be ascertained as it is moved from one sub-set of society to another, and that measuring such value transfers is not only conceptually feasible and technically manageable, but a necessary task (5.1.3). The starting point here is the 'bona fide value appropriation' (positive) assumption (see Figure A5.4a), with the derived 'revenue is value creation unless value transfer is proven' implication implying that in order to discern the amount of sustainable value creation, value transfers must be ascertained.

Section 5.2 poses three questions to interrogate the theoretical basis of value extraction as the micro-level source of negative economic and human development. The first dips into the extensive theory of rent seeking in economics and asks why it matters (5.2.1). The second seeks to find an answer to the raison d'être for extractive activities, which is possible by gaining an understanding of the underlying causes of non-elite 'acceptance' responses to extraction in the context of the 'impossible exit' conjecture (5.2.2). This is then complemented and nuanced with a discussion on the full range of non-elite responses to being on the receiving end of extractive transfer-IN (5.2.3). A typology of responses to value transfer-OUT by non-elites is proposed with four categories: 'acceptance', 'exit', 'informality', and 'challenge' (summarized in Table 5.1).

Section 5.3 elaborates on the transition from micro-level value appropriation to macro-level performance. Earlier, this work asserted that all elite business models sit on a 'value spectrum' (Proposition 11; Figure 2.10). Section 5.3 starts by further specifying the fundamental conceptual elements that allow the calculation of the two main sustainable value creation (SVC) measurements: the Value Creation Position (VCp) and the Value Creation Rating (VCr) (5.3.1). These include the notions of negative and positive externalities, which are respectively operationalized through transfer-IN/OUT based on the 'quantifiability of value transfers' (finance) assumption. Critically, decision-makers can weight and then offset against each other different value creation and transfer activities (see the implications in Figure A5.4a). As a result, the capital allocation process SVC measurements—with the VCr as the input—can be used to derive 'The Sustainable Value Creation (SVC) Valuation Frameworks' for equity, debt

and firms (Table 5.2) with a supporting set of equations (Table 5.3). Risks associated with extractive value transfers are company-specific but non-diversifiable (just like market risk) and hence their minimization is deemed to lead to a lower cost of capital. The subsequent sub-section makes a thematic leap to address another base: the meso-level conceptualization of elite cohesion at the elite system level in relation to the separation of powers (5.3.3). The 'elite cohesion underpins social order' conjecture is tempered by the idea that elite cohesion must exist in balance with a robust elite separation of powers. These two seemingly incompatible elements provide the creative tension for vibrant intra-elite contests to escape stasis or even more regressive outcomes (as is described in Figure 5.2 illustrating the 'intra-elite quality contest' dilemma). In the next sub-section, the 'extractive escalation dynamic' conjecture consolidates an understanding of the micro to macro transition mechanism and explains social and economic decay, as well as its opposite: virtuous, self-reinforcing development achieved through the 'inclusive escalation dynamic' (5.3.4). The closing sub-section continues to consolidate the theory system of this chapter and advances a *leitmotif*; capitalism, or any other business and political system, needs to be judged by the sustainable value creation agency of its elite agency (5.3.5).

To summarize, the two chapters of Part II ('Integration') worked on the idea that elites create and appropriate value through business models that enjoy a bargaining power advantage attained through wins in the market, non-market, and narrative market arenas. Elite business models are in essence but a bundle of value and risk creation and extractive transfer activities. The relative proportions of creation and extraction determine development outcomes. No elite business model is pristine. All benefit from value appropriated but not created (transfer-IN) and these amounts (part of revenue/profits) are captured by the VCp measurement (see Figure 5.1a). The extended VCr counterpart additionally accounts for value created but not appropriated (transfer-OUT). Taken together, the two are the ETED's proposed micro-level sustainable value creation measurements, and, as such, a key building block of this inquiry. For instance, as the theory enters the field of finance, the VCr is the primary input for 'The Sustainable Value Creation (SVC) Valuation Frameworks' (described in Table 5.2).

Figure 5.3 illustrates the applied arc between the SVC measurements and the SVC valuation frameworks that should act as incentives for the allocation of capital. Both the SVC measurements (conceptualized and operationalized from Chapter 2 onwards), and the SVC valuation frameworks (that now take a central applied role), are tightly coupled with this theory's three assumptions for socio-economic relations and their implications for financial analysis (see Figure A5.4b) and both toolsets are designed to support micro-level decision-making. In the next chapters, additional SVC measurements are introduced to further the quest for macro-level development.

SVC''

## (of finance, for the allocation of capital to firm, project, asset, liability or financial instrument) The Five Sustainable Value Creation (SVC) Valuation Frameworks'

STUTTUC

 $SVC_E'$ 

EVm'

EV'

 $SVC_D'$ 

# Sustainable value creation (SVC) measurements (of firm, project, asset, liability or financial instrument)

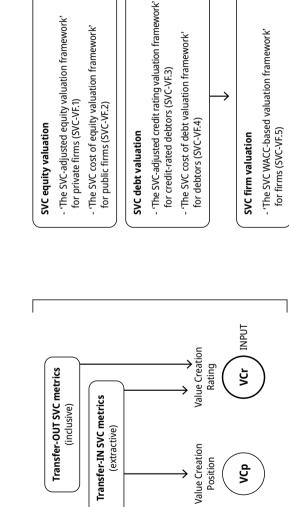


Figure 5.3: The relationship between sustainable value creation (SVC) measurements and sustainable value creation (SVC) valuation frameworks.

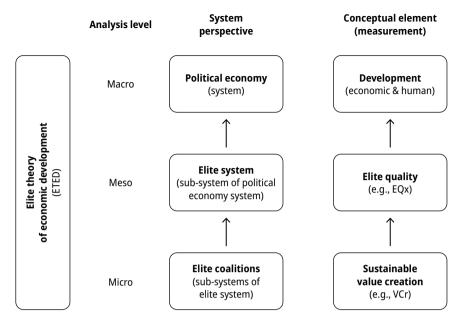


Figure 5.4: The systems perspective of the ETED.

The political economy system, its sub-systems, and their respective levels of analysis, as well as the key conceptual elements and associated measurements are now presented in Figure 5.4 as a summary of the theoretical efforts made in the first two parts of this book. Jointly these outline a general systems framework for elite agency that selectively integrates an eclectic literature.

The inquiry proceeds in Part III by comprehensively considering the 'Implications' of the elite theory that are relevant for policymaking, including measurements and frameworks that aim to quantify and incentivize the aggregate value creation of a given economy's elite business models. The applicability of the ETED to the problems of the real world stem from its central working hypothesis that the sustainable value creation of both firms and an economy can be ascertained. Given its connection to institutional quality, elite quality at the elite system level becomes an essential concern. The inquiry therefore turns to elite quality measurements (starting with the EQx) that are posited to be portals through which it becomes possible to both envisage and steer the prospects for mid- to long-term economic growth and human development.