THE SILVER LINING OF COOPERATION:

Self-defined rules, common resources, motivations, and incentives in cooperative firms

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Abstract

Cooperatives are characterised by mutual-benefit coordination mechanisms aimed at the fulfilment of members' participation rights. This paper explores the institutional elements that regulate individual behaviour and outcomes in cooperatives by bringing together new-institutionalism, behavioural and evolutionary economics. Our framework considers four main dimensions of the governance of cooperative firms: (1) the development and application of self-defined rules by the members of the cooperative; (2) the management, and appropriation of common resources and outcomes; (3) intrinsic motivations and reciprocating behaviours; (4) the implementation of suitable incentive mixes based on inclusion and reciprocity, including both pecuniary and non-pecuniary elements. An example is offered in order to highlight possible problems in the governance of cooperative firms, in particular the processes of distribution and appropriation of surplus. The example aims at introducing the discussion of the new framework of analysis.

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> "Dilemmas nested inside dilemmas appear to be able to defeat a set of principals attempting to solve collective-action problems through the design of new institutions to alter the structure of the incentives they face. ... But some individuals and/or communities have created institutions committed themselves to follow rules, and monitor their own conformance … to the rules in common pool of resources situations".
>
> Elinor Ostrom (1994)

1. Introduction

Cooperative firms are understood, in this paper, as mutual benefit organisations created by self-organised principals (Ostrom, 1994). These are directly invested of the responsibility to define and pursue the objectives of their organisation.1 It follows that cooperative firms are created to protect, first of all, the participation rights of their membership in order to satisfy its needs and demands. Cooperatives do not, as a norm, maximise private returns accruing to the investment of financial capital. They are usually controlled on an equal voting-right basis by different typologies of patrons (e.g. producers, workers, consumers) or by a mix of them (multi-stakeholder cooperatives). Since the organisation is created to pursue objectives other than the ones of investors, private objectives vested in external owners are substituted with mutual-benefit aims. This puts the burden of the fulfilment of economic, financial, and organisational requirements directly on the self-organised

[1]Mutuality is considered by various authors to be directly linked to the reciprocating behaviour of the involved actors (Bruni & Zamagni, 2007) and to inclusive versus exclusive preferences (Sacchetti & Tortia, 2010).

principals. External financiers have, as a norm, limited incentives to invest in cooperatives, both because private returns to investment in specific assets are much reduced with respect to for-profit firms, and because the lack of control rights increases the risks of losses and of morally hazardous behaviours by the self-organised principals.[2] Those peculiar governance characteristics require appropriate analytical tools. Whilst the contributions of new institutional, behavioural[3] and

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[2]A second typology of non-profit making firms is represented by social enterprises (or entrepreneurial non-profit organisations with a public benefit objective), which find, only partially, their organisational expression in the cooperative form (Borzaga & Tortia, 2010). This work will refer mostly to cooperative firms, though many of the arguments developed here can be applied to other typologies of non-profit oriented firms.

[3] Analyses of individual behaviour carried out by the behavioural school question the hypothesis that every human action, and especially every economic action, is governed exclusively by self-interest. Behavioural economics maintains instead that human actions spring from a mix of motivations and preferences. The approach of behavioural economics was firstly inspired by developments in social psychology (e.g., DeCharms, 1968; Deci, 1975), which took into consideration the relevance of intrinsic and non-monetary motivations. Then it sprang in economics in connection with the doctrine of limited rationality (Simon, 1979) and decision making under risk (Khaneman & Tversky, 1979). Frey (1997) evidenced the interplay between intrinsic motivations and extrinsic incentives. Behavioural economics introduce social preferences as crucial drives of behaviours. Social preferences include behaviours that are not-self-interested since people can decide driven by the interest for the wellbeing of others (altruism), by a general inclination to reciprocity (Fehr & Gächter, 2000) and by a quest for justice and equity (Fehr & Schmidt, 2001; Tyler & Blader, 2000).

evolutionary economics[4] have provided insights on specific aspects of economic choice, we argue that each stream taken separately does not define a comprehensive framework for analysing the behaviour and goals of cooperatives. This work is positioned to fill that gap, by introducing a new framework of analysis.

New-institutionalism is one of the most influential schools in understanding choices across markets and organisations. It has been deeply involved with the study of opportunistic behaviours facing asset specificity, contrasting interests and asymmetric information (Williamson, 1973; Jensen & Meckling, 1976). These problems are relevant in the study of the management and distribution of common resources (Ostrom, 1994). However, the new-institutionalist framework is not suited for accommodating actors' motivations. Even when called into play, motivations are mostly taken as exogenous to the explanatory framework. However, motivations are likely to be crucial in clarifying the behaviour on non-traditional forms of enterprises, such as cooperative firms and social

[4] Evolutionism in the study of the economy was initiated by Penrose (1959) and is based upon the idea that organizational routines in the social world serve a similar function to genetic material in the biotic world (Nelson & Winter 1982). Organizational routines serve as codes (replicators) transmitting instructions that support the behavioural propensities of the organization, which can be interpreted as interlocking equilibria of individual habits (Hodgson 1993, 2006). These routines can be renewed through organizational innovation and transmitted by imitation, and they define the potential for adaptation and survival in the socio-economic environment. According to evolutionary theory, institutions take the form of organizational routines in terms of property rights, governance structures, and organizational models.

enterprises. In these organizations, as demonstrated by a literature that grew overtime (Rose-Ackerman, 1996; Ben-Ner & Putterman 1998; Leete, 2000; Ben-Ner & Gui, 2003; Valentinov, 2007, 2008) motivations are not exclusively related to monetary qualities, since at the outset, when the organisation is created, principals attach value also to reciprocating behaviours, inclusion in the choice of strategies and objectives, fair procedures, and socially oriented goals. An explanatory framework that assesses the interplay of both extrinsic and intrinsic motivations is therefore needed.

The mix of motivations and associated values requires coordination. Building on evolutionary theory, we take routines as the coordinators of the activities undertaken by self-organised principals. We understand routines as shared and established ways of dealing with specific management and production issues that help the alignment of individual motivations and organisational objectives. Routines, in this context, represent evolving mechanisms incentivising consistence between collective and individual values and objectives, including not only monetary elements but also inclusion, fairness, learning and autonomy, respect and recognition, reciprocity and individual wellbeing.

The strategy of the paper is as follows: in Section 2 we consider the economic nature of cooperative firms, in terms of entrepreneurial activity self-organised by non investor principals. Section 2 introduces an example of cooperative misbehaviour in order to illustrate some of the main dangers connected with the process of appropriation and distribution of resources in inclusive governance forms. The organisational dilemmas introduced in Section 2 are taken up in Section 3, where we introduce a new framework of analysis that accounts for the monetary and non-monetary qualities of cooperatives. In particular, we argue that pluralism of values, represented also by multiple motivations, should be reflected by self-defined rules, routines, and mix of incentives. Performance would be then assessed on the basis of such values. Section 4 concludes.

2. The socio-economic nature of cooperative firms

Cooperative firms are regarded in this paper as non-profit oriented firms. This interpretation marks some of their most fundamental institutional and behavioural features as against profit maximising firms. Profit maximisation typically depends on the economic nature and institutional features of investor-owned, business firms. The latter have been conceptualised as saleable objects (Putterman, 1988), which implies that owners aim at maximising market value and being in a position to sell the firm (or its shares) at the highest possible price. The maximisation of market value requires that expected profits are, in turn, maximised.

In the case of cooperatives firms a different process can be observed, although not necessarily so, depending on the institutional and legal context.[5] To illustrate, let us consider the Italian and the

[5] When the non-profit orientation is not imposed by law, as it happens in most Anglo-Saxon countries, diverse outcomes and behaviours can be observed, including profit maximising ones. These are usually linked to income maximising choices by members and to the possibility offered by law to de-mutualise and sell the organisation at its highest possible market price. However, the empirical evidence shows that many

Spanish legislations as two specific cases in which explicit emphasis is placed on the non-profit orientation of cooperatives. In particular: (1) cooperatives are required to reinvest at least part of the net surpluses in asset-locked reserves that are exclusively owned by the organisation and cannot be appropriated by members also in the case of de-mutualisation and/or sale of the firm; (2) members rights are personal rights and cannot be sold as such in the market. In other words, the market for membership rights is excluded or severely restricted by law. Both categories of institutional constraints make the sale of the firm more difficult and less convenient, dampening the tendency to consider the organisation as a saleable object.[6]

In our perspective, the nature of cooperative firms is given by the need to device mutual-benefit coordination mechanisms for the fulfilment of social rights and needs coming from non-investor

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cooperatives in these national contexts still behave as non-profit-maximising and/or community oriented firms.

[6]Starting from the seminal contributions by Furubortn & Pejovich (1970), and by Vanek (1970), these institutional features have attracted serious criticisms against cooperative firms, since they have been considered the source of dynamic inefficiencies in the allocation and accumulation of self-financed capital funds (Bonin, et al., 1993). These considerations were initially referred to the former Yugoslav economic system, and then extended to all the forms of cooperative firms characterised by the accumulation of capital in asset-locked reserves. However, while the ensuing phenomenon of under-investment and under-capitalisation has found weak empirical support (Bartlett, et. al, 1992), these contributions have failed to recognise the positive functions of the asset lock, and to evidence its coherence with the non-profit nature of cooperatives.

stakeholders. Such needs would include, for example, the stability of employment and a fair wage for workers in worker cooperatives, access to financial support for little producers in credit cooperatives, adequate quality and product prices for customers in consumer cooperatives.[7]

More even distribution with respect to for-profit firms, however, does not have to happen at the expenses of efficiency. Cooperatives have been shown to be able to reach high degrees of production efficiency, at times higher than profit maximising firms (Bartlett, et al., 1992). These results can be explained by the ability of cooperatives to implement effective coordination and governing mechanisms that favour the mutual alignment of members' motivations and objectives on the one hand, and organisational objectives on the other. In practice, consistency between individual and collective objectives can be evolved by means of democratic participation and deliberation as a

[7]We do not question here the legitimacy of the analysis of the behavioural responses of cooperatives as income maximising firms, as in the research tradition initiated by the Ward (1958) model. Such analytical approach was able to define testable hypothesis that have been confirmed by empirical tests, such as the lower responsiveness of cooperative firms to market shock than profit maximising firms (Pencavel et al., 2006). However, the hypothesis of income maximisation also led to wrong implications, such as the possibility of a negatively sloped supply curve in the Ward (1958) model, envisaging serious misunderstandings of the economic nature of cooperatives. Furthermore, the Ward model takes for granted the institutional environment in which cooperatives operate, as this environment was largely drawn from the legal constraints imposed on self-managed firms in the former Yugoslav system. Hence, the role of institutions and their change is taken as exogenous.

method for discussion and strategic decision-making (Sacchetti & Sugden, 2009). Results are likely to include improved organisational and production efficiency, as well as individuals' satisfaction (Stiglitz, 2009). The former can be significantly improved *vis à vis* profit making-firms when trust and reciprocating behaviours are built in organisational routines (Becchetti, 2010). The latter has been related by Deci & Ryan (2000) to the individual's basic psychological needs – namely competence, autonomy and relatedness – to which social contextual conditions must comply if the individual has to be satisfied. These findings suggest that when extrinsic goals differ from intrinsically determined needs, the wellbeing of the individual diminishes. Participation in the formation of organisational objectives, besides some degree of internalisation of organisational characteristics, can render organisational goals consistent with individuals' internal values and needs, improving satisfaction and wellbeing (Cf. Carpita et al., 2010 for evidence). Finally, the lower utilisation of monetary incentives and the stronger stress put on intrinsic motivations and involvement are conducive to reduce costs and to increase competitiveness (Borzaga & Tortia, 2010).

These results contradicts the nature of traditional analysis of cooperative firms, which often disregards the role of motivational complexity in shaping the interplay between self-interested and exclusive orientations on the one hand, and cooperative behaviours on the other. By reducing human behaviour to the expression of exclusive and individualistic motivations the possibility to understand the behavioural underpinnings of cooperation is lost. The analysis is therefore constrained, and cannot explain rules and objectives, nor can it explain the multiplicity of results of cooperatives as particular associative entrepreneurial forms. It follows that the behavioural propensities of the actors involved, including the mesh of intrinsic and extrinsic motivations, inclusive and exclusive preferences need to be properly integrated in the organisational context. To this objective, incentive mixes represent an emergent property of complex organisations whose function is to make coherent, while, at the same, leave the interaction open between individual behaviour and organisational objectives. While traditional economic approaches have almost solely focused on monetary incentives, we endorse a different perspective whereby monetary outcomes represent only part of the desired end results. We regard non-pecuniary aspects such as learning, recognition, fairness, autonomy, and inclusion in decision-making as integrative foundational qualities of a cooperatives' membership. These are mirrored by rules and routines, as well as by organisational objectives, against which performance should be measured (Sacchetti & Tortia, 2010).[8]

3. Dark side of cooperation: appropriation and distribution

Economic analysis has shown behavioural diversities not only in individuals, but also at the collective level between cooperative and for-profit firms. For example, worker cooperatives tend to

[8]As summarised by Kahneman, et al., (2004, p. 429) "numerous studies have established that life satisfaction is weakly correlated with income".

protect employment to a larger extent than capitalist firms. To this end, worker members are ready to accept fluctuating wages (Craig & Pencavel, 1992, 1994; Pecavel, et al., 2006; Burdin & Dean, 2009). Different attitudes can be also found in cooperative banks, which tend to be created for providing financial support to small producers, who would otherwise be rationed by commercial banks.

Most of the analysis concerning cooperative firms, however, has tended either to support their behaviour in a hagiographic way, or to devalue their role and results with ideological arguments (Borzaga, et al., 2011). Shared objectives and voluntary compliance with managerial decisions add significant complexity to the analysis. Inclusive governance requires an understanding of the conditions under which individuals accept to behave cooperatively, as against free riding and opportunism. A number of issues still call for critical inquiry, for example: failures to reach the desired objectives; instances of misalignment between individual and organisational objectives; the spread of opportunism and breakdowns in coordination engendered by contrasts between different members or between members and managers. These difficulties are recurring in cooperative firms and cast doubts on whether cooperatives represent welfare-increasing governance solutions. In a recently published article on the *New York Times*, Castle (2009) describes the fraudulent conduct of some European agricultural cooperatives in the adjudication of European subsidies:

> “Because the cooperatives provide agricultural equipment, farmers sometimes sign forms giving co-ops the right to withdraw money from their individual accounts, in the way that many people pay household bills. But fraud investigators found this to be happening even to farmers who had not agreed to the withdrawal of funds. At his home in the village of D., A. L. held up his statement from

> the Agricultural Bank of Greece for December 2005. On Dec. 28, he received a payment of €3,012 in subsidies for olive oil, even though he farms only 150 trees and would normally claim several hundred Euros. That same day, an unexplained debit removed €2,397. "No one can explain the debit," he said, "not the bank, nor the cooperative. No one can explain *how the money came into my account or who has taken it*." (emphasis added).

This example uncovers at least two major issues. The first is related to the misalignment of external (from the European Union) and internal incentives. The second is related, instead, to internal governance failures and represents a more serious threat to the possibility of enhancing welfare through self-organisation. The impact of environing conditions on the organisation - as depicted by EU policies aimed at supporting cooperatives - need to be considered critically, since the results of the interaction between external and internal incentives may be far from those initially desired. More fundamentally, however, we suggest that the valorisation of intrinsic motivations, which is a distinctive characteristic of non-profit organisations, can be attained only when so-called deviant behaviours are prevented and restricted.[9]

Not so much research, however, has been committed to what enables self-organised entrepreneurial ventures to be both efficient and effective. Specifically, we relate efficiency with the interplay between specific individual values and motivations on the one hand, and firm governance and objectives on the other, through the mediating role of the incentive structure. We also suggest that

[9]The importance of control and retaliation in cooperative interactions has been evidenced by behavioural economist starting from the seminal contribution by Fehr & Gächter (2000)

effectiveness responds to the ability of self-defined rules and routines to achieve, as a necessary condition (and besides pecuniary results), non-monetary outcomes, such as individual satisfaction by means of giving space to the intrinsic motivations of individuals.

Organizational routines can be functional to the achievement of individual wellbeing. At the same time, the implementation of constraining rules serves as a precondition for controlling opportunistic behaviours. The two aspects of the problem can be put together if rules that reinforce trust and reciprocity are able to forestall deviant behaviours and, at the same time, become the repositories of organisational incentives and of the ability of the organisation to support intrinsic motivations. Whilst traditional microeconomic textbooks argue that monetary incentives are, as a rule, the main drivers of efficiency, behavioural arguments show that only rules that reflect the shared values of participants and support their motivations allow the organisation to achieve also satisfactory monetary outcomes. In cooperatives, therefore, incentives should be consistent with underlying values protecting and fostering inclusion, trust and reciprocal behaviour. Production efficiency comes to depend on those values, besides monetary incentives.

4. The definition of a new framework of analysis

Our arguments are tailored to the nature of cooperative firms: where profit is not the major value, the dominant qualities become intrinsic motivations, non-monetary incentives as well as individual satisfaction in all its components. In the case of profit-making firms, instead, the dominance of monetary drivers endorsed in microeconomic textbooks can retain a more fundamental explanatory power, with individual satisfaction attached to monetary returns.

If we had to understand failure of cooperatives to reach the desired ends, we would need first of all to address their specificities and their interaction mechanisms. We suggest a framework which acknowledges, in particular:

a) the values and motivations endorsed by self-organised principals when developing governance and working rules for the accomplishment of production activities;

b) the nature of the resources used and the processes of value-added appropriation.

The basic institutional structure of the organisation is typically defined by law and requires compliance by the members of cooperatives. There is, to put it differently, a broad institutional framework which provides part of the organisational rules. These reflect a number of consolidated values to which the principals choose to adhere in the first place. Variations, however, occurs. Governance and working rules specific to each single organisation are usually inscribed in the organisational protocols and in other forms of self-regulation, depending on members' discretionary decisions (Ostrom, 1994). Within the organisation, in particular, routines represent the procedures through which the organisation interacts with the external environment and are, therefore, subject to change.[10]

[10]The open-ended nature of institutional evolution has to do, in this case, with the ever changing features of rules inside each single organisation and relates to the firm survival and its expansion potentials. We refer

Both legal and self-defined rules identify criteria for managing resources and distributing returns. The utilisation and distribution of rivalrous resources, in particular, engenders trade-offs which, in the absence of proper regulation, can become unsolvable social dilemmas. Self-defined rules have, therefore, a clear place in guiding the appropriation of resources and preventing the exacerbation of conflicting interests. Most importantly, when truly reflecting the needs, values and objectives of members, regulation enables common activities to develop consistently with individual fulfilment. Recalling the work of Commons (1934, p.70), institutions empower individuals, being “collective action controlling, liberating and expanding individual action” (quoted in Mirowski 1987, p. 1020).

The challenge is to unearth the governance characteristics that can be effectively associated with the value and resource-specificities of cooperatives. A contribution to the answer may come from considering:

a) the relevance of non-monetary measures of performance associated with intrinsic motivations and with the specific values of the membership;

b) incentive mixes as an expression of the interdependence between individual values motivations, the nature of resources, and organisational values and objectives.

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here to the concept of ontogenetic evolution, more than to the concept of phylogenetic evolution of the institutional set-up of the organisation (see Hodgson, 2006).

4.1. The design and diffusion of self-defined rules

Members in self-organised enterprises define and implement their own rules without resorting, at least as a matter of course, to external enforcement. In many instances, detailed knowledge of the production process and of the socioeconomic context allows members to design rules which are more effective in terms of their propensity to lead to desired results than what external regulators would be able to achieve. These include both production as well as non monetary measures, such as individual wellbeing (Ostrom, 1994). We see this as a sheer possibility, whose actual realisation is not guaranteed and requires stringent conditions, especially in terms of the consistency of rules with individual motivations and values. Because values evolve over time, subject to experience, similarly rules are understood as evolutionary entities which need to be historically contextualised and tested (Dewey, 1977/1940; Cf. Sacchetti & Tortia, 2010, for an analysis of Dewey's perspective on values and preference formation). We would argue that the initial need to which a self-organised membership attach value, and which is reflected by rules, is the desire to accomplish common production objectives for the enhancement of inner motivations and the improvement of individual wellbeing.

In this perspective, bonding aspects are to be taken into account at the outset. Respect of reciprocity and conditional cooperation have been argued to be a necessary condition for improving organisational efficiency and individual wellbeing (Fehr, et al., 2002). It follows that also cooperatives need to detect and foreclose deviant behaviours which, however, are not likely to be frequent when individual values, motivations, organisational objectives and the incentive structure are consistently aligned and re-aligned over time. Control costs, as a consequence, have been shown to be lower in this kind of organisation than in for-profit firms (Bartlett et al. 1982). The ongoing self-selection of members on the basis of shared values and the establishment of organisational procedures coherent with those values allow cooperatives to benefit also from a reduction of transaction costs engendered by opportunism and dishonesty. However, the focus of the analysis is, in its essence, not just on the constraining aspects, but on the empowering features of in-built rules.

4.2. The governance of common pools of resources

Rules and routines need to reflect the specificities of non-profit oriented firms, starting from values. Whilst respecting specific values, moreover, rules and routines need to address the particular nature of resources used and accumulated by cooperatives. These portray some of the features of common pools of resources: together with the value added produced, they are rivalrous, but at least partly non-excludable. As said, rivalry is related to the scarcity and exhaustibility of resources. It would engender not-emendable social contrast in the absence of proper regulation. Non-excludability is one of the most characterising features of cooperative firms, and derives from the inclusive nature of governance rules in democratic organisational settings. Decision making and appropriation rights guarantee members to have a say in the management of common resources and in the distribution of the value added, while non-members could, as a norm, be excluded from the appropriation of the non-contracted parts of the value added. Rivalry is addressed by the rules defining appropriation.

The latter, is crucially influenced by specific procedures that the same members of the organisation are called to create, approve, and implement. Different rules and routines can shift the balance in favour different appropriators, who need to deliberate on what needs and aims should be recognised and, then, infuse their evaluation into choices. In particular strategic decisions are a synthesis of such a process and impact on assessments about, for example, how to share resources or invest for the future development of the organisation.

The time horizon of decision making is also crucial, since increased or quicker appropriation by some members can often reduce or slow down appropriation by other members in the future. Unless organisational outcomes can be represented as win-win situations, which cannot be presumed to be always the case, trade-offs in the distribution of resources need to be addressed carefully as a matter of course. As a consequence of rivalry and non-excludability, conflict is always a looming risk in entrepreneurial forms run by self-organised principals. While no optimal solution can be expected to emerge from the members' interaction, formalised procedures and customs (Schlicth, 1998) play a crucial role in guaranteeing clear standards of procedural and distributive fairness more than in any other organisational form (Tyler & Blader, 2000, 2003).[11]

While various kinds of dilemma emerge also in for-profit firms – not least regarding distributional aspects – there, it is a decision-maker (or restricted group of decision makers at the top of the

[11] The crucial role of distributive and procedural fairness in cooperative firms is fully confirmed by empirical evidence (Tortia, 2008, 2009)

hierarchy) that holds control of strategic decisions. In mutual benefit enterprises there is usually no such authority. Choices of strategic relevance, therefore, need to be made on the presumption that failures to reach decisions can impose substantial costs on the membership and on the other patrons of the organisation, up to the disappearance of the organisation itself. But how should processes of decision-making be designed in order to keep coherence with the values that back cooperation?

It has been argued by some critics in the new-institutionalist school that non-profit firms show higher ownership costs in the form of decision-making costs (Hansmann, 1996). In reply, Borzaga & Tortia (2010) suggest that such conclusions are flawed in at least two respects. First, they stem from the faulty idea that decision-making costs cannot be adequately limited in non-profit making firms. Secondly they lack to consider routines as repositories of procedural knowledge, both codified and tacit, which support organisational processes, including decision making, without necessarily inflating costs.

Consistently, Ostrom (1994) has demonstrated that self-organised principals can govern common pool of resources in an effective way and in some cases more effectively than in the presence of outside control under private or public property. This is possible through the evolution of *ad hoc* rules reflecting context specificity. It is a way of recognising the interaction between the organisation and its environment which involves, for example, the type of resources available, the characteristics of production organisation, as well as cultural elements, such as the initial values of the self-organised principals as reflected in the specific choice of organisation. Rules and routines emerge as solutions to specific needs and production problems, and function as the coordination mechanisms of activities. They change as needs and objectives evolve, in the context provided by a mutating environment that actively interacts with the stimuli provided by the organisation and by each individual within it. Because of such interconnectedness, working rules evolve jointly with the evolution of the principals' values, as well as by suggesting novel solutions to old problems.[12] As an illustration, consider sanctions. Although not being excluded, the definition of sanctions is not the main aim of self-defined rules in cooperatives, whose objective rests, instead, with the coordination of production activities, consistently with the accomplishment of welfare increasing outcomes.

[12]Interconnectedness between individuals, the organisation, and other environing conditions can be analysed by introducing, although not in this paper, a dynamic analysis of the continuous adjustment of individual needs and preferences on the one hand, and of organisational change on the other. New-institutionalism is useful to set up basic organisational needs, such as honesty and absence of corruption, but these specific 'civic values' should not be confused with the indeterminateness, plurality and dynamism of individual desires, objectives and preferences. Accordingly, change in organisations must reflect change in individuals' desires and objectives. The rules underlying the governance of organisations are considered, therefore, as dynamic and plural. We suggest that, to reflect evolutionary dynamics, organisations need to attach value to those processes that keep up the interaction between rules and individuals' historical evolution of values.

4.3. Incentive mixes as a reply to specific values and individual motivations

The governance of common resources in non-profit making firms is a reflection of specific values and objectives. These require the formulation of consistent rules, which are however dependent on the context and on the features of the production process. The basic principles of self-organisation should, nonetheless, apply to each of these organisations in the same way. Organisational routines and other rules define individual actions and behaviour. Still, no rule can be final. Rules are meant to evolve should the principals find that there is no resonance between the values embedded in rules and the assessment they have evolved over time through experience (Cf. Dewey, 1977/1917). Therefore, if we argue for the need of matching individual and organisational objectives, we inevitably acknowledge an evolving equilibrium between what the individuals assess as valuable and what is recognised as such by institutions. The continuous scrutiny of rules is crucial, as any mismatching would lower the individual feeling of fulfilment and, therefore wellbeing.

A non secondary consequence of the mismatch between individual values and organisational rules and routines would be the emergence of X-inefficiency, for example in terms of members' reduced involvement and commitment, or individual pursuit of aims at odds with organisational objectives. Because of these reasons, control costs would rise. Orthodox approaches have prescribed a number of remedies, ranging from increasing hierarchy to tightening control and pay for performance (Lazear & Shaw, 2007). All these cures are liable of increasing costs without guaranteeing expected efficiency (Frey & Osterloh, 1999). More fundamentally, however, these solutions are based on the exclusive control of strategic direction as well as on instrumental methods of interaction. One of the consequences of exclusion has been argued to be the generation of strong biases on individual willingness and capability to exert their voice and creativity (Sacchetti et al. 2009), thus further reducing feelings of competence, autonomy, recognition and, therefore, overall satisfaction (Cf. Ryan & Deci 2000). The negative impact on the desire to participate would then reinforce exclusion like in a vicious cycle (Sacchetti et al. 2009).

In self-governed organisations, however, the imposition of hierarchical and exclusive rules is more difficult and more likely to be ineffective, since members with equal rights will tend to reject decisions that do not respect fairness and mutuality. Equality, fairness and mutuality would be consistent values to be adopted in the management of resources, consistently with the initial choice of the legal form. It follows that governance needs to be based on the specific values of cooperatives, and innovate on solutions which favour the fine-tuning of decision mechanisms and organisational objectives with members' preferences in an inclusive way. The desire to reach consensus, through for example deliberation, needs to replace authority, simple transactions and bilateral negotiations in the definition of procedures and in their implementation (Sacchetti & Sugden 2009).

Similarly self-organised principals will choose a mix of incentives which reflects a specific process of evaluation and apprises individual motivation sets consistently. In particular it has been argued that monetary incentives should be adequately balanced with non-monetary ones, and match individual motivations which do not have a specific monetary equivalent. Intrinsic motivations often drive individuals because they feel a deep interest in the activity carried out. This is true whether this interest entails increased monetary remuneration or not. However, recent results coming from the analysis of workers' motivations in social cooperatives demonstrate that stronger intrinsic motivations are also linked to higher monetary remuneration (wages) since they increase effort (Becchetti, et al., 2009).[13] Hence, stronger intrinsic motivations differentiate workers associated with high productivity from less productive workers. The positive link between intrinsic motivations and productivity widens the scope of the orthodox approach since the link between effort and wellbeing appears to be mediated by the role of motivations.

4.4. Interaction

From our discussion, it follows that the incentive mix offered by non-profit oriented firms should promote the intrinsic leverage of activities, even at the cost of lower economic returns. By giving priority to the alignment of individual motivations and organisational objectives, individual satisfaction and wellbeing improve. The appraisal of non-material returns, however, does not rule out the need to satisfy individuals on both pecuniary and non-pecuniary grounds. These two complementary dimensions are a crucial aspect of the organisation survival and growth. Rules and routines can provide the mix of modalities for incentivizing both extrinsic and intrinsic aspects of

[13] This does not imply higher costs in cooperatives with respect to for-profit firms because the average level of wages is usually lower for the former (Pencavel, et. al., 2006).

individual behaviour. Finally, motivational upholding and individual fulfilment cannot be supported only by the formal distribution of participation rights but needs to be paired by substantive features of the organisational setting, such as the transparency of procedures, and the possibility to express autonomous and creative choices.

The reversed pyramid in Figure 1 exemplifies the interplay between the different elements in the framework. It accounts, in particular, for the interaction between the individual and the institutional structure (Hodgson, 2007)[14]. The organisation is represented as a stratified entity where the different layers interact through specific connectors: incentive mixes. At the base of the pyramid are basic institutional features which usually undergo a high degree of legal formalisation concerning control and appropriation rights. Differently, the upper layers reflect the evolving values and propensities of individuals. As such, their impact on rules, let alone the legal definition of control rights, is not observable in the immediate future but requires a longer-term perspective.

Figure 1 about here

[14]The aim is not to provide an explanation of why the foundational layers show a strong legal underpinning. We only observe that this is the case in most socio-economic systems.

At the most fundamental level, control rights allocate control over the broad direction of the organisation and over the appropriation of the produce.[15] They are binding in defining who has access to decision-making; however they do not univocally define how common resources are managed. This pertains to the governance of strategic choice making, which is crucially influenced by the organisation's structure and working rules. The nature of governance, at this level, is chosen by the self-organised principals, reflecting their values and objectives. By framing values and objectives, self-regulation determines also the criteria for assessing behaviour. We identify therefore two complementary faces of self-regulation: the creative and the binding. If, on the one hand, the definition of rules leaves space for the expression of specific values and enables principals to creatively shape the organisation's governance, on the other hand rules have also constraining features. These are directed to foreclose opportunistic behaviour and guarantee a high degree of compliance with collectively-defined objectives.

The constraining feature of rules is not meant to impair individual potential, but to ensure that each individual's right to participate and share results is respected. Rules that inhibit inclusion, from this perspective, would be perceived as unfair and have the undesirable effect of undermining intrinsic

[15] Control rights and their legal dressing are themselves influenced by values, culture and, in some cases, individual motivations. However, this process of evolution of control rights is likely to take place in the long run (Williamson, 2000). Because of this reason, this work considers control rights as given and, as said in footnote 7, it is cast in terms of ontogenetic, more than phylogenetic evolution (Hodgson, 2006).

motivations. Intrinsic motivation is impaired also when rules are perceived as external to the individual. One way to align individual desires and organisational rules is to put in place processes of adjustment which can modify rules to reflect the evolving, shared desires of members. Monetary and non-monetary incentives, specifically, can prompt the mutual adjustment of individual and organisational objectives. More fundamentally, we can say that the interplay between what the individual finds valuable on the one hand, and what is recognised as valuable by organisational rules, on the other, attaches meaning to tasks and supports individual intrinsic motivation (Deci, 1975; Rayan & Deci, 2000).

Intrinsic motivations are located at the top layer of the scheme. Their full expression represents the highest attainment of the organisational structure insofar as it increases individual wellbeing and improves production performance. [16] Our scheme, therefore, identifies the benchmark for assessing the impact of an organisation in the ability of the combined action of control rights and working

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[16] "Perhaps no single phenomenon reflects the positive potential of human nature as much as intrinsic motivation, the inherent tendency to seek out novelty and challenges, to extend and exercise one's capacities, to explore, and to learn. … The construct of intrinsic motivation describes this natural inclination toward assimilation, mastery, spontaneous interest, and exploration that is so essential to cognitive and social development and that represents a principal source of enjoyment and vitality throughout life" (Deci & Rayan, 2000).

rules to enable the full expression of individuals' intrinsic motivations.[17] This occurs if there is mutual adjustment over time between individual values and the values recognised by institutions.

5. Concluding remarks

Cooperative firms have been studied mainly by neoclassical and by new-institutionalist schools. Both of them were born and thrive in the context provided by capitalist institutions. Their inner values and logic in explaining economic phenomena appears largely functional to the development of the capitalist economic system, which is mostly populated by profit-oriented firms. However, when these values have been applied to different kinds of enterprises, such as cooperatives and other typologies of non-profit oriented firms, results have been limited and inconclusive, at time inconsistent or contradictory (Borzaga, et al., 2011). Besides the unsatisfactory results of economic analysis, recurring scandals have reinforced the negative appraisal of cooperative organisations.

The application of unsuitable conceptual tools is at the roots of flawed understanding of organisations that pursue mutual benefit objectives, and calls for a redefinition of the issues. In developing a coherent framework of analysis we have considered firms as entrepreneurial

[17]Intrinsic motivations find spontaneous expression in each single individual. Here we highlight that their full expression in the organisational realm requires adequate institutional preconditions, which are likely to be particularly favourable in self-organised entrepreneurial ventures.

associations driven by self-organised collective action in which members are granted democratic and non-saleable control rights. We have suggested that what is ultimately distinctive in explaining the choice and implementation of rules by the same principals who create and run the organisation is the principals' set of shared values and objectives. (Cf. Sacchetti & Tortia, 2010).

The accomplishment of an adequate framework of analysis for the study of the management and appropriation of common pools of resources in non-profit oriented firms is more relevant than in traditional profit maximising firms because control rights are distributed in a participatory way and have a personal character, i.e. they are attributed to person-members and not to shares of capital (Borzaga & Tortia, 2009). Democratic participation in cooperative firms implies that the outcomes and the procedures concerning each individual member depend on the preferences expressed by other members. The interconnectedness of results both at the individual level and at the organisational level is institutionally recognised by means of mutual dependence and inclusive governance. This raises a whole set of questions connected with the rivalrous and non-excludable nature of the resources employed and of the value added produced by cooperative firms. Our framework of analysis represents a way of acknowledging and explicitly addressing – through the checks and balances of a democratic decision making system - the dangers connected with opportunism. More crucially, cooperative governance is about at least ensuring that all the members can have a voice in the decision-making system, thus improving the compatibility between individual and organisational needs and objectives.

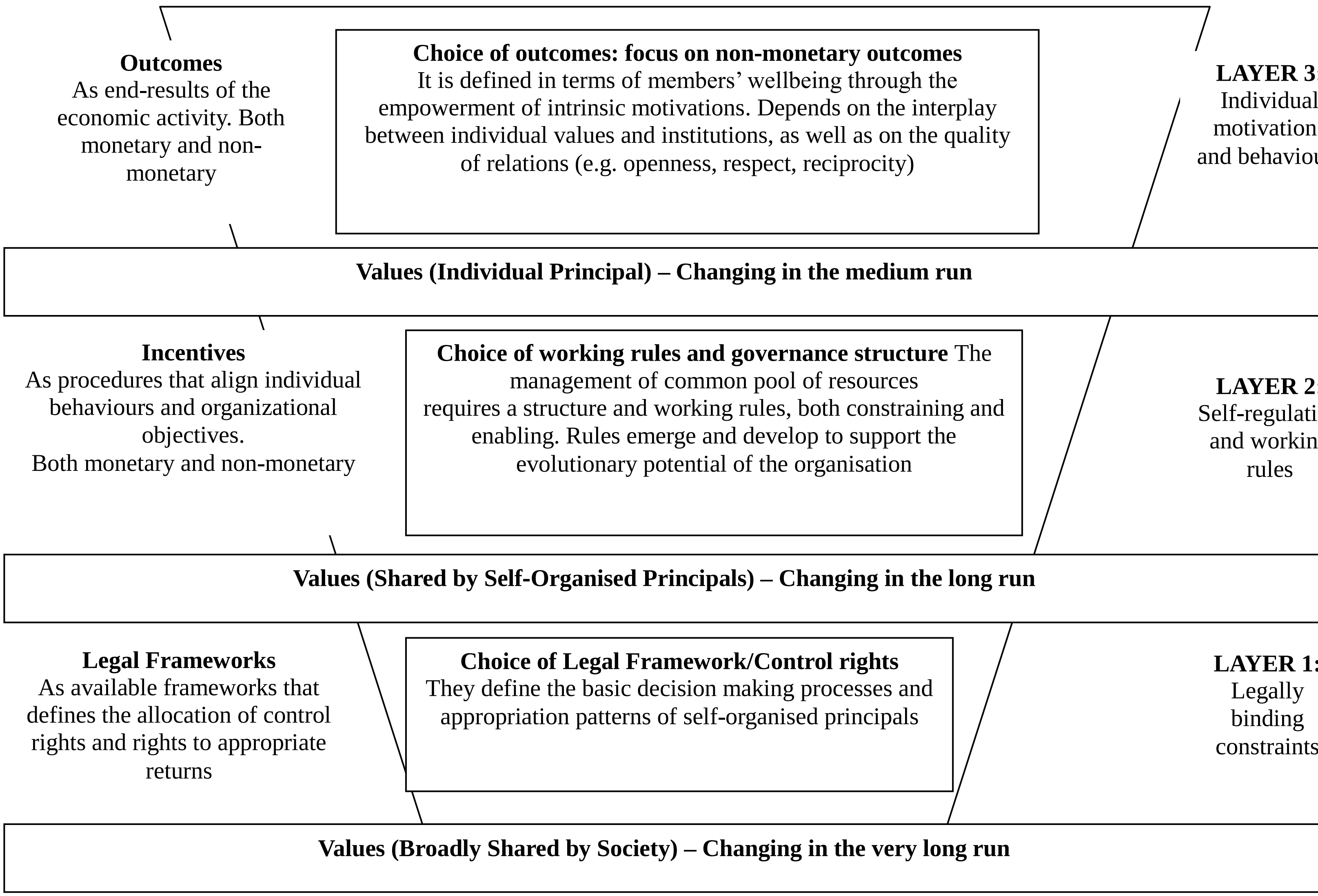
These enabling features work only when relations inside the firm are based on trust and reciprocating behaviours, since each individual position is not independent of the positions and behaviours of the other members. The spread of opportunism can be particularly dangerous where intrinsic motivation is at the heart of activities.[18] Opportunism can easily undermine the alignment of individual motivations and collective objectives, endangering firm survival and growth. However, when opportunism is kept at bay by proper rules, members' rights of inclusion are strengthened and enable the fullest expression of intrinsic motivations, which, in turn, foster the use of creative potential in people, their satisfaction as well as organisational productivity.

The choice of including intrinsic elements in the incentive mix provides consistency and resilience to the organisation. The incentive system develops through an open-ended trial and error process, while monetary outcomes are regarded as part of the end result rather than what drives economic activity. The example of frauds occurred in the agricultural sector showcases some circumscribed, but relevant, difficulties linked to the actualisation of self-governed entrepreneurial forms. These difficulties are connected with the necessity to govern and distribute limited resources characterised by non-excludability. The discussion also shows that the dark side of cooperation, which becomes

[18]While in new institutionalism (Williamson, 1975) opportunism has a substantive role in individual behaviour (human beings are opportunist by their very nature), in our framework opportunism represents juts one possible behavioural pattern, and indeed an evolving one. Hence opportunism represent a simple obstacle to the accomplishment of cooperative behaviours, and to the flourishing of intrinsic motivations.

apparent when deviant behaviours are not properly restricted, can be rescued if strong emphasis is put on the formal elaboration of effective governance and working mechanisms that reinforce underlying and evolving values, as well as on the quality of relationships. In this context, we suggest that the creation of an inclusive and fair environment, cleared as much as possible from unbalances related to opportunism, is one of the preconditions for the development of activities in line with the intrinsic motivation and creative potential of individuals.

Figure 1 - Cooperative organisations explained: the reversed pyramid of interconnections between control rights, working rules and outcomes.



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