

Towards the Emergence of Constitutive Rules for Equitable Agribusiness Value Chains

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Abstract

Agribusiness value chains in developing countries have experienced the impact of a double State reform process. The first generation of reforms imposed through the Washington Consensus aimed at economic stabilization, reduction of State budget deficits, and removal of trade barriers. The second generation focuses more on institution building in particular the creation of effective and independent regulatory agencies. This process puts institutional change in the foreground and therefore faces the resistance of entrenched vested interests. This paper develops the concept of quaternary institutions, that is, constitutive institutions for governance and discusses the conditions of emergence of new co-ordination rules in agribusiness value chains in developing countries that favour the inclusion of smallholders and less powerful stakeholders. A brief review of relevant concepts in institutional economics is conducted to clarify the role, the forms and the functions of these institutions. It leads to paying special attention to information generation and sharing as a crucial factor of institutional change. The role diverse actors such as the State, private organisations and external bodies can play in the emergence of quaternary institutions is then highlighted.

Introduction

This paper uses the concept of agribusiness value chain (also called supply chain or commodity chain) and refers to institutional economics to discuss the transition from State-led to market-led agriculture development in developing countries. The concept of agribusiness value chain is used to represent, in a national economy, a specific set of actors and activities in relation to a particular product. It is not only a heuristic tool that is helpful to understand the complexity and logic of interactions between different groups of interest, it is also a structuring approach in the sense that in both developed and developing countries, entire subsectors have evolved towards the integrated form of a commodity chain (Bourgeois and Herrera 2000).

The wave of structural adjustments promoted by the financial institutions of the Washington consensus (the International Monetary Fund and the World Bank) during the last 15 years of the 20th century is characterised by economic stabilization, reduction of State budget deficits, and removal of trade barriers. They brought a transition from an administered (or State-led) to a market-led economy (Griffon 1999). This general trend also strongly affected commodity chains. Inefficiencies in the production and trade of agricultural products within supply chains were usually considered as the doing of failing State intervention and induced the withdrawal of the State from virtually any type of intervention, including regulation activities. However, mixed results and undesirable patterns of market failures appear to spoil the expected efficiency gains. A new set of reforms aiming more at the building of a new institutional capacity, in particular the creation of new, more efficient and independent regulatory agencies (Marzin, Voituriez & Losch 2001) was then promoted. A new institution building terminology (decentralization, governance, social capital) progressively substituted to the old structural adjustment terminology.

Yet, old problems endure while new problems arise. Griffon (1999:4-5) highlights that "*the (liberal) transition is governed by a set of rules, some of which decompose while others recompose*". Growth and competitiveness still constitute the paradigmatic objectives in supply chains. The co-ordination through prices in transparent markets where informed sellers and buyers meet is still the common blueprint of interaction, and the dominant view of economists and advisors in global or sector economic policies that affect agriculture and commodity chains. In this model where the market is presented as the alternative solution to public administration inefficiencies and as the only effective mode of co-ordination for optimal allocation of resources, the old prescriptions persist: liberalization through rapid or progressive removal of incentives, taxes, and barriers to the production and trading of agricultural products, transformed products and inputs; privatization of manufacturing, industrial and commercial enterprises; economic stabilization and maintaining the main macro-economic balances. In the supply chains in developing countries, these still mean the privatization of State-owned assets, the dismantling of the administration of the commodity chain, and the opening up to international trade.

The focus on institution building, especially the creation of new regulatory agencies with the purpose of improved governance recognized to some extent that market-led regulation is an efficient form of co-ordination only in certain circumstances and that not all agents have the capacity for investment, the initial resource endowments, or the access to adequate information to create the conditions for a competitive and transparent market. Yet, the creation of new regulatory forms that are supposed to deal with market powers meet the same problems it strives to eliminate: the existence of entrenched, powerful vested interests.

Sudden and drastic changes have thus occurred in commodity chains affecting their functioning, the behaviour of their actors, and the former modes of interaction. They show that the constitution of efficient competitive and equitable commodity chains can neither result from State rules nor from market rules, but from navigation between the reefs of State and Market.

While prices are an important regulating factor and coordinating mechanism between individuals' plans, other factors increasingly explain the success of more efficient value chains such as technology, quality, information, and organization (Hugon 1999). Each of these factors makes explicit reference to collective actions and to interdependencies that are not necessarily regulated by prices.

Developing countries face a serious challenge in promoting a lasting, profitable agriculture and an agro-industry that will benefit all their farmers and entrepreneurs and fit in the national and international economy. They have to fight the market powers of specific groups of agents who regulate the commodity chains by their control over prices and where existing rules favour short-term competitiveness, produce negative externalities, progressively or rapidly marginalize already deprived or disadvantaged groups such as smallholders.

This problem leads to discussing the emergence of new modes of co-ordination and collective control of individual actions without losing the imperatives of economic performance. It is sustained by a systemic concept of competitiveness that emphasizes the role of interactions and dialogues as a factor of dynamic growth. Bradford (1994) and Hugon (1999) for example argue that endowment, strategies and policies are now more important sources of competitive advantages than natural resources. The World Bank (1993) also shows that negotiated strategies and policies, bringing together those in charge of the public and private sectors played a crucial role in the process of growth in East Asia.

The challenge is therefore to ensure that the creation of new institutional forms aiming at the establishment and the application of coordination rules in supply chains will effectively reduce inequalities and externalities that are produced by government and market failures.

The paper is organised in three sections. In the first section, reference is made to the conceptual framework of institutional economics with a specific focus on the emergence, development, and operation of constitutive arrangements. Implications for the commodity chains, in particular the role of information, are then discussed. In the third section, the respective role of various agents in the emergence of such arrangements is discussed.

Conceptual Framework

Institutions

Confronted with uncertain situations economic actors apply rules of behaviour. These “... *rules of the game in a society*” are called institutions by North (1990, 3). Institutions reduce the uncertainty and provide a structure of reference for decision making in everyday life. They define and limit the range of individual choices in the face of innumerable actions. As such they affect the economy by their effect on the costs of exchange and production. This section briefly introduces some key concepts on institutions and develops some more specific and relevant points for the discussion of the emergence of institutions and institutional change.

Commons' definition of an institution as "*Collective action in control of individual action*" brings a useful entry point in the context of supply chain (Commons 1934:69, cited by Neale 1988). It emphasizes the relations between actors and the system and it highlights a coordination function which purpose is to reach a state that is not the random aggregation of individual and separate decisions.

Further relevant developments on institutions include distinctions on their nature and their functions/roles. Walliser (1989:341), for instance, distinguishes "procedural" (abstract mechanisms of co-ordination, a contract for example) from "organic" (concrete entities charged with implementing mechanisms, a Board of Trustees for example) institutions, "regulative" (orienting existing behaviour) from "constitutive/generative" (establishing new behaviors) institutions, "programmed" (explicit agreement between actors) from "spontaneous" (non-intentional) institutions. E. Ostrom (1988:120) presents an equally relevant distinction for the understanding of transition problems in a commodity chain. She identifies three functional levels: (i) operational - the rules that are applied, (ii) collective - how to change the rules, and (iii) constitutional, the rules for changing the rules. Parto (2005:37) also elaborates a typology of institution where an "associative" type is mentioned as "... *facilitating prescribed or privileged interactions among different private and public interests*". This typology leads to the recognition that institutions are hybrids, and the possibility for associative institutions being first regulative and then becoming constitutive is very consistent for the discussion on the emergence of new forms of coordination in commodity chains.

Within this framework, the market, and its rules, is considered as an institution aiming at organizing exchanges among individuals in relation with a product or a group of products. From this perspective, it is not only a tool for the regulation of individual actions, but also a set of procedures ensuring co-ordination amongst economic agents. The role and efficiency of the market as a resource allocation mechanism have been discussed by economists of the "*expanded standard theory*" through various analytical approaches and concepts such as rent-seeking (Krueger 1974), transaction costs³ and opportunistic behaviour (Williamson 1975), asymmetric information (Stiglitz 1998), and negative externalities especially on natural resources². In the neo-institutionalism framework, the market is not challenged as the dominant mode of resource allocation. It is analyzed in an institutional context that explains why it is unable to provide optimum outcomes and fails to fulfil its expected role.

However, for Perroux (1991:315) there is "*no market without peace in the market*". He shows that "*the market is not a mechanism that can be isolated from the institutional environment where it was born and where it develops... Nobody doubts that the concrete, historical market is an institution*" (Perroux 1991:314-315). Accordingly, even under the assumption of market-ruled co-ordination, arbitration is necessary to ensure that peace prevails. This arbitration aims at finding compatibility between the plans and the projects of unequal groups. It serves the market and should not be used to serve oneself. In the transition phase that takes place in agribusiness value chains in developing countries, the passage from State-ruled to market-ruled coordination is a passage from one form of arbitration to a new one. This step is neither easy nor neutral. Path dependence (North 1990), transaction costs, asymmetric information, free riding may limit the options. The emergence of new forms of collective action in this context corresponds to the creation of programmed new constitutive procedures embedded in organic institutions, according to the terminology of Walliser, or institutions that are both collective and constitutional. These

institutions will be thereafter called *quaternary institutions*, in reference to the fact that they serve all primary (production), secondary (industry) and tertiary (services) sectors that are constituents of a supply chain (Bourgeois, 1999).

The rules for changing the rules: emergence of constitutive arrangements

In agribusiness value chains, there is always a pre-existing system of relationships governed by rules, codes, organizations, routines. This system remains stable as long as actors do not question it for technical, cultural, economic, social or political reasons. Why and how does change occur? Institutional economics provides elements of answer for understanding institutional change. Authors largely underscore technical change, or the development of technology, related to the progress of science as a first source of change (see for instance Veblen, Commons and Ayres cited in Fusfeld, 1977:753-754). Changes may also be economically driven either, as indicated by Marx, through individual action or as the result of larger transformation towards a market economy (see Polanyi in Fusfeld, 1977:768-769).

How change occurs, why at a specific moment and not at another, why in one place and not in another? What is the reason for institutional change? Walliser (1989:360) argues that “ (...) *an institution ends (up) by becoming autonomous to the point where the reasons that brought it into being are no longer actually the same as those that make it last, transform or disappear.*” In this evolutionary context, institutional change is produced when expected benefits outweigh the costs (see Coase in Feeny, 1988:163). This implicitly means that the change results in a gain in efficiency as detailed by Feeny (1988:180):

“These sources (of the benefits expected from innovations in institutional arrangements) include the capture of capital gains, risk sharing, the achievement of economies of scale, the reduction of transaction costs, and the amelioration of incomplete markets, externalities and market failure”.

This view of the emergence of institutions is centred on an (often implicit) demand and it acknowledges that current arrangements let escaping considerable gains. It would remain incomplete without taking into consideration the supply of institutional change. This supply depends on the structure of power or the balance of interests between different groups, and is conditioned, according to Feeny (1988:183), by a certain number of key factors such as the cost of the institutional design and its implementation, existing and conventional knowledge (customs; habits), constitutional order, existing arrangements, and the net benefits expected by the dominant decision-making elite.

Similarly, in the theory of convention, Boyer and Orléan (1994:222-231) show with non co-operative games that the passage from one convention to a superior one requires that a certain number of stakeholders co-ordinate to change simultaneously their behaviour. Otherwise self-reinforcement factors would hold the established convention steady. During transitions such as those affecting supply chains in developing countries, the game of actors is as important as the institutional frame.

The emergence of new rules in agribusiness value chains

The concept of agribusiness value chain is based on an explicit acknowledgement that interwoven relationships, that need to be taken into account to explain observed situations, exist within and outside the market. The assumption is that such value chains are not sectors of the national

economy where individual agents exchange products on the exclusive basis of a bilateral relationship determined by prices. The commodity chain is a system of interacting individual and collective agents (associations of producers, federations, syndicates, enterprises, public administration) and a cluster of co-ordination mechanisms where various institutional arrangements ranging from routines and custom-based verbal agreements to formal laws and decrees can be found.

Supply chains are subject to considerable processes of change. Actually, structural adjustment and posterior reforms induced by international financial authorities, donors, followed by political elites, supported by multinational enterprises, and expressed in the rules of the game of international commerce are the strongest source of institutional change. The eagerness of governments in developing countries to dismantle public administration in commodity chains, to withdraw all public intervention, to unilaterally open up to international commerce, to privatize businesses and services, and to deregulate clearly witnesses this point. It is also related to a dominant free market paradigm that attempts to establish an institutional functioning that passes through the implementation of certain principles (less State intervention) and modes of organization (more market) preferred to others. Such pressure aims therefore at modifying the functioning of value chains in the hope that the dominant mode of regulation will be price arbitration.

In the case of the transitions affecting the commodity chain, changes seldom originate from a technical innovation to which individuals and organizations must adapt through appropriate institutions. They are immediately institutional (as shown by the term “institutional reform” used by donors) and lies within the scope of Polanyi’s (1944) logic of the “great transformation”. Given the fact that institutional adjustments are slow while practical implementation is rapid, the “*capture of markets by sectional interests*” who benefit from market powers (Hubbard 1997:243) is possible. It would then favour short-term competitiveness to the detriment of social justice, economic efficiency and sustainable management of natural resources, and lead to the exclusion of the less powerful actors such as small scale farmers.

This situation poses a fundamental problem: how is it possible (in terms of capacity and adequate time frame) to ensure that an agribusiness value chain includes all actors and that they produce the institutions that will permit them to collectively control its evolution?

The application of the concepts presented earlier can provide some elements of answer. These are not normative; they are informative. They are sought to orient the thinking and action of analysts, researchers, and decision makers confronted with the pressure for deregulation from interest groups, and seek to promote transitions where administered commodity chain becomes co-managed rather than handed over to violence, market powers, and opportunistic behavior.

Quaternary institutions and constitutive change

As indicated earlier, the situations of reference (before adjustment or deregulation) are characterized by the existence of institutions that cannot be substituted by others just by simple will. Transition does not spontaneously take place, leading to an efficient market-ruled agribusiness value chain. It is oriented by the interplay of existing actors and institutions. If transition is expected to lead to more efficient forms of organisation of the agribusiness value chains, avoiding its capture by powerful groups, the exclusion of smallholders, or the generation

of accrued disparities or unwanted externalities, it has to be oriented accordingly. How can this transition be oriented?

A possible answer is to promote a common interest among actors to implement regulative changes in the functioning of commodity chains through the building of constitutive organizations to ensure that the market, and other institutions, serves the interests of the greatest number. As indicated earlier, the terms *quaternary institution* (or constitutive institutions for governance) refer to institutional arrangements aiming at changing co-ordination rules so that the plans and strategies of economic agents can be made more compatible in their mutual interest. These institutions are primarily organic, constitutive and programmed, operating at the collective and constitutional level. Their functions, organisational forms, and factors of emergence are discussed thereafter.

Functions

The main function of a quaternary institution is to overcome government and market failures associated with the transition from State-led to market-led rules in agribusiness value chains.

In overcoming market and government failures, quaternary institutions contribute to reduce the uncertainty linked to the incompleteness and asymmetry of information and to the dominant position of some actors over supply, demand or prices. As such, quaternary institutions reduce non-cooperative behaviour of organizations or individuals, protect actors from market from violence (fraud, cheating, contraband, exaction) and contribute to resolve conflicts.

In the field of non-market relations they function as constitutive organizations in charge of establishing collective rules that are accepted and used by the stakeholders. They also establish agreements on the means to exert control and sanction the non respect of the regulative agreements. Thus these institutions contribute to improved governance in the commodity chain by assuring transparency as a result of the circulation of information and promoting dialogue between actors.

Organisational Forms

As organic institutions, quaternary institutions are embedded in organizational forms. While the functions they perform import more than the form they take, certain types of quaternary institutions are more efficient or more adapted to specific purpose. These options are discussed thereafter on the basis of permanence and organisational complexity.

Non-permanent ad-hoc forms: meetings, forums. Forums or meetings are non-permanent ad-hoc quaternary institutions that can be used to promote the emergency of new constitutive arrangements. Their purpose is to circulate information, stimulate non market contacts and exchanges, and allow for a shared reflection on the basis of raising awareness on current and future problems in order to orient decisions and to gradually forge common representations.

Largely open and allowing for great distribution of information, they are rather cheap unless they involve a very large number of people. Their institutional design is simple but fundamental conditions for their success include the quality of the organization, the substance of discussions and the respect of specific rules in particular in allowing equitable voice to all the participants.

Forums and meetings, like policy arenas, may have great executive power. They may also contribute to the emergence of more perennial forms of quaternary institutions.

Permanent ad hoc forms: groups, committees, commissions. More permanent ad hoc forms to tackle specific problems allow for conflict resolution, for adjustments in periods of crisis, for continuous monitoring of new agreements, and for orienting policies. Arbitration and decisions have considerably greater power, particularly if they operate in presence of high-level decision makers. However, these are not usually appropriate forms for exerting control and enforcing rules.

To be truly functional, they compel more restricted participation and this can in turn result into representation problems for certain categories of actors, generally the most dominated and most significant in number. If no consideration is made for outward relays, information distribution will be limited and therefore of little use. The success of an ad hoc permanent organisation depends by and large on how representative the participants are and on the content of information used for negotiation and decision.

Permanent Bodies: inter profession, grouping, federation, offices. The more permanent and complex organisational forms are inter profession, federation, or offices. They differ from the apparently similar forms of constitutive institutions for governance dismantled in the deregulation and liberalization process of formerly State-administered commodity chains because they are independent from State intervention, or at least, the State is but one of the stakeholders among others. They do not emerge from the State's willingness to regulate the supply chain but from stakeholders' willingness to act collectively in defence or promotion of common and shared interests, through policy orientation and decision, investment decisions, information, establishment of rules, norms, and contracts. Interests of all parties are represented. They are bestowed with arbitration and supervision powers, and significant political power. Their institutional design can be complex, their establishment and functioning costly in terms of time and money. There is also a possible risk to see their functions being diverted to serve lobbies or interest groups.

Factors of emergence

As discussed earlier new institutional forms emerge when a number of criteria are met: expectation of greater efficiency (gains), a sufficiently large number of actors who have a stake in the change, the net expected benefits of the elite and dominant decision makers, existing knowledge, the cost of the institutional design and the cost of its implementation, constitutional order, existing arrangements, and conventional knowledge. These different elements provide the analytical frame for discussing the emergence of quaternary institutions in commodity chains.

Expected benefits. The perception that the opportunity for substantial gains is lost is one of the factors mentioned by the theory of institutional change that can explain the passage to new arrangements. In commodity chains, this perception is not always present due to a lack of adequate information on the current loss of potential earnings. There are cultural barriers such as language and education, physical barriers such as remoteness as well as socio-economic reasons, such as the strategy of specific actors who limit or divert the circulation of information for their own benefit, which may explain why some actors do not have access to this information.

The creation of quaternary institutions is strongly linked to the possibility of raising awareness that the current functioning does not or no longer respond to needs and objectives, or does not allow for preparation for future changes. Beyond the conception of new institutional economics where information is an instrument for making the market more efficient through greater transparency, information is considered here as a key factor for institutional transformation of commodity chains because of the knowledge it brings in regard to the expected gains for all the actors of change, as Melody (1987:369) argues, “...*effective regulation requires information with respect to the potential implications of various reform possibilities...*”

Communication of information is also crucial because it modifies the pattern of interactions that constitute the essence of institutions (Melody 1987). The circulation and highlighting of the shared benefits⁹ to be gained from establishing new institutional arrangements will for instance increase the number of actors with a stake in change and their power. As Marwell and Oliver (1993) stress in the theory of critical mass and collective action, the more numerous and diverse the actors, the easier the initiation of the dynamics of institutional change. At least three types of information whose circulation could significantly help or contribute to the establishment of new institutional constitutive arrangements can be identified: 1) information about competitiveness and efficiency of a commodity chain and its prospects, 2) the analysis of current functioning and obstacles to change, and 3) an anticipation of the new forms of functioning and the modes of establishment. The last point particularly refers to knowledge about constitutive rules, their role and importance.

The emergence of constitutive rules that will permit new actors to take part in the management of a supply chain implies a shift in the functioning of existing interactions among stakeholders. Thus, the net benefits expected by the dominant elite and decision-makers cannot be ignored. The structures of power in place and particularly the relationships between politics and the economy must be taken into account and integrated in the analysis of the situation. As Perroux (1991:315) explains, collusion between the “Prince” and the “Merchant” leads to the market serving oneself and not to one serving the market.

The Cost of Change. The cost of institutional design and the cost of putting it into operation must be compatible with the expected efficiency gains. Inexpensive systems of co-ordination will be preferred for instance when the commodity chains are not yet organized or are newly operating, or when their absolute economic or social contribution (added value, food security) is still low. Conversely, more costly and permanent forms will be required for more commodity chains that heavily weight both in terms of their complexity, history and in terms of their economic and social role (for example, for traditional export products or staple food).

Hodgson (2006) highlights that some institutions and in particular coordination rules are self organizing and therefore depend less on other institutions for the enforcement of their internal rules. Reciprocally, changing coordination rules would require the action of other institutions to overcome the inertia that is created at individual level through habits (Hodgson 2004) and the related institutions these habits contribute to establish. This point will be further developed in the next section.

Triggering the Emergence of Quaternary Institutions

Three types of actors can be at the origin of the creation of quaternary institutions to enable the emergence of new regulatory institutions in a commodity chain: the State, private-sector organizations, and bodies that are external to the commodity chain. Their role is respectively discussed thereafter.

Arbitration by the State

Deregulation and the dismantling of State-owned or -led enterprises in commodity chains do not lead, as we have seen, by the means of an uncontrolled laissez-faire system, to the establishment of a free and competitive market allowing for the optimal allocation of resources. However, real criticisms expressed against State administration of commodity chains are mostly legitimate because they refer to situations where the State is not an abstract entity working for the good of all but a power serving particular interests. In this sense, the debate over the role of the State is not or is no longer over the “less” or the “more” but over the “better”.

How can the role of the State in the creation of quaternary institutions be conceived? Fundamentally, the State is responsible for ensuring coherence between macro-economic objectives and the strategies of autonomous businesses. A commodity chain being a cut-out of the economy corresponding to a sole sector of activity, State representation within the commodity chain is necessary to ensure at least that investment decisions made by the economic agents are taken into account in the management of public affairs. Actually, the role of the State goes beyond that of being an observer of decisions whose effects could be incompatible, or even adverse, to decisions made in other sectors of the national economy.

Thus the State/Market dichotomy must be replaced by a range of possibilities modulated according to circumstances (Christy 1996:1146). The State still has, at least, two functions that are connected with the creation of quaternary institutions compatible with the orientations of the current paradigm: facilitating constitutive changes and performing governance activities.

State intervention in commodity chains can be considered as legitimate if it contributes to i) establish a legal framework and its application (contracts, norms, quality), ii) propose and finance in part the new institutional design, iii) facilitate the establishment of an agreement on the management of a commodity chain that will reduce uncertainty and allow decisions to be made and iv) promote the emergence of organizations that will participate in the management of the commodity chain.

In performing governance functions, the State may play two acceptable roles. The first one is the reconciliation of the interests of different segments of the agribusiness value chain in the name of national interests, through the organizations of meetings or through intermediation by “offices” generating and circulating information. The second one is the provision of arbitration in conflicts between organizations and interest groups.

These two functions are consistent with the basic principles of the Principal/Agent theory, where the State establishes new rules of the game, associated with the functioning of the market, enabling economic agents’ interactions and decisions towards increasing collective welfare (Gintis 1993:8-14). The Principal/Agent problem that appears here between the State and the

private sector and among State organizations is the hold that a mandated interest group could gain on the economic development of a commodity chain. This problem can be solved by the establishment of quaternary institutions capable of arbitration. But as underlined by Perroux, this is equally a question of the legitimacy of the role of the State. Acknowledgement of its competence as regards legislation is a basic requirement and one must pay careful attention to collusion between economic and political powers in the promotion of a new institutional arrangements.

Induction by Private Sector

Two cases must be distinguished according to the presence or absence of previous inter-organizational arrangements.

In absence of such arrangements, when some groups perceive a common interest to modify the existing rules they may take the initiative to create a force for change. It is however difficult to put in place new constitutive institutions for governance without the agreement of other actors. Therefore, the way the process takes place is of utmost importance. As highlighted elsewhere (Bourgeois and Herrera, 2000) the promotion of dialogue and convincing other actors on the basis of documented and objective arguments as to the soundness or the need for the proposed changes is a key factor.

Still, other actors may suspect a manipulation of information by the interest groups that are promoting these changes. Resorting to some State arbitration or support, provided that it is not seen as collusion, or to a neutral agency, can reduce this risk.

When an organized structure already represents the interests of the stakeholders in a commodity chain, this structure may manage the major part of the functions of constitution and governance as discussed above. Its fundamental task is to facilitate dialogue between organizations and individuals representing the interests of the different segments of the commodity chain in the pursuit of a common interest.

However, this type of structure may be also subject to pressures resulting from the institutional context where the commodity chain itself developed, and become an obstacle to institutional change. This happens for instance when representation is poor, or when it has been captured by a dominant group and its vested interests. This is the case when processing industries or importing wholesalers who have room to play with raw materials or finished products, in national or international markets, use such an organization to manage differential tariffs in the trade of goods to the detriment of producers who do not have this liberty.

Intermediation of Third Party

The third case is the intermediation by external bodies, serving as catalysts for institutional change and the emergence of quaternary institutions. The bodies of bilateral or international co-operation can play for instance an important role in this domain and present a certain number of advantages. These are, in particular: economic neutrality due to the absence, a priori, of short term economic interests in the transition, political neutrality, orientation toward greater democracy, the search for development balanced between management of natural resources, productivity and redistribution, the capacity to analyze, generate and circulate information, the possibility of transferring and adapting knowledge and experience.

Risks exist nonetheless. Neither political neutrality nor economic disinterests are guaranteed. Third party's understanding of socio-cultural specificities can be weak and there can be the tendency to propose standardized or ideology driven models that may not operate.

This external intermediation is, strictly speaking, not a form of quaternary institutions but an incentive form for the emergence of new constitutional agreements. However, production and communication of information, technical and financial support and sharing of experience can largely contribute to the emergence of quaternary institutions if they show the interest of institutional change, propose modes of functioning that are legitimate for all actors, and support the functioning of new arrangements in their early stage.

Conclusion

In the 1980s market-led coordination was actively promoted by the Bretton Woods organizations. The latter highlighted and used the failures of State intervention to justify structural adjustment policies. Mixed results led to a reorientation of the paradigm towards more institutional building and the creation of independent regulatory agencies. Yet, these do not satisfactorily overcome dysfunctions in the commodity chains due to both market and State failures. However, the emphasis on governance and the needed change of the rules of the game bring on the forefront of the debate the question of institutional change in commodity chains and in particular the creation of constitutive institutions that can modify the rules of operation of such commodity chains and promote the inclusion of all stakeholders.

This essay uses the framework of institutional economics and highlights both the necessity to struggle against the imperfections of the market and to promote non market forms of coordination aiming at reducing the uncertainty that surrounds individual action and collective choices. It emphasizes the role of information as a factor of institutional change and the creation of quaternary institutions, or constitutive institutions for governance, as a means of institutional change.

The creation of quaternary institutions depends on the pre-existing inter-organizational arrangements in the commodity chain, and can result from State intervention in its recognized role of institution building, from private sector initiative or from external or third-party intermediation.

Quaternary institutions share some common characteristics that bring them close to the "*institutional approach to economic policy*" synthesised by Petr (1984:4). They are value-driven and process-oriented, as they aim at the attainment of accepted and shared human values and focus on transformation, interaction, and movement not on a static equilibrium. They are evolutionary and holistic since the arrangements and measures that can be proposed are not permanent and they take into account the diversity of interests and the stakeholders and indicators of all natures. They are also non dogmatic and democratic, avoiding immutable truths, dogmas, and absolute laws and operating through the control exercised by their members.

Further work is needed to expand the reflection on the emergence of democratic and effective forms of regulation in the commodity chains. This is a key issue of governance and regulation and one of the 21st century's work yards for development economists (Yusuf and Stiglitz, 2002).

References

- Bourgeois R. (1999). "La constitution des filières et les institutions quaternaires". Document de Travail 36, CIRAD-Ecopol, Nogent-sur-Marne.
- Bourgeois R. and Herrera D. (2000). "Actor-led Changes for Efficient AgriFood Systems, Handbook of the Participatory Actor-Based CADIAC Approach". Monograph Series 39, CGPRT Centre, Bogor.
- Boyer R. & Orléan A. (1994). "Persistance et changement des conventions. Deux modèles simples et quelques illustrations". In Orléan, André (Ed.). "Analyse économique des conventions". PUF, Paris. 219-247.
- Bradford C. *The New Paradigm of Systemic Competitiveness: Towards More Integrated Policies in Latin America*. OCDE, Paris.
- Christy R. D. (1996). "Markets or Government? Balancing Imperfect and Complementary Alternatives". *American Journal of Agricultural Economics* 1996(78):1145-1156.
- Commons J.R. (1934). "Institutional Economics". MacMillan, New York.
- Favereau O. (1994). "Règles, organisations et apprentissage collectif: un paradigme non standard pour trois théories hétérodoxes." In Orléan, André (Ed.). "Analyse économique des conventions", PUF, Paris. 113-137.
- Feeny D. (1988). "The Demand for and Supply of Institutional Arrangements". In Ostrom, Feenly & Picht, "Rethinking Institutional Analysis and Development", International Centre for Economic Growth San Francisco, 59-209.
- Fusfeld D.R. (1977). "The Development of Economic Institutions". *Journal of Economic Issues*, 11(4):743-784.
- Gintis H. (1993). "Repenser la politique économique à l'aide de la théorie de l'agence". *Problèmes Economiques*, 2314: 8-14.
- Griffon M. (1999). "Transition vers l'économie de marché dans l'agriculture en Afrique". Notes et Documents 75, CIRAD-Ecopol, Nogent sur Marne.
- Hodgson G.M. (2004). "Reclaiming Habit for Institutional Economics". *Journal of Economic Psychology* 25:651-660.
- Hodgson G. M. (2006). "What Are Institutions?" *Journal of Economic Issues*, XL(1):1-25.
- Hubbard M. (1997). The 'New Institutional Economics' in Agricultural Development: insights and Challenges. *Journal of Agricultural Economics* 48 (2):239-249.

- Hugon P. (1999). "Avantage comparatif, compétitivité et organisation des filières". Notes et Documents, CIRAD-Ecopol, Nogent sur Marne.
- Jésus F. & Bourgeois R. (2003). "Reconciling Actors' Preferences in Agricultural Policy – Towards a New Management of Public Decisions". Monograph Series 44, CGPRT Centre, Bogor.
- Krueger A. O. (1974). "The Political Economy of the Rent-Seeking Society". *The American Economic Review*, 64 (3):291-303.
- Marwell G. & Oliver P. (1993). "The Critical Mass in Collective Action: A Micro-Social Theory". Cambridge University Press, Cambridge.
- Marzin, J., Voituriez, T. & Losch, B. (2001). "Impact of Privatisation of the Public Sector on Developing Countries. Benefits and Problems". Cirad, European Parliament, Montpellier.
- Melody, W. H. (1988). "Information: An Emerging Dimension of Institutional Analysis". In Tool, M.R. (Ed). "Evolutionary Economics, Volume 2, Institutional Theory and Policy". Armonk, New York. 361-387.
- Neale W.C. (1988). "Institutions". In Tool M.R. (Ed). "Evolutionary Economics, Volume 2, Institutional Theory and Policy". Armonk, New York. 228-.
- North, D. C. (1990). "Institutions, Institutional Change and Economic Performance". Cambridge University Press, Cambridge.
- Ostrom E. (1988). "Institutional Arrangements and the Commons Dilemma", In Ostrom et al. (Ed.), "Rethinking Institutional Analysis and Development: Issues, Alternatives and Choices". ICEG, San Francisco. 101-139.
- Parto S. "Economic Activities and Institutions: Taking Stock". *Journal of Economic Issues* 39(1):21-52.
- Perroux, F. (1991). "L'économie du XXème siècle, Tome V, Théorie générale: les concepts". PUG, Paris.
- Petr J.L. "Fundamentals of Economic Policy". In Tool M.R. (Ed), "An Institutionalist Guide to Economics and Public Policy". Sharpe, New York. 1-17.
- Polanyi K. (1957). "The Great Transformation". Beacon Press, Boston.
- Requier-Desjardins D. (1994). "Le comportement des acteurs dans les filières agroalimentaires en Afrique sub-saharienne: essais d'interprétation par les concepts de l'économie des organisations". *Economie institutionnelle et agriculture, Actes du XIII^{ème} Séminaire d'économie rurale*, CIRAD, Montpellier. 65-80.

Stiglitz J. (1988). "*Redefining the Role of the State: What should it do? How should it do it? And should these decisions be made?*" Paper presented at the Tenth Anniversary of MITI Research Institute, March 1998.

Tool, M.R. *Evolutionary Economics, Volume 2, Institutional Theory and Policy*. Armonk, New York.

Yusuf S. & Stiglitz J.E. "A propos du développement: questions réglées et questions en suspens". In Meier & Stiglitz (2002). "*Aux frontières du développement: le futur en perspective*". The World Bank, Washington D.C. 189-223.

Walliser B. (1989). "Théorie des jeux et genèse des institutions." *Recherches économiques de Louvain* 55(4):339-364.

World Bank (1993) "*The East Asian Miracle: Economic Growth and Public Policy*". The World Bank, Washington, DC.