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The standard view of economists is that formalisation of private rights in land is a prerequisite of economic growth, especially so in conditions of acute population pressure and agricultutal commercialisation. That stage has been reached in many regions of the African continent, hence the recommendation that land rights be duly registered by a central authority acting on behalf of the state. An alternative view, more prevalent among social scientists, claims that, far from being bypassed by evolving scarcity circumstances, the informal (customary) land tenure system is capable of adjusting itself to the needs of a modern agriculture while at the same time ensuring a more equitable access to land for those whose livelihood narrowly depends upon it.

This paper aims at assessing these two views by carefully looking at the arguments advanced by their respective upholders as well as by taking stock of the most recent empirical evidence available to test their validity. It will be shown that the first view is not as solidly grounded as it may seem at first sight, yet the second view must be duly qualified to allow for serious inter-community failures of the 'indigenous order' solution.

Under conditions of growing population pressure and increased market integration, the question as to whether the spontaneous evolution of the informal system of land tenure can be relied upon to meet the challenge of a modern agricultural economy is of enormous importance. The standard view of economists is that formalisation of private rights in land is a necessary step to make as soon as land becomes scarce so that competition arises around it and agents are willing to transact land through markets.

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That stage has been reached in many regions of the African continent, hence the recommendation that land rights be duly registered by a central authority acting on behalf of the state. An alternative view, more prevalent among social scientists, claims that, far from being bypassed by evolving scarcity circumstances, the informal (customary) land tenure system is capable of adjusting itself to the needs of a modern agriculture while at the same time ensuring a more equitable access to land for those whose livelihood narrowly depends upon it.

The present paper aims at assessing these two views by carefully looking at the arguments advanced by their respective upholders as well as by taking stock of the most recent empirical evidence available to test their validity. In the following, I begin by presenting the economists' standard view before subjecting it to a systematical appraisal. The alternative view will naturally come out when this systematic appraisal proceeds, since it has largely evolved as a reaction to the conventional doctrine of the economists. As for the weaknesses of the alternative view, they will be pointed out in a final section.

The standard economic doctrine of property rights in land

Evolution of land tenure under conditions of growing land scarcity

When a natural resource, say land, is abundant, there is by definition no competition for it. The critical issue is access to labour, not to land. In such circumstances, private property rights in land are not useful nor economically justifiable.

Externalities among competing users are unimportant since when people are dispersed over the land they have little ability to cause a fall in the average income of their neighbours through competition in the joint use of the resource or through ecological spillover effects. In other words, when population densities are low, an open access regime is efficient. The conservation of the natural resource is not jeopardized and there is no overcrowding effect through which additional entries can lead to a decline in the income level of existing producers. In the words of a property rights theorist: "externalities are of such small significance that it does not pay anyone to take them into account" and "there is no positive value to society of creating clearly defined property rights in land" (Johnson, 1972: 271).

Access to land does not, however, take place in a social and political vacuum and it is therefore incorrect to speak about an open access regime to describe land tenure rights in land-abundant environments. Even though they may not be precisely defined, territorial boundaries do exist between different communities or lineage-based groups which have the corporate custody of the land within their area of control. In African villages, the operation of territorial delineation actually corresponds to a symbolic gesture whereby the head of the founding lineage signifies that there is a privileged association between the delimited portion of the land area and the social group which he represents (Platteau, 1992: 85). Yet, rules of access remain quite flexible and, provided that they show a real willingness to recognize local authorities and to follow local customs, outsiders may be easily accommodated into communities, through the establishing of personal links of friendship or godparenthood. Communities are therefore largely porous and ethny-, lineage- or community-based identity feelings do not imply any attitude of rigid exclusion vis-a-vis strangers.

When population pressure on land intensifies, growing competition causes an increasing incidence of externalities among

users. A standard response to this potentially inefficient situation is to restrict outsiders' access to the local resource base (see, e.g., Noronha, 1985; Downs and Reyna, 1988; Bassett and Crummey, 1993; Laurent *et al.*, 1994). But if the population of native claimants continues to grow, the externality problem is only postponed.¹

To prevent efficiency losses following from the uncoordinated and joint use of a resource (the classical rent-dissipating externalities) as well as processes of resource depletion resulting from congestion effects, two institutional evolutions are available. Either the community takes steps towards regulating the collective use of the resource, or it accepts its division and the consequent emergence of individualised rights. Under some conditions, including the absence of transaction costs, the two solutions are theoretically equivalent and they lead to a Pareto-efficient outcome. In the real world, however, transaction costs are important and a central thesis of the property rights school in economics is that, given such costs, division of common property resources and the gradual individualisation of tenure rights are a more efficient solution than collective regulation under the form of adding rules of use to rules of access. At least, this is true for resources that are not too much spread out and are valuable enough to cause the benefits of privatization to exceed the costs (whether direct or opportunity costs). Underlying such a diagnosis is the belief that the governance costs arising from collective regulation are

quite significant especially because of the opportunistic tendencies of resource users (for more details, see Baland and Platteau, 1998; Platteau, forthcoming: Chap. 3).

When land acquires a scarcity value, individualisation of land tenure is actually demanded by landholders who begin to feel uncertain about their (customary) rights. As a result of their attempts to assert increasingly individualised use rights to given plots, disputes over ownership of land, inheritance and land boundaries tend to multiply which are more and more difficult to resolve and entail rising litigation costs. Yet, with the appreciation of land prices, the expected gain from obtaining specific land rights justifies to an increasing extent the transaction cost of disputation. This rising incidence of land conflicts and the accompanying threats to social order provide clear signals on which the government is called upon to act.

That litigation causes significant efficiency losses in the rural economy is evident since valuable resources are spent in non-productive activities. What must be added is that, even when there is no open dispute, the strategies used by people to claim new lands or to protect customary access are often costly not only from a private but also from a social viewpoint (see Meek, 1949; Berry, 1984: 89-96, 1988: 62-71; Noronha, 1985: 88-89, 208; Le Roy, 1985; Platteau, 1992: 163-175; Roth, 1993: 316-317). This is particularly obvious when such strategies cause an underutilisation of land resources, such as when landholders are reluctant to land or rent

^{1.} Thus, for example, in the case of the Orma pastoralist communities of northeastern Kenya, elders responded to increasing land pressure by prohibiting nomadic herders from grazing their herds on the village common pasture. Over the years, they strengthened this prohibition by gradually extending the period during which the local common pasture is made inaccessible to outsiders. Eventually, the restricted zone was declared out of bounds to the outsiders year round. Interestingly, however, Orma villagers continued to use the common pasture as much as they liked and this lack of restrictions applied to insiders was not seen by them as problematic (Ensminger, 1990: 667-69).

out their land for fear of losing their rights to it, or when they erect makeshift structures on the land or cultivate it in a desultory fashion to create the illusion that it is occupied and actually brought under cultivation.

The expected response of national governments to these clear signals is to carry out administrative reforms so as to put an end to the wasteful use of rural resources and to the social tensions arising from land disputes. Sooner or later, such reforms will necessarily include a formal registration of private land rights and full-fledged land titling procedures (requiring the completion of a cadastral survey). As a consequence of formal adjudication, all conflicts will then be solved, leaving nothing to dispute. Social peace and political stability will follow. According to this view, therefore, formal private property rights, far from being imposed ex abrupto by public authorities, emerge in response to a pressing demand expressed by increasingly insecure landholders whether directly or indirectly (through the rising incidence of land conflicts). Looked at in this way, the task of the government appears essentially nonproblematic. It only consists of supporting a change that is desired by everyone (including the officials who own land themselves), that is, of facilitating or hastening "a transition caused by fundamental economic forces" (Bruce, 1986: 51). In the words of Barrows and Roth, "registration is best viewed as a policy to assist in the evolution of land tenure institutions under way ..." (Barrows and Roth, 1989: 24).

As hinted at above, formal registration of land property rights is the ultimate stage in the evolution of land tenure systems under conditions of land scarcity. Deepening individualisation takes place along two main dimensions, namely the range of the rights held, and the extent of autonomy afforded by the landholder in exercising these rights. The

range refers to the package of rights enjoyed by the landholder, including rights of use and rights of transfer. Typically, rights over a given piece of land begin to be asserted by being able to freely choose which crop to grow, to freely dispose of the harvest output, and to prevent others from exploiting the same parcel (e.g., by grazing their livestock). Individualisation makes its way through the gradual extension of use rights (for example, the right to recultivate the same plot of land even before the normal period of fallow has elapsed, or the right to plant trees and to bring other improvements to the land, are increasingly recognized) and, above all, through the addition of transfer rights. In an ascending order of hierarchical importance, the latter comprise the right to lend the land along traditional lines (that is, as part and parcel of a wider relationship of reciprocal exchange between two families and lineages), the right to give it, to bequeath it, to rent it out (against cash payments) and, eventually, to sell it.

Individualisation of land tenure is also reflected in the growing autonomy enjoyed by farmers regarding their decisions of use and, particularly, regarding their decisions to transfer land. Thus, in the initial stages of individualisation, the rights to rent out or to sell land parcels are seriously circumscribed by the requirement that land ought to remain within the family or the lineage. It is the responsibility of the lineage heads to see to it that this condition is duly abided by and this is why their permission is explicitly requires before any sale of land can take place. Such condition is however gradually relaxed as land becomes more scarce.

The expected benefits of land titling

Two types of beneficial economic effects are expected to follow from the establishment of duly recorded private property rights in land: allocative effects resulting in more efficient

use of the land available, on the one hand, and dynamic effects resulting in land conservation and improvement, on the other hand (Demsetz, 1967; Johnson, 1972; Ault and Rutman, 1979; De Alessi, 1980; Feder, 1987, 1993; Feder *et al.*, 1988; Feder and Feeny, 1991; Barzel, 1989; Libecap, 1989a; Binswanger *et al.*, 1995; Feder and Nishio, 1997).

More efficient use of the land can itself arise from two distinct sources. First, more efficient cropping choices are made possible because decision biases in favour of short-cycle crops that arise from tenure insecurity are removed when land titles are introduced. Second, under the same circumstances, land is transferred from less to more dynamic farmers and consolidated into larger holdings, thereby eliminating the excessive fragmentation and subdivision encouraged by traditional land allocation and inheritance patterns. When property rights are not clearly ascertained and effectively enforced, willing buyers who do not belong to the same community must incur significant search, enforcement and litigation costs as a result of which a wedge is driven between the land's value of marginal product in the owner's use and the value of marginal product if used by the most productive alternative user. The price of land does not then reflect its true social value. Due to the significant transaction costs arising from asymmetric information, land transfers are inhibited among stranger farmers, thus causing the volume of land transactions to be less than optimal. By putting an end to ambiguity in property rights, land titling drastically reduces transaction costs and encourages land acquisition by those able to make the best use of it.

Development of the land market is often supposed to induce a switch from subsistence cultivation to commercial agriculture under the impulse of dynamic, market-oriented agricultural entrepreneurs (see, e.g., Feder and Noronha, 1987). Full-fledged private property rights do not only improve the allocation of land among different uses and among different users, but they also enhance investment incentives. The dynamic impact of land titling on investment behaviour can be actually decomposed into demand and supply effects. Or, to put it in another way, landowners whose rights are legally protected can be expected to be both more willing and more able to undertake investment.

They are more willing to invest for essentially two reasons. First, there is the point made long ago by John Stuart Mill that, when farmers are better assured of reaping the future benefits of their present efforts and sacrifices thanks to secure rights of use, they have more incentives to invest in soil conservation measures, land improvements and other operations that raise productivity in the long term (Mill, 1848: Book V, chap. VIII). This 'assurance effect' therefore follows from the fact that when farmers feel more secure in their right or ability to maintain long-term use over their land, the return on long-term land improvements is higher. Conversely, lack of tenure security can be thought of as creating a risk of land loss that causes a decline of expected income from investment or, alternatively, as shortening the farmer's time horizon, thereby discouraging him from performing actions that yield benefits over time. Second, when land can be more easily converted to liquid assets through sale -that is, when superior transfer rights have the effect of lowering the costs of exchange if the land is either rented or sold-, improvements made through investment can be better realised, thereby increasing its expected return. Investment incentives are then again enhanced (Besley, 1995c: 910-12; Platteau, 1996c: 36). This second effect may be called the 'realisability effect'.

Farmers are not only more willing but also more able to invest because, when freehold titles are established, land acquires collateral value and access to credit is therefore easier. This is especially true regarding formal lending sources which often have imperfect information on the borrower. 'collateralisation effect' nevertheless remains important in so far as informal credit obtainable from informal lenders without using land as collateral is typically less advantageous than formal credit (Feder and Nishio, 1997: 5). In fact, the emergence of a class of professional moneylenders in the countryside –and the concomitant emergence of a class of landless people— is seen as the natural outcome of both the reduction of the lender's risk and the possibility of foreclosure in case of default (Hicks, 1969: 107).

As pointed out by Besley, the key assumption to make this argument valid is that better land rights lower foreclosure costs. Note also that this 'ability to invest' effect can be framed as an incentive effect as well. As a matter of fact, more individualistic land rights resulting in improved collateral options may be expected to reduce the equilibrium interest rate, and since the interest rate is set equal to the marginal productivity of capital invested in land, investment is stimulated (Besley, 1995c: 909-10). More importantly, the increase in the farm's collateral value is likely to increase the amount it can borrow (perhaps from zero to some positive value). Either change in the conditions of credit supply will reduce the farmer's shadow price of capital (Carter et al., 1994: 155-56).

If we except gifts (including inheritance), land may thus change hands in two main ways: through foreclosure or through voluntary market transactions. In both cases, greater economic efficiency is the expected outcome, whether in static or dynamic terms².

An empirical appraisal of the standard view

Two central arguments in the above-presented property rights doctrine are the following: formal property rights in land are ultimately necessary (i) to afford the kind of security which all farmers need to carry out long-term investments whether for the purpose of improving or conserving the land (lenders also need that security in order to insure themselves against the risk of default); and (ii) to activate the land market so as to allow a more efficient allocation of that scarce factor among competing owners. The aim of this section is to assess the validity of these arguments in the light of the available empirical literature (for more details, see Platteau, 2000: chap. 4).

Land titling does not enhance investment and use of credit

The empirical evidence on the relationship between land rights and investment or land yields in African agriculture is so far largely inconclusive. This holds especially true when the incidence of investment is compared between lands protected by a formal title and non-registered lands. In empirical studies, Kenya is a reference country because it is one of the few African countries where a programme of individualized titling has been systematically applied to rural lands for several decades (since the fifties). Interestingly, the evidence available so far does not show that agricultural investment and land yields have

increased as a result of this programme (Green, 1987: 20-22; Haugerud, 1989: 62-90; Pinckney and Kimuyu, 1994: 11-12; Migot-Adholla *et al.*, 1991: 165-66; Migot-Adholla *et al.*, 1994b: 135-38). Thus, for example, on the basis of a comparison with the Kilimanjaro region in Tanzania, Pinckney and Kimuyu (1994: 12) concluded that: "With increased individualisation of land rights under the indigenous systems between the 1920s and the 1960s, it is likely that our sample of Kenyan farmers would have invested rapidly in coffee during the 1960s even if the land titling had not taken place".

Technically speaking, the most satisfactory test of the impact of land titling in Kenya is that carried out by Carter, Wiebe and Blarel (1994) on the basis of a cross-sectional farmlevel data set from the highly commercialized Njoro area (in the Rift Valley). This study is particularly reliable because it avoids the causality problem of inferring from the existence of a significant relationship between titling and agricultural investment that causality runs from registration to enhanced investment. When title acquisition and title maintenance involve real expenditures, it is indeed a priori possible that farmers tend to register land parcels that benefit from comparatively high levels of investment, or that registered farms are those which have better profitability conditions justifying such expenditures. In this case, registration does not stimulate investment but is positively related to it (Roth et al., 1994a: 194). In the words of Carter and associates:

"...when title acquisition is costly, identification and measurement of the effects of tenure reform are complicated because the best-endowed farmers, most likely to benefit from enhanced tenure security, are also most likely to seek title to their land. Farmers less favourably

endowed, are in turn, less likely to acquire title. Simple comparison of the performance of observed title and untitled farms thus tends to overstate both the realized effects of title on farmers who have obtained it and the potential effects of title on those who have not" (Carter *et al.*, 1994: 165).

The study by Carter et al. circumvents the above identification problem by carefully separating the effect of land title per se from the characteristics of the farms and farmers observed to have more legally secure tenure arrangements. More precisely, it estimates the impact not only of titles but also of other factors such as the farm's market access (measured by the size of the farm itself negatively associated with the shadow price of capital) that affect the economic value and likelihood of investment. What the authors show is that in Kenya title status is systematically related to farm size and mode of access to land to the point that true title effects vanish once these mediating factors are duly taken into account. Moreover, with the help of an ingenious econometric test, the authors have been able to disentangle securityinduced demand effects from credit supply effects of land title. Their analysis provides no confirmation of the existence of the former type of effects (the 'assurance effect').

Considering countries where titling is optional rather than compulsory does not basically alter the above conclusion. In the Shebelle region of Somalia, the effects of land title on various types of agricultural investment have all been found to be insignificantly different from zero: "a comparison of smallholder untitled and titled farms showed little difference in investment in equipment, fencing, drainage, bunding, irrigation pumps, or wells, and the overall level of investment was extremely low" (Roth *et al.*, 1994b: 224-

^{2.} Beyond the above efficiency effects, land titling has the additional advantage of providing the government with a precious tool for assessing property taxes and thereby increase its revenue.

25). Another study on Uganda reached a somewhat more ambiguous conclusion, however: registration here appears as significantly and positively related to investments in fencing, continuous manuring and mulching, and positively but insignificantly related to all remaining long-term investments. Also, effects on investment tend to be more positive when registration is voluntary than when it is imposed by the government (Roth *et al.*, 1994a: 193).

In Zimbabwe, smallholders -without having private title to their land-have achieved rapidly increasing maize yields, and their productive performance is not inferior to that of the biggest commercial farmers (Harrison, 1992: 131). Another study by Moor (1996) in the same country has however shown that tenure security has had a significant and positive effect on long-term on-farm investments. (The impact on credit could not be assessed given the low incidence of credit use in the sample area). Yet, the sample area was peculiar in so far as it was used for resettlement, implying that no customary tenure system existed before the granting of land titles.

At this stage, it is useful to pause for a moment and to look at the evidence available for some Asian and Latin American countries. In their pioneer study of Thailand, where comparison of investment behaviour was effected between farmers possessing legal land titles and squatters with no such document, Feder and associates came to the important conclusion that most of the impact of title ownership "stemmed from the fact that titles increased farmers' access to formal credit, rather than from the elimination of actual risk to the land rights of the farmers" (Feder and Feeny, 1991: 145). Where no organised credit sources existed, legal titling did not make much change. In the same vein, a study conducted in the state of Andra-Pradesh

(India) by Pender and Kerr (1994) has reached the conclusion that land rights status as measured by its transferability has had little effect on investment and credit, presumably because of the scarcity of formal credit sources in the survey areas.

In another study devoted to rural Paraguay, Carter et al. (1997) have estimated the impact of titling on investment and productivity in a way that differentiates according to the wealth level of farmers. The results obtained by them are much less encouraging than those of Feder and his coauthors. Indeed, what the former authors show is that, due to a wealth bias in the credit market, small farmers below a certain wealth threshold do not improve their effective access to credit following land titling. Unfortunately, this threshold is such that a large majority of households do not actually come close to it. For all these credit-constrained households, titling enhances the demand for investment in capital goods attached to land, yet binding liquidity constraints prevent them from increasing the total level of investment (so that there is substitution of attached for unattached capital).

From the analysis of regions where land titling exist, there is thus converging evidence that the assurance (or the induced-security demand) effect does not operate under ordinary circumstances. As we have seen above, the experience of Kenya actually suggests the same conclusion. The point can be made, however, that in the particular case of resettlement or new colonisation areas (and in urban or peri-urban areas), where risk and asymmetric information with respect to land rights are especially high, the granting of titles is likely to increase the assurance that the returns of an investment will accrue to those who make it and thereby to promote land improvement and conservation (see, e.g., Feder and Feeny, 1991; Alston et al., 1996, for Brazil; Moor, 1996, for Zimbabwe; Friedman *et al.*, 1988, for the Philippines).

Yet, even that more qualified statement must be taken cautiously since the aforementioned study of Thailand by Feder et al., which did not find evidence of an assurance effect, was carried out in a resettlement area. The point is that, even in frontier or new colonisation areas (such as the Ghibe valley in Ethiopia), effective communities may be formed under the decentralised initiative of the migrant settlers themselves. These communities lay down and enforce rules that enable them to expel farmers who do not abide by the established code of conduct regarding land rights and other essential matters. In general, the local informal order embedded in the rural community guarantees basic land rights to all villagers (including migrants) and these are sufficient to induce investment. There is then no need for the state to intervene through centralized procedures aimed at formalizing land rights (Atwood, 1990; Migot-Adholla et al., 1991; Platteau, 1992, 1996c, 1997; Bassett and Crummey, 1993; Bruce and Migot-Adholla, 1994). If, for one reason or another, the village informal order is absent, has vanished, or is proving unable to regulate access to land, however, the state may be welladvised to substitute for the missing social structure.

It has been pointed out above that, when it exists, the positive influence of land titling on investment behaviour is generally channelled through the credit supply or collateralisation effect. Yet, as has also been documented, this effect is far from being systematically present: use of production credit by farmers may remain low in spite of the emergence of mortgageable land.

The prediction according to which organised credit sources will spontaneously arise in response to land registration to meet

the latent demand of credit-rationed farmers is much too simplistic. Low credit use may actually be caused by two distinct types of factors. On the one hand, it may result from supply failures that have their origin in various imperfections not only in the credit market itself but also in other rural factor markets, particularly the land market. On the other hand, it may be determined by demand failures that prevent farmers from tapping available credit sources. Let us consider these two sets of factors in more detail, starting with demand failures.

Smallholders may fail to apply for loans because they perceive a high risk of losing their land through foreclosure, as the experience of Kenya testifies (Green, 1987: 8; Shipton, 1988: 106, 120; Barrows and Roth, 1989: 9). This may be especially true of subsistence-constrained farmers who fear their ability to repay loans taken for investment purposes is very low (unless payoffs are short-term). Perceptions of risk of default and aversion for land mortgage may actually vary depending not only on economic position but also on other characteristics such as age of the landholder. In Kenya, for example, it is mainly elders who reject the idea of land mortgage while younger men may be more attracted by the prospect of ready cash and, as a result, they are more liable to have their lands foreclosed (Shipton, 1988: 106, 120). Unfortunately, the latter do not necessarily use credit for productive or investment purposes. 'Urgent' consumption needs which elders may well regard as luxury can easily drive young people straight into landlessness, whether inadvertently or not. Interestingly, to reduce intra-family conflicts around land mortgages, public authorities in Kenya have required the agreement of family members prior to any use of land as collateral by the title-holder.

Another important reason behind the

farmers' failure to respond to the availability of loanable funds is the lack of attractive investment opportunities or the absence of conditions critical for their successful exploitation. This typically occurs when no technological package suitable for intensive agriculture is on offer, such as is often the case under rainfed farming conditions; or when investments embodying technical progress are highly labour-intensive (e.g., fencing, digging of furrows and ditches, tree planting, building of anti-erosion barriers, etc) and family labour is sufficient to supply the required effort (so that no capital is needed for the purpose of advancing wages); when the required infrastructure, input-delivery, output-marketing or extension services are not available; when visible wealth is being arbitrarily taxed (a risk to which agricultural investments are particularly vulnerable).

Failures to supply credit in spite of titling may arise from different sources. Clearly, they may result from imperfections in the land market that tend to make registration ineffective. This obviously happens if titled land is not considered a reliable collateral by credit-givers because it is difficult to foreclose or because, the market being thin, it is not easy to dispose of in case of default (Okoth-Ogendo, 1976: 175; Collier, 1983: 163-164; Noronha, 1985: 197-198; Bruce, 1986: 40; Barrows and Roth, 1989: 9).

Difficulties in foreclosing land (or other immovables) may originate in either the official or the civilian sphere, or in both. The first case occurs when the judicial system is ineffective or partial. This is a widespread phenomenon in SubSaharan Africa, particularly in urban and peri-urban areas where official titles are generally granted to private owners of land and buildings. In actual fact, a complaint frequently voiced by institutional credit-givers — not only state finance corporations but also commercial banks and

other private credit agencies—is precisely that foreclosure on property belonging to rich and powerful borrowers cannot be legally enforced because the judicial system is under the strong influence of their political allies. In Kenya where influential people in government and politics bought larger plots (so-called Z-plots) under the land settlement schemes, we learn that: "By mid-1969 no cases of chronic loan defaulters from Z-plot holders had yet been referred to the Attorney General, although by the end of 1969, 158 recommendations for eviction of other settlers had gone to the Sifting Committee in Parliament with 84 evictions resulting" (Wasserman, 1976: 155-156 – quoted from Van de Laar, 1980: 173). Clearly, perverse equity effects result from the operation of a land market (with free mortgage) when it is combined with a biased legal system.

If anything, the situation has worsened in Kenya. Corruption is so widespread in the legal and judicial systems that registration does not offer serious protection to titleholders and that banks have nowadays stopped accepting land titles as collaterals. Testimonies abound to show that the power of money exceeds that of legality to vindicate claims to land. In other words, to protect access rights against deceitful claimants, the possession of a title is not sufficient: too often, it is the amount of the bribes offered to the judge which will decide which party is going to win the case irrespective of any legal supporting evidence (personal field observations).

Popular expression of anger and active opposition can also 'break the transmission' between registration and credit supply. This happens because, when people do not consider the new system of (land) rights as legitimate and do not accept the reshuffling of wealth it may imply, they may succeed, – especially in young nations with 'soft' states

as we find them in SubSaharan Africa –, in blocking the normal functioning of the legal system. Costs of foreclosure may then remain high. Thus, in Kenya again, lending authorities have had great difficulty foreclosing on land mortgages chiefly because "the presence of many kin around mortgaged land makes it politically unfeasible to auction the holdings of defaulters" (Shipton, 1988: 120). In urban peripheries, notes another study, "although some banks have accepted titled land as collateral and auctioned it off in cases of default, in some cases purchasers were not able to take occupation of the land for fear of reprisals" (Migot-Adholla *et al.*, 1991: 170).

Governments may not want to run counter to popular demonstrations of this kind lest their political basis or the fragile consensus on which their national policies rest should be undermined. In the case of Kenya's White Highlands repeopled with native farmers after the departure and compensation of European colonists (the land settlement schemes referred to above), the government was eventually compelled to restrain the use of land as collateral. The fact of the matter is that: "The cry of land hunger had fed the nationalist rebellion that had brought the government to power. To turn people off the lands that they had fought to capture would be to risk the wrath of the true believers in the nationalist revolution" (Bates, 1989: 74). The pressure on the government was all the stronger as the official opposition represented by a radical party (the KADU or Kenya African Democratic Union) lobbied intensively on the land issue (ibidem: 67-68).

In the above, it has been assumed that the land registration system itself works properly and that difficulties arise downstream from the central recording process. In fact, ineffective operation of this system resulting in the invalidity of the title documents may well

prevent any reduction of uncertainty and lowering of foreclosure costs. As has been emphasized with reference to several Asian countries by Feeny (1988) and to India by Wadhwa (1989), a major problem with cadastral surveys is that they are often incomplete and there is a lack of diligent record keeping of all intervening changes in land ownership. In the words of David Feeny, in virtually all sampled countries "the legal provisions 'exceeded' administrative practice in the degree of sophistication and precision of the land rights ... the transaction cost of establishing and operating the [registration] systems were considerable and much higher than the costs of enacting the enabling legislation" (Feeny, 1988: 295). The difficulties are obviously compounded when landholdings comprise numerous parcels which are often minuscule.

In SubSaharan Africa, where administrative capabilities are much less developed than in Asia, the problem is bound to be all the more serious, not a minor consideration when it is borne in mind that high costs are associated with registering land (site visits, land surveys, maps, registration proper,...). This is amply confirmed by available evidence. Even in a country like Senegal where land registration has been allowed, on a voluntary basis, only during a limited period of time and demanded by relatively few people, we are told that "the Senegalese bureaucracy is still processing registration claims that were filed in the two-year grace period granted by the 1964 National Domain Law" (Golan, 1990: 51). In Kenya and Uganda, successions and other transfers of title have gone largely unregistered, as a result of which land records hardly reflect the present day reality, thus destroying the utility of the record and possibly engendering new uncertainties (Doornbos, 1975: 68; Bruce, 1986: 58; Saul, 1988: 273; LTC, 1990: 4).

In the case of Kenya, Green does not hesitate to say that failure to maintain a valid record of successions and absence of updated records constitute one of the major disappointments of the land titling program (Green, 1987: 11). As for Shipton, he writes: "So the emergent land market is largely unregistered. It is likely to remain so. The government does not have the resources to monitor, let alone control, the many kinds of land exchanges that happen every season in the farm neighborhoods. By their very nature, these defy recording and classification: for the most part they are ad hoc, unnamed, individually tailored agreements in which land is only one of many mutually interchangeable goods;... the lines blur between loans, rentals, barter, swaps, and sales" (Shipton, 1988: 123).

To sum up, as a result of glaring failure to build up and update reliable land records, titles shown on the register are increasingly at variance with the facts of possession and use and considerable confusion is created over legal property rights. The impact of land registration is therefore undermined and, since credit agencies are not able to rely on titles as evidence of land ownership, the collateral effect fails to materialise. In Zambia, it is the very process of issuing titles that is disturbed by interventions from customary authorities. Thus, for example, the District Council in Mazabuka upholds traditional norms of prohibition "by refusing to relay title applications to the Lands Ministry in Lusaka, although they had no authority to withold them; applications would only be accepted for small, fenced-in tree gardens around the dwelling, not for agricultural fields" (Sjaastad, 1998: 250).

Besides difficulties in repossessing land collaterals and realising them in the market (or in getting titles issued), there are supply constraints arising from the strategy of credit-

givers. First, commercial banks and financial institutions are often reluctant to lend for land purchases because they are unwilling to tie up their capital, raised largely through short-term deposits, for long periods of time (Dorner and Saliba, 1981; Stringer, 1989). Moreover, bankers usually prefer lending against more reliable streams of income than those found in agriculture. Second, considerations of administrative costs may lead banks and other credit agencies to set a minimum size of loans which often exceeds the capital needs of smallholders (Barrows and Roth, 1989: 9), or to refuse to lend to them on the ground that their property is costly to dispose of in the event of foreclosure due to the tiny size of fragmented landholdings. Following titling, distribution of credit is thus likely to become more unequal and this is bound to affect farm income distribution.

The above analysis, it must be noted, suggests policy implications which widely differ from those usually associated with the standard economic theory of property rights. As a matter of fact, to the extent that land titling affects investment behaviour only through the credit-supply effect, it may be better to address the collateral problem directly (perhaps through the formation of informal co-operative borrowing groups) than to resolve it through expensive titling programs (Carter et al., 1994: 156). To avoid setting off unequalising processes, special attention ought to be lent to market access problems, particularly with respect to capital, that tend to hit smallholders who constitute the bulk of the farming population. On the other hand, if lack of credit use in agriculture also comes from the demand side as a result of various market and state failures, the most sensible thing to do for a government is to try to remove non-tenurial constraints with a view to freeing this demand (André and Platteau, 1998).

Land titling may increase insecurity

The process of adjudication and registration of full-fledged private property rights in land is susceptible of increasing insecurity for vulnerable categories of the population.

Two sources of increased uncertainty deserve special mention: the loss of derived rights at the expense of vulnerable categories, and the unfair assignment of rights to the powerful.

Loss of derived or secondary rights

The idea that land registration is grounded in an adjudication procedure that does nothing else than recognise and record accurately existing land rights is far too simplistic. In effect, if titling may reduce risk and transaction costs for some categories of people, it may simultaneously create new uncertainties for other categories which rely on customary or informal practices and rules to establish and safeguard their land claims (Atwood, 1990: 663-64). In other words, as the experience of Kenya reveals, sections of local populations face a serious risk of being denied legal recognition of their customary rights to land during the registration process (Green, 1987: 6, 22-23). This is especially true of women, pastoralists, hunter-gatherers, casted people, former slaves and serfs, people belonging to minority tribes, etc., who have traditionally enjoyed subsidiary or derived (usufruct) rights to land. As noted by Green, increased security for the registered owner usually the male head of household - "may mean greater insecurity for other users, who may after the reform use the land only at the sufferance of the owner" (ibidem: 26; see also Coldham, 1978; Bruce, 1986; 54; Bruce and Fortmann, 1989: 7; Mackenzie, 1993: 208-

Ultimately, if an equity problem arises, it is because traditional tenure rules and rights which determine access to land (and water

points) in such a way as to assure employment for the able and social security for the poor, the old and the disabled defy recording and classification. Put in another way, it is impossible to bring to the adjudication register all the multiple rights claimable under customary law (Barrows and Roth, 1989: 8). Given that the complex bundles of rights associated with given parcels are extremely hard to sort out (where one person's bundle of tenurial rights stops and where another's begins is often very difficult to determine) and that a landholding unit (such as the 'compound' in West African societies) is rarely under a single management rule (if only because women manage 'their' fields fairly independently), the cost entailed by a comprehensive registration would be prohibitively high, all the higher as the bureaucratic machinery is confronted by a considerable information gap. Such a machinery has indeed much less information and knowledge of land tenure history of rural communities than these communities themselves (Riddell et al., 1987: 30-31).

In fact, when customary group rights and community control are extinguished by a procedure of registration/titling, there is a transfer of transaction costs from local land authorities to the state and it is the inability of the state to bear them that explains the failure to adjudicate and register all rights existing under the customary system (Barrows and Roth, 1989: 21). It must also be added that traditional systems of land tenure involve a great deal of flexibility and recording all the adjustments implied would prove extremely difficult.

Unfair assignment of rights to the powerful In a social context dominated by huge differences in education levels and by differential access to the state administration, there is much to be feared that the adjudi-

cation/registration process will be manipulated by the elite in its favour. If the experience of Thailand can serve as any guide, then it indicates that such a fear is well justified: land records have been manipulated by powerful government officials so as to allow elites (individuals, families, or private companies) with a high level of political connections "to obtain ownership of land that, under the traditional system, would have been controlled by homesteading cultivators". Original occupants (especially when they belong to non-Thai minorities) found it difficult to protect their customary rights owing to "differential access of claimants in land disputes to the Thai bureaucracy" (Thomson et al., 1986: 413-14; see also Feeny, 1988: 286-287, 294-96). The same kind of difficulties, and the consequent fear of land registration on the part of dominated sections of the population, have been documented with respect to other Asian countries (see, e.g., Wadhwa, 1989; Viswanath, 1997, for India), and to Latin America and the Caribbean as well (Stanfield, 1990).

The situation is not different in SubSaharan Africa. During the colonial period already, in countries where lands could be immatriculated (such as those under French colonial rule), numerous malpractices have been observed which allowed powerful people (including bureaucrats, particularly land surveyors who are "prominent experts in land grabbing") to dominate land allocation procedures, especially inside or near urban areas. As for rural lands, the few people who took advantage of the registration system had often manipulated the law to expropriate collective rights for themselves (Bayart, 1989: 113; Golan, 1990: 19; Haugerud, 1983: 78; Mackenzie, 1993: 212). The case of Uganda where chiefs used (voluntary) land titling reform to snatch land (including communal grazing areas) away from the poor is wellknown (Doornbos, 1975; Noronha, 1985; see also Firmin-Sellers, 1996, for Ghana).

Contemporary evidence points in the same direction, as can be judged from the experience of the few countries where a land titling programme has been implemented; or from that of the numerous countries where registration of rural lands has been allowed during a transitory period accompanying a reform vesting bare ownership of all nonimmatriculated lands in the state; or, again, from the experience of countries where public lands form an important category in national land laws. In the first two cases, the experience is similar: clever, well-informed or powerful (and usually educated) individuals often successfully jockey to have parcels not previously theirs registered in their own name while the mass of rural people are generally unaware of the new land provisions or do not grasp the implications of registration. An extreme, almost caricatural illustration is provided by these few well-connected Kenyans who succeeded in having pasture lands registered in their own names on the ground that they would bring them into cultivation. In fact, as the experience soon revealed, their intent was not to exploit the land in question but just to use it as collateral in order to obtain loans from banks in Nairobi. Proceeds of these loans were used to finance children's university studies abroad and the plan was to shun repayment and let the land be foreclosed (personal communication of Okoth-Ogendo).

In Mauritania, good irrigated lands traditionally claimed by local Negro-African communities on the right bank of the Senegal river have been adjudicated to private owners with a view to encouraging their efficient exploitation. Yet, as things turned out, these lands were allotted to people of Moorish origin by an essentially Moorish administration and many of them were not actually

brought into cultivation (Leservoisier, 1994 : 181-84).

As for allocation of public lands, there are plenty of accounts showing that it is often politically manipulated. In Nigeria, just to take one example, under the cover of national development projects extensive land tracts "running to hundreds of hectares" have been granted (on a long-term basis) to 'political friends' even though this led to the dispossession of many villagers of their customary lands (Zubair, 1987: 133; see also Mugangu Matabaro, 1997, for Congo ex-Zaïre).

Given the high level of politicisation of wealth allocation in SubSaharan Africa and the highly unequal chances of getting access to strategic information or influencing bureaucratic and judiciary decision-making (see, for example, Sklar, 1979; Hyden, 1983; Berry, 1984; Young, 1986; Bayart, 1989), registration can therefore be said to supply a mechanism for transfer of wealth in favour of the educational, economic and political elite (Barrows and Roth, 1989: 8). Insofar as it encourages the assertion of greedy interests with powerful backing and is likely, wittingly or not, to reward cunning, titling opens up new possibilities of conflict and insecurity. This evolution can have disastrous consequences for vulnerable sections of the population if loss of land is followed by outright eviction.

A final remark is in order. If titling is not (fully) subsidised and a price is charged on landholders, the strategies of powerful individuals is all the more threatening as lack of access to credit and low wealth levels prevent smallholders from registering their land. Price of registration thus acting as an important rationing mechanism, smallholders are highly vulnerable to attempts by the elites to grab their (untitled) lands while, on the contrary, the latter can immediately

protect their own. In other words, titling increases tenure insecurity of the poor because it places a formidable weapon in the hands of the rich who have both better ability to pay the price of registration and superior knowledge of government bureaucracy and procedures (see, e.g., Roth, 1993: 318-19).

Land titling is neither a necessary nor a sufficient condition for land market activation Registration of land rights turns out to be neither a necessary nor a sufficient condition for land market activation. Let us begin by considering the second proposition before turning to the first one.

Titling is not a sufficient condition for land market activation

The main evidence here again comes from Kenya. As a matter of fact, it appears that, contrary to expectations, land sale transactions have not increased following the implementation of the titling program. Activation of the land market just occurred during the earliest stages of the reform because, in the knowledge of pending registration, the educated elite took advantage of the situation to acquire additional lands. Except for that peculiar set of circumstances, the majority of parcels, when they are transferred, continue to follow the path of customary channels (lending, gifts, inheritance or non-registered sales) among which inheritance stands foremost (Haugerud, 1983: 80; Collier, 1983: 156-58; Bruce, 1986: 56; Green, 1987: 13-18; Barrows and Roth, 1989: 10-11; Migot-Adholla et al., 1991: 160-164; Mackenzie, 1993: 200).

Supply considerations largely explain why land sale markets are thin in SubSaharan Africa, even in countries where land titles have been issued. Landholders are typically reluctant to sell their land, even when they get an employment outside the agricultural sector

and they reside in town. Land continues to be perceived as a crucial asset for the present and/or future subsistence of the family, all the more so as it is a secure form of holding wealth and a good hedge against inflation ("It is our bank and we will not part with it", said the member of a founding lineage in a village close to Matam, Senegal). That considerations of social insurance determine attitudes of deep attachment to land is understandable in a context of scarce alternative employment opportunities and risky labour markets. For many people working in urban areas, indeed, land serves both as an insurance against uncertain employment and against landlessness in the next generation of the family, and as a pension fund for their old days (Bruce, 1986: 56; Green, 1987: 27; Lawry, 1993:

Such social security considerations often underlie the apparent persistence of indigenous control over land transfers even when they are duly registered: thus, in Kenya, many owners of titled lands do not consider that they are entitled to transfer their lands outside the lineage or to make permanent transfers without having previously obtained the approval of their family or community. This is not always the case, however. It has thus happened (in Kenya) that "young, unemployed men sold land registered in their name, leaving their parents destitute" (Green, 1987:7), and that "poor peasants, given title to their land, promptly sold it, spent the cash and were soon left landless and cashless to" (The Economist, 21–27 January, 1995: 49).

It is precisely to prevent such decisions being made without sufficient consideration for their future consequences (that is, to prevent myopic behaviour on the part of thoughtless rightsholders) or for their immediate consequences for other family members (that is, to force selfish rightsholders to take account of externalities) that rural communities or family units require to be consulted beforehand. Such interference with the free play of market forces is justified in so far as these communities are ultimately responsible for the subsistence of their individual members, and will therefore be called upon to assist any member who has become destitute out of bad luck or wanton behaviour.

In the case of Kenya, this situation of a constrained land market is reinforced by the fact that District Land Control Boards in charge of approving land sales are frequently reluctant to permit transactions which would leave families (and their descendants) landless and destitute. That is why they insist that all adult members of the household (including women) of the title-holder are to be present at the hearing to indicate their agreement with the sale. The government has actually sanctioned this de facto situation since a presidential directive aimed at minimizing land disputes requires the agreement of family members in addition to that of the title-holder prior to any sale or use of land as collateral (Haugerud, 1983: 84; Mackenzie, 1993: 200; Pinckney and Kimuyu, 1994: 10).

In Zimbabwe, likewise, a proposal by a land tenure commission appointed by the government (October 1994) provides that individual farmers should be given the right to own their land, but their right to buy and sell it should be subject to the approval of the traditional village council (the *sabuku*) which in pre-colonial days used to be vested with the prerogative of allocating local lands (The Economist, 21–27 January 1995: 49).

There is a remarkable lesson to draw from the above: it is under the pressing need to prevent land disputes and family conflicts from multiplying too rapidly that the state has decided to retreat from the most radical interpretation of freehold tenure and to revert to some customary principles of land allocation. Contrary to predictions, central registration of land has not led to a reduction of land disputes but, if anything, to their exacerbation. Consequently, public authorities are well-advised to rely on decentralized, customary mechanisms of intra-family negotiation and dispute settlement.

Economic considerations are not the only rationale for keeping family land. Other, more symbolic motives that belong to a traditional realm of values also seem to play a role. In tribal societies, indeed, the collective identity of a people is narrowly tied with the ancestral land. Since its value is embedded in the social structure and history of a particular community (Riddell et al., 1987: 82-83), land represents far more than a mere input into an agricultural enterprise and it is impossible to abstract it from all the social, ritual, affective and political meanings associated with it. People continue to strongly adhere to the traditional ethical principle that land ought to belong to the 'sons of the village', to the members of the local community (most commonly defined by descent or adoption) whose families have been living on the land for several generations and have therefore developed ritualistic and strongly emotional identity links with it. This is all the more so as the ancestors' cult is still very much alive (ancestors are actually believed to continuously intervene in presentday human affairs) and is deeply rooted in the (corporate) land of the lineage (Caldwell and Caldwell, 1987: 415-17).

Reluctance to part with ancestral land is especially strong when it threatens to go to outsiders. Already during the colonial period, indigenous people felt it a sacred duty to protect family or clan property and to prevent ancestral land from passing into European hands³. Nowadays, the same attitude can still be largely observed and, as expected, the land market is more severely restricted where kinship ties are strongest, for example, more restricted in Kenya's former African reserve (where it operates mainly among members of the same ethnic group) than in the former white settled areas and in urban peripheries (Migot-Adholla et al., 1991: 169; Pinckney and Kimuyu, 1994: 15). What Zufferey has noted with reference to Botswana (Eastern Central District) still applies to many countries in SubSaharan Africa: "Owning land thus appears to confer to the local residents a sense of identity and membership in a specific social group in comparison with the bahaladi (foreigners) who are, in contrast, expected to apply for land" (Zufferey, 1986: 79).

Titling is not a necessary condition for land market activation

Under conditions of acute land scarcity, unmitigated by a sufficiently rapid development of land-saving technical innovations and new income-earning opportunities outside the agricultural sector, land sale transactions tend to multiply even when they are illegal and the land is not titled. This is all the more likely to happen if the customary order and its social security mechanisms are weak or have eroded under the pressure of individualistic tendencies encouraged by market development (including the individualisation of land tenure itself) (Baland and Platteau, 1996: 279-83). Desperation sales are then the mechanism

^{3.} Thus in Nigeria, 1922-23, the Egba asked through their chief that they be allowed by the British to mortgage their *urban* lands to foreign companies so as to be able to raise money from local European banks. Yet they were keen that such principle is not extended to *rural* lands because they felt it a sacred duty not to take any risk that their ancestral property will be lost to foreigners (Meek, 1949: 266-67).

through which the above-discussed shortage of voluntary supply is overcome and the land market is activated. A high incidence of migratory flows is another circumstance susceptible of activating land sale transactions.

Two recent studies, one by André and Platteau (1998) on western Rwanda and another one by Baland, Gaspart, Place, and Platteau (1999) on Central Uganda have thus shown a high incidence of informal land market transactions. In the village studied by the former authors, almost 30% of land parcels owned by local inhabitants (representing about the same proportion of total land owned) had been acquired through market purchases. The closure of the land frontier in Eastern Rwanda and of migration possibilities in both Uganda and Zaïre (causing reverse migration movements) combined with rapid population growth to suddenly cause an enormous amount of land hunger that was not counterbalanced by an expansion of nonagricultural employment opportunities. Increasing activity of the local land market triggered off by rising numbers of distress sales rapidly ensued.

As a matter of fact, the study found that, out of 247 recorded land sales, almost twothirds have been motivated by the need to finance emergency expenditures (food and medicine), to repay debts or to meet social exigencies. Especially worth singling out is the fact that in more than 30% of the cases it is the sheer need for survival that has forced the household to part with a fraction of its landholding. In addition, almost 17% of land sales have occurred because the household had to incur litigation expenses usually connected with land disputes or to pay various kinds of fees (including bribes paid to judges with a view to influencing court decisions). It is only in about one-third of the cases that land sale transactions can be presumed to have

fostered efficiency: parcels were thus sold due to bad location (usually an excessive distance from the owner's house), to the owner's desire to rationalise his property, or to reallocate his wealth (such as when he uses the sale proceeds to construct a new house, to finance a migratory move or schooling expenditures, etc).

It bears emphasis that the rapidly increasing activity of the land market took place in spite of its largely illegal character. Indeed, below a critical size of two hectares, land property is permitted to be neither alienated nor subdivided or fragmented (decree n° 09/76 of 1976, March 4, art. 3 and art. 82-83). From evidence provided in the paper, it is evident that all sales of land parcels are in violation of the law: local inhabitants are too poorly endowed in land to be allowed to part with some of it.

One important lesson from the above Rwandan story is that spontaneous individualisation of land rights, unassisted by any process of titling or registration at the state level, can be extremely effective in activating the land market even when land sales do actually violate the law. In this respect, it is quite revealing that land sale transactions were typically attested by written documents established in the presence of witnesses, thereby ensuring the validity of land transactions.

In Uganda, informal land sales are not illegal yet they are even more frequent than in Rwanda. In the area studied by Baland *et al.* (1999), 47% of the total land area owned by the sample households in 36 different villages have been purchased, a figure which is very close to the proportion of 45% found for the areas of Mpigi (Central Uganda) and Kabale (South Uganda) by Swallow *et al.* (1994). Uganda is apparently the African country with the highest rate of land market activity.

The above findings demonstrate that what

matters are *de facto* rather than *de jure* rights. In Kenya, exercising prerogatives formally attached to full-fledged private property rights guaranteed by legal titles would contravene important community norms that are embedded in the indigenous tenure system. In Rwanda and Uganda, by contrast, relentless population pressure and an history of much more individualised settlement patterns making for the absence of genuine community life have caused the land tenure system to evolve so radically that *de facto* private property rights have emerged even in the absence of state-led registration.

Note finally that it is probably wrong to think that the collateral effect can only occur if the land is duly titled. Evidence seems to show that informal land market transactions can be supported by written evidence sufficiently reliable to allow the use of land as collateral by local credit-givers. In Rwanda, for example, credit-cum-savings rotating associations known as tontines are able to seize on the land of a defaulting member (André and Platteau, 1998).

Limitations of the informal village order

The problem of inter-community relations
Reliance on local communities for allocating and enforcing land rights offers significant advantages. First, contrary to formal procedures such as land titling which are costly and impose definitive land rights, informal practices at village level are cheap (they economize on information costs) and flexible. Second, even though social differentiation is not to be underestimated, African village communities tend to provide social security

to all their members and to ensure that everybody can participate in new opportunities. Such considerations of social security and equity usually dominate pure efficiency concerns, which should be regarded as a positive contribution in a generally insecure economic environment (Lawry, 1993: 73). Third, contrary to a widespread view, informal tenure systems embedded in community life do not necessarily hamper the development of land markets and formal sanctioning of land rights does not necessarily stimulate such a development. And, fourth, enduring customary systems tend to receive remarkable consensus, in particular consensus on the normative order justifying land claims (Saul, 1993).

Rather than comprehensive land titling programmes, what Africa seems to require is therefore a pragmatic and gradualist approach that reinstitutionalises indigenous land tenure, promotes the adaptability of its existing arrangements, avoids a regimented tenure model, and relies as much as possible on informal procedures at local level (Bruce, 1986: 64-68; Atwood, 1990: 667; Migot-Adholla et al., 1991: 170-173)4. Hence the need to explore "community-based solutions to tenure insecurity and a 'state-facilitated' evolution of indigenous land tenure systems" (Bruce, 1993: 50-1). In other words, since reality shows that in SubSaharan Africa direct state intervention in land matters is better minimised - state intervention is indeed a major source of farmers' insecurity -, and that village systems are frequently able to evolve to meet new needs, one may conclude that indigenous land tenure arrangements still have a dominant role to play.

While emphasising a crucial role for

^{4.} Interestingly, the same conclusion was reached in a careful survey of the land situation in Latin America and the Caribbean (Stanfield, 1990).

African village communities, one should be wary of not falling into the snare of romanticism. These communities are not the kind of havens of peace and harmony that they are sometimes portrayed to be. Perhaps their most serious shortcoming consists of their parochial character which induces chauvinistic behaviours towards outsiders when land pressure begins to reach alarming levels. Here is a protective stance that contrasts with the well-documented attitude of openess and hospitality characterising indigenous communities under conditions of land abundance. Owing to fears aroused by impending scarcity, traditional displays of tolerance thus give way to crude and open manifestations of discrimination against strangers.

Original occupants may not hesitate to use violence to oppose the transfer of traditional family or communal lands to outsiders, committing acts of sabotage, looting, burning and theft on the property and crops of the new landholders. An extreme example of the excesses to which this opposition may lead is the so-called 'Manifesto of the Oppressed Negro-Mauritanian'. Written by an extremist group belonging to the black (haalpulaar) community of Mauritania, it is an aggressive reaction to the post-1983 introduction of private land rights conferred (by adjudication) upon stranger owners over irrigated lands located on the right bank of the Senegal river. In this manifesto, the Negro-Mauritanians are invited to use any conceivable means to prevent their customary lands from passing into the hands of the *Beydane* elite (of Moorish origin), that is, "to boycott, ban, kill if needed, all those who encourage the sale of land; destroy, burn the possessions of these strangers

who come to develop your lands while the land should belong to our villages" (quoted from Bayart, 1989: 82).

Since cultivators on both sides of the river belong to the same (haalpulaar) community⁵, and since some people residing on the left bank (that is, on the Senegalese side) used to cultivate lands located on the right bank (that is, on the Mauritanian side) over which they had customary access since generations, the transfer of lands on the right bank to Moorish owners was bound to create serious tensions between the two neighbouring countries. These tensions could not be contained and led to a war between Senegal and Mauritania in April 1989 (Leservoisier, 1994: Chap. 10; Maiga, 1995: 54-57).

It is also worth noting that, on the left bank, there is growing resentment and mounting opposition against transfers of land through 'illegal' sales - chiefs or other powerful individuals sell customary land without the consent of the community and unduly appropriate the proceeds - to rich purchasers. Opposition is especially directed at capitalists or civil servants from Dakar and at the well-to-do Moor elite which acceded to economic prosperity through its leadership role in the export oilseeds boom in the Sine-Saloum. It is easy to multiply examples of this kind. In the Peanut Basin itself, we learn that every year villagers "meet to trace the borders of the land and set the rules so that everyone bands together to keep the land in the village" (Golan, 1990: 15).

In Ghana, as the frontier land became gradually exhausted, indigenous (*Akan*) ideology began to reassert with vigour "the inalienable rights of the native custodians of the land, and the inalienable rights of individual usufruct" (Robertson, 1987: 77).

In Western Burkina Faso, local residents fear a flood of migrant settlers (mainly Moose) into their ancestral lands, but, so far, thanks to the strength of their traditional social structure (based on agnatic lineages), they have succeeded in effectively blocking further settlement on their territory (Saul, 1993: 81-2 and Laurent, 1995; see also Riddell *et al.*, 1987: 31 for Zaïre).

Land alienation to strangers, whether through sale transactions or state mandatory allocations, is not necessarily opposed by the use of open violence. Milder and more subtle forms of hostility such as malpractices of deceit, manipulations and double deals directed against strangers are frequent occurrences. In Kenya, for example, "farmers who have pledged their land titles as security for loans are sometimes tempted into selling their land to strangers without informing them of the charges on the land", which leaves them free to default on their loans if they wish (Shipton, 1988: 111). Also, some farmers sell their land to several (stranger) buyers at once or agree to sell "in the expectation that after they have collected their money, the sale will be ruled void by the local land control board and district registrar and they will succeed in evading repayment of the money paid by the buyer" (ibidem).

Evidently, such discriminatory postures of indigenous communities towards strangers entail both efficiency and equity costs. Efficiency costs arise from all the transaction costs and the ensuing land market imperfections that are created by distrust and opposition between indigenous and stranger farmers. As illustrated above, land may be prevented from accruing to the latter, whether through land sale, land rental, or land adjudication processes. To the extent that strangers are more performing than indigenous members of the host communities, efficiency losses will result. Sometimes,

resistance against allocation of land to strangers does not take place immediately but only after they have demonstrated their ability to manage land more successfully than the original residents. Thus, in the Zorgho region in Burkina Faso, some areas of suitable land were developed under the auspices of the PDLG (Projet de Développement Local du Ganzourgou) and granted to immigrant farmers who were interested in irrigated agriculture. Indigenous farmers preferred to continue their traditional rainfed agricultural practices and did not show any interest in new agricultural methods. Yet, when the land improvement scheme proved successful, indigenous farmers reacted by opportunistically claiming back what they consider as their own 'ancestral' lands and by demanding the expulsion of all stranger farmers (personal communication of Hubert Ouedraogo).

Equity costs are the direct result of the aforementioned fact that certain communities may retain surplus land for themselves (say, because they want to have reserve land available for future generations) while farmers from other communities may be land-hungry. A well-functioning land rental market might, of course, overcome such imbalances in land endowments, at least for a certain time period. None the less, the fear of losing ownership rights if land is thus rented out to stranger farmers may act as an impediment to rental contracts.

In the above circumstances where serious tensions develop between indigenous communities and immigrant groups as a result of growing actual or anticipated land scarcity, land markets may therefore be prevented from working in a satisfactory manner. Or, more exactly, land transactions may carry low transaction costs when made between people native of the resident community, yet entail considerable transaction costs as soon as the land deals involve

^{5.} The haalpulaar ('Toucouleur') community is a mix of Fulani and Serere ethnies.

strangers. The above-cited study by André and Platteau (1998) on Western Rwanda is probably a good illustration of this possibility. But the same cannot be said of the study on Central Uganda (Baland *et al.*, 1999) since many land transactions in this area actually enable immigrants to get access to land. A possible explanation for this situation is that, in Uganda compared with Rwanda, there exist relatively stable non-agricultural income opportunities, especially in urban areas, that help to alleviate land pressure and to induce a significant number of landholders to permanently migrate to these areas of alternative employment.

The other side of the dilemma

To sum up, when land becomes severely scarce and alternative income-earning opportunities are lacking, the customary system of land tenure, in spite of its undoubted evolutionary qualities, cannot be expected to work efficiently and equitably if inter-community or interregional dimensions are taken into account. This said, the important point to make is that there is no guarantee that a centralised process of registration and enforcement of land rights will prove more successful. Indeed, if the allocation of land is not deemed fair and legitimate by the indigenous communities, important transaction costs will in any event arise that impair the efficiency of land and other rural factor markets.

Such costs follow from the uncertainties created by a situation in which land rights granted to immigrant farmers (through formal adjudication or through state-enforced market transactions) are likely to be seriously disputed by a majority of local residents. Think, for example, of all the costs which the new, 'illegitimate' owners will have to bear in order to protect the land property they have acquired in violation of local customary

norms (perhaps as a result of land sales by a 'corrupt' land master or village chief). Such costs are of both a fixed and recurrent nature : thus, land and related property need to be not only enclosed and fenced but also constantly guarded against malignant interference. Furthermore, mounting social tensions in the countryside can give rise to serious labour market imperfections that may entail considerable efficiency costs at the level of the whole economy. This will happen if landless villagers, prompted by a desire to take revenge for the loss of their customary rights of access, decide to harm the interests of the new private owners, at least when these owners are strangers.

As wage labourers, they may be incited to indulge in labour-shirking and mismanagement of assets while, as sharecroppers, they will pilfer inputs, underreport output and overreport non-labour factor costs. These moral hazard problems can be controlled only through continuous and tight monitoring, thus increasing the effective cost of labour dramatically. To such problems, landowners may nevertheless respond by adopting capitalusing input combinations or labouraugmenting innovations so as to ease the problems of controlling hired labour and to avoid sharecropping their lands. From a social viewpoint, mechanization of the production process, when it is conceived as a means of breaking labour supervision constraints that would not have arisen under another land rights system, appears as unfortunate. It corresponds to input mixes that are ill-suited to the factor endowments of African societies since fixed capital in the form of sophisticated imported machinery will cause a serious drain on their scarce savings and foreign exchange

In Kenya, we are thus told that most of the new landless "do not appear to be moving into tenant or agricultural wage-labor roles, but leaving agriculture generally as the re maining farmers employ more labor-efficient methods" based upon mechanization (Bruce, 1986: 54; 1988: 44). Along the Senegal river in Mauritania, the new *Beydane* owners bring their good *waalo* (irrigable) lands under intensive (rice) cultivation through a system of owner cultivation assisted by labour-saving mechanical devices. Such a choice has been apparently motivated by the desire to overcome difficult supervisory problems in a social context dominated by tense intercommunity relations.

When land sale transactions (or other types of transfers) take place that run counter to traditional social norms, it cannot be taken for granted that the sum of transaction costs will decrease and that efficiency will improve. Incentive problems resulting from lack of legitimacy of the new land arrangements may create serious imperfections in the labour and land rental or sale markets with the effect of impeding the equalization of land-labour ratios across farms that allocative efficiency would dictate.

The way ahead

We are now able to conclude. Rural communities in SubSaharan Africa form living systems which have at their disposal many effective means to preempt or subvert any change ushered in from without which they do not like. Turning these communities around or opposing them in land matters is all the more difficult as tenure rights are embedded in socio-cultural systems that are not easily bypassed (they embody rules about virtually all aspects of social life, such as marriage, inheritance, homage and power, etc.). What is therefore needed is an approach

based on cooperation rather than confrontation⁶. This implies, whenever feasible, a strengthening of local capacities for management, information, and dispute settlement rather than imposing from above the mechanisms of a formal state legal system (Atwood, 1990: 667). In most cases, it also implies recognising the rights of original occupants to 'vacant' land located in their ancestral territories (Bassett, 1993a). Owing to the persisting influence of traditional concepts of corporate land ownership and identity, it is indeed a more effective strategy for the state to (skilfully) negotiate acceptable compromises with customary native communities if the objective is to open pockets of abundant land to stranger cultivators or to improve village lands that are not optimally exploited. Such compromises can, for example, lead indigenous communities to rent out land to outsiders in a peaceful atmosphere where their original rights are not disputed or subverted by the state. To prevent the kind of tragic situations mentioned above from arising, the issue of land rights must be squarely addressed and debated with the local community before a development scheme involving strangers is started.

This being said, when informal institutions and practices are no more reliable methods of adjudicating land rights and ensuring land tenure security, African governments may have to undertake a formal registration procedure. There are special circumstances where titling may thus be worthwhile, such as when indigenous tenure systems are absent or very weak; or when traditional lines of authority have been severed and loyalties to lineage and communal

^{6.} See the fascinating study by Bassett on Northern Ivory Coast where examples of the two attitudes can actually be found in the explosive context of Fulani sedentarisation (Bassett, 1993b: 143-49).

groups eroded (Migot-Adholla *et al.*, 1991: 170). Yet, even when uncertainties and tensions prevail that cannot be adequately reduced by local communities, – particularly with respect to inter-community relations –, or when local practices involve efficiency or equity costs deemed excessive, the government does not necessarily need to have recourse to the most costly solution. Thus, short of registration, it could lay down a number of basic, well-publicized principles aimed at validating certain kinds of land claims or transactions (Migot-Adholla *et al.*, 1991: 170; 1994a: 114-17).

As Martin Weitzman (1993) has pointed out in another context, conventional economic theory that draws on the property rights literature may be inadequate because it misses a critical dimension, namely the ability of groups or communities to solve potential conflicts internally, without having recourse to explicit legalistic rules of behaviour. Since such an ability depends to an important extent on the history or culture of the society concerned (an element of social life that cannot be easily changed), this literature can be blamed for a false pretention to universal applicability. In fact, when communities have a good problem-solving potential, as many experiences in Africa testify, trying to impose formal rules and procedures on them is counter-productive and involves a considerable waste of resources. However, one should add, there are various ways of cooperation between the state and the rural communities that could help remedy the most glaring failures of customary tenure systems when they become subject to strong pressures owing to rising land scarcity.

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