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Food Security:
A Post-modern Perspective
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FOOD SECURITY: A POST-MODERN PERSPECTIVE

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SUMMARY

The paper explores post-modern currents in food security. It identifies three main shifts in thinking about food security since the World Food Conference of 1974: from the global and the national to the household and the individual; from a food first perspective to a livelihood perspective; and from objective indicators to subjective perception. It finds these shifts to be consistent with post-modern thinking in other spheres. And it draws on the wider debate to recommend food security policy which eschews meta-narratives in favour of recognising diversity, providing households and individuals with choices which contribute to self-determination and autonomy. The current conventional wisdom on food security is reviewed and some post-modern amendments are suggested.

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FOOD SECURITY: A POST-MODERN PERSPECTIVE

1. INTRODUCTION¹

In the years since the World Food Conference of 1974, the concept of 'food security' has evolved, developed, multiplied and diversified. At the last count, there were close to two hundred different definitions of the term (Smith et al 1993). A suitable analogy is with a pool of genetic material, left quietly in a corner of the rain forest. One minute, we find a single, simple life form, the next, the forest floor is crawling with different species and the air is bright with the flash of multi-coloured wings. From its simple beginnings, food security has become, it seems, a cornucopia of ideas.

Some might feel that growth on these terms is unacceptable; that when a term is used in many different ways, or provides many different perspectives on reality, then its usefulness is limited. Would it be better to abandon 'food security' altogether and retreat to some more narrow and quantifiable indicator of well-being, like anthropometric status or household income?

On the contrary. I want to argue here that the multiple uses of the term 'food security' reflect the nature of the food problem as it is experienced by poor people themselves. Further, I want to suggest that in this kind of world the current of thinking labelled 'post-modernism' will be a helpful guide. I shall argue within a post-modern framework that understanding food security requires explicit recognition of complexity and diversity, and that it necessarily privileges the subjective perceptions of the food insecure themselves.

A policy conundrum follows, however. If food security is a complex objective, pursued with others (shelter, safety, health, self-esteem), in a world where individual households face diverse, complex and different livelihood opportunities, what role can policy possibly play? Can governments ever know enough to act? At first sight, post-modernism leads to *laissez-faire*, to a market-based neo-liberalism (Colclough and Manor 1991). Yet there may be alternatives, building for example on revealed preference and self-targeting. A new kind of food security policy may emerge.

2. SAMPLING THE CORNUCOPIA: FOOD SECURITY 1974-1994

The history of thinking about food security since the World Food Conference can be conceptualised as consisting of three important and overlapping paradigm shifts, which have brought theory and policy progressively closer to 'real' food insecurity (Hewitt de Alcantara 1993). The shifts are reflected in successive definitions of the term, of which thirty or so are listed as examples in Appendix 1. The three shifts are (a) from the global and the national to the household and the individual, (b) from a food first perspective to a livelihood perspective, and (c) from objective indicators to subjective perception.

2.1 FROM THE GLOBAL AND THE NATIONAL TO THE HOUSEHOLD AND THE INDIVIDUAL

Despite Henry Kissinger's famous aphorism about no child going hungry to bed, the World Food Conference of 1974 was born largely out of shock at the sharp rise in world food prices

¹ I acknowledge with thanks the comments of Robert Chambers, Susanna Davies, Anne Marie Goetz and Robin Mearns, as well as the participants in seminars on this topic at IDS, Sussex, and at Cornell. I remain responsible for all errors.

in the preceding two years and fear that the world food system was running out of control. Hence the emphasis in the final report on world food supply and prices and on the need to secure the system against risks, like those posed by the failure of the harvest in the USSR in 1972 (UN 1975). The first definition in Appendix 1 speaks clearly of these concerns, defining food security as the

'availability at all times of adequate world supplies of basic food-stuffs . . . , to sustain a steady expansion of food consumption . . . and to offset fluctuations in production and prices' (UN 1975)

A statement in these terms leads inexorably to a focus on supply, to concern with national self-sufficiency and to proposals for world food stocks or import stabilisation schemes. Indeed, these matters were the main initial concern of new institutions set up by the World Food Conference, like the World Food Council and the FAO Committee on Food Security; and were reflected in the early literature on food security (e.g. Valdes 1981). A practical outcome, in 1981, was the extension of the IMF Compensatory Financing Facility to cereals, as a way to help countries meet unexpected needs for food imports.

Those early concerns live on today in the preoccupation of many governments, African in particular, with national food self-sufficiency (Harsch 1992). Yet, it was clear from the outset that widespread hunger could and did co-exist with the presence of adequate food supply at the national and international level.

Amartya Sen (1981) has been credited with initiating the paradigm shift that moved this issue of access to food to centre-stage. However, the idea was already commonplace in nutrition planning and had been amply demonstrated in field studies (Joy 1973, Berg 1973, Levinson 1974, Kielman et al 1977). Sen's contribution, then, was to codify and theorise the access question, give it a new name, 'food entitlement', and demonstrate its relevance even in famine situations (Devereux 1993).

As a result of these efforts, it has been impossible since the early 1980s to speak credibly of food security as being a problem of food supply, without at least making reference to the importance of access and entitlement. In practice, it has been more usual to define food security as being first and foremost a problem of access to food, with food production at best a route to entitlement, either directly for food producers or indirectly by driving market prices down for consumers.

The shift from macro to micro has been reflected in policy initiatives, especially at international level: from the wider concept of food security adopted by FAO in 1983 (Huddleston 1990), to the Bellagio and Cairo Declarations of 1989 and the International Conference on Nutrition in 1992 (FAO/WHO 1992): all these emphasise access to food as the defining characteristic of food security.

Ambiguities remain, however, particularly about whether the unit of analysis should be the individual or the household. While one school of thought has focused on the household as the unit of analysis for food security (Sahn 1989, Swift 1989, Eide 1990, Frankenberger and Goldstein 1990, Jonsson and Toole 1991), another has placed intra-household power and resource-allocation issues in the front line of analysis and focused instead on individual food security (Reutlinger 1985, Gittinger et al 1990). The first school certainly recognises the importance of intra-household issues: indeed, its concern is often specifically with mother and child health. However, the difference lies in whether intra-household issues are treated as

within the domain of food security or as more appropriate to a discussion of caring capacity and health conditions (Jonsson and Toole *ibid*).

Recent research favours the view that access to food by individuals in a household is pervasively linked to the control they have over household resources and the access they have to household income (Hart 1986, Evans 1991, Kabeer 1991). The implications for food security can be substantial: in urban Brazil, for example, unearned income has twenty times the effect on child survival if it is controlled by mothers (Thomas 1991).

Following this logic, most current definitions of food security begin with individual entitlement, though recognising the complex inter-linkages between the individual, the household, the community, the nation and the international economy. Thus, the most-cited definition of food security is taken from a World Bank policy study, published in 1986:

'Food security is access by all people at all times to enough food for an active, healthy life' (World Bank 1986:1)

Here the stress is on individual access, in all seasons and all years; and to enough food not just for survival, but for active participation in society. This definition is very different to the one which emanated a decade earlier from the World Food Conference.

2.2 FROM A FOOD FIRST PERSPECTIVE TO A LIVELIHOOD PERSPECTIVE

The second paradigm shift is from a food first perspective to a livelihood perspective, and beyond that to a preoccupation with the long-term resilience of livelihoods. Whereas the first shift took place largely in the period 1975-1985, the second shift took place mainly after 1985, stimulated by observation of the African famine of 1984/85.

The conventional view of food security was of food as a primary need, a lower-order need in Maslow's (1954) hierarchy of needs. The view was well-expressed by Hopkins, who argued that

'food security stands as a fundamental need, basic to all human needs and the organisation of social life. Access to necessary nutrients is fundamental, not only to life *per se*, but also to stable and enduring social order.' (Hopkins 1986:4)

In recent years, however, the assumptions underlying this view have been questioned. It has been recognised that food, especially short-term nutritional intake, is only one of the objectives people pursue. Thus, de Waal (1989) found in the 1984/85 famine in Darfur, Sudan, that people chose to go hungry to preserve assets and future livelihood: 'people are quite prepared to put up with considerable degrees of hunger, in order to preserve seed for planting, cultivate their own fields or avoid having to sell an animal' (de Waal 1991:68). Furthermore, 'avoiding hunger is not a policy priority for rural people faced with famine' (*ibid.*). Others have similar findings, particularly in the context of analysing the sequence of coping or adaptive strategies people follow in times of drought (Corbett 1988, Frankenberger and Goldstein 1990, Davies 1993).

In part, these findings reflect an issue of time preference: people going hungry now, in order to avoid going (more) hungry later. However, there is a broader issue of livelihood at stake, in

which objectives other than nutritional adequacy are pursued (Chambers 1988:1, Davies forthcoming).

Time preference remains important, nevertheless: not just livelihood, but secure and sustainable livelihood (Chambers *ibid.*). In this connection, Oshaug has argued that

'a society which can be said to enjoy food security is not only one which has reached (a) food norm, . . . but which has also developed the internal structures that will enable it to sustain the norm in the face of crises threatening to lower the achieved level of food consumption.' (Oshaug 1985:5-13).

Oshaug identified three kinds of households, 'enduring households', which maintain household food security on a continuous basis, 'resilient households', which suffer shocks but recover quickly and 'fragile households', which become increasingly insecure in response to shocks. Similar approaches are found elsewhere (Benson, Clay and Green 1986, Barraclough and Utting 1987) and have recently been extended with the addition of 'sensitivity', a measure of the extent of change following a shock (Blaikie and Brookfield 1987, Bayliss-Smith 1991): the interaction between resilience and sensitivity provides a strong framework for the analysis of food insecurity over time, with the most food insecure households characterised by high sensitivity and low resilience (Swift 1989, Davies forthcoming).

The upshot of these ideas is a view of food security which identifies livelihood security as a necessary and often sufficient condition for food security (Maxwell 1988 and 1991:22) and which focuses on the long term viability of the household as a productive and reproductive unit (Frankenberger and Goldstein 1990).

2.3 FROM OBJECTIVE INDICATORS TO SUBJECTIVE PERCEPTION

The third shift is from an objective to a subjective approach. In the poverty literature, there has been a long-standing distinction between 'the conditions of deprivation', referring to objective analysis, and 'feelings of deprivation', related to the subjective (Townsend 1974), and this has been picked up in the literature on rural poverty. Kabeer (1988), for example, identifies lack of self-esteem as an element of poverty, and Chambers (1989) talks similarly of self-respect. In the food security discussion, the paradigm shift is more recent².

Conventional approaches to food security have relied on objective measurement: 'target' levels of consumption (Siamwalla and Valdes 1980); consumption of less than 80% of WHO average required daily calorie intake (Reardon and Matlon 1989); or, more generally, a timely, reliable and nutritionally adequate supply of food (Staatz 1990). Definitions couched in these terms present problems, for two main reasons.

First, the notion of nutritional adequacy is itself problematic. For any individual, nutritional requirement is a function of age, health, size, workload, environment and behaviour (Payne and Lipton 1994). Estimates of calorie requirements for average adults and children with average activity patterns in average years are subject to constant revision (Payne 1990). Adding adaptation strategies complicates the calculation (Payne and Lipton *ibid.*). Estimating precise calorie needs for different groups in the population is therefore difficult. Indeed, in a

² Sen (1981) acknowledges the power of subjective analysis, but concentrates on objective entitlements.

strong statement on this subject, Pacey and Payne have concluded that all estimates of nutritional requirements have to be treated as value judgements:

'Something which is specifically excluded . . . is the notion of an 'optimum' state of nutritional health, achievement of which might be the criterion for a requirement level . . . Any views of 'desirable' or 'optimal' food intakes for human individuals or groups can only be value judgements.' (Pacey and Payne 1985:70-1)

If this is true, questions arise about who is to make the value judgements for individuals, households, communities or nations - a parallel discussion to the question asked in participatory research, 'Whose Knowledge Counts?' (Chambers 1979). There must be a predisposition to believe that the judgement of the food insecure themselves is to be weighted disproportionately in this process.

A second problem arises because qualitative aspects are omitted from the kind of quantitative measures listed earlier. The issues include technical food quality (EC 1988, Bryceson 1990), but also consistency with local food habits (Oomen 1988), cultural acceptability and human dignity (Oshaug 1985, Eide et al 1985, 1986), even autonomy and self-determination (Barraclough and Utting, 1987, Barraclough 1991). The implication is that nutritional adequacy is a necessary but not sufficient condition for food security.

These ideas suggest that it is not just the quantity of food entitlement that matters, but also the 'quality' of entitlement. Measurement questions again arise: how are the different aspects to be measured and weighted? Are there trade-offs between them? And who decides?

Problems of this kind have led some observers to stress the subjective dimension of food security. Thus, Maxwell defines food security as follows:

'A country and people are food secure when their food system operates in such a way as to *remove the fear that there will not be enough to eat*. In particular, food security will be achieved when the poor and vulnerable, particularly women and children and those living in marginal areas, have secure access to *the food they want*' (Maxwell 1988:10, emphasis added).

The emphasis here on subjective assessment is only beginning to be seen in data collection and evaluation (Frankenberger 1992:96ff). However, questions about perceptions of food problems have been asked in the Indian National Sample Survey, and research in the US has attempted to develop indicators for subjective aspects of food insecurity, including lack of choice, feelings of deprivation and food acquisition in socially unacceptable ways (Radimer et al 1992). It is notable that the latter draws attention specifically to the diversity of coping strategies, which 'may be so great that it is questionable whether or not the universe of the tactics could be included in a questionnaire' (ibid:42-3S).

The aggregate effect of the three paradigm shifts is a significant change in the food security agenda since the mid-1970s. Instead of a discussion largely concerned with national food supply and price, we find a discussion concerned with the complexities of livelihood strategies in difficult and uncertain environments; and with understanding how people themselves respond to perceived risks and uncertainties. The new agenda suggests some conclusions about the treatment of food security in the 1990s:

'flexibility, adaptability, diversification and resilience are key words. Perceptions matter. Intra-household issues are central. Importantly, ... food security must be treated as a multi-objective phenomenon, where the identification and weighting of objectives can only be decided by the food insecure themselves.' (Maxwell and Smith 1992:4)

3. SOME POST-MODERN CONNECTIONS

Before turning to a discussion of policy implications, it is worth pausing to observe that the conclusions we have reached on the current conceptual state of food security have a familiar ring. The emphasis on flexibility, diversity and the perceptions of the people concerned are themes found also in rural development (Chambers 1983, 1993, Rondinelli 1983), industrial development (Rasmussen et al [eds] 1992), public administration (Murray 1992) and planning (Field 1987, Maxwell 1990).

More generally, these are also the themes of post-modernism. This is interesting not just because post-modernism apparently 'haunts social science today' (Rosenau 1992:3), but also because it enables new connections to be made.

Rosenau's ghostly metaphor is apt. Post-modernism is ubiquitous, in art, in architecture, in literature, in philosophy; but is notoriously difficult to define and delimit. The usual starting point is with the modernism that post-modernism rejects and particularly with the so-called 'Enlightenment project': the idea, born in the eighteenth century, that rational thought, the scientific domination of nature and new, scientific forms of social organisation would banish backwardness and emancipate humankind (Harvey 1989:42ff, Schuurman 1993:23). The scientific method, with its emphasis on testing hypotheses, is characteristic of modernism (Skinner 1985). By analogy, architects and town planners like Le Corbusier were modernist, with their emphasis on building 'machines for living'; so were industrialists like Henry Ford, developing a mechanised and routinised production line; and so, indeed, were many planners of the 1950's and onwards, with their emphasis on top-down planning and systems approaches.

Post-modernists find philosophical and pragmatic reasons to reject this approach. They doubt the relevance of positivist, scientific methods of enquiry in the social arena and turn instead to subjective interpretation, a suspicion of empirical testing, a preoccupation with discourse and language and a prejudice in favour of local knowledge (Sayer 1992:1). They are especially suspicious of global world views or 'meta-narratives', which purport, like natural laws, to explain social behaviour across time and space (Rosenau *ibid*:6). Their focus instead is on diversity (Booth 1993). By analogy again, the architecture of post-modernism favours the re-creation of small, informal communities (Harvey *ibid*.); the industrial model is of Japanese-style flexible specialisation; and the planning model is bottom-up, participative and decentralised. The art form of post-modernism is collage, which imposes no rules, but borrows insights or images pragmatically from wherever seems appropriate (Harvey *ibid*.). The key thinkers in post-modernism are Derrida, Foucault, Habermass and Kuhn (Skinner *ibid*.); the key words are deconstruction, indeterminacy, diversity, interpretation.

Thus, we find in post-modernism a challenge to many accepted ways of seeing the world and trying to understand it:

'Post-modernists rearrange the whole social science enterprise. Those of a modern conviction seek to isolate elements, specify relationships and formulate

a synthesis; post-modernists do the opposite. They offer indeterminacy rather than determinism, diversity rather than unity, difference rather than synthesis, complexity rather than simplification. They look to the unique rather than causality, and to the unrepeatable rather than the re-occurring, the habitual or the routine.' (Rosenau *ibid*:8)

This quotation certainly echoes the debate on food security, and has resonance more widely in development. Figure 1 represents some current tensions in development in terms of the modern-post-modern dichotomy. When the debate is cast in this light, it can be seen that the paradigm shifts that have affected thinking about food security provide an illuminating case study of post-modern development thinking. In particular, the contemporary food security preoccupation with local perceptions, knowledge and strategies, as well as the use of participatory research methods, are characteristically post-modern.

FIGURE 1

MODERN AND POST-MODERN CURRENTS IN DEVELOPMENT

	Modern	Post-Modern
Underlying reality	Simple, uniform	Complex, diverse
Objectives	Growth Preoccupation with macro	Development Preoccupation with micro
Research approach	Measure Survey Reductionist Deduction Abstract models Aggregate	Listen Participatory Rural Appraisal Holistic Induction Complex reality Disaggregate
Planning approach	Plan Model Top-down Centralise	Enable Interact Bottom-up Decentralise
Implementation	Blue-print Role culture Standardisation	Process Task culture Flexibility, Innovation

4. IMPLICATIONS FOR POLICY

One of the most popular words in the lexicon of post-modernism is 'deconstruction', defined as 'tearing a text apart, revealing its contradictions and assumptions' (Rosenau *ibid*:xi). One of the objectives here has been to deconstruct the term 'food security'. However, in so doing, a new construction has been proposed, a distinctively post-modern view of food security. The ice is admittedly very thin. Post-Modern thinking rejects the privileging of one interpretation over another and does not much approve of new constructions:

'the cultural producer merely creates raw materials (fragments and elements), leaving it open to consumers to recombine those elements in any way they wish. The effect is to break (deconstruct) the power of the author to impose meanings or offer a continuous narrative' (Harvey *ibid*:51).

Given disclaimers of this kind, it is not surprising that post-modernists are congenitally bad at policy. And at first sight, the terrain is unpromising, at least in terms of food security. In the extreme case, there are no aggregations, no 'recommendation domains', in which individuals or households share common characteristics and behave in similar ways (Byerlee et al 1980). Instead, we find a heterogeneous mass of individuals, each with different physiological needs, qualitative priorities and livelihood strategies. However, on closer examination, and contrary to expectations, a post modern perspective does suggest new entry points.

A predictable option for a post-modernist would be to abdicate responsibility and let markets allocate resources. This is an extreme form of neo-liberalism, in which the potential for state action is denied *a priori*. Some writers of a post-modern persuasion have come close to this position, arguing, for example, that state intervention often harms or hampers the poor in their effort to diversify and manage risk (Chambers 1991). Others have argued that responsibility for intervention should lie, not, or not just, with government, but also with communities, for example by strengthening the 'moral economy' (Swift 1993).

At best, however, this position must be seen as incomplete - and would be seen as such by the authors cited. In the field of poverty reduction, analogous to food security, it has been argued that the state has:

'a key, enabling role to play ...: by generating information about the causes, extent and severity of poverty; by providing a peaceful environment in which poor people and poor communities can pursue their livelihood strategies; by ensuring that the poor have access to physical, social and economic infrastructure; by providing a safety net beneath standards of consumption and social welfare; and, in general, through good governance' (Lipton and Maxwell 1992:7)

Similar principles apply to food security. In particular, states routinely and rightly assume responsibility for providing a minimum social protection and food security safety net, especially in times of drought or other disaster. Additionally, they intervene to a greater or lesser extent to tackle chronic malnutrition, especially among children. Most observers think the state should also act to respect, protect and fulfil the human right to food (Tomasevski 1984, Eide 1989, Eide et al 1991).

An alternative approach, therefore, is to ask what room for manoeuvre exists for policy within a post-modern paradigm. Three principles immediately suggest themselves.

First, the post-modern view would suggest that there will be no over-arching theory, applicable to all situations: no 'meta-narratives' about food security. Policy will need instead to recognise the diversity of food security situations and strategies, and be contingent on particular circumstances. The principle of 'horses for courses' has an appropriate post-modern resonance.

Secondly, post-modern food security policy will give priority to, or 'privilege' in the jargon, the livelihoods of individuals and communities, drawing *inter alia* on the principles of 'design' (not 'planning') at a community scale (Harvey 1989:66ff). It will give priority to providing households and individuals with choices which contribute to self-determination and autonomy in developing of livelihood strategies.

Thirdly, and in pursuit of the above, there will be good ideas to borrow from many different fields, applying to policy the principles of collage: from Participatory Rural Appraisal, ideas about building on people's own perceptions and priorities (Chambers 1992); from industrial development, ideas about flexibility and embracing change; from rural development, the idea of 'process planning' rather than 'blue-print planning', with its emphasis on organic growth rather than the implementation of a master plan, from public administration, ideas about 'open', user-centred and decentralised administrative systems, what Murray (1992:86) calls the 'fractal state'. A post-modern building may display architectural allusions to many different periods: a post-modern food security policy should be similarly eclectic in its search for inspiration.

These principles have practical implications and can be used to challenge or extend the conventional wisdom on food security. Acknowledging the risk of falling into the trap of meta-narrative, Figure 2 presents a stylised summary of the conventional wisdom, in the form of a ten-point action plan for food security in Africa. This already contains many post-modern elements, which should not be surprising, given the trajectory of food security since the 1970s: the emphasis on 'livelihoods' rather than 'jobs', the priority given to diversification, strict limits to state intervention, for example on food marketing; reinforcement of the role of community, especially in providing social security safety nets; and explicit support for bottom-up, participatory and organic planning and implementation.

At the same time, there are areas where the conventional wisdom can be extended. First, it needs to be said more explicitly that programmatic recommendations need to be adjusted to particular circumstances. Factors include the character of food insecurity, state capacity and political circumstances (Buchanan-Smith and Maxwell 1994): what is possible in Botswana, which is peaceful, stable and relatively rich, is very different to what might be done in Southern Sudan, which has none of those characteristics.

Secondly, it would be useful for the manifesto to be more robust about the importance of diversity. It already points to the value of diversification, to reduce risk. It could go further to encompass also ideas about the complexity of livelihood and coping strategies. One option here is explicitly to increase choice and maximise the likelihood of impact, by encouraging a diversity of programme alternatives. For example, some households could benefit from food for work during a drought, but others might prefer subsidised credit, or assistance with migration to seek work. It should not be expected that there will be a single 'best' solution to a highly heterogeneous set of problems. Dreze and Sen (1989:102) make this point, arguing for an 'adequate plurality' of responses. Participatory Rural (and urban) Appraisal can be a powerful tool to help identify appropriate interventions.

Thirdly, and by the same token, the programme does not go far enough in addressing the problem of targeting, which is recommended mainly as a way to reduce costs. In fact, both the food security literature and the wider post-modern perspective suggest that it is very difficult to collect enough information successfully to carry out administrative targeting: the diversity of coping strategies is just too large. A more suitable approach may then be to set up schemes which encourage 'self-targeting', in which people themselves select which interventions most suit them at a particular time. A common example is to replace administrative targeting of food for work with open-access schemes, where wages are set slightly below market levels and people participate or not as they see fit: cheaper to administer, certainly, but also more flexible and, in principle, giving participants more autonomy.

Figure 2

Food Security in Africa: A Consensus Strategy

1. A primary focus on supplying vulnerable people and households with secure access to food: individual and household needs take precedence over issues of national food self-sufficiency or self-reliance.
2. The overwhelming necessity for peace and physical security, given that war is the single greatest cause of famine in Africa.
3. The importance of economic growth: poor rural and urban people need secure and sustainable livelihoods, with adequate incomes and reasonable buffers against destitution; poor nations need buoyant economies and adequate foreign earnings, in order to provide jobs, acquire agricultural inputs and, where necessary, purchase food.
4. Within agriculture, growth strategies are needed which lay particular emphasis on generating jobs and incomes for the poorest groups, including those in resource-poor and environmentally degraded areas. Agriculture and rural development strategies should usually favour labour-intensity, though recognising that some groups, especially female-headed households, may be short of labour and require more capital to increase productivity.
5. A balance between food and cash crops is the best route to food security, following the principle of long term comparative advantage rather than of self-sufficiency for its own sake. However, the potential income gains from cash cropping should not be sought at the expense of measures to reduce risk, through diversification; and policies are required which maximise the benefit of cash-cropping to the poor.
6. Efficient food marketing is needed, to store and distribute food, at reasonable prices, to all parts of the country in all seasons and in all years. In the long term, the private sector may acquire and redistribute food surpluses over time and space, efficiently, competitively and without excess profit. However, the state retains a key role, as catalyst of the private sector, as buyer and seller of last resort and as controller of relief buffer stocks.
7. More effective and efficient safety nets need to be established, by strengthening community institutions, introducing new targeted food and nutrition interventions, and improving famine preparedness and response, especially at the local level. Improved targeting can limit the cost of these social security interventions, especially where the target group is small relative to the population and where administrative costs can be contained, for example by geographical or self-targeting approaches.
8. Famine preparedness is a critical need in many countries, involving not just early warning, which is often adequate, but also improved capacity to respond. Possible measures include early decisions of when to import food, small, locally-based stocks of food for relief distribution, relief works that can be activated quickly, special programmes for vulnerable group feeding, early water and health interventions, and special programmes for rehabilitation.
9. Strong international support will be essential, through a more favourable trading environment, debt relief and greater and better-focused aid flows. Food aid can play an important part, but needs to be integrated more closely with financial aid and linked more closely to food security efforts, for example by better management of counterpart funds.
10. Finally, food security planning should follow a 'process' rather than a 'blueprint' approach, with large-scale decentralisation, a bias to action over planning, the encouragement of risk-taking and innovation, and the fostering of task cultures not role cultures in multi-disciplinary and multi-sectoral planning teams.

Sources: World Bank 1988, Dreze and Sen 1989, Huddleston 1990, Maxwell 1992, von Braun et al 1992.

Finally, food security has much to learn from recent advances in thinking about public administration, often based on developments in the management of business organisations, and sometimes explicitly described as post-modern in character (Murray 1992:83). Going beyond process planning as a model, Murray (ibid) discusses how to turn public sector administrations into 'open systems', characterised by new forms of relationship with clients, greater public accountability, more decentralisation, much greater organisational flexibility and greater individual commitment. There are many lessons here for food security institutions, perhaps especially those engaged in top-down and resource-intensive relief programmes.

5. CONCLUSION

The changes identified to the current conventional wisdom on food security do not require a major re-write, to make the recommendations more post-modern in character. This is because, as the paper has shown, thinking about food security has itself evolved in ways consistent with a post-modern paradigm. Nevertheless, the changes sharpen programmatic policy and make it more relevant. They demonstrate the value of relating food security, not just to other topics in development, but to a wider philosophical and cultural current. Post-modernism seems to offer a number of core ideas which are relevant across the development field and certainly extend thinking on food security.

At the same time, a post-modern perspective proves useful in policy. This is a surprise and challenges the reluctance of many post-modernists to progress beyond deconstruction and take responsibility for reconstruction. With the notions of diversity, complexity and flexibility at its heart, current policy on food security conforms both to post-modern concerns with indeterminacy and to the practitioner's imperative that 'something must be done'.

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Appendix

Definitions of food security and insecurity, 1975-1991

1. 'Availability at all times of adequate world supplies of basic food-stuffs . . . , to sustain a steady expansion of food consumption . . . and to offset fluctuations in production and prices' (UN 1975)
2. 'A condition in which the probability of a country's citizens falling below a minimal level of food consumption is low' (Reutlinger and Knapp 1980)
3. 'The ability to meet target levels of consumption on a yearly basis' (Siamwalla and Valdes 1980)
4. 'Everyone has enough to eat at any time - enough for life, health and growth of the young, and for productive effort' (Kracht 1981)
5. 'The certain ability to finance needed imports to meet immediate targets for consumption levels' (Valdes and Konandreas 1981)
6. 'Freedom from food deprivation for all of the world's people all of the time' (Reutlinger 1982)
7. 'Ensuring that all people at all times have both physical and economic access to the basic food they need' (FAO 1983)
8. 'The stabilisation of access, or of proportionate shortfalls in access, to calories by a population' (Heald and Lipton 1984)
9. 'A basket of food, nutritionally adequate, culturally acceptable, procured in keeping with human dignity and enduring over time' (Oshaug 1985 in Eide et al 1985)
10. 'Access by all people at all times to enough food for an active and healthy life' (Reutlinger 1985)
11. 'Access by all people at all times to enough food for an active, healthy life' (World Bank 1986)
12. 'Always having enough to eat' (Zipperer 1987)
13. 'An assured supply and distribution of food for all social groups and individuals adequate in quality and quantity to meet their nutritional needs' (Barraclough and Utting 1987)
14. 'Both physical and economic access to food for all citizens over both the short and the long run' (Falcon et al 1987)
15. 'A country and people are food secure when their food system operates efficiently in such a way as to remove the fear that there will not be enough to eat' (Maxwell 1988)
16. 'Adequate food available to all people on a regular basis' (UN World Food Council 1988)

17. 'Adequate access to enough food to supply the energy needed for all family members to live healthy, active and productive lives' (Sahn 1989)
18. 'Consumption of less than 80% of WHO average required daily caloric intake' (Reardon and Matlon 1989)
19. 'The ability . . . to satisfy adequately food consumption needs for a normal and healthy life at all times' (Sarris 1989)
20. 'Access to adequate food by and for households over time' (Eide 1990)
21. 'Food insecurity exists when members of a household have an inadequate diet for part or all of the year or face the possibility of an inadequate diet in the future' (Phillips and Taylor 1990)
22. 'The ability . . . to assure, on a long term basis, that the food system provides the total population access to a timely, reliable and nutritionally adequate supply of food' (Staatz 1990)
23. 'The absence of hunger and malnutrition' (Kennes 1990)
24. 'The assurance of food to meet needs throughout every season of the year' (UNICEF 1990)
25. 'The inability . . . to purchase sufficient quantities of food from existing supplies' (Mellor 1990)
26. 'The self-perceived ability of household members to provision themselves with adequate food through whatever means' (Gillespie and Mason 1991)
27. '(Low) risk of on-going lack of access by people to the food they need to lead healthy lives' (Von Braun 1991)
28. 'A situation in which all individuals in a population possess the resources to assure access to enough food for an active and healthy life' (Weber and Jayne 1991)
29. 'Access to food, adequate in quantity and quality, to fulfil all nutritional requirements for all household members throughout the year' (Jonsson and Toole 1991)
30. 'Access to the food needed for a healthy life for all its members and . . . not at undue risk of losing such access' (ACC/SCN 1991)
31. 'Enough food available to ensure a minimum necessary intake by all members' (Alamgir and Arora 1991)
32. 'The viability of the household as a productive and reproductive unit (not) threatened by food shortage' (Frankenberger and Goldstein 1991)



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