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Wages and Employment
in Less-Developed Countries

by

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WAGES AND EMPLOYMENT IN LESS-DEVELOPED COUNTRIES

Concern over employment trends and unemployment prospects has led to new interest in wage issues in less developed countries. Until very recently the development literature had little to say about these issues, as a glance at the standard textbooks indicates. General and abstract questions bearing on wages have been debated extensively, in the shadow pricing and unlimited-supply-of-labor model discussions, for example. But of policy analysis there is very little. And more important, there exists an astonishing void on the empirical side. Even in that large body of writing on inflation in Latin America, where wages frequently occupy a central role in explaining the inflationary process, detailed studies of actual wage behaviour are very sparse. It is symbolic that 15 years after the original Lewis article on unlimited supply of labor, one still sees articles dedicated to showing why wage rates should or should not rise as development proceeds in a labor surplus two sector model, all without reference to empirical evidence. Since practically nobody has bothered to study what has actually been happening to wages in LDCs, this is not so surprising.

Aside from suggesting that there are occasional peculiarities in the preoccupations of economists, what this means is that the empirical basis for generalizing about actual wage behaviour in LDCs is exceedingly slender. This is true not only of wage employment relationships, but of virtually all wage-related problems. And "empirical" in this sense does not mean only the derivation of regression coefficients, but also the definition and description of even more basic matters such as labor market structure and the mechanics of wage determination.

In this paper I will look at wages in the context of the overall employment problem in LDCs. The goal is limited: to sort out those aspects of wage-employment relationships which appear to merit major concern, from those in which wages are or seem to be of marginal importance, and to explore some of the policy implications that emerge from the analysis. The usual *caveats* about sweeping discussions of this kind are in order. Differences in LDC environments and experience are vast, and our knowledge of what has been happening in the wages area is sparce, uncertain, sometimes contradictory. One set of environmental differences is especially difficult to bridge with easy generalization: that existing between the more advanced Latin American countries and the rest of the LDCs. The differences are typified by the great disparity in distribution of population between agricultural and non-agricultural sectors; in countries like Argentina, Chile, Uruguay and a few others we are dealing with, societies which are only one-third agricultural, while the rest of the world is two-thirds or more agricultural. There are other important differences, not only between the advanced countries of Latin America and the rest of the LDCs, but within the rest of the LDCs too — differences in agricultural organization, man-physical resource relationships, degrees of urban concentration, for example — which make generalizations about wage behaviour on wage policy extremely treacherous.

The Primacy of the Agricultural Sector

It is worth emphasizing at the outset the obvious fact that employment and unemployment in LDCs involve a great deal more than the wage sector and therefore wage questions. As noted above, with only a few exceptions (mainly the advanced, larger countries of Latin America) the typical LDC has between 60-80 per cent of its population engaged in agriculture. The sector for which wage issues have direct relevance is therefore normally very small, whether it is defined as "modern," "urban," "industrial" or most broadly, the sector in which paid employment is predominant. IN almost all LDCs outside of Latin America the proportion of the total population in paid employment is below 10 per cent. In India, for example, the number of workers relying on paid employment as the main source of income is probably about 35 million, out of a total population of nearly 550 million; "industrial employment" in India is in the neighbourhood of 4 million. In Africa the proportions are similar; most African countries have between 5-10 per cent of their total population in recorded paid employment; out of Nigeria's 50-60 million people the most recent figure for recorded wage employment is about 600,000 (with perhaps another 300,000 in paid employment in the "unorganized" or small workshop sector), while Kenya, one of the more industrially developed African countries, has some 600,000 recorded paid employees out of a population of over 9 million. For the LDCs as a whole, approximately 70 per cent of the total "labor force"[1] is

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[1] "Labor force" is used in quotes because the concept is not meaningful in countries with large traditional agricultural sectors, the definition of "participation rates" being virtually impossible in such countries. It is used at all only because most internationally comparable data use it.

employed in agriculture.[2]

Given the relative weights of agricultural and non-agricultural sectors or — what is not quite the same thing — the wage and non-wage sectors, it is obvious that the nature and dimensions of the unemployment problem in LDCs is strongly influenced by the rate of growth of population, and its resolution primarily involves agricultural development and transformation. The arithmetic on this score is devastating. Assuming population and "labor force" growth of 2 per cent annually, and (by comparison with actual employment growth) a relatively high growth rate of non-agricultural employment of 3 per cent annually, an economy with 80 per cent of its population in agriculture will after 50 years still have almost 70 per cent of its people in agriculture, and the farm population will still be growing in absolute terms.[3]

The slow decline in the preponderance of agricultural employment in LDCs which is implied by these kinds of calculations is borne out by more recent experience. For a fairly large sample of LDCs, between 1950 and 1960 industrial employment increased from 8 to 9.5 per cent of those employed; if agriculture's share in total employment continues to decline at the same rate as occurred between 1950 and 1960 approximately two-thirds of the total "labor force" in LDCs will still be employed in agriculture 50 years from now.[4]

This reminder that the main locus of the employment-unemployment problem in LDCs is in the agricultural sector is useful in several respects. First, it underscores the need to keep agriculture and agriculture transformation at the center of thinking about development policies and strategies. There are only a few countries where the evaporation of the traditional agricultural sector, its absorption into the "modern" sector, is at all likely in the foreseeable future. There are countries with low population: resource ratios, such as Libya, Kuwait, Liberia, Gabon, and those which have relatively low proportions of their labor force now in agriculture, such as Chile, Argentina and Venezuela.

Secondly, it puts the meaning of "labor absorption" in somewhat better

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[2]David Turnham and I. Jaeger, "The Employment Problem in Less Developed Countries: A Review," Working Paper, Second Conference on Research into Employment Problems in Developing Countries, Paris, 1969, O.E.C.D. Development Centre, p. 75.

[3]Cf. Bruce Johnston, "Agriculture and Economic Development: The Relevance of the Japanese Experience," Food Research Institute Studies, Vo. VI, No. 3, Appendix Table IV.

[4]See D. Turnham and I. Jaeger, pp. 75 ff.

focus. Distinguishing between absorption in the traditional agricultural sector and outside of it helps in understanding the character and scope of the unemployment problem. There are, for example, a substantial number of countries where because of still favorable man-land ratios marginal and average products in traditional agriculture are not very different — i.e., without even assuming any dynamizing effects of population growth on agriculture or any significant technological or organizational change in agriculture, output per capita in these countries declines relatively slightly as population in the traditional sector increases; many African countries are still in this position. "Labor absorption" here clearly has a different meaning than it does in the crowded traditional sectors of the Asian sub-contintent.

Thirdly, and most important for present purposes, it serves to put the whole issue of employment creation and related questions in proper perspective. Writing and thinking in this field tends to stress too much manufacturing or industrial employment. For most of the world, this is as noted earlier, a very minor sector in terms of employment, yet when economists write about investment criteria or choice of techniques, or about elasticities of demand for labor, or indeed wage policy problems, it is almost invariably the manufacturing sector which is explicitly or implicitly at issue. But, insofar as employment creation is concerned, the main arena is in agriculture, with unorganized small scale or workshop manufacturing, personal services, government following in importance.[5]

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[5]Possible multiplier effects from growth of industrial employment cannot significantly reduce the agricultural sector's prime role as an absorber of labor, even if the gross job multiplier (the increase in employment in trade and services associated with an increase in factory employment) is as high as one — which is higher than even optimistic observers put it. (Galenson's study results in an estimate of .6 and this is surely optimistic since his sample has many advanced countries. W. Galenson, "Economic Development and the Sectoral Expansion of Employment," International Labor Review, LXXXVII, June 1963, p. 510). The net multiplier, which takes account of jobs destroyed in the handicraft sector by expansion of factory output, is surely much smaller, and may even be negative, since substitution of factory production for small workshop or handicraft output appears to involve massive substitution of capital-intensive for labor-intensive production. (Cf. Pan American Union, Industrialization in Latin America: Priority Problems, Doc. Cit/1138, Addendum 2, May 1967, Washington, D.C., p. 106, where the "displacement ratio" is estimated to be as high as 7-8 to 1.)

It certainly matters whether overt urban unemployment is, say, 10 per cent or 15 per cent, or whether modern sector employment rises by 4 per cent a year rather than 3 per cent, alternatives directly related to wage questions. But the significance of these elements is dwarfed by other factors — whether the rate of growth of population rises or falls by half a percentage point, for example, or whether the new technology induced by the "Green Revolution" will be labor-saving or labor-using. Put somewhat differently, a minimum wage rate which is set "too high" by a government may lead to a lower rate of growth of output and employment than would otherwise be the case, and this is a matter of some moment. But if policies are not designed to prevent premature "tractorization" in areas where new hybrid seeds are being adopted, the consequences for unemployment are vastly greater. All of which is to emphasize that despite some tendency — at least until recently — for economists to focus their attention on employment problems in the modern sector, the heart of the problem lies elsewhere.

Wages and the Growth of Modern Sector Employment

The statistical results of the past two decades of growth make clear that modern sector employment in most LDCs has grown relatively slowly in relation to growth of output. This awareness, in combination with demographic considerations, lies behind much of the concern over employment prospects in the coming decades.

The facts are not much in dispute, despite poor employment data and great uncertainties as to coverage, i.e., "manufacturing" or "industry" and the composition of each. Thus for a large sample of LDCs, manufacturing output grew at 7.1 per cent annually between 1955-1965, while employment grew 4.4 per cent; for "industry" as a whole (including mining and utilities), output growth was 7.4 per cent, employment growth 4.0 per cent. Regional and inter-country differences are large. The incremental employment — output ratio seems to have been lowest in Africa and Latin America, highest in East and Southeast Asia — .39 in Latin America, .56 in Asia.[6] Spotty data for Africa indicates that this relationship between employment increase and output growth may have been between .2-.3 for most countries: there are some African countries in which industrial employment has either not grown significantly or has actually declined between

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[6]U.N., The Growth of World Industry, 1967 edition, Vol. I, General Industrial Statistics, 1953-1966 (New York, 1969).

the mid-fifties and mid-sixties, for example, Kenya, Tanzania, Malawi, Guinea, Congo-Kinshasa.

Output in the modern sector thus seems to have grown much faster than employment, and given rates of output growth have had associated with them less employment growth in LDCs than in advanced countries, when relative factor endowments suggest that the reverse should have been true.

Wage "distortions" and notably a general level of wages higher than the "market" or "equilibrium" rate is included in most lists of factors explaining this slow growth of employment in LDC industrial sectors.[7] That wage levels are "too high" in this sense is indicated by the existence in most countries of substantial open unemployment without a general tendency for wage rates in the modern or organized sector to drop, by the abundance of job claimants for every opening, by the existence of much lower rates for presumably similar labor in the unorganized section of the labor market.[8]

The failure of wage rates in the modern sector to reflect more accurately market forces is partly explained by the presence of organized social forces in the industrial sector, notably trade unions. But government wage and social policies are probably of far greater and more general significance. Governments everywhere in the LDCs play a major role in wage determination, as employers and wage regulators. Their wage policies are normally guided by a combination of ideological and political considerations in which the concept of a "fair" or "living" wage plays a large role. Wage levels thus tend to be based on some concept of "minimum human needs," and changes in the prices of the good basket making up this minimum needs budget tend to be basic influences on wage changes. Modern sector enterprises, in addition, are usually willing and able to pay

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[7] Cf. E. Thorbecke, "Unemployment and Underemployment in the Developing World," Paper presented at Columbia University Conference on International Economic Development. Williamsburg, Va., February 1970, pp. 16ff.

[8] In more formal terms, wage distortions exist whenever actual wages differ from marginal social opportunity costs of labor. Where open unemployment and apparent underemployment is widespread the social opportunity costs of labor presumably tend toward zero. In these circumstances almost any positive wage represents a "distortion" in the sense of a divergence between private and social costs. Some writers try to give an economic rationale for positive wage rates (cf. Moes, J.E. and A. Bottomley, "Wage Rate Determination with Limited Supplies of Labour in Developing Countries," in The Journal of Development Studies, IV, April 1968, pp. 380-385). But their arguments are unconvincing. The main explanation is clearly institutional.

higher wages than necessary to recruit their labor force, for a variety of economic and non-economic reasons.[9]

The general picture then, is of modern sectors of LDCs existing as oases of high wages, with these wage levels enduring and even rising despite substantial unemployment, mainly because of government wage and social policies. To these high wage levels, or their increase, is attributed part of the explanation for relatively slow LDC employment increases in the past 10 or 20 years.

There is no question about the plausibility of this kind of analysis. As a general proposition, and other things equal, a more rapidly rising wage level will lead to less growth in employment than a less rapidly rising one, for reasons that are well known.[10] Furthermore empirical studies in a number of countries suggest wage elasticities of demand for labor which are negative and significant though generally lower than one.[11]

It would nonetheless be unwise to place too heavy a stress on wage distortions in explaining slow employment growth in LDCs during the past several decades. Some of the observed (negative) relationship between wage changes and employment changes is due to autonomous factors, unrelated to wage behavior. For example, in early stages of industrialization, or more properly in the early life of an industrial establishment, there occur increases in output per worker which are associated with the passage of time; these seem to be attributable

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[9] Cf. E. Berg, "Wage Structures in Less Developed Countries," in A. D. Smith, ed., Wage Policy Issues in Economic Development (New York, 1969), pp. 276-277.

[10] See I.L.O., Minimum Wage Fixing and Economic Development (Geneva, 1969), pp. 43-55 for a good summary analysis of the possible employment effects of wage changes.

[11] Reynolds, L. G., "Wages and Employment in a Labor Surplus Economy," American Economic Review, March 1965; Erickson, J., "Wage-Employment Relationships in Latin American Industry: A Pilot Study," International Labour Office, 1969, draft manuscript; Harris, J. R. and M. P. Todaro, "Wages, Industrial Employment and Labour Productivity: The Kenya Experience," in Eastern Africa Economic Review, I, June 1969, pp. 29-46. Baryaruha, Azarias, Factors Affecting Industrial Employment: A Study of Ugandan Experience 1954 to 1964, Nairobi: Oxford University Press, East AFrican Institute for Social Research, Kampala, Uganda, Occasional Paper No. 1, 1967; abridgement in Development Digest, Vol. 7, No. 4, October 1969, pp. 17-21.

to learning by doing and related phenomena.[12] In newly industrializing countries industrial output thus tends to rise faster than industrial employment, and when wage rates have been rising at the same time it is easy to impute the lower employment-output ratios to the wage changes. Similarly, labor-saving techniques introduced in the wage of wage increases may be only slightly related to the wage changes.[13] Also, from what is known about some important kinds of investment decisions, wage levels do not appear to be critical considerations.[14]

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[12] See Frank, C.R., Jr., "Urban Unemployment and Economic Growth in Africa," Oxford Economic Papers, Vol. 20, No. 2, July 1968.

[13] One frequently cited case of massive wage-induced disemployment is Northern Rhodesia (now Zambia) in the 1950's. If the same ratio of African labor inputs to copper outputs had prevailed in 1959 as had existed in 1949, African employment would have been twice as high in 1959 — 69,000 instead of 35,000. Robert Baldwin, among others, has argued that the wage awards of the early 1950's were the major impetus to the mechanization programs introduced later in the decade which explain the lower employment-output ratio. (R. E. Baldwin, "Wage Policy in a Dual Economy — the Case of Northern Rhodesia," in Race, Vol. IV, No. 1, November 1962, p. 79.)

However, in the neighboring Katanga, many of the same kinds of technological changes were introduced between 1949 and 1953, also leading to doubling of physical output per worker. The changes in the Katanga copper industry were not wage-induced; real wages had been stagnant or declining for some years prior to 1950. (See F. Bezy, Problèmes Structurels de l' Economie Congolaise (Louvain, 1957, pp. 128 ff.).) The reasons for rapid mechanization without wage pressure in the Katanga are not altogether clear, but one important factor seems to have been the growing gap between actual and attainable productivity mainly due to technological developments since 1930 which the Congo mining industry could not introduce in the years of depression, war, postwar production bottlenecks in European capital goods industries.

Comparative productivity data for the copper industries of the Katanga and the Copperbelt (though made uncertain by differences in richness of ore and other factors) indicates that the productivity gap was large and widening in favor of the Katanga. Between 1938 and 1954, for example, output per African employee was stagnant on the Copperbelt, while it had tripled in the Katanga. (Bezy, op. cit., pp. 141-145.) In the mid-50's the "backward" Copperbelt began to catch up with the Katanga. It is not unlikely that the large and obvious differences in productivity between the two neighboring mining industries would have led to Copperbelt management response even if the wage awards of the 1950's had been much more modest.

[14] Cf. Yair Aharoni, The Foreign Investment Decision Process, Harvard Business School (Boston, 1966); and P. Kilby, Industrialization in an Open Economy: Nigeria 1945-1966 (Cambridge, 1969), Ch. 3. The Puerto Rican case is a rare if not unique exception. At least in the early stages of industrialization there the impetus came from labor-intensive, low-wage, foot-loose manufacturing industries, consisting of mainly American firms producing for the United States market. Investment decisions were thus very sensitive to labor cost differentials between Puerto Rico and alternative mainland locations.

More important than these considerations, however, is the generalized existence of distortions in the price of capital and in circumstances surrounding decisions on factor use. The really crucial distortions, these which appear to have the most significance in the explanation of slow employment growth, concern not labor but capital. They derive from certain economic policies found in many LDCs, and from certain institutional features of the decision-making process in many LDCs, which together strongly encourage capital-intensity. In many LDCs, over-valued exchange rates, subsidized credit arrangements, industrial incentive legislation and general fiscal policies which give favored treatment to capital investment greatly stimulate the use of capital-intensive methods. Where an enterprise can import foreign capital goods cheaply (if allocated the foreign exchange to do so), can get financing at low and sometimes even negative rates of interest (in highly inflationary situations), is given duty-free import of capital goods, spares and raw materials and is offered a variety of fiscal incentives to use capital equipment (accelerated depreciation and investment allowance provisions) — in these circumstances it would be surprising if labor intensive techniques and processes were adopted even if the price of labor were to fall out of sight.

In addition, and related more specifically to public or semi-public investment, foreign aid has had well-known effects in encouraging capital intensity, since aid donors typically finance only offshore costs of aid projects. And in many parts of the world machinery salesmen have been major initiators of industrial projects. Their major interest is not at all in rational factor proportions but in augmenting sales of home country equipment; the projects they peddle so successfully around the world take little account of local factor endowments, including unemployment of unskilled labor. Taken together, supplier credits (much of which goes to lubricate the activities of machinery salesmen or promoters) and foreign aid have financed a substantial share of LDC investment in recent years, and both are relatively immune from considerations of relative factor prices.

Finally, the project planning process in most LDCs is scarcely conducive to rational choice of techniques. Engineers or sector technicians dominate, and they tend to live in a world of fixed coefficients. Economists are few, particularly in government operating agencies where most projects take shape, usually permanent shape.

In this array of factors making for adoption of capital intensive techniques wage distortion clearly ranks near the bottom in terms of importance.

Urban Wages, Rural-Urban Income Differentials and Migration

The population of most urban areas in LDCs is growing rapidly; rates of 8-10 per cent a year are common, which is 3-4 times as high as overall population growth. Meanwhile, recorded urban employment has been growing much more slowly — about one-third as fast in most cases. The presumption is strong that open unemployment in urban areas is large and growing, though problems of definition, difficulties of measurement and lack of data allow very few firm statements about magnitudes or even trends.[15]

Differentials in income between urban and rural sectors undboutedly contribute to the rural-urban migration which lies behind much of the growth of town population. Here too conceptual difficulties and data scarcity demand caution in interpreting the raw data on average money earnings in the two sectors. It is not easy to choose appropriate groups for these income comparisons; the number of dependents in each group is rarely known; valuation of subsistence output raises well-known problems; and comparison of real incomes when life styles differ substantially is open to serious objections.[16] There is nonetheless little question that the income differentials are generally very substantial. The typical unskilled urban laborer probably receives an income two or three times as high in real terms as his cousin in traditional agriculture.[17]

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[15] Cf. D. Turnham and I. Jaeger, op. cit., Ch. III, for a survey of findings of unemployment studies.

[16] See for further discussion, Republic of Kenya, Public Services Salaries Commission Report, 1967, Ch. I.

[17] Rural per capita income in East Pakistan in the early 1960's has been estimated to be about one-third of per capita urban income. (S. Bose, "Trend of Real Income of the Rural Poor in East Pakistan, 1949-1960," Research Report A-69, Pakistan Institute of Development Economics, 1968.) Comparable estimates for Egypt in 1960 gave average incomes in urban areas four times as high as those in rural areas, and data for India, Ceylon, and Brazil suggest a differential of 2-3 in those countries. (See citations in David Turnham and I. Jaeger, op. cit., p. 37.) One recent study states that in French-speaking African countries average wage earnings are ten times as high as average earnings in traditional agriculture (C. Morrison, La Repartition des Revenus dans les Pays du Tiers-Monde, Paris, 1968), but there are definitional and data problems which reduce the meaningfulness or comparability of this estimate, notably with respect to average numbers of dependents in the relevant sectors. In Kenya it was estimated that average African wage earnings in urban areas were some two times greater than average African agricultural earnings in the mid-sixties. (Republic of Kenya, Report of the Public Service Salaries Commission, 1967, Ch. I, Nairobi, 1967.)

These large rural-urban income differentials, which are magnified by differing availabilities of amenities and social overheads in town and country, are widely condemned on social or equity grounds; they indicate that the benefits of economic growth in many or most LDCs have tended to go disproportionately to urban, employed minorities of the population. In economic terms, the differentials are "too large" in the sense that they serve no allocative purpose; they are bigger than needed to induce the flow of labor required in the urban economy. In fact, they spur "excessive" migration from agriculture and increase rates of urban unemployment. The differences in relative returns are such that even when probabilities of finding employment in towns are low, migration often still offers the income maximizing alternative to villagers. Migration probably reduces agricultural or other rural outputs in most cases, especially since it may be selective, with the most adventurous, energetic and ambitious villagers seeking their fortunes in towns.

It is the link between urban wage levels and rates of migration that is of particular relevance to issues relating to wages and employment. There is no question that high urban wage rates, other things equal, contribute to the rural urban income differential and stimulate townward migration; or that, other things equal, a rise in wage rates tends to raise the rate of out-migration from agriculture and the rate of unemployment in towns, since jobs are fewer but job-seekers greater in number. So the question is not the existence of a relationship between wage levels or wage changes and rates of migration, but its strength. In some recent discussions, urban wage rates are given a predominant role in explaining the migration phenomenon.[18] For a variety of reasons this seems to me exaggerated, a matter of letting the small urban sector become the tail that wags the migration (and urban unemployment) dog.

First of all, it is well to recall that wages are only one element in rural-urban income differentials. Not only are the differences in amenities also great, but even more important, the income differentials are vitally affected by the existing pattern of fiscal burdens and expenditure benefits, and by many government policies, including price policies toward agricultural outputs, land reform, industrialization and trade policies. In many countries the relative poverty of villagers has less to do with wage behavior than with

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[18] Cf. J. R. Harris and M. P. Todaro, "A Two Sector Model of Migration with Urban Unemployment in Developing Economies," Working Paper, M.I.T. Economics Department, December 1968; and "Urban Unemployment in East Africa: an Economic Analysis of Policy Alternatives," in Eastern AFrican Economic Review, Vol. IV, n.s. 2, December 1969.

agricultural, tax and expenditure policies. When migration is made a function of urban wage rates or changes, a lot of very important elements are being impounded by the ceteris paribus assumption.

As for the relationship between income differentials and migration, it is obvious that the migration phenomenon involves a great deal more than simply the relative incomes available in rural and urban areas. One hint that this is so is that there are many countries in which real wages have in fact fallen in the past decade, and in which income differentials between rural and urban areas have narrowed considerably.[19] Yet it does not seem that rates of migration have been affected, though the time is short and knowledge of what is happening very limited.

There are in any case strong reasons for believing that the rate of rural to urban migration is less a function of relative incomes in the two sectors, even when urban incomes are discounted by the probability of finding no job, than of other, more fundamental structural factors.

The first is that in regions where rural social structure is oppressive, as is particularly the case in parts of Latin America, movement to town is not a marginal decision, a trade-off of more income in town for less in the rural areas. Movement to town rather represents a new life in a special and powerful sense. As one writer rapturizes:[20]

> ...for the mass of people (the movement from ruralism to urbanism)... is a matter of emancipation. Women are emancipated from domestic obligations; children are emancipated from the work force; laborers are emancipated from the vagaries and tyrannies of the land; and human relations as such are emancipated from strict economic necessity.

Secondly, for the villager who seeks urban employment and does not find it, the cost of failure is generally low. In a large part of the less developed

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[19] Real wages of Indian manufacturing employees seem to have declined by a total of some 20 per cent between the mid-fifties and mid-sixties, and the internal terms of trade between rural and urban areas have moved substantially in favor of agriculture since 1965. In a number of African countries there have been drastic reductions in real wages or urban unskilled labor in the 1960's — cuts of some 50 per cent in Ghana and Congo-Kinshasa, for example, and 30-40 per cent in a number of French-speaking West African countries. One recent computation of real wage data indicates that in 7 out of 24 countries (not including those mentioned above) manufacturing real wages actually declined in the first half of the 1960's, and in 3 others they increased by 1 per cent a year or less. (A.D. Smith, "A Conspectus of Wage Trends in Developing Countries," in A.D. Smith ed., Wage Policy Issues in Economic Development (Geneva, 1969), p. 44.)

[20] I. Horowitz, Three Worlds of Development (New York, 1966), p. 338.

world the ethics of the extended family and the bonds of village loyalties persist in towns, allowing new arrivals a guarantee of support at a minimum subsistence level. In tropical countries, or at least tropical lowlands, the physical environment is such as to make this level relatively low, gentle weather reducing to a minimum the survival needs for shelter and clothing. Except where "push" factors have predominated in inducing migration, as in countries in which heavy population pressures or land tenure arrangements have generated a sizeable landless peasantry, migrants into town tend to retain village ties and even claims to the land. In some regions, there is still much short-term, even seasonal migration, which causes only slight reductions in village outputs and hence has very low social costs.

A third set of relevant factors relate to expectations and perception; the elasticity of supply of migrants is probably greater with respect to these than it is to the average income differential in town and country. It seems reasonable to suppose, for example, that the relationship between willingness to migrate and probability of finding employment is particularly close. It also seems reasonable that this relationship is a lagged function, with expectations of job probabilities depending on past rates of growth of employment and past unemployment rates. If for some years unemployment rates in town have been relatively low, and migrants have been reasonably successful in finding jobs, it is not likely that a worsening of objective prospects will have much short-run effect on migrant perceptions. It is only the persistence of a high unemployment rate that will reduce perceived probabilities and hence the propensity to migrate.

Finally, the impact of rapid increases in educational outputs must be recognized. In the past 20 years in most LDCs, there has occurred a radical break with the past in terms of proportions of relevant age groups in school and numbers of graduates. The expectations of these first few generations of educated people are shaped by experience in the past – generally the very recent past – when education was a sure passport to modern sector employment, and sometimes even to riches and power. In the space of a few years all of this has changed. Schools are now or soon will be producing far more graduates than can conceivably be employed in the modern sector as they were in the past. Although a few studies have shown a remarkable plasticity of expectations among people in school, few of the newly educated are willing to accept a final shutting of the door on the main chance, which is what a return to the village represents to most of them. They flood the town, preferring to take their chances there. While the rural-urban income differential is not irrelevant for this group, much deeper matters are involved, matters of basic aspirations and options as to life style.

All of this is to caution against giving too great emphasis to wide rural-urban income differentials as mainsprings of migration. Various structural factors have come together in the past two decades to intensify the migration to towns — educational transformation, lags in expectation changes, and the carry-over into urban life of the kinship and village ties prevailing in rural areas. It also suggests that there may be equilibrating forces at work which promise, probably fairly soon, to make migration less attractive. The average urban wage itself tends to decline as a greater proportion of urban population is either unemployed or finds employment in the unorganized sector, where wage rates are lower and more flexible. The persistence of relatively high levels of unemployment in towns will result in a pessimizing of expectations over times. The growing burden of dependency will increase the pressure on traditional social arrangements such as the extended family system. As the proportions of the educated unemployed grows so will social acceptance of rural employment for educated people; failure of graduates to find jobs in the modern sector will have less and less stigma attached to it, and will be no longer — as it frequently still is — attributed to defects of character. Except in those parts of the less developed world, therefore, where "push" factors have been or will become dominant in inducing rural-urban migration, the relative attractiveness of urban employment may soon decline. The level of unemployment at which there is apparently some tendency toward stabilization will surely be higher than in industrial, temperate zone countries, for reasons suggested above and, given the expected rates of population increase around the world, push factors will continue to force migrants out, at a rate dependent mainly upon the rate of agricultural development and social transformation in the countryside.

Wage Employment Relationships in the Public Sector

It is within the public sector that the most critical connections are to be found between wages and employment. In most of the LDCs governments employ between 40 and 60 per cent of the recorded paid labor force, and even a greater share of the educated and trained labor force. Public sector expenditures on personnel and personnel-related items seems generally to be in the neighborhood of two-thirds of total public expenditures. Public sector savings finance much (commonly around half) of total capital investment, and the extent and effectiveness of public sector "development spending" (research, surveys, agricultural extension, at least some education, training, health)[21] is an important determinant of future growth. Government wages thus directly affect the level of employment of the major employer of labor in the modern sector, the rate of public sector saving and development spending, and hence the rate of growth of output and employment in the future. Also, government's revenues are affected indirectly by wage levels and changes in the private sector, which influence its receipts from profits taxation.

I know of no empirical study of how governments vary their employment in response to wage changes. One kind of limiting case is where there is a rigidly fixed budget constraint; in this case a wage rise leads to a proportionate decline in numbers hired. Another extreme case is where government for political reason or by customs rarely fires anyone, so that wage rate increases are followed by proportionate rises in the public sector wage bill. In most cases government's demand for labor is probably elastic with respect to wage increases, but less than (-)1. At higher wage rates employment is less and government's wage bill is greater.

Employment and growth effects of this higher wage bill then depend mainly on how it is financed. Various alternatives exist. It can be financed out of other recurrent items in the budget (materials, supplies, maintenance, for example); out of "development spending"; out of non-development spending (pure public consumption); out of increased tax revenues; or out of deficit financing.

There are in theory some ways for a rise in the public sector wage bill to be financed without negative effects on either employment or growth. If non-developmental consumption expenditure is reduced, growth will be unaffected, while the impact on employment will depend on the employment content of wage goods relative to the employment content of government consumption. If increased taxes fall on local or expatriate quasi-rents (e.g., on earnings of nationals or expatriates which are higher than necessary to maintain the flow of work or capital) then the supply of factors will be unchanged. If there is

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21 Definition of "development spending" presents numerous problems which need not be gone into. It is defined here as expenditure on activities intended to have some relatively direct impact on the flow of future output.

Keynesian-type underemployment, deficit financing might increase growth and employment by raising aggregate demand.[22]

In practice, in any event, it appears — from very limited and mostly casual observation — that the responses to higher wage rates are made in all directions: some employment reduction, either in absolute terms or in lower rates of increase; some cut in appropriations for materials, supplies and maintenance; some reduction in development spending; some attempt to raise new revenues; and in some countries deficit financing. The employment effect is greatest on casual (mostly unskilled) employees and on contractuals (employees without civil service tenure), since it is always difficult and often impossible, to fire "established" civil servants. There appears also to be a strong tendency to skimp on the non-personnel items in the budget; maintenance is one of the first targets of budgeteers or harried agency heads. Development spending is almost invariably affected in any budget squeeze; it is widely treated as a residual — something left after the "regular" commitments of Government are met. In inflation-prone countries, rising wage bills tend to fuel the inflationary process via increased pressures towards higher deficits. However the burden of a higher wage bill in the public sector is distributed, if there is any sensitivity of employment to rises in wage rates in the public sector the impact on the level of modern sector employment is substantial, given the heavy weight of public employment in the modern sector.

The discussion has thus far been framed in terms of wage increases. Analysis of the effects of wage reductions involves additional considerations. Other things unchanged, a general wage reduction increases the inflow of revenue from taxes on private sector profits. It also reduces the cost of government projects and services. Redistributive, growth and employment effects then depend on how government utilizes the additional resources made available by wage reduction; it depends on what can be called government's marginal propensity to spend wastefully. Where this propensity is low there are no problems. Wage reduction will lead to expansion of government development programs and expansion and improvement of public services. In this case employment and growth effects are positive and significant, and there will be some redistributive

[22]In both these latter cases, however, there is an indirect negative impact on growth and employment. If Government could have taxed quasi-rents in the absence of a wage increase the volume of public development spending could have been increased. And if underemployment related to deficient aggregate demand existed output and employment could be increased by deficit financing in the absence of an increased wage bill.

effects favoring the unemployed; the possibility will also be created to distribute benefits in favor of deprived social groups and regions by suitable allocation of expenditures. To the extent that the marginal propensity to spend wastefully is high, the beneficial effects of wage reduction are utilized to import jet aircraft, ministerial Mercedes or industrial plants that can never operate profitably, the effects on output and employment growth will be small and can conceivably be negative.

Most governments have a marginal propensity to spend wastefully which falls somewhere between 0 and 1.[23] Except at the unlikely extremes, where all or nothing is spent wastefully, some "wasteful" or "inequitable" spending will be combined with some growth-inducing, employment-creating and amenity-equalizing expenditure. What the standard or normal ratio of "wasteful" government expenditure is to total expenditure of LDC governments we do not know; it would not be easy to get agreement among different observers even on the definitions of the concepts involved. The ratio which makes a policy of wage reduction or restraint "worthwhile" or "desirable" is a matter of judgment. The ratio which makes such a policy acceptable to the wage earners concerned is of course something else again.

One public sector wage issue deserves special attention: that relating to educated and trained manpower. Because of the dominant position of Governments as employers of this segment of the labor force, government salary structures set the general pattern for these workers in LDC economies even where Government is not the major employer in the general labor market.

The main issue raised is what to do about the salaries of highly educated manpower. Government employees with higher education and training are paid less

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[23] Marginal propensities to spend wastefully which are negative can easily be imagined, and in fact were common throughout much of the post World War II years when in a number of countries foreign aid offers exceeded local capacity to provide domestic costs. In these cases any additional dollar of public saving had a multiplier or leverage effect which was considerable. Propensities to spend wastefully of greater than one are a little harder to find, and involve slippery judgments about the meaning of "wasteful" expenditure — an issue I have tried to avoid here. One example might be the use of resources from wage reductions to increase investment in industrial or other projects which will require continuing subsidy and hence drain on future public saving. Another example might be where financial ease caused by lower wage rates leads government to undertake a large construction program in the capital city, diverting resources from existing programs of higher productivity.

than their counterparts in private sector employment, less still than technical assistance personnel receive, and far less than world market rates, where these are relevant (professionals, some technicians, very senior administrators). At the same time they are paid a great deal more than low-skilled employees in the public sector (or in the economy at large); the gap between average earnings of higher and lower cadres in the civil service being much greater in poor than in rich countries.

In most countries for which information is at hand government's have tended to hold down salaries of more highly paid civil servants while pushing up the wages of those at the bottom. Thus, in India, the ratio between the starting salary of an Indian civil service administrative officer and a laborer (peon) working for the central government fell from 43:1 in 1939 to 5:1 in 1959. In Brazil the ratio between maximum and minimum base salaries in the civil service fell from 18:1 in 1936 to 4:1 in 1963. In many African countries the ratio between starting salaries for administrative officers and unskilled laborers, which was well above 25:1 in the pre World War II years, was close to 7:1 in the late 1960's; there have been very few increases in rates for university trained civil servants in the past 15 years.[24]

Two problems arise. In the absence of a strong, effective national ideology which might conceivably provide a substitute incentive, the effort elasticity of supply of these workers tends to be high and negative. The basic reasons are the "Europeanization" of aspirations regarding standards of living, and the daily presence of comparison groups earning more money. There is thus a tendency for them to respond to wage restraint by withdrawal of effort, departure from the public sector, dual job-holding, "corrupt" behaviour. If the public sector had only a tangential role to play in the development process, as was by and large the case historically in now-advanced countries, this would not be so serious. But governments today take a leading role in the management of the economy, and the question of whether and how they can do so in the presence of surly civil services has nowhere been adequately considered.

Secondly, in many countries highly educated manpower remains in short supply at the same time that salaries in the public sector are restrained. We have here a classic case of scarcity which requires some classic policy response —

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[24] E. Berg, "Wage Structures in Less-developed Countries," in A. D. Smith, ed., Wage Policy Issues in Economic Development, New York 1969, pp. 322 ff.

notably rationing, in order to avoid or contain tendencies toward competitive bidding for graduates by various ministries, public corporations, etc. That effective rationing policies are so rarely put into effect accounts for much of the disarray of public services in new states.

The basic dilemma, especially in countries of acute scarcity, is that great numbers of graduates, relative to present stocks, are or soon will be emerging from the expanding educational systems. How many of the flow of new graduates government can employ as teachers, nurses, doctors, engineers, extension agents, etc., is closely dependent on the wage rate they must be paid. The present premium for education and training, which is "too low" to satisfy many incumbents is not only "too high" to allow government to greatly expand its hiring in the future, but is likely to be more than adequate to satisfy those future graduates, for whom the alternative will be unemployment or underemployment. In other words, if educational premia can be reduced in real terms many more graduates will become employable in the future. The trade-offs are clear. Governments can employ relatively few, highly-paid high school or university graduates and have more unemployed or underemployed graduates and fewer poorer services and development programs. Or it can employ more of these graduates at lower rates, reducing the numbers of educated unemployed, providing more extensive and better services and undertaking more development activity. The pivotal factor is the wage rate. The chief difficulty — in countries where skills are very scarce — is holding the line on money wage rates while supplies of graduates expand.

Wage Policy Implications

The analysis points clearly to the conclusion that wage restraint, meaning reduced or very slowly rising real wages is generally appropriate, in accord with the major LDC goals of employment expansion, greater output and more equity in income distribution between wage and non-wage, urban and rural employed and unemployed groups. This is hardly a cheerful conclusion; nobody finds it agreeable to contemplate the reduction of incomes, or even their slower rise, or wage earners only a step or two away from harsh poverty. Yet few students of LDC development, employment or wage policy problems are able to escape it. There is apparent in recent writing a striking consensus on the need for wage restraint; even a recent I.L.O. report leans heavily in this direction.[25]

[25] I.L.O., Minimum Wage Fixing and Economic Development (Geneva, 1969). See also A.D. Smith, ed., Wage Policy Issues in Economic Development (London, 1969).

To say that wages should be "low" or even "lower" offers some policy orientation. But both analytically and for policy purposes this formulation is much too general. A high level of generality is inevitable, particularly on the policy levels; no simple wage recipe can be applied to all countries always. Whether wage levels should be lower, and if so by how much depends on the particular evolution of wages and other incomes in each country and on local economic structure and conditions. The same prescriptions could not be applied, for example, to 1968 Ghana, where real wages had fallen by some 50 per cent in the previous decade, and where the gap between incomes of those in the wage economy and those outside of it had narrowed considerably, and to the three East African countries, where real wages had risen in the neighbourhood of 10 per cent annually during the same period. Nor could the same wage prescriptions apply wholesale to countries of such different economic structure as Burma and Brazil.

Even in individual economies there is no analytically satisfactory way to specify precisely where wage levels should be fixed to maximize output and/or employment. Partial equilibrium analysis would suggest that a wage structure, similar to that determined in a perfectly competititve market economy, would be appropriate for output maximization. But the supply price for unskilled labor cannot be determined independently of all policies affecting the economy, particularly agricultural policies. There is no single supply function of unskilled labor to the wage sector, but a family of functions, whose location and shape depend on agricultural prices, transport availability and costs, import policies, policy toward trade and credit, and practically all other economic variables.

Despite this theoretical uncertainty about where the "proper" level of wages is located, several wage guidelines can be specified, and these in practice can provide the general framework for a wages policy aimed at faster growth of employment and output. The first, which applies mainly to economies in which population remains heavily — say two-thirds or more — agricultural, is that wages of unskilled labor should be aligned more closely on average incomes in agriculture. Wages so aligned would tend to stimulate employment, reduce urban migration and permit a relatively higher level of development expenditure than wages otherwise determined. This does not give a specific answer to the question of how much above average agricultural earnings unskilled rates should be, but wage policy issues are in practice rarely posed in such a way that so specific an "answer" is needed. The issue is usually whether minimum wage rates should be brought closer to "a living wage," or the real wage losses due to rises in cost of living made up, or the "inequitable" wage received by one component of the wage labor force should be changed. If the level of real income in the agricultural sector becomes the main criterion for wage changes more suitable wage decisions are likely to follow, though problems of measuring and comparing incomes of farmers and wage earners, problems which were alluded to earlier, will always leave a considerable measure of uncertainty and room for bargaining.[26] The point is that the bringing of average agricultural and wage incomes closer together provides a major guidepost for more rational wages policy.

The second major guidepost refers to skilled workers, and has already been indicated; premia for skill should be reduced because only small premia are necessary for encouragement of skill acquisition, because large income differentials are inequitable, their reduction is necessary if general wage restraint is to be acceptable to the majority of unskilled workers, and because employment of trained and skilled manpower is highly wage elastic in the public sector. Where scarcities appear the policy response would be to increase supplies not raise wage rates.

It must be recognized that there are costs involved in a low wage policy. It is highly likely that the effectiveness and itensity of work supplied is adversely affected, particularly among highly trained and educated workers. The withdrawal of efficiency may be offset by improvement of training and promotion possibilities and reduction of non-wage job grievances, but fundamental matters of organizational behavior and interpersonal relations are involved here, many of them deeply rooted in the cultural environment and not subject to quick or easy change. Low wages to unskilled workers may affect efficiency in another way: by causing deterioration of health and nutrition, or causing slower rates of improvement. But these problems are best dealt with by means other than wages policy — public health measures, nutrition education campaigns, price subsidies for protein-rich foods, employer-provided meals, etc.

There are, moreover, some unfavorable income distribution effects of low wage policies. Income distribution is shifted in favor of dividend receivers

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[26] Data scarcity and other objections to moment-of-time comparisons of income between the two groups may make comparison of <u>changes</u> in income a more operational and persuasive criterion.

abroad, domestic capitalists, managers, entrepreneurs, and private sector employees whose incomes are less amenable to effective control than are salaries of public employees. Governments already capture a substantial share of reported corporate profits; marginal tax rates are not often below 40-50 per cent in LDCs. And by price control measures it might be possible to reallocate some of the benefits of wage reduction from profit receivers to consumers. But again this demands administration effectiveness not commonly found, so that some socially questionable redistribution effects are certain.

The costs of wage restraint then, are real. And to those mentioned should be added the risks and inconveniences entailed for wage-restraining governments, most of them unstable, almost all of them fragile. For these costs to be reduced, and indeed for wage restraining policies to have significant impact, a whole range of complementary policies are required, not only tax, price, and industrial relations policies, but also policies which involve basic matters of development strategy such as the relative priorities to be given to agricultural and industrial development. No wage policy, for example, will much dampen the flow of migrants in any country unless something is done not only about improving rural amenities, but about prices for major export crops or local staples, about price policies for off-farms inputs, possibly about land tenure arrangements — about the whole public policy posture toward agricultural development. Nor will industrial sector expansion bring much better rates of employment absorption regardless of wages policy, without basic changes in many features of public sector decision-making processes regarding industry, and unless LDC governments review their fiscal policies and industrial incentive legislation with the aim of softening or eliminating those features which encourage adoption of capital-intensive techniques. Without appropriate changes in general economic and social policies even the most rational wages policy will make hardly a dent on the employment problems of the 1970s and beyond.

Summary and Conclusion

The main arguments of this paper can be summarized in six points. First, the wage sector, where wages and wage-employment relationships are directly relevant, is in most LDCs so small in terms of proportions of the labor force employed that it can be only a minor theatre of employment absorption in the decades ahead, except for some specific groups, such as educated manpower. The main action will be in agriculture. Secondly, wage distortions, notably a level of wages higher than the "equilibrium" rate and rising real wages in the face of extensive and probably increasing urban open unemployment, may be significant factors in explaining slow employment growth in the modern industrial sector in a few countries, but in general their impact is swamped by the effects of economic policies and practices bearing on the price of and access to capital which strongly encourage capital intensive investment. Thirdly, rural-urban income differentials stimulate urban migration and contribute to urban unemployment. But basic factors of a structural kind are probably of more decisive significance, notably the desire for liberation from oppressive rural social and political conditions, slow changes in expectations as to employment possibilities and life styles, extremely rapid growth in educational outputs, and the persistence of extended family obligations in towns. Fourth, the most important connection between wages and employment is the impact of levels and changes on the public sector. Wage levels affect the volume of resources available to government, the level of development spending and hence future rates of growth of output and employment, and the level of public employment, especially of educated manpower. Fifth, in general, wage restraint, implying either actual real wage reductions or slower rates of increase than has occurred in most LDCs in the recent past, is the appropriate policy for encouragement of employment absorption, output growth, and greater equity in the spread of benefits. Finally, the effectiveness, as well as the acceptability of wage restraining policies depends on how governments use resources thereby made available. In all cases, costs are involved, such as higher payments to foreign dividend receivers, local capitalists, as well as relative improvements for others whose incomes are not easily controlled. There are obvious risks too, of social and political upheaval. The effectiveness of wages policy, and minimization of these costs and risks, depend on adoption of broader policy changes which are essential if the employment problem is to be confronted seriously.

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