# LABOR UTILIZATION OF MIGRANTS IN URBAN KOREA, 1970\*

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This paper examines three major issues regarding the employment characteristics of urban migrants in Korea in 1970. The issues are: (1) whether the majority of urban migrants from rural areas are engaged in the traditional tertiary activities, (2) whether migrants constitute the majority of unemployed population, and (3) whether the tertiary activities generate lower income than the secondary activities.

The findings indicate that (1) the urban informal tertiary sector was not the major point of entry for new migrants, (2) the migrants did not constitute the majority of unemployed urban population, and (3) workers in the secondary industries and the personal service sector experienced a high degree of underutilization measured by income, duration of work and mismatch, but workers in the other tertiary sectors experienced a lower degree of underutilization. All these findings together raise a question regarding the much publicized relationships among the low degree of industrialization, the prevalence of the traditional tertiary sector, and the high degree of underemployment in developing countries.

#### Introduction

The purpose of this paper is to examine the labor force characteristics of urban migrants in relation to industrial structure in Korea in 1970. In the 1960s Korea experienced a very rapid urban growth. Urban population increased from 28 percent of the total population in 1960 to 41 percent of the total population in 1970. The annual growth of the urban population was almost three times that of the country as a whole (IPP, 1972:78). Migration played an important role in this rapid urban growth. Net migration accounted for 49 percent of the urban population increase between 1960 and 1966 and for 73 percent of the urban population increase between 1966 and 1970 (Kwon et. al., 1975: 75–76). The rapid growth of urban population was accompanied by a rapid growth of the secondary industries. Among workers between the ages of 14 to 64, the proportion of employment in secondary industries increased from 8.9 to 19.1 percent for the nation as a whole and from 23.5 to 36.6 percent for the urban areas (Min, 1982: 165–169).

Many studies on urbanization process in the developing nations have focused on the problem of urban poverty in relation to massive rural-to-urban migration and the process of urban involution of informal (i.e., traditional) tertiary sector activities (UN, 1966: 38; UN, 1973: 521; Amin, 1976: 239; Bairoch & Limbor, 1968: 311–337; Bairoch, 1973: 49; Jones, 1968: 459; Pazos, 1975:239). The issues have been (1) whether or not rural-to-urban migrants enter massively into the urban tertiary activities, (2) whether or not these tertiary activities generate lower income than the secondary activities, and (3) whether or not migrants constitute the majority of unemployed population in urban areas. With regard to the first issue, the relationship between rural-to-urban migrants and the urban

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informal tertiary sector is explicit in Todaro-Harris model of migration based on expected income. Here, the urban informal tertiary sector provides interim stage job opportunities for migrants who look for "permanent" jobs in the modern sector. Various other studies also report that migrants drift into the urban informal tertiary sector. (ILO, 1978: 4; Field 1975: 165–188; Sethuraman, 1976a; Sethuraman, 1976b: 75; Lubell, 1978: 747–756). On the other hand, labor market studies in Brazil, Peru, Tanzania, and Sudan show some indications that the urban informal tertiary activities are not the major point of entry for new migrants from rural areas, and that a sizable proportion of these migrants entered regular wage employment directly (Mazumdar, 1976; 655–79; Oberai, 1977: 222; Yap, 1976: 227–342).

With regard to the second issue, the widespread notion of low productivity and thus, underemployment in the informal sector is partially being challenged. Ray Bromley warns against the general tendency among the advocates of formal/informal dualism to equate the urban informal sector with the urban poor and against the myth of a labor aristocracy of the formal (modern) sector. He points out that in most developing countries a substantial number of the formal sector employees are low-paid, have no job security, and are there to build up capital to start an informal sector enterprise (Bromley, 1968: 1033–40; Gerry, 1978: 1147–60; Harris, 1978: 1077–86). Similarly, Hackenberg argues that frequently the informal sector offers higher wages than industrial employment and better upward mobility opportunities through entrepreneurship (Hackenberg, 1980: 391–419; McNamara, 1975: 339–47). On the other hand, Mazumdar acknolwedges a substantial earnings differential between the formal and informal sectors, but also reports a wide diversity of earnings in the informal sector. There are a substantial number of informal sector employees whose earnings are equal to or higher than the formal sector employees (Mazumdar, 1976: 675).

With regard to the third issue, while it is generally hypothesized that migrants constitute the majority of unemployed population in urban areas, studies show that migrants simply cannot afford to stay unemployed for a long period of time (Fapohunda & Lubell, 1978: 45; Sethuraman, 1976: 116; Lubell & McCallum, 1978: 61; Oberai, 1977: 215; Yap, 1976: 227-342). High unemployment rates are frequently observed among young urban natives who acquire high levels of education and who have family support for a prolonged period while searching for the right jobs (Sethuraman, 1976: 84-5; Fapohunda & Lubell, 1978: 45; Bairoch, 1973: 59; Thorbecke, 1973: 399).

In view of these controversies concerning the labor force characteristics or urban migrants in the developing nations, this study presents one more empirical analysis of the labor force structure and labor utilization of urban migrants in Korea. The analysis of the Korean situation in the 1960s will be an important contribution to the current discussions on the subject because unlike the situation in many developing nations, Korea experienced rapid expansion of the secondary industries as mentioned earlier.

#### Methodology

#### 1. Data

This research is based on the 1 and 10 percent sample tapes of the 1970 Korean population census. The major limitation of these data for the present research is that questions about individual income were not asked in the census. Therefore, the Survey Report on Occupational Wages in 1970 is utilized to supplement this lack of information on individual income. Data from this report were input into computer for necessary statistical manipulation.

#### 2. Definitions

a) Migration: Migration is discussed in terms of (1) the migrant/non-migrant distinction, (2) migration type, and (3) migration status. The distinction between migrants and non-migrants is based on changes in administrative unit of residence (Shi or Gun) in the period of 1965 and 1970 (i.e., 5-year period migration). Two types of migration are considered: rural-urban and urnan-urban migration.

Migration status is classified into five categories based on information on the place of residence at three points in time: (1) at the time of birth, (2) in 1965, and (3) in 1970. The five categories are: (1) non-migrant, a person who was in the same place at all three points in time, (2) early migrant, a perison whose places of residence in 1965 and 1970 were identical but different from the place of birth, (3) recent migrant, a person whose places of birth and of residence in 1965 were idential but different from the place of residence in 1970, (4) chronic migrant, a person who was in three different places at the three different points in time, and (5) return migrant, a person whose places of birth and of residence in 1970 were identical but different from the place of residence in 1965.<sup>1</sup>

Introduction of migration status causes some confusion in terminology. The early migrant in migration status is included in the non-migrant category in discussions of five-year-period migration. When this is not clear in the context, we will refer to the urban natives and the early migrants as the 5-year non-migrants as opposed to the 5-year migrants who migrated to urban areas after 1965.

- b) The labor force structure: In analyzing the labor force structure we abandoned the traditional three-sector (i.e., primary, secondary, and tertiary) model in favor of a six-sector model presented by Browning and Singelmann (1975). The six sectors and corresponding industries<sup>2</sup> are as follows:
  - 1. Extractive Sector:
    - 1) Agriculture, Fishery, and Forestry
    - 2) Mining
  - 2. Transformative Sector:
    - 3) Construction
    - 4) Food
    - 5) Textile

<sup>1.</sup> This classification is admittedly crude since we do not know the history of residential movements between the time of birth and 1965, and between 1965 and 1970. Therefore, we assume that there was no migration if the residential locations are the same at two consecutive points in time, and that there was one migration if the residential locations are different at two consecutive points in time. In other words, we assume one migrant means one migration in the reference period. The fourth category is named chronic migrants because the several changes of residential location suggest that the individual in this category is highly mobile.

<sup>2.</sup> Industry codes (3-digit numbers) were allocated into these six sectors as follows:

<sup>111</sup> to 290→sector I; 310 to 581→sector II; 610 to 629, 710 to 795,→sector III; 810 to 853 →sector IV; 900 to 913, 930 to 939, 942, 960→sector V; 920 to 929, 940, 941, 943 to 959, 630 to 681→sector VI

- 6) Metal
- 7) Machinery
- 8) Chemical
- 9) Miscellaneous Manufacturing
- 10) Utilities
- 3. Distributive Services Sector:
  - 11) Transportation and Storage
  - 12) Communication
  - 13) Wholesale Trade
  - 14) Retail Trade (except Eating and Drinking Places)
- 4. Producer Services Sector:
  - 15) Banking, Credit, and Other Financial Services
  - 16) Insurance
  - 17) Real Estate
  - 18) Engineering and Architectural Services
  - 19) Accounting and Bookkeeping
  - 20) Miscellaneous Business Services
  - 21) Legal Services
- 5. Social Services Sector:
  - 22) Medical and Health Services
  - 23) Hospitals
  - 24) Education
  - 25) Welfare and Religious Services
  - 26) Nonprofit Organization
  - 27) Postal Services<sup>3</sup>
  - 28) Government
  - 29) Miscellaneous Professional and Social Services
- 6. Personal Services Sector:
  - 30) Domestic Services
  - 31) Hotels and Lodging Places
  - 32) Eating and Drinking Places
  - 33) Repair Services
  - 34) Laundry and Dry Cleaning
  - 35) Barber and Beauty Shops
  - 36) Entertainment and Recreational Services
  - 37) Miscellaneous Personal Services.
- c) Labor Utilization: This study utilizes the "labor utilization framework" (LUF) developed by Philip M. Hauser (1974: 1-15) and modified to fit the data of the 1970 Korean Population Census. The labor utilization framework is an elaboration of the commonly used labor force approach.

The labor force approach divides the total population into two categories: (1) population in the labor force and (2) population not in the labor force. The first category is further subdivided into the employed and the unemployed. The labor utilization framework further differentiates the employed population according to whether they are adequately or inadequately utilized. The inadequately utilized are further differentiated by type of underutilization, i.e., (1) by working an inadequate number of hours, (2) by receiving an inade-

<sup>3.</sup> In Korea postal services are included in the same category as telephone services. Therefore, postal services are included in the distributive services sector in our analysis.

quate income, and (3) by a mismatch between the levels of education and occupation. These three forms of underutilized employment plus unemployment constitute the four forms of inadequate utilization of the labor force.

The labor utilization framework as presented by Hauser is based on a priority scheme of tabulating types of underutilization. The unemployed are counted first, then those who are underemployed; in the latter category the first priority is given to those who work an inadequate number of hours, the second priority is given to those who receive an inadequate level of income, and third priority is given to those persons who work adequate hours at an adequate income but whose occupations do not correspond with their levels of education. Those who do not experience any of the four types of inadequate utilization are classified as "adequately utilized."

The labor force includes those employed, unemployed, and those whose main activities were not related to employment but who worked for pay during the reference week. The employed population consists of (1) those who worked, (2) those who had jobs but did not work, and (3) those whose main activities were not related to employment but who worked for pay during the reference week. The unemployed population consists of those who were looking for work during the reference week. Differentiation of the employed labor force follows the LUF method without the priority procedure. In other words, the three forms of inadequate employment are measured independently of one another so that a person may be identified as being inadequately employed in all three forms simultaneously. An adequately employed person is of course the one whose employment is not characterized by any form of inadequacy.

Due to the nature of the Korean census the measurement of adequacy or inadequacy of employment status is a modified version of Hauser's framework. First, the 1970 Korean census did not collect data on income. We used the 1970 Survey Report on Occupational Wages which provides information on mean, minimum, and maximum wages of each occupation (in three-digit codes) by sex, the number and the level of skills of the workers, industry, and geographical location. Based on this information we derive a wage proxy of workers by sex, occupation, industry, and region since these four variables are included in the 1970 Korean census. Secondly, work duration is reported in terms of months, not hours per week. Therefore the notion of part time and full time work is not applicable to the current study. Finally, education is reported in terms of a nominal scale which can be translated into an interval scale based on the researcher's knowledge of the educational system in Korea.

These three deficiencies in the nature of the 1970 Korean census data prohibit any precise measures of labor utilization. However, we believe that estimations based on a modified version of Hauser's framework will provide better information on the utilization of labor resources than the traditional labor force approach.

## Wage Approximation

As stated above we derive a wage proxy using the data from the the 1970 Survey Report on Occupational Wages. There are two limitations involved in using these data. One is that the survey period was April 1970, while the population census reference week was in September 1970. Therefore, we assume that there were no changes in income for occupational categories between April and September of 1970. The second limitation is that the survey included only those establishments which employed ten or more workers, and excluded government organizations and government run educational institutions. We have no way of knowing from the 1970 population census either the size of business enterprises in which individuals are employed or whether or not the work places are government.

organizations.

In order to lessen the extent of the problem that might result from the second limitation, we apply the wage approximation only to those who are employers, regular workers, or temporary workers. We include temporary workers in this estimation because it is a well-known practice that big companies hire temporary workers rather than regular workers to keep labor costs down (Park, 1978: 306).

The 1970 Survey Report on Occupational Wages provides information on (1) sex of the worker; (2) occupation (in three-digit codes); (3) industry (in three-digit codes); (4) geographical location of the work place; (5) the number of workers in each occupation; (6) the mean wage of each occupation; (7) the minimum and maximum wages; and (8) the number of workers with different levels of skill in each occupation. The occupational survey involves 1,016,517 workers. About 20 percent of these workers, however, fall into the occupational category N.E.C. (not elsewhere classified) in each industry. Therefore, the wage approximation is based on 80 percent (812,999) of these workers whose occupations are classified into three-digit codes.

Based on the information for these 812,999 workers we created a raw data file which contained 8,070 cases, a case being an occupational category cross-classified by industry, mean wage, sex, and the number of workers and geographical location. Since the occupational and industry codes are in three-digit numbers, we aggregated the data into two-digit occupational codes and into six industry sectors. Two-digit occupational codes were used because it is known that there are wage variations within one-digit occupational categories, and because the three-digit codes are too detailed and certain categories contain too few workers. With regard to industry classification, a multiple classification analysis showed improvement in the proportion of explained variance in wages when using the six-sector classification of industry over one-digit industry codes. This seems an additional empirical support for our usage of the six-sector model in this study.

Although the data were presented in terms of eleven regions (two largest cities and nine provinces), we reclassified the region into four categories: (1) Seoul, the capital city and the largest city, (2) Busan, the second largest city, (3) three provinces that contain the three largest cities (Seoul, Busan, and Daegu)—Gyeonggi do, Gyeongsang Buk-do, and Gyeongsang Nam-do, and (4) the remaining provinces. This classification is based on the assumption that employment in these four regional categories will have differential monetary rewards. It was expected (1) that the monetary rewards would be higher in the capital city than in other parts of the country, (2) that the monetary rewards in Busan, the second largest city, would be less than those in the capital city but higher than those in other parts of the country, and (3) that the monetary rewards in the three provinces that contain the three largest cities would be affected by the wage level of the large cities, and thus higher than those in other provinces. This assumption is partially supported in a multiple classification analysis<sup>4</sup>. The difference between using eleven categories and using four categories of the region is minimal. The proportion of explained variance in wages (R<sup>2</sup>) was 0.864 for the former and 0.859 for the latter.

The MCA model used in wage approximation is as follows<sup>5</sup>:

$$\bar{W}_{jkmn} = \bar{W} + \sum_{j=1}^{2} a_{j} S_{j} + \sum_{k=1}^{99} b_{k} 0_{k} + \sum_{m=1}^{6} c_{m} I_{m} + \sum_{n=1}^{4} d_{n} R_{n} + e_{jkmn}$$

<sup>4.</sup> The MCA coefficients express the independent effect of each category of independent variables in the model in terms of deviation from the grand mean value of the dependent variable (i.e., wage in this case). The MCA coefficients are 1,448.94 for Seoul,—486.85 for Busan, —149.88 for the three provinces, and —1,989.85 for the remaining provinces. Workers in the three provinces received higher wages than those in Busan.

<sup>5.</sup> R<sup>2</sup> for this model equals to 0.859.

where,  $\overline{W}_{jkmn}$  = Mean wage of the worker in the jth category of sex, in kth category of occupation, in mth category of industry, and nth category of region.

 $\overline{W}$  = Mean wage of 812,999 workers.

S = Sex.

O = Occupation (two-digit codes).

I = Industry (six sectors).

R = Region (four categories).

 $a_j$ ,  $b_k$ ,  $c_m$ ,  $d_n = MCA$  coefficients for respective variables.

 $e_{ikmn} = error terms.$ 

The wage approximation was effected by assigning the mean wage and the four MCA coefficients to individuals with respective characteristics regarding the four variables. For example, the mean wage of total workers is \#17,933 (won), the MCA coefficient for being male is 2530, the MCA coefficient for being in occupational category 16 is -105, the MCA coefficient for being in industry sector 1 is 236, and the MCA coefficient for being in Seoul is 1449. If a person falls into these categories, his/her wage is calculated by adding four MCA coefficients to the man wage: W = 17,933 + 2530 + (-105) + 236 + 1449 =22,043.

## Adequacy Measure

*Income.* The labor utilization framework requires that a cutoff point in income be set a priori. Different cutoff points are used based on the household size and on household headship. The Annual Report on the Family Income and Expenditure Survey (EPB, 1971: 68-69) by the Korean Bureau of Statistics makes the following classification of monthly household expenditures.

A) Consumption Expenditures

1) Food:

Cereals\*

Meat and fish\*

Vegetables and seaweeds\*

Fruits\*

Condiments\* Processed food

Confectioneries and soft drinks

Alcoholic drinks

Meals away from home

2) Housing:

Rents paid\*

Estimated rents for owner-occupied dwelling\*

Water charges\* House mending

Furnitures and furnishings

3) Fuel and Light: Electricity charges\*

Fuel\*

Other fuel and lights

4) Clothing:

Clothes\*

Cloth, cotton and thread\*

Hosiery\* Footwear\* Accessories Other clothing 5) Miscellaneous: Medical care\*

Personal care Stationeries\* School-fees\*

Reading and recreations

Transportation and communication\*

Cigarettes

Other miscellaneous

B) Non-consumption Expenditures Taxes and public expenditures\*

Interest on personal debts

Others

The minimum monthly household expenditures by household size are calculated by adding up expenditures on items with an asterisk (\*) which are considered to be the basic items for living. Table 1 presents the minimum monthly household expenditures by household size in urban areas. The word "minimum" has a special meaning. The household expenditures presented in Table 1 represent the actual amount of money spent on the minimum number of expenditure items considered to be basic items for living. The amount of money spent on each item is the average, not minimum, amount for each household size.

The addition of one person to a household requires an increment of \(\pi 3,547\) on the average in the household budget. Thus, subtraction of this amount from the two-person household budget yields \(\pi 11,613\) which will be used as the minimum monthly living expenses for a single-person household or a worker who is not a household head. The minimum expenditures presented in Table 1 will be used as cutoff points for heads of household of respective household size.

Duration of work. The cutoff point for duration of work is 12 months for every worker. This might be considered as a conservative measure. However, considering the fact that the mean wage of all workers (1,016,517) included in the survey of occupational wage in 1970 was \pi17,044 and the fact that the duration-of-work data reported in the 1970 population census do not distinguish part-time from full-time work, we believe it necessary to assume that workers should work every month of the year to support themselves and their families.

The level of education for occupation. The cutoff points are set a priori at one standard deviation above the mean in each two-digit occupational category. Education in the 1970

Table 1: The Minimum Monthly Household Expenditure by Household Size in Urban Areas, Korea 1970

Household Size	Minimum Expenditure
2	₩15,160
3	18,530
4	22,380
5	23,800
6	28,720
7	30,800
8	33,540
9	39,990
All households	25,460

Source: Derived by adding household expenditures on necessary items for living in urban areas in Economic Planning Board, Annual Report on the Family Income and Expenditure Survey 1970, pp. 68-69.

population census was reported in a nominal scale: whether or not a person was attending, had finished, or not finished primary, or secondary school, or junior college or university. This nominal variable was rearranged into ten categories of ordinal scale: (1) no schooling, (2) attending or not finished primary school, (3) finished primary school, (4) attending or not finished middle school, (5) finished middle school, (6) attending or not finished high school, (7) finished high school, (8) attending or not finished junior college, (9) finished junior college, or attending or not finished university, (10) finished university. These categories are translated into an interval scale as follow:

	Interval Scale
Ordinal Scale	(in number of years)
(1) No schooling	0
(2) Attending or not finished primary school	3
(3) Finished primary school	6
(4) Attending or not finished middle school	7.5
(5) Finished middle school	9
(6) Attending or not finished high school	10.5
(7) Finished high school	12
(8) Attending or not finished junior college	13
(9) Finished junior college, or attending or not finished universit	ty 14
(10) Finished university	16

The means and standard deviations are calculated based on the assumption that the highest limit of the interval scale is 16 years of schooling as there is no way of knowing the true highest limit of "finished university" category.

The meausre of adequacy of work duration applies to all workers (37,082) in the 1 percent sample data of the 1970 population census, whereas the measure of adequacy of education for given occupations applies to 36,592 workers due to missing information on either education or occupation. The adequacy of income measure is applied only to 14,128 workers whose occupations had identical two digit occupational codes which were included in the occupational census, and who were either employers or regular workers or temporary workers.

#### **Findings**

#### Migration and Labor Force Structure

Of the urban population 14-64 years old in 1970, 32 percent were non-migrants since birth, 41 percent were early migrants, 18 percent recent migrants, 8 percent chronic migrants, and 1 percent return migrants. The last three migration statuses constitute all 5-year migrants (26.6 percent), i.e., those who had changed their administrative unit of residence (Shi or Gun) since 1965. In terms of migration type, 28.3 percent were urban-urban migrants, and 71.4 percent were rural-urban migrants. The remaining 0.3 percent were immigrants. Our research question in this section is whether or not there were differences in the labor force structure among various migrant and non-migrant groups.

# 1) Non-Migrants, Early Migrants, and the 5-year Migrants:

There were noticeable differences in the distribution of industrial sectors among non-migrants, early migrants, and the 5-year migrants (Table 2). The relative size of the extractive (or primary) sector was largest among non-migrants: almost three times that among the early migrants and more than five times that among the 5-year migrants. The relative

size of the transformative (or secondary) sector was largest among the 5-year migrants, whereas the relative size of the total tertiary sector was largest among the early migrants. Regarding individual tertiary sectors, the relative sizes of the distributive, producer, and social services sectors were largest among the early migrants and the relative size of the personal services sector was largest among the 5-year migrants.

## 2) 5-Year Migrants and 5-Year Non-Migrants:

When the non-migrants and the early migrants were combined into a 5-year non-migrants category and compared with the 5-year migrants, the relative size of the total teritary sector was similar for the two groups, but there were considerable differences in the relative sizes of the extractive and transformative sectors. The relative size of the extractive sector was larger among the 5-year non-migrants, whereas that of the transformative sector was

Table 2: The Sectoral Distribution of the Labor Force by Migration Characteristics, Urban Korea, 1970

Migration Status		Prim.	Sec.	Tertiary					
and Migration		Ext.	Trans.	Total	Dist.	Prod.	Soc.	Pers.	Total
Type									
Migration Status			_	Both Sex	es				
Non-migrants	(1)	17.3	36.1	46.6	23.3	2.3	10.3	10.7	100.0
Early Migrants	(2)	5.9	35.8	58.4	29.7	2.7	12.2	13.8	100.0
Recent Migrants	(3)	3.0	47.0	49.9	18.9	1.4	7.1	22.5	100.0
Chronic Migrants	(4)	3.8	36.3	59.8	23.6	1.9	17.2	17.1	100.0
Return Migrants	(5)	5.4	37.6	57.0	24.8	3.2	15.8	13.2	100.0
5-Year Non-mig.	(1, 2)	9.5	35.9	54.7	27.7	2.6	11.6	12.8	100.0
5-Year Mig. (	3, 4, 5)	3.3	44.0	52.7	20.3	1.6	9.9	20.9	100.0
Migration Type for	5-Year I	Migrants							
Urban-Urban Migr	ants	2.3	40.1	57.6	20.5	2.3	14.1	20.7	100.0
Rural-Urban Migra	ints	3.7	45.6	50.7	20.2	1.3	8.2	21.0	100.0
Migration Status				Male	;				
Non-migrants	(1)	17.7	36.2	46.1	24.2	2.5	10.5	8.9	100.0
Early Migrants	(2)	5.0	37.2	57.7	30.4	3.1	13.5	10.7	100.0
Recent Migrants	(3)	3.8	46.7	49.4	25.0	2.0	8.9	13.5	100.0
Chronic Migrants	(4)	3.7	39.1	57.2	24.7	2.2	19.9	10.4	100.0
Return Migrants	(5)	5.1	39.4	55.4	26.0	3.8	17.5	8.1	100.0
5-Year Non-mig.	(1, 2)	8.9	36.9	54.1	28.5	2.9	12.6	10.1	100.0
5-Year Mig. (	3, 4, 5)	3.8	44.2	51.9	24.9	2.1	12.5	12.4	100.0
Migrantion Type for	r 5-Year	Migrants							
Urban-Urban Migra	ants	2.5	44.0	53.4	23.7	2.7	16.7	10.3	100.0
Rural-Urban Migra	ints	4.4	44.4	51.3	25.5	1.9	10.6	13.3	100.0
Migration Status				Femal	e				
Non-migrants	(1)	16.3	35.6	48.2	21.0	1.9	9.9	15.4	100.0
Early Migrants	(2)	8.5	31.7	59.8	27.9	1.4	8.2	22.3	100.0
Recent Migrants	(3)	1.9	47.5	50.6	10.4	0.6	4.4	35.2	100.0
Chronic Migrants	(4)	4.1	29.1	66.7	20.8	1.0	10.1	34.8	100.0
Return Migrants	(5)	6.0	33.6	60.4	22.2	1.8	11.9	24.5	100.0
5-Year Non-mig.	(1, 2)	11.0	32.9	56.1	25.6	1.6	8.8	20.1	100.0
5-Year Mig. (	3, 4, 5)	2.4	43.7	53.9	12.6	0.7	5.7	34.9	100.0
Migration Type for	5-Year I	Migrants							
Urban-Urban Migra	ants	1.8	32.4	65.8	14.2	1.6	8.8	41.2	100.0
Rural-Urban Migra	nts	2.5	47.6	49.9	12.0	0.4	4.6	32.9	100.0
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Source: The one and ten percent sample tapes of the 1970 Population Census.

larger among the 5-year migrants. There were also differences between these two groups in the distribution of the individual tertiary sectors. The relative size of the distributive services sector was higher among the 5-year non-migrants and that of the personal services was higher among the 5-year migrants.

## 3) Recent, Chronic, and Return Migrants:

Among the 5-year migrants there were interesting variations in the sectoral distribution among the three migration status groups. The proportion of the labor force engaged in the extractive sector was highest among the return migrants; that in the transformative sector was highest among the recent migrants; and that in the total tertiary sector was highest among the chronic migrants.

Looking at the distribution of the labor force in the individual tertiary sectors, variations among these three groups of migrants appear again. Of those employed in the tertiary sectors, the majority of the recent migrants were in the distributive services (18.9 percent) and personal services (22.5 percent). Among the chronic migrants, the largest sector was the distributive services sector (23.6 percent) followed by both social services (17.2 percent) and personal services (17.1 percent). Among the return migrants, the largest tertiary sector was also the distributive services sector (24.8 percent) followed by social services (15.8 percent) and personal services (13.2 percent). The largest relative magnitude (3.2 percent) in the producer services was found among the return migrants.

## 4) Urban-Urban and Rural-Urban Migrants:

The main difference between the urban-urban and the rural-urban migrants was that the proportion of migrants engaged in the transformative sector was higher among the rural-urban migrants (45.6 percent) than among the urban-urban migrants (40.1 percent). On the other hand, the proportion of migrants employed in the tertiary sectors was higher among the urban-urban migrants (57.6 percent) than among the rural-urban migrants (50.7 percent). Looking at the distribution of migrants into the four tertiary sectors, we notice a striking similarity in the relative magnitudes of the distributive services and personal services sectors between the urban-urban and rural-urban migrants. Each of the two sectors employed about 20–21 percent of each of the two types of migrants. However, this is a deceptive presentation since there were differences between the sexes as mentioned below.

## 5) Differences between the Sexes:

There were differences between the sexes in the sectoral distribution of the labor force. Sex differences were greater among migrants than among non-migrants. The main sex difference was in the distribution of the tertiary sectors. Regardless of migration status or type, the relative size of the total tertiary sector was greater among women than among men, whereas that of the secondary industries was greater among men than among women with exceptions of the recent migrants and the rural-urban migrants. In fact, the differences between the urban-urban and rural-urban migrants mentioned above were due mainly to the differences between these two groups among women. Among men, about the same proportion (44 percent) of urban-urban and rural-urban migrants was found in the transformative sector. The relative magnitude of the total tertiary sector was slightly higher among the urban-urban migrants (53.4 percent) than among the rural-urban migrants (51.3 percent). Among women, however, there were considerable differences between the urban-urban and rural-urban migrants in the proportion in the transformative and in the total tertiary sector. Of the urban-urban female migrants, 32.4 percent were engaged in the transformative sector and 65.8 percent were in the tertiary sector; the corresponding figures for the rural-urban female migrants were 47.6 percent and 49.9 percent.

Looking at the distribution of individual tertiary sectors, the relative sizes of distributive, producer, and social services sectors were greater among men than among women, whereas the relative size of the personal services sector was far greater among women than among men. Comparing the relative sizes of the distributive services and personal services, the former was far greater than the latter among men in all categories of migration status and type. Among women, non-migrants and the early migrants were more concentrated in the distributive services than in the personal services; but all 5-year migrants were more concentrated in the personal services than in the distributive services.

As mentioned earlier, the relative sizes of the distributive services and personal services sectors for both sexes combined were similar for urban-urban and rural-urban migrants—each about 20-21 percent. But we notice a substantial difference between the sexes. For men, the relative magnitudes of the two sectors were larger among the rural-urban migrants; for women, they were larger among the urban-urban migrants.

# 6) Urban-Urban and Rural-Urban Migrants among the Recent Migrants:

In Table 2 we noticed that the recent migrants were most likely to enter the secondary industries of all 5 migration status groups. Table 3 shows that among the recent migrants, rural-urban migrants were more likely to enter the secondary industries than urban-urban migrants; 48 percent of the former compared to 42.3 percent of the latter were in the transformative sector. There was a great difference between the sexes. Among men, the proportion in the transformative sector was slightly higher among the urban-urban migrants (48.1 percent) than among the rural-urban migrants (46.4 percent). Among women, it was much higher among the rural-urban migrants (50.4 percent) than among the urban-urban migrants (34.5 percent).

While the urban-urban migrants were less likely to enter the secondary industries than the rural-urban migrants, they were more likely to enter the tertiary industries than the rural-urban migrants. This is due mainly to the employment pattern among women. Among men, there was no difference in the relative size of the total tertiary sector between the urban-urban and rural-urban migrants. Among women, 64.3 percent of the urban-urban migrants were employed in the tertiary industries whereas 47.5 percent of the rural-urban migrants were employed in the tertiary industries.

Looking at the personal services sector, we notice a great difference between the urbanurban and rural-urban female migrants: 44.9 percent of the former and 33.1 percent of the latter were employed in this sector. Comparing the relative size of the personal services sector with that of the transformative sector (i.e., the secondary industries), the urban-

Table 3: The Sectoral Distribution of the Recent Migrants by Migration Type, Urban Korea, 1970

	Prim.	Sec.		_	Tertiary			
Migration type	Ext.	Trans.	Total	Dist.	Prod.	Soc.	Pers.	Total
			Both Se	xes				
Urban-urban Migrants	1.8	42.3	55.7	19.2	1.7	9.0	25.8	100.0
Rural-urban Migrants	3.3	48.0	48.6	18.8	1.4	6.6	21.8	100.0
-			Male	e				
Urban-urban Migrants	2.3	48.1	49.4	24.1	1.9	11.5	11.9	100.0
Rural-urban Migrants	4.2	46.4	49.4	25.1	2.0	8.4	13.9	100.0
			Fema	le				
Urban-urban Migrants	1.1	34.5	64.3	12.4	1.4	5.6	44.9	100.0
Rural-urban Migrants	2.0	50.4	47.5	9.9	0.4	4.1	33.1	100.0

Source: The one and ten percent sample tapes of the 1970 Population Census.

urban female migrants were more likely to enter the personal services sector than the transformative sector, whereas the opposite was the case for the rural-urban female migrants.

# Migration and the Utilization of the Labor Force

Our research question in this section is whether or not there were differences in the degree and characteristics of the utilization of labor resources between migrants and non-migrants, between different migration status groups, and between migrants of two migration types in urban areas.

# 1) 5-Year Migrants and 5-Year Non-Migrants:

There was a considerable difference in the utilization of labor of those two groups (Table 4). The economic activity rate was higher and the unemployment rate was lower among migrants than among non-migrants. The directions of these differences were the same for both sexes; the magnitudes of these differences were geater among women than among men. The proportion of underutilized persons by income was higher among the 5-year migrants. However, this was due to higher proportion of underutilized migrant women. The migrant men were better utilized than non-migrant men in terms of income. The better utilization of labor among migrant men does not imply that they had higher incomes

Table 4: Utilization of Labor by Migration Status, Urban Korea, 1970

						5 Year	
Labor Utilization	Non- Mig. (1)	Early Mig. (2)	Recent Mig. (3)	Chronic Mig. (4)	Return Mig. (5)	Non- Mig. (1, 2)	Mig. (3, 4, 5)
				Both Sexe			
Labor Force	43.8	49.9	59.4	52.6	49.6	47 8	57 2
Unemployed	6.9	4.3	3.2	3.9	5.9	5.1	3.4
Underutilized by Income	44.7	48.5	53.0	42.7	36.2	47.2	50.3
Underutilized by Work Duration	39.0	32.3	39.7	31.0	34.4	34.4	37.3
Underutilized by Mismatch	9.6	9.3	7.1	9.7	9.6	9.4	8.2
Adequately utilized on 2 measures						- • •	V. <b>-</b>
(Work duration and mismatch)	54.9	61.0	56.0	59.9	58.4	59.1	57.0
				Male			
Labor Force	62.1	78.4	77.0	83.4	78.6	72.5	78.8
Unemployed	7.1	4.7	4.1	4.3	6.0	5.5	4.2
Underutilized by Income	32.4	39.9	24.5	30.1	23.6	37.6	26.0
Underutilized by Work Duration	37.6	30.3	40.1	27.8	31.9	32.5	36.2
Underutilized by Mismatch	11.3	10.8	8.8	13.1	11.9	11.0	10.2
Adequately utilized on 2 measures						11.0	10.2
(Work duration and mismatch)	55.2	62.0	54.4	61.5	59.5	59.9	56.6
				Female			
Labor Force	24.7	24.6	44.9	26.6	27.0	24.7	39.2
Unemployed	6.2	3.3	1.9	2.6	5.5	4.3	2.1
Underutilized by Income	72.3	74.0	90.8	75.2	68.4	73.4	88.0
Underutilized by Work Duration	42.6	38.1	39.2	39.2	40.2	39.5	39.2
Underutilized by Mismatch	5.3	5.1	4.6	·7.5	4.5	5.1	5.2
Adequately utilized on 2 measures				. /=		J.1	5,2
(Work duration and mismatch)	54.1	58.4	58.2	55.8	56.1	57.0	57.7

Source: The one and ten percent sample tapes of the 1970 Popula tion Census.

than non-migrant men in 1970. The mean wage in 1970 was higher among non-migrant than among migrant men, but the size of the family was also larger among non-migrant than among migrant men (Min, 1982: 362–363).

In terms of duration of work, non-migrants were slightly better utilized than migrants, especially among men. Among women, the proportion underutilized in terms of work duration was similar for migrants and non-migrants. In terms of mismatch, migrants were slightly better utilized than non-migrants. The proportion of underutilized workers both by work duration and by mismatch was slightly higher among non-migrant than migrant men; migrant and non-migrant women were similar in this respect.

## 2) Migration Status:

Of the five migration status groups, non-migrants since birth showed the lowest economic activity rate and the highest unemployment rate, whereas recent migrants showed the highest economic activity rate and the lowest unemployment rate. The latter group of migrants, however, were most underutilized in terms of income and work duration. In terms of income, the return migrants were best utilized; in terms of work duration, the chronic migrants were best utilized. In terms of mismatch, the recent migrants were best utilized: this was expected since the general educational status of this group was lowest of the five groups (Min, 1982: Chap. 5).

There were sex differences in labor utilization by income and work duration. Among men, recent migrants were better utilized than non-migrants, early migrants, and chronic migrants in terms of income; but they were most underutilized in terms of duration of work. Among women, recent migrants were most underutilized in terms of income, but better utilized than non-migrants and return migrants in terms of duration of work.

Looking at the utilization of labor by work duration and mismatch taken together, the early migrants were best utilized and non-migrants were most underutilized. Among the 5-year migrants, the recent migrants were most underutilized. The proportion of adequately utilized on both measures was slightly higher among the recent migrants than among the non-migrants. Looking at each sex separately, the difference between men and women was noticeable. Among men, non-migrants and the recent migrants were the most underutilized, non-migrants being slightly better utilized than recent migrants. Among women, the differences in the proportion of adequately utilized on both measures among the five groups were much smaller than those for men, and the most underutilized group was non-migrants followed by chronic migrants.

# 3) Urban-Urban and Rural-Urban Migrants:

There were considerable differences in the utilization of labor between urban-urban and rural-urban migrants (Table 5). The abor force participation rate was higher among rural-urban migrants but this was due to the high labor force participation rate of rural-urban female migrants (41.4 percent). Among men, the labor force participation rate was slightly higher among urban-urban migrants. The unemployment rate was higher among urban-urban migrants for both sexes. The proportion of underutilized labor by income was the same between the two groups of migrants among men (26 percent); but among women, there was a large difference between urban-urban migrants (78.3 percent) and rural-urban migrants (91 percent). In terms of work duration, rural-urban migrants were more underutilized for both sexes than the urban-urban migrants. As one might expect, the proportion of underutilized by mismatch was much higher among urban-urban migrants. The difference in the proportion of the mismatched labor force between urban-urban and rural-urban migrants was great both for men (15 versus 8 percent) and women (9.2 versus 3.8 percent). The proportion of adequately utilized labor by both work duration and mismatch was higher among urban-urban migrants for men, but higher among rural-urban

Table 5: Utilization of Labor by Migration Type, Urban Korea, 1970

Labor Utilization	Urban-Urban Mig.	Rural-Urban Mig	
	Both Sexes		
Labor Force	55.2	58.2	
Unemployed	3.8	3.3	
Underutilized by Income	43.7	52.9	
Underutilized by Work Duration	31.7	39.6	
Underutilized by Mismatch	13.0	6.3	
Adequately Utilized on 2 Measures			
(Work Duration and Mismatch)	58.8	56.3	
	Male		
Labor Force	79.6	78.4	
Unemployed	4.4	4.1	
Underutilized by Income	26.0	26.0	
Underutilized by Work Duration	28.7	39.5	
Underutilized by Mismatch	15.0	8.0	
Adequately Utilized on 2 Measures			
(Work Duration and Mismatch)	59.9	55.2	
	Female		
Labor Force	34.1	41.4	
Unemployed	2.7	2.0	
Underutilized by Income	78.3	91.0	
Underutilized by Work Duration	37.7	39.7	
Underutilized by Mismatch	9.2	3.8	
Adequately Utilized on 2 Measures			
(Work Duration and Mismatch)	56.7	58.0	

Source: The one and ten percent sample tapes of the 1970 Population Census.

migrants for women. But the proportion of underutilized labor on both measures was higher among urban-urban migrants for both sexes.

#### Migration, Labor ForceStructure, and Labor Utilization

The research question in this section is whether or not there were differences in the utilization of labor in different industrial sectors among various migrant and non-migrant groups.

## 1) 5-Year Migrants and 5-Year Non-Migrants:

In terms of income, migrant labor was better utilized than non-migrant labor; an exception occurs in the transformative sector where the latter was slightly better utilized (Table 6). The difference in the proportion of underutilized migrant and non-migrant labor was greater in the extractive and distributive services sectors (11 to 15 percentage points) than in other sectors (3 to 4 percentage points).

With respect to duration of work, non-migrants were doing better than migrants in general, with the exception of the extractive sector where migrants were better utilized than non-migrants. The difference in the proportion of underutilized workers was greater in the extractive, distributive services, and personal services sectors (5 to 8 percentage points) than in other sectors (2 to 3 percentage points).

With respect to the mismatch measure, non-migrants were doing better than migrants in the extractive and social services sectors; in other sectors, migrants were doing better than non-migrants. However, the difference between these two groups in the proportion of underutilized workers was modest in all sectors (less than 3 percentage points).

Table 6: The Proportion of Underutilized Labor by Income, Duration of Work, and Mismatch in Industrial Sectors by Migration Status and Type, Urban Korea, 1970

		Industrial Sectors							
			Dist.	Prod.	Soc.	Pers.			
Migration Status and Type	Ext.	Trans.	Serv.	Serv.	Serv.	Serv			
	Labor Underutilization by Income								
Non-migrants (1)	60.8	54.5	36.9	6.0	6.1	56.7			
Early Migrants (2)	56.9	59.6	49.8	10.2	5.9	60.7			
Recent Migrants (3)	41.5	61.8	32.5	2.4	3.6	53.1			
Chronic Migrants (4)	51.6	50.4	42.1	11.4	2.6	65.0			
Return Migrants (5)	28.6	51.2	20.0	2.8	5.3	53.2			
5-year Non-migrants (1, 2)	58.4	57.9	46.2	8.8	6.0	59.4			
5-year Migrants (3, 4, 5)	43.8	59.5	34.8	4.9	. 3.2	55.7			
Urban-urban Migrants	47.9	48.9	36.7	5.2	2.5	68.7			
Rural-urban Migrants	43.6	6.29	34.1	4.7	3.8	50.2			
	Labor Un	derutilizatio	n by Dura	tion of Wo	rk				
Non-migrants (1)	71.3	40.1	26.9	19.3	13.9	36.4			
Early Migrants (2)	67.8	39.0	26.5	16.5	10.0	33.8			
Recent Migrants (3)	66.4	43.0	36.3	23.5	15.6	40.1			
Chronic Migrants (4)	62.0	35.5	29.9	13.7	8.9	39.2			
Return Migrants (5)	58.2	36.4	33.8	14.9	15.7	45.3			
5-year Non-migrants (1, 2)	69.8	39.4	26.6	17.3	- 11.1	34.5			
5-year Migrants (3, 4, 5)	64.7	41.3	34.3	20.1	12.6	40.0			
Urban-urban Migrants	66.9	35.4	29.9	16.1	9.5	39.0			
Rural-urban Migrants	64.4	43.4	36.0	23.3	14.8	40.5			
	La	bor Underu	tilization b	y Mismatch	n				
Non-migrants (1)	9.7	11.4	8.6	4.3	5.1	11.0			
Early Migrants (2)	7.6	11.3	8.2	4.5	6.0	10.7			
Recent Migrants (3)	8.0	7.9	4.3	2.3	5.2	8.4			
Chronic Migrants (4)	10.2	14.9	8.3	4.2	6.9	13.5			
Return Migrants (5)	15.2	13.1	6.3	11.7	5.9	6.5			
5-year Non-migrants (1, 2)	8.8	11.4	8.3	4.4	5.7	10.8			
5-year Migrants (3, 4, 5)	9.0	9.5	5.6	3.3	5.9	9.4			
Urban-urban Migrants	16.2	15.5	10.5	1.7	8.1	14.5			
Rural-urban Migrants	6.9	7.3	3.6	4.5	4.6	7.4			

Source: The one and ten percent sample tapes of the 1970 Population Census.

## 2) Migration Status:

All five groups of migration status were utilized in different degrees in different industrial sectors (Table 6). With respect to all three labor utilization measures, and for all groups of migration status, workers in the producer services and social services were in general better utilized than workers in other sectors: the only exception is the return migrants in the producer services who were more underutilized than the return migrants in distributive services and personal services.

The best utilized group in terms of income in each sector was the return migrants in the extractive sector, the chronic migrants in the transformative and social services sectors, and the recent migrants in the other three sectors. It should be noted that all these groups were 5-year migrants. The best utilized group in terms of duration of work in each sector was the return migrants in the extractive sector, the chronic migrants in the transformative, producer services, and social services sectors, and the early migrants in the distributive

services and personal services sectors. The best utilized group in terms of mismatch was the early migrants in the extractive sector, the recent migrants in the transformative, distributive services and producer services sectors, non-migrants in the social services sector, and return migrants in the personal services sector.

# 3) Urban-Urban and Rural-Urban Migrants:

Among the 5-year migrants, urban-urban migrants were better utilized in terms of income than rural-urban migrants in the transformative and social services sectors (Table 6). There was a large difference in the proportion of underutilized workers between the urban-urban and rural-urban migrants in the transformative sector: 48.9 versus 62.9 percent. We noted above that the rural-urban migrants were more likely to enter the transformative sector than the urban-urban migrants and yet, the rural-urban migrants were more underutilized. In the other four sectors, the rural-urban migrants were better utilized than the urban-urban migrants. In the personal services sector in particular, the rural-urban migrants were doing far better than the urban-urban migrants.

With respect to duration of work, the urban-urban migrants were better utilized than the rural-urban migrants in all sectors except in the extractive sector. On the other hand, with respect to mismatch, the rural-urban migrants were better utilized than the urban-urban migrants in all sectors except in the producer services sector.

#### Conclusion

We stated earlier three major issues regarding the employment characteristics of urban migrants. The first issue was whether or not the majority of urban migrants from rural areas are engaged in the traditional tertiary activities. In 1970, the majority of urban Koreans, migrants or non-migrants, were employed in the tertiary sector. Comparing 5-year migrants with non-migrants or early migrants, the 5-year migrants were more likely than the other groups to be employed in the secondary industries. Furthermore, among the 5-year migrants, those who came from rural areas were more likely to be employed in the secondary industries than those who came from other urban areas. When we look at female migrants separately, the urban-urban migrants showed a greater tendency to work in the tertiary sector, especially in the personal services sector, whereas the rural-urban migrants were more evenly distributed in the secondary (47.6 percent) and in the tertiary (49.9 percent) industries. Among men, the relative sizes of what one may call the modern services sectors (i.e., producer services and social services) were higher among the urbanurban migrants, whereas the relative sizes of the traditional services sectors (i.e., distributive services and personal services) were higher among the rural-urban migrants. The relative size of the secondary industries was similar for both the urban-urban and rural-urban migrants.

Of the recent migrants, those from rural areas were also more likely to be employed in the secondary industries than those from other urban areas. Again the female recent migrants who came from urban areas rather than from rural areas showed a greater tendency to be employed in the tertiary sector, especially in the personal services. Thus, the prevailing notion of the rural-urban migrants crowding into the urban informal tertiary sector cannot be applied to the Korean situation. The Korean situation is similar to the situations in Brazil, Peru, and Tanzania where the urban informal sector was not the major point of entry for new migrants from rural areas.

The other issues were whether or not migrants constitute the majority of unemployed population and whether or not the tertiary activities generate lower income than the secondary activities. Our analysis shows that non-migrants, men or women, were more

likely to be unemployed than migrants. In fact, of the five migration status groups, unemployment rate was highest among the non-migrants. Among the 5-year migrants, the place of origin, rural or urban, did not make much difference in unemployment rate.

Regarding the issue of comparative labor utilization of the secondary and of the informal tertiary activities, our analysis shows that workers both in the secondary industries and in the personal services sector experienced high degrees of underutilization by all three measures, i.e., income, duration of work, and mismatch. But, workers in other tertiary sectors such as the distributive services, producer services, and social services, experienced much lower degrees of underutilization by all measures.

It is ironical that the recent migrants who were more likely than other migration status groups to enter the transformative sector experienced higher degrees of underutilization both by income and by duration of work than other groups in the same sector. Similarly, while the female urban-urban migrants tended to concentrate in the personal services, the urban-urban migrants, both sexes taken together, experienced the highest degree of underutilization by income among all groups of migration status and type in the same sector. A similar situation was also found among the rural-urban migrants in the transformative sector. We noted that the rural-urban female migrants were most likely to be in the transformative sector. Yet, the rural-urban migrants, men and women combined, experienced the highest degree of underutilization by income among all groups of migration status and type in the same sector. The high degree of underutilization of the urban-urban migrants in personal services and that of the rural-urban migrants in the transformative sector were mainly due to the extremely high degree of underutilization of female recent migrants.

In conclusion, the Korean experience raises a question regarding the importance of industrialization. The low degree of industrialization in the developing countries has frequently been deplored and the prevalence of the traditional tertiary sector has been blamed for the high degree of underemployment. This study indicates that employment in the secondary industries is not necessarily a desirable status from the individual point of view unless it is accompanied by adequate rewards. From the policy-making point of view, eradication of poverty among urban migrants will not be accomplished simply by absorbing the migrants into the secondary industries without adequate monetary provisions. In Korea in the 1960s the expansion of the transformative sector was the backbone of the economic growth. Yet, those who worked in that sector were, in general, worse off than those in other sectors. The significance of this fact is more pronounced in view of the fact that the productivity of labor (i.e., output per worker) was higher in the transformative sector than in other sectors (Kuznets, 1977: 54-5).

#### References

Amin, Samir

1976 Unequal Development (New York: Monthly Review Press).

Bairoch, Paul

1973 Urban Unemployment Problem in Developing Countries (Geneva: International Labor Office).

Bairoch, Paul and J.M. Limbor

1968 "Changes in the Industrial Distribution of the World Labor Force, by Region, 1880-1960," International Labor Review 98.

Bromley, Ray

1978 "Introduction—The Urban Informal Sector: Why Is It Worth Discussing?", World Development 6.

Browing, Harley L. and Joachim Singelmann

1975 The Emergence of a Service Society: Demographic and Sociological Aspects of the Sectoral Transformation of the Labor Force in the U.S.A., Report to the Manpower Administration, U.S. Department of Labor.

Economic Planning Board

1971 Annual Report on the Family Income and Expenditure Survey 1970 (Seoul, Korea: Economic Planning Board).

Fapohunda, Olanrewaju J. and Harold Lubell

1978 Lagos: Urban Development and Employment (Geneva: International Labof Office).

Field, Gerry S.

1975 "Rural-Urban Migration, Urban Unemployment and Job Search Activity in LDC's," *Journal of Development Economics* 2.

Gerry, Chris

1978 "Petty Production and Capitalist Production in Dakar: The Crisis of the Self-Employed," World Development 5.

Hackenberg, Robert A.

1980 "New Patterns of Urbanization in Southeast Asia: An Assessment," *Population and Development Studies* 6.

Harris, Barbara

1978 "Quasi-Formal Employment Structure and Behavior in the Unorganized Urban Economy, and the Reverse: Some Evidence from South India," *World Development* 6.

Hauser, Philip M.

1974 "The Measurement of Labor Utilization," Malayan Economic Review 19.

Institute of Population Problems

1972 Estimate and Analysis of Population Structure (Seoul).

International Labor Organization

1978 World Employment Programme: Urbanization and Employment in Developing Countries (Geneva).

Jones, G.W.

"Underutilization of Manpower and Demographic Trends in Latin America," *International Labor Review* 98.

Kuznets, Paul W.

1977 Economic Growth and Structure in the Republic of Korea (New Haven: Yale University Press).

Kwon, Tai Hwan et al.

1975 The Population of Korea (Seoul: The Population and Development Studies Center). Lubell, Harold

1978 "Urban Development and Employment: The Third World Metropolis," International Labor Review 117.

Lubell, Harold and Douglas McCallum

1978 Bogota: Urban Development and Employment (Geneva: International Labor Office).

Mazumdar, Dipak

1976 "The Urban Informal Sector," World Development 4.

McNamara, Robert S.

1975 "Urban Poverty in Developing Countries: A World Bank Analysis," Population and Development Review 1.

Min, Kyonghee

"Urban growth, migration, the sectoral transformation of the labor force, and labor utilization in Korea, 1960-1970" (Ph.D. dissertation, Fordham University).

Oberai, A.S.

1977 "Migration, Unemployment and the Urban Labor Market: A Case Study of the Sudan," *International Labor Review* 115.

Park, Chan-il

1978 "Uksip Yonde Hankuk yi Gong-Up Hwa wa Silzil Imgum Suzun (Korean Industrial

Development and the Level of Real Wage in the 1960) in *Hankuk Nodong Munze yi Guzo* (The Structure of Korean Labor force) (Seoul, Korea: Kwang Min Sa. ed.).

Pazos, F.

1975 "Development and the Underutilization of Labor: Lessons of the Dominican Republic Employment Mission," *International Labor Review* 111.

Sethuraman, S.V.

1976a Jakarta: Urban Development and Employment (Geneva: International Labor Office).

1976b "The Urban Informal Sector: Concept, Measurement, and Policy," *International Labor Review* 114.

Thorbecke, Erik,

1973 "The Employment Problem: A Critical Evaluation of Four ILO Comprehensive Country Report," *International Labor Review* 107.

United Nations

1966 The Process of Industrial Development in Latin America (New York: United Nations, Economic Commission for Latin America).

<sup>1973</sup> Economic Survey of Asia and the Far East 1973 (Bangkok).

Yap, Lorene Y.L.

<sup>1976 &</sup>quot;Rural-Urban Migration and Urban Underemployment in Brazil," *Journal of Development Economics* 3.