HOME INDUSTRY WORKERS IN NUEVA ECIJA: A CASE STUDY

TERESITA R. MAQUISO
Central Luzon State University

This study examines the situation of sixty-six home industry workers in a municipality in Nueva Ecija. The production dynamics of four different work groups are first reviewed, followed by an analysis of the workers' social and economic characteristics. Returns to labor are generally low, whether computed on an hourly or a monthly basis. In the absence of viable alternatives, though, the workers remain committed to their jobs.

The role of the handicraft industry in generating foreign exchange for the country is well known. Both national government agencies and the private sector have been regularly engaged in promoting the export of Filipino culture and crafts through media displays, trade missions and organized exhibition fairs in various capitals of the world. Notwithstanding all of these, however, it is sad to note that no reliable data could be obtained as to the total foreign exchange earnings for the handicraft industry. On the contrary, figures released by concerned agencies hardly jibe with one another.[1]

Compounding these conflicting estimates is the fact that no one seems to know what comprises the handicraft industry itself. For instance, while one agency may include such products as children's dresses and toothbrushes under this heading, another may fail to follow suit (Aguilar and Miralao, 1984). For its part, the Central Bank has completely obliterated the handicraft category from its official printouts even though hand-tallied figures from this institution's ledgers showed the industry as accounting for more than 117 million dollars in export sales, with this figure representing nearly five percent of the total earnings for the non-traditional manufactures (Aguilar and Miralao, 1984: 25-28).

Despite these inconsistencies in official accounts it is apparent that the home industry has unmistakably contributed its share to the country's dollar reserves. The industry's total dependence on local raw materials is also worthy of note insofar as this implies that the earnings generated by the handicraft industry are totally net or "real," in contrast to the other import-dependent Non-Traditional Exports whose earnings (though much larger than those of the handicraft industry) are largely gross. In essence, the net contribution from these other industries is much more modest than that which is projected by their gross receipts.[2] The handicraft industry also utilizes local materials, and, as such, generates demand for other sectors of the economy, thus benefiting a wider group of people. It is in this light that a study to determine the extent to which the actual producers of export handicraft items are benefited by their work becomes significant and necessary.

Objectives and Methodology

This paper attempts to examine employment within the handicraft industry, with a particular focus upon the producers of these goods, the home industry workers themselves. In particular, it will seek to answer the following questions: How much do the handicraft workers really earn? How significant is the occupation's contribution to their development as a people? What are their perceptions relative to their occupations?

The data for this paper were gathered in January and February of 1984. They are taken from interviews with four home industry production groups working within the province of Nueva Ecija.

The interview technique was utilized to gather basic sociological data while key informants were employed extensively to provide insights into production dynamics. Observations and documentation of the various production activities were also undertaken.

In all, sixty-six respondents participated in the study. This number comprised 94 percent of the total number of home industry workers working under the umbrella of a foundation which is deeply involved with community development projects.[3] The respondents represented the four groups of workers organized by the foundation. Two of these (Groups A and B) operated within the poblacion of the municipality in question while the other two (Groups C and D) were living in barangays situated 2 ½ and 7 kilometers away from the poblacion, respectively.

Production Dynamics

Organization. All respondents were volunteer members of production work groups that were organized by a foreign-assisted foundation in 1981.[4] Each work group was composed of workers living within a single barangay. Each was also assigned to work on particular products according to its members' respective skills.

The first group, which I will term as Group A, was composed of the handicraft workers. It produced such items as curtains and room dividers made out of *rono* stems, *tigbi* and/or *ipil-ipil* seeds; chimes crafted out of capiz shells; and necklaces fashioned out of seeds and beads. All its members resided in the poblacion.

Group B, for its part, specialized in slatted bamboo crafts. At the time of the study, it was the only group that extensively used machines in the preparation of materials. These were used to splice the bamboo into uniform slats, to plane rough surfaces and for sizing. It was also the only group whose venue of work was located in the foundation's machine shop.

Group C specialized in solid bamboo crafts, such as flower vases, candle holders, lanterns and mugs. Each member of this group worked on his or her job order at home.

Group D, on the other hand, was distinguished from all the rest because it involved the use of woven bamboo mats. Lampshades, mirror frames, baskets, fruit trays, waste baskets and an assortment of trinkets were fashioned by this group. This group also differed from the rest insofar as it was the only one which was subdivided into two smaller groups.

Two of the groups practiced subcontracting. Group A did this for the stringing of beads, and Group D for spokesmaking and mat weaving. A duly elected set of officers administered each group's activities. These were charged with the following duties and responsibilities: (1) allocating job orders to the members; (2) ensuring members' punctuality in the submission of their assigned quotas; (3) negotiating with the foundation for the group's production loans; (4) procuring the group's raw materials and other production needs; and (5) preparing the group's payroll in collaboration with the foundation's office staff.[5]

The foundation was managed by a board of directors. Members of the board were drawn from the municipality's Catholic church and from a university operating in the province. The foundation extended production loans to the worker-members at a one-percent rate of interest and also lent its machine shop to them free of charge. Its staff monitored production activities, rendered extension work, assisted the groups' officers in their administrative functions, received and supervised the packaging of products, collected payments for the job orders, and paid the workers their corresponding dues.

The workers' products were bought by a marketing outfit which directly received job orders from abroad and which in turn channelled these orders to the foundation. This marketing outfit also determined the buying price of each product or item.

Nature of the Work

Observations of the production process disclosed the fact that the fabrication of an item for export, be it a handicraft or bamboocraft, required painstaking work and varying degrees of craftmanship which could have only been acquired after long years of experience. Each product was a testimony not only of the highly skilled hands that shaped it but also of the length of time invested in its creation. Among

the Group B workers, for instance, splicing of bamboos required the use of machines which at all times demanded precision and alertness of mind. Among the handicraft workers, eye straining processes were observed to have been the normal fare. In the latter case, such tasks as the continuous stringing together of minute *ipil-ipil* seeds for some six hours at a time was not unusual and neither was the practice of doing this under a flickering light at night.[6] Other jobs demanded not only high labor investments but also were harmful for the skin. Thus, the hands of some workers were heavily exposed to corrosive agents like muriatic acid (which was used in cleaning individual capiz shells) or sanding materials. In other cases, their hands would be intermittently pricked and drilled through by sharp pointed implements used on small bits of *rono* stems. On the whole, it was in the preparation of materials for assembly that the main risks, as well as the bulk of the necessary work, were encountered.

Division of Labor

In principle, division of labor or allocation of job orders was governed by skill considerations. When an item could be easily produced by all members, its production was usually shared equally by all. However, when an item required special skills, its production, with the group members' consent, was generally appropriated to the most highly skilled worker. In most cases, this was either the president or some other lesser officer. This practice was perceived as ensuring equity and avoiding jealousy between officers and members.

Groups A, C and D practiced the above type of job order allocation. Each member-worker was given a quota to fill within a particular time frame. Work was done individually by members in their respective homes. In all three groups the accomplishment of one's quota typically required the cooperation and assistance of other members of the family. Both young and old were tapped to work on the various phases of production. Again, intra-family task allocation was typically based upon skill levels, so that in some cases an older son or daughter took on the more important jobs while the parents consigned themselves to doing less rigorous and demanding routines. The younger siblings generally assisted in the cleaning and preparation of materials, since these tasks required less expertise and precision.

Group B (slatted bamboo craft), on the other hand, observed the assembly line concept in production, i.e., each worker was assigned a particular phase in the production cycle like bamboo splicing. Being assigned to one phase, however, did not mean being glued to the same work the whole year round. Rotation of job assignments was undertaken. One therefore became a slatmaker at one time, a planer, a sizer, or a splicer at another time. The officers also rotated among these jobs and did as much if not more work than the other group members. According to the officers, these practices helped to avert monotony, to foster camaraderie, and to minimize truancy.

Capitalization and "Profit" Sharing

The production needs of each group were met by a group production loan which the respective leaders negotiated with the foundation. Out of the proceeds of this loan, each group procured materials either from an adjoining province (the case for Group B) or from the marketing outfit that bought their finished products (as was done by all other groups).

Owing to differences in production dynamics, "profit" sharing also came in two forms.[7] Groups A, C and D divided the group's earnings based on the number and type of product each member was able to accomplish. Group B, on the other hand, allocated its earnings according to the number of hours each member spent in work. Unlike other groups, therefore, Group B members were paid by the hour, the rate of which varied according to the income which the group was able to earn per job order. As pointed out earlier, prices were determined by the marketing outfit which bought all of the workers' products.[8] Since there was no other outlet for their work, the group members had to accept this, though not, it might be mentioned, without a number of complaints on their part.

Social and Economic Characteristics of the Home Industry Workers

Sociodemographic Profile

As shown in Table 1, persons working in this particular home industry were about equally distributed among the different age groups. Young adults (20-35 years old) were as numerous as the middle-aged group (36-45 years old) as well as those in the older years. Overall, 64 percent of the workers were females. Sex distribution, however, varied strikingly between the various work groups. Every single one of the workers in Group A was a woman, whereas all of those in Group B were males. Females showed a slight predominance (56 percent) in Group C and also outnumbered males in Group D, where they comprised 72 percent of all workers.

In interpreting these data it is useful to keep in mind that much of the necessary labor for handicraft production is performed by other household members, particularly children. If these had been included as respondents in the survey, the resulting age profile would, of course, have been much younger. Also worthy of note is the fact that most workers had been employed by the industry for at least five years. As such, the age at which they had begun this sort of work was younger than that shown in Table 1.

The mean family size among the respondents was 3.81 children. Only twelve percent had more than five children. For the most part, these children had not yet reached adulthood. Over 80 percent were less than 22 years old, while 62.5 percent were in the school age bracket (7 years old and above). Given these data, it could be inferred that most households had a good number of dependents to feed and to send to school.

Educational levels among the children were not particularly low. At the time of the study, most of the school-aged children were in school and a fairly good number of them (27 percent) had also been to college. Another 37 percent were in high school and 36 percent were still at the primary or elementary levels.

It might also be noted that slightly more than half (53 percent) of the respondents were farmers who owned pieces of agricultural land. To them the home industry was merely a secondary source of income. To the remaining 47 percent, however, the home industry was a major, if not the only source of income, and therefore their only means for survival. This was particularly true of the handicraft workers residing in the poblacion (Group A) where 79 percent of them were totally dependent on the home industry for their sustenance. A large percentage (45 percent) of the bamboocraft workers in the poblacion (Group B) were in a similar situation. However, 83 and 56 percent, respectively, of the workers in Groups C and D responded positively to the question as to whether they also farmed some land.

At the time of the study, the area in question was suffering from one of the most severe

Table 1. *Age of respondents*

Ages (yrs.)	A	B	C	D	Total
Below 30	2	1	1	4	8(12.1%)
31 – 35	3	4	3	5	15(22.7%)
36 – 40	3	1	2	3	9(13.6%)
41 – 45	4	3	4	2	13(19.7%)
46 – 50	3	–	3	3	9(13.6%)
51 and above	4	2	5	1	12(18.2%)
Total	19	11	18	18	66(99.9%)

droughts in its history. The National Irrigation Administration had failed to deliver water for more than a year. Thus, all home industry workers except for the 9 percent who owned irrigation pumps became totally dependent on the home industry for subsistence.

Ownership levels for farm-related objects other than a pump were also not high. Only 35 percent of the respondents owned a carabao, 27 percent a plow harrow, and a mere 4 percent a hand tractor.

Given this profile of dependency, it becomes important to determine how adequate is the income of these handicraft workers. In particular, does this industry offer a viable alternative to farming or other farm-related occupations?

Profitability and Gainfulness of Home Industry Work

As a means of determining the levels of living earned by each of the four groups, an analysis will first be made of the handicraft goods which they produce as far as the following factors are concerned: labor investment, cost of materials, unit sale cost, and the resulting labor cost per hour. Data on these factors, as they refer to the handicraft workers in Group A, are therefore shown in Table 2. From Table 2 it could be gathered that the handicraft workers' resulting daily income of ₱8.72 (obtained by multiplying the average labor cost per hour by 8 hours) was far below that of an agricultural worker's which at the time of the study was ₱15.00 per eight-hour day. Agricultural laborers are also given free snacks in the morning and in the afternoon. The table also shows that the labor cost per hour tends to decline as the amount of time needed to complete work on the item goes up. Thus, profitability is greatest for the bead necklace, which takes less than half an hour to assemble, and least for the RD-Ipil-Tigbi, which requires 35 hours of work per set. Worthy of note, however, is the fact that the return on the initial investment (for materials) is greater for those products which require extra time to make.

Among the subcontracted handicraft workers, the pay was even less. For instance, stringing a bead curtain gave one an income of ₱.15 per strand or about ₱3.00 a day for 20 strands. This comes to only 50 centavos per hour, or roughly half of the mean labor cost per hour of the registered handicraft workers.

Among all the home industry workers' groups, Group B (slatted bamboocraft workers) was found to be somewhat better off than those in the other categories. As will be recalled, this was the only group where production cost was equally shouldered by all, where products went through an assembly line process, and where workers were paid according to the actual number of hours spent working in the foundation's machine shop.

Table 2. *Labor Investment and Other Cost Factors per Item among Handicraft Workers in Group A*

Item	No. of hrs. invested per piece	Unit sale cost	Unit expenses (materials)	"Net" per unit or item	Computed labor cost per hour
Pagoda chimes	.875 hrs.	(₱) 4.50	(₱) 3.15	(₱) 1.35	(₱) 1.54
RD – ipil-tigbi	35 hrs/set	26.50	10.85	15.65	.44
Bead necklace	.35 hrs/set	2.05	1.48	.57	1.63
Chip curtain	27 hrs/set	32.00	12.00	20.00	.74

Mean labor cost per hour: P1.09

The data collected for this particular group covered only one job order (that of lampshades). The production of this item involved the amount of ₱10,524.00 for raw materials and entailed a total of 5,005 man-hours of labor. The computed hourly rate based on the group's net income for this particular job order amounted to ₱4.04. Further interviews revealed that this rate was just about the average that this group obtained for every product made. With this rate as an index, the workers' daily income at a maximum of eight hours each day can be estimated as about ₱32.32.

Another advantage for this group was that it did not run out of work orders for more than one month during the time of the study. With this as a gauge, it could therefore be inferred that workers in Group B got at least ₱800 a month each during peak seasons, as in the period just before Christmas.

For the solid bamboocraft workers in Group C, cost and income data were collected on the five different items shown in Table 3. This table shows an even lower rate of return per man-hour of work than was the case for either of the two preceding groups. Indeed, the data show that the workers were actually losing money on one item (the center piece), while their average wage came to only 58 centavos per hour. This was the lowest hourly labor cost for any of the four groups and shows this group to be the most economically disadvantaged. The only redeeming feature that can be mentioned for this type of work, then, is that it requires less vigorous and meticulous execution than was the case for either Group A or Group B.

Variation in the number of hours needed to produce the items listed in Table 3 is not great. As such, this factor appears to play a less important role in determining returns to the initial investment, though there is again some tendency (as was the case with Group A) for hourly pay rates to be lower for those items (e.g. the center piece and "1460 Natural") which take a lot of time to produce.

As shown in Table 4, a picture similar to groups A and C was manifested by the product profile of Group D. That is, hourly labor costs for this group were again quite low. At an average of ₱1.13 per hour, a bamboocraft worker in this group got only ₱9.00 for an eight-hour day.

Interviews further revealed that the workers wrote off a loss in the production of at least one item – the waste basket. The unreasonably low buying price quoted by the marketing outfit left them scrimping on leftover materials to make ends meet. "Lugi kami" was the workers' unanimous verdict on the profitability of this particular product. If they could only be given a choice they would not take on orders of this kind. Even the other articles were not too successful as far as profitability is concerned, at least when one takes into account the fact that

Table 3. *Cost of Materials and Other Cost Factors per Item Among Solid Bamboocraft Workers (Group C).*

Item	No. of hrs. invested per piece	Unit sale cost	Unit expenses (materials)	"Net" per item	Labor cost per hr.
Solid lantern	1.75	₱ 5.50	₱ 2.40	₱ 3.10	₱ 1.77
Mugs	1.60	2.50	2.15	.35	.22
Slatted basket	2.25	10.00	7.40	2.60	1.66
Center piece	2.25	3.50	4.15	(.65)	(.29)
1460 natural	2.85	15.04	14.95	.09	.03

Mean number of hours per product: 2.1
Mean labor cost per hour: P0.58

Table 4. *Cost of Materials and Other Cost Factors per Item and Unit Sale Cost.*

Item	No. of hrs. invested per product	Unit sale cost	Unit expenses (materials)	"Net" per item	Labor per hour
Flower vase	8	₱ 7.50	₱ 2.75	₱ 4.75	₱ .59
Mirror	3	19.00	13.45	5.55	1.85
Granny	8	23.50	7.35	16.15	2.02
Dome lampshade	3.3	10.50	6.45	4.05	1.21
Waste basket	8/set	16.00	18.80	(2.80)	(.35)
Star weave	3	5.50	1.15	4.35	1.45

Mean no. of hours invested per unit: 5.6
Mean labor cost per hour: P1.13

subcontracted workers had yet to share with the workers' proceeds. For their part, pay scales for this latter group were very low indeed. On the average each was paid ₱1.00 for every six mats woven. Since each mat took some 30 minutes to weave, this meant a compensation of only about 33 centavos an hour or a mere ₱2.00 for a six-hour work day.

Table 5 presents a summary profile of the workers' gross and net incomes for the busiest six months in 1983 (i.e. July 1983 to January 1984). These figures, taken from the payroll which was prepared for each group, represented the respective group's actual earnings, i.e., the amount that accrued to its members after their production loans had been paid. The per capita net income was computed from each group's net earnings.

The figures shown in Table 5 agree well with those presented earlier. The relatively high monthly wages earned by Group B correspond to the high labor costs per hour found for this group. Similarly, it is the handicraft and the solid bamboocraft employees who were earning the least during this six-month period, just as they had been shown earlier to be receiving the lowest earnings when computed on an hourly basis.

These figures suggest that one requirement for greater profitability in the handicraft industry is to provide for increased capitalization and division of labor. As will be recalled, it was the workers in Group B (who were employed in the foundation's machine shop) who benefited most from these two working conditions. The high proportion of female workers in Groups A, C and D might also be mentioned in this regard. Perhaps there has been some form of subtle discrimination in the pricing scales for products produced by these groups, as based on the fact that they are largely composed of women.

Two other points should also be made in relation to the data shown in Table 5. In the first place, there was considerable variation in monthly wages earned by members *within* Groups C and D. In both cases, those workers who specialized in handicraft activities were paid considerably less than those who were not (i.e. the solid bamboocraft specialists of Group C and the woven bamboocraft workers of Group D). For example, the handicraft workers employed within Group B were earning only ₱104 per month during the period in question, as compared to over a thousand pesos per month for the solid bamboo craft workers *per se*. Thus, the figures for Groups C and D which are shown in the table are only approximate values, and may be expected to vary further, according to the tasks of each worker.[9]

In addition, the reader should again be reminded that these same three lowest-paid work groups (A, C and D) were also most prone

Table 5. *Summary Profile of the Workers' Gross and Net Incomes July 1983 – January 1984*

Group	Gross sales	Cost of materials	Net profit	Per capita profit	Monthly wage
A	₱95,782	₱38,418	₱57,364	₱2,868	₱ 478
B	170,428	81,146	89,282	7,440	1,240
C	69,083	25,393	43,690	2,731	455
D	111,282	48,296	62,985	3,705	618

to obtain assistance from other members of the household. Moreover, some aspects of these jobs were subcontracted. Thus, *per capita* or per worker incomes would be even lower than those shown in the table.

Workers' perceptions of their work

Regardless of their seemingly niggardly earnings, the workers expressed strong attachment to their home industry work for reasons of survival. It was a common sentiment that the efforts workers invested in their work were at times negated by the paltry sums paid to them *("hindi sulit sa pagod")*. In the absence of a viable alternative, though, they felt, that they really had no other choice. *"Walang ibang pagkakakitaan"* (We have no other source of livelihood), they begrudgingly admitted. Prior to the 1983 drought, some workers interspersed their home industry job activities with farm work, which tended to be more profitable. However, this practice was not always best for the home industry outfit since it meant that quotas were not punctually filled and that obligations to importers were correspondingly jeopardized. Undoubtedly, this practice was beneficial for neither the export business nor for those wholly dependent on the home industry outfit. The fact remains, though, that under the present exploitative circumstances, home industry will remain a secondary source of income that will be pursued only when other avenues for survival are closed.

Concluding Statements

The foregoing account shows the miserable plight of the home industry workers under study. While a marketing outfit assured them of the sale of their products, this same firm also divested them of the substantial profits that an export market can provide. This case demonstrates that the plain producers in an economic system, in their quest for survival, unwittingly breed an asymmetrical situation where their weaknesses are exploited and exaggerated. Unless the producers themselves undertake the marketing of their own products and reliance on the present marketing outfit remains duly minimized, their plight shall remain pathetic despite their products' worthy contribution to the country's export revenues. This, however, may take a long time to develop as the task requires organizational skills entirely different from what the workers were exhibiting at the time of the study.

Notes

[1]Thus, the Philippine Chamber of Cottage Industries estimates that sales of handicraft items bring in 350 million dollars per year, as compared to the much lower figure of 92 million dollars which is cited by NACIDA. Estimates by the Central Bank and MTI/NCSO fall in between these two extremes (Aguilar and Miralao, 1984:30-31).

[2]Thus, the *net* earnings of the electronics industry in 1983 were only 1,085 million dollars, as compared to a gross total of 4,511 million dollars. In contrast, the net earnings of industries dependent strictly upon indigenous materials (handicrafts, furniture making, wood manufacturing) came to 609 million dollars for this same time period.

[3]Attempts were at first made to interview all of the workers. However, failure to meet six of the potential respondents after two attempts constrained the researcher to delete them from the sample.

[4]The outfit was officially registered as a cooperative but existed, in fact, only as a group whose members functioned as wage earners. No decisions were made by the workers. Allocation of job orders, determination of production expenses, and the like, were all controlled by the manager (an ex-priest from Europe who later married a Filipina).

[5]The payroll reflected both the wages earned by the workers and deductions for repayment of the group's production loan.

[6]Job orders often came in pulses, thus requiring the workers to work full-time (both day and night work) during periods of peak activity in order to beat resulting deadlines. For Group C (members of which lived in a non-electrified sitio) this meant working by the flickering light of a kerosene lamp. Their work under these circumstances was thus not only physically taxing but psychologically demanding as well.

[7]The word "profit" here should not be taken in the strict sense of the word, insofar as the monies that the workers got were actually payments for their labor. No money accrued to the group as a whole after all payments had been made for the group's loan and labor. Virtually the only profit which they were able to obtain came from leftover materials which could be saved for the next job order.

[8]The pricing scheme took into consideration the cost of materials but used a very low estimate for this. For example, the bamboo internodes needed to make the lampshades were priced by the marketing outfit at only 60 to 75 centavos, whereas their actual cost at the time of the survey was ₱1.35 each.

[9]Further statistics on the earnings of specific subgroups within the four major categories are available upon request from the author.

References

Aguilar, Filomeno V., Jr. and Virginia A. Miralao
1984 "Handicrafts development and dilemmas over definition (The Philippines a case in point)." *Handicraft Paper Series No. 1.* Manila: Ramon Magsaysay Award Foundation.

Ibon Data Bank
1984 "Non-traditional exports top priority." *Ibon Facts and Figures.* August 31.