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Workforce Profile of New or Recently Expanded Manufacturing and Exported Services Firms in North Dakota

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Abstract

North Dakota has experienced substantial growth in employment during the 1990s, with much of that growth occurring in the manufacturing and exported services sectors. (Exported services include such activities as telemarketing and data processing where the major market for the service is outside North Dakota.) This study presents the employment and demographic characteristics of employees at new and expanding manufacturing and exported services firms in North Dakota. The workers were asked to rate their opportunity for advancement, their opportunity for technical/skills training, and the type of training that would best enable their advancement with their current employer. The workers also described their current housing and their plans to look for different housing. Data came from a survey of workers at 12 new or expanding manufacturing and exported services firms, located in both rural and urban areas across North Dakota. Completed surveys were received from 324 workers, or about 27 percent of the total employees of the 12 firms.

About 83 percent of the respondents reported that they were paid an hourly wage, while 17 percent received an annual salary. The overall average hourly wage was \$9.92, with manufacturing workers earning an average of \$8.70 and exported services workers earning an average of \$10.26.

Persons between 20 and 40 years old made up more than two-thirds of the workers responding to the survey. Male workers made up 56 percent of the respondents employed by manufacturers but only 41 percent for exported services firms. About 21 percent of the workers, overall, had moved to their present community when they took their current job, while the remaining 79 percent had been residing in the community prior to taking their current job. Almost 62 percent of the respondents owned their current home while 36 percent rented. The respondents most commonly lived in single-family houses (63%), followed by apartments or duplexes (28%), and mobile homes (8%).

More than 80 percent of the respondents rated their opportunities for technical/skills training at their current place of employment as *good to excellent*. Training in computers and computer software was the type of training most often indicated by respondents as being helpful to their advancement at their present place of work. Almost two-thirds of respondents said they would be *definitely interested* in obtaining training while another 28 percent would be *somewhat interested*. Less than one person in ten said they were *not at all interested* in further training.

Key Words: manufacturing, exported services, workforce, training, North Dakota, economic development

Highlights

North Dakota has experienced substantial growth in employment during the 1990s, with much of that growth occurring in the manufacturing and exported services sectors. New and expanding firms in the manufacturing and exported services sectors have created new job opportunities not only in the state's larger urban centers but also in smaller communities. However, when expanding employment opportunities lead to in-migration of persons from other areas, questions may arise regarding the adequacy of the host community's housing and public services to meet the needs of the new workers and their families. Increasing employment opportunities also are leading to shortages of skilled workers.

This study examines the employment and demographic characteristics of employees at new and expanding manufacturing and exported services firms in North Dakota. The workers were asked to rate their opportunities for advancement, their opportunities for technical/skills training, and the type of training that would best enable their advancement with their current employer. The respondents also described their current housing and their plans to look for different housing. Data came from a survey of workers at 12 new or expanding manufacturing and exported services firms, located in both rural and urban areas across North Dakota. Completed surveys were received from 324 workers, or about 27 percent of the total employees of the 12 firms.

About 35 percent of the workers responding to the survey had worked for their current employer for less than one year, 52 percent had worked from one to five years, and 13 percent had worked six years or more. About 83 percent of the respondents reported that they were paid an hourly wage, while 17 percent received an annual salary. The overall average hourly wage was \$9.92, with manufacturing workers earning an average of \$8.70 and exported services workers earning an average of \$10.26. Among the workers who were paid an annual salary, 42 percent received a salary of \$30,000 or more, while 47 percent were paid between \$20,000 and \$30,000, and 11 percent were paid less than \$20,000 per year.

Persons between 20 and 40 years old made up more than two-thirds of the workers responding to the survey. Male workers made up 56 percent of the respondents employed by manufacturers but only 41 percent for exported services firms. About one-third of the respondents were single, overall, while about 57 percent were married and about 10 percent were widowed, separated, or divorced. About 59 percent of the respondents had attended college, while 14 percent had attended a trade school, and the remaining 27 percent listed high school as their highest level of education.

About 21 percent of the respondents had moved to their present community when they took their current job, while the remaining 79 percent had been residing in the community prior to taking their current job. The percentage of relocating workers was substantially higher for the manufacturing sector (32%) than for the exported services sector (18%) respondents. The relocating workers were slightly older, on average, than those who were previous residents of the community (36 vs. 33.7 years). The two groups were quite similar as regards marital status and average household size. Only about 17 percent of the relocating workers had not pursued post-secondary education, compared to 31 percent of the previous residents. The relocating workers

were more frequently paid an annual salary than were the previous residents (27.5% vs. 13.5%). The relocating workers also tended to be more heavily represented in the upper salary and wage levels.

Almost 62 percent of the respondents owned their home while 36 percent rented (the remaining 2.9 percent lived with their parents). The respondents most commonly lived in single-family houses (63%), followed by apartments or duplexes (28%), and mobile homes (8%). The relocating workers were more likely than previous residents to rent their housing (46% vs. 33%). Almost one-third of the respondents indicated that they anticipate looking for different housing within the next year.

When asked whether they saw their jobs as temporary or permanent, most respondents (80%) regarded them as permanent. Almost two-thirds rated their opportunity for advancement at their current place of employment as *good to excellent*. More than 80 percent rated their opportunities for technical/skills training at their current place of employment as *good to excellent*. Training in computers and computer software was the type of training most often indicated by respondents as being helpful to their advancement at their present place of work. Almost two-thirds of respondents said they would be *definitely interested* in obtaining training while another 28 percent would be *somewhat interested*. Less than one person in ten said they were *not at all interested* in further training.

Workforce Profile of New or Recently Expanded Manufacturing and Exported Services Firms in North Dakota

F. Larry Leistritz and Randal C. Coon*

Economic development and diversification have been a priority in North Dakota for more than a decade. The state's economic development program, **Growing North Dakota**, which was enacted in 1991, has enjoyed substantial success. From 1990 to 1995, total employment statewide grew by 10.7 percent, compared to only 3.6 percent from 1985 to 1990 (Coon and Leistritz 1997a). Among the sectors registering substantial growth were services (12,529 jobs) and manufacturing (5,145 jobs). This is consistent with the goals of **Growing North Dakota**, which emphasized growth in value-added agricultural processing, in other manufacturing, and in exported services (Leistritz 1995).

New and expanding firms in the manufacturing and exported services sectors have created new job opportunities not only in the state's larger urban centers but also in smaller communities. (Exported services firms engage in activities such as telemarketing and data processing where the major market for the service is outside North Dakota.) The job opportunities associated with these new or expanding primary sector firms may allow the host communities to retain local workers and their families, who might otherwise be forced to seek employment elsewhere, or they may lead to in-migration of persons from other areas. (Primary sector or basic sector firms are those that sell part or all of their product or service to markets outside North Dakota.) When a project leads to a substantial level of in-migration, questions may arise regarding the adequacy of the host community's housing and public services to meet the needs of the new workers and their families.

Increasing employment opportunities in North Dakota are leading to low unemployment rates and to shortages of skilled workers such as machinists/welders, engineers, and sales personnel (Coon and Leistritz 1997b). North Dakota's unemployment rate for March 1997 was 3.2 percent, the lowest March rate since unemployment rates were first calculated for the state in 1958 (Job Service North Dakota 1997). Tight labor market conditions point to the need for skills training to enable workers to qualify for available jobs.

This study presents the employment and demographic characteristics of employees at new and expanding manufacturing and exported service firms in North Dakota. The workers were asked to rate their opportunities for advancement, their opportunities for technical/skills training, and the types of training that would best enable advancement with their current employer. Finally, the workers described their current housing and their plans to look for different housing. The report thus represents another step toward obtaining a clearer understanding of the socioeconomic effects of new or expanding primary sector businesses.

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Procedures

To obtain information about the economic effects that new or recently expanded primary sector firms have on the North Dakota economy, a two-stage survey was conducted. An initial questionnaire requesting information about plant expansion, employment, and expenditures was mailed in April, 1996 to 124 new or recently expanded firms across the state. Of these, 42 returned completed surveys, which served as the basis for a report summarizing these firms' direct employment, expenditures, and plant expansion (Coon and Leistritz 1997b).

From the firms completing the initial survey, 12 were selected to participate in the worker survey reported here. These 12 firms represent a cross section of new and expanding manufacturing and exported services firms, located in both rural and urban areas of North Dakota (Figure 1). The worker questionnaires (see Appendix) were sent to the personnel director, or other specified contact person at each company, who distributed them to the workers. Self-addressed return envelopes were provided to facilitate return of the completed questionnaires to the Department of Agricultural Economics. A total of 1,214 questionnaires were distributed to the 12 companies, and 324 completed surveys (26.7 percent) were returned (Table 1). Of the returned surveys, about 74 percent were from employees of exported services firms.

Results

Of the workers who responded to the survey, about 35 percent had worked for their current employer for less than one year, while 52 percent had worked from one to five years, and 13 percent had worked six years or more (Table 2). About 83 percent of the respondents reported that they were paid an hourly wage, while 17 percent received an annual salary.

Wages and Earnings

The overall average hourly wage for respondents was \$9.92, with manufacturing workers earning an average of \$8.70 and exported services workers receiving an average of \$10.26. Manufacturing workers most frequently reported an hourly wage of less than \$7.50 while exported services workers most often reported an hourly wage between \$7.50 and \$9.99 (Table 2). Hourly wage rates averaged somewhat higher for male workers (\$10.97) than for their female counterparts (\$9.16). Hourly wage rates averaged substantially higher for workers whose education included college (\$10.65) or trade school (\$10.38), compared to those who listed high school as their highest level of formal education (\$8.44). Wage rates also tended to increase substantially as the time employees had worked with their present employer increased. Workers who had worked one year or less averaged \$7.98 per hour, compared to \$9.86 for workers with one to five years with the current employer, \$13.77 for those with six to ten years, and \$18.79 for those with more than ten years.

Among the workers who were paid an annual salary, 42 percent received a salary of \$30,000 or more, while 47 percent were paid between \$20,000 and \$30,000 per year, and 10.5 percent received less than \$20,000 per year (Table 2). Manufacturing workers most often reported salaries over \$30,000 while services workers most often had annual salaries between \$20,000 and \$30,000.

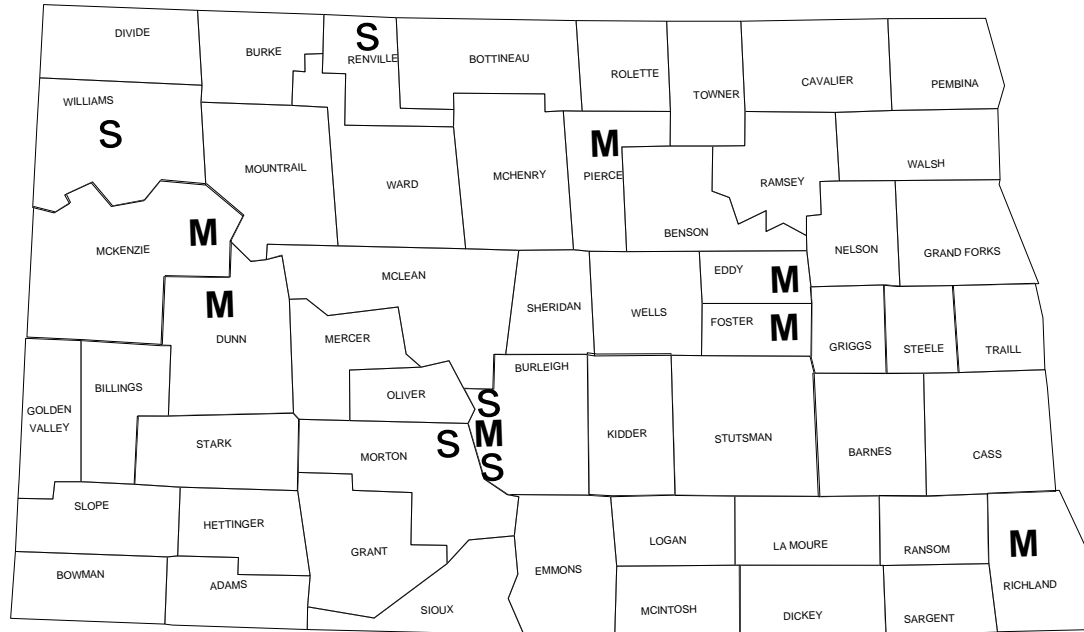


Figure 1. Location of Firms Participating in Worker Survey

M = manufacturer

S = exported services firm

Table 1. Number of Employees of Surveyed Firms and Number of Usable Questionnaires, New and Expanding Firms by Type, North Dakota, 1997

Firm Type	Number of Employees	Number of Questionnaires	Percent Response
Ag. Processing and Manufacturing	342	84	24.6
Exported Services	<u>872</u>	<u>240</u>	<u>27.5</u>
Total	1,214	324	26.7

Table 2. Employment Characteristics of Employees of New and Expanding Firms, North Dakota, 1997

Characteristic	Firm Type		Overall
	Manufacturing	Services	
	-----percent-----		
How Long Worked for Current Employer:			
Less than 1 year	29.8	36.3	34.6
1 to 5 years	64.3	47.9	52.2
6 to 10 years	6.0	7.5	7.1
10 years or more	0.0	8.3	6.2
Form of Payment:			
Hourly Wage	74.4	85.8	82.9
Annual Salary	25.6	14.2	17.1
Hourly Wage Rate:			
Less than \$7.50	41.4	27.1	30.4
\$7.50 to \$9.99	36.2	39.2	38.5
\$10.00 to \$14.99	20.7	19.1	19.4
\$15.00 or more	1.7	14.6	11.7
Annual Salary:			
Less than \$20,000	15.0	8.1	10.5
\$20,000 to \$29,999	30.0	56.8	47.4
\$30,000 or more	55.0	35.1	42.1

The annual earnings of hourly wage workers were estimated by multiplying the average hourly wage rate times the average hours worked per week times the weeks worked per year and adding overtime pay at an assumed wage rate of 1.5 times the reported hourly wage. The annual earnings of these workers averaged \$23,430 overall, with manufacturing workers earning an average of \$20,734 and exported services workers averaging \$24,210 (Table 3). Annual earnings tended to increase with age up to age 40. Workers less than age 20 averaged \$11,191 in annual earnings, compared to \$24,387 for those in the age group 20 to 29, and \$27,646 for those 30 to 39. Annual earnings declined somewhat for workers over 40. This can be attributed in part to somewhat lower levels of education of older workers. Among workers over age 40, 33 percent listed high school as their highest level of education, compared to only 26 percent for those under 40. The relationships of annual earnings to workers' education, gender, and length of time worked for their present employer were similar to those noted with respect to hourly wage rates (Table 3).

Table 3. Annual Earnings for Hourly Wage Employees of New and Expanding Firms Responding to Survey, North Dakota, 1997

Characteristic	Annual Earnings				Mean Dollars
	Less than \$10,000	\$10,000 to \$19,999	\$20,000 to \$29,999	\$30,000 or more	
	-----percent-----				
Age:					
Less than 20	42.9	50.0	7.1	0.0	11,191
20 to 29	4.2	36.6	29.6	29.6	24,387
30 to 39	1.9	38.9	25.9	33.3	27,646
40 to 49	8.3	50.0	16.7	25.0	23,976
50 or more	<u>5.0</u>	<u>85.0</u>	<u>5.0</u>	<u>5.0</u>	<u>16,551</u>
Total	7.2	45.6	22.1	25.1	23,430
Gender:					
Male	4.5	31.5	32.6	31.5	26,347
Female	9.4	57.9	13.1	19.6	21,004
Education:					
High School	8.3	58.3	26.7	6.7	18,758
Trade School	0.0	43.3	33.3	23.3	25,984
College	6.7	40.4	16.4	36.5	25,813
How Long Worked for Present Employer:					
Less than 1 year	14.3	57.1	24.3	4.3	17,449
1 to 5 years	4.0	47.5	19.8	28.7	23,645
6 years or more	0.0	8.0	24.0	68.0	39,311

Annual salaries of employees who received a salary rather than an hourly wage followed similar patterns. Reported salaries tended to increase with age. Among the respondents less than age 30, only 15 percent reported salaries of \$30,000 or more, whereas 100 percent of the respondents age 50 or over reported salaries in that range (Table 4). Male workers were more likely to report salaries over \$30,000 than their female counterparts, and more than 93 percent of those whose education included at least some college reported salaries over \$20,000. The length of time worked for the current employer also was associated with higher salaries. Only 22 percent of the respondents who had worked less than one year for the current employer received salaries of \$30,000 or more, whereas 100 percent of those who had worked six years or more reported salaries in this range.

Table 4. Annual Salary by Respondent Characteristics, New or Expanding Firms, North Dakota, 1997

Characteristic	Annual Salary		
	Less than \$20,000	\$20,000 to \$29,999	\$30,000 or more
	-----percent-----		
Age:			
Less than 30	20.0	65.0	15.0
30 to 39	4.4	39.1	56.5
40 to 49	7.7	38.5	53.9
50 or over	0.0	0.0	100.0
Gender:			
Male	0.0	41.9	58.1
Female	23.1	53.8	23.1
Education:			
High School	25.0	25.0	50.0
Trade School	20.0	40.0	40.0
College	6.8	52.3	40.9
How Long Worked for Present Employer:			
Less than 1 year	22.2	55.6	22.2
1 to 5 years	9.7	53.7	36.6
6 years or more	0.0	0.0	100.0

Demographic Characteristics

Persons between 20 and 40 years old made up more than two-thirds of the workers responding to the survey (Table 5). Exported services firms had somewhat more workers younger than age 20 (8.7%) than did manufacturers (1.2%). On the other hand, manufacturers had a higher percentage of workers age 40 or over (30.9% vs. 23.9% for service firms).

Male workers constituted 56 percent of the respondents employed by manufacturers but only 41 percent for exported services firms (Table 5). About one-third of the workers were single, overall, while about 57 percent were married and about 10 percent were widowed, separated, or divorced. The percentage of single workers was somewhat higher in the exported services sector, possibly a reflection of the somewhat younger ages of these workers.

Table 5. Demographic Characteristics of Employees of New and Expanding Firms Responding to Survey, North Dakota, 1997

Characteristic	Firm Type		Total
	Manufacturing	Services	
	-----percent-----		
Age:			
Less than 20	1.2	8.7	6.8
20 to 29	29.8	39.3	36.8
30 to 39	38.1	28.0	30.7
40 to 49	20.2	17.2	18.0
50 and over	10.7	6.7	7.7
Gender:			
Male	56.0	40.6	44.6
Female	44.0	59.4	55.4
Marital Status:			
Single	25.0	35.4	32.7
Married	66.7	53.8	57.1
Widowed/Separated/Divorced	8.3	10.8	10.2
Highest Level of Education:			
High School	36.9	24.4	27.6
Trade School	22.6	10.5	13.7
College (some)	40.5	65.1	58.7
Did Respondent Move to Community When They Took Current Job?			
Yes	31.7	17.9	21.4
No	68.3	82.1	78.6

About 59 percent of the respondents had attended college, while 14 percent had attended a trade school, and the remaining listed high school as their highest level of education (Table 5). The percentage attending college was substantially higher for the service sector firms (65.1%) than for manufacturers (40.5%). On the other hand, the percentage who had attended a trade school was substantially higher in the manufacturing sector (22.6% vs. 10.5% in the service sector). A likely explanation is that skills required in manufacturing are more likely to be acquired in a trade school than those required by the services firms.

About 21 percent of the respondents had moved to their present communities when they took their current job. The remaining 79 percent had been residing in the community prior to taking their current job. The percentage of relocating workers was substantially higher for the manufacturing sector (32%) than for the exported services firms (18%). A possible explanation is that adequacy of the local labor supply is typically a primary location criterion for exported services firms (Leistritz 1993), and hence these firms have often located in North Dakota's larger communities. On the other hand, the logistics of assembling raw materials and distributing products, adequacy of water supplies and other local infrastructure, and physical proximity to suppliers or customers may play a greater role in location decisions of manufacturing firms. Overall, 25 percent of the workers employed by firms in nonmetro locations had relocated, compared to only 19 percent of workers at metro firms.

Demographic characteristics of the relocating workers (i.e., those who moved to their present community when they took the job) are compared to those of the previous residents in Table 6. The relocating workers were slightly older, on average, than those who were previous residents of the community (36 vs. 33.7 years). The two groups were quite similar as regards marital status and average household size, although the relocating workers more frequently reported single-person households. Only about 17 percent of the relocating workers had not pursued post-secondary education, compared to 31 percent of the previous residents.

Employment characteristics of the relocating workers and previous residents are compared in Table 7. Relocating workers were more likely to regard their job as permanent (92.7%) than were previous residents (76.2%). The relocating workers were more frequently paid an annual salary (27.5%) than were the previous residents (13.5%). The relocating workers also tended to be more heavily represented in the upper salary and wage levels. For example, among those who received annual salaries, 60 percent of the relocating workers reported salaries of \$30,000 or more, compared to only 28.6 percent of the previous residents. Among those who were paid an hourly wage, 52 percent of the relocating workers reported wage rates of \$10 or greater, compared to only 26 percent of the previous residents. Overall, it appears that the relocating workers include a substantial percentage of persons in upper level management jobs or in positions requiring special skills or experience.

Another contrast between the two groups relates to the percentage of the married workers' spouses who were employed. About 69 percent of the relocating workers reported that their spouses were employed, compared to 88 percent of the previous residents.

Table 6. Demographic Characteristics of Relocating Workers and Previous Residents, Employees of New and Expanding Firms Responding to Survey, North Dakota, 1997

Characteristic	Units	Relocating Workers	Previous Residents
Age:			
Mean	Years	36.0	33.7
Distribution:			
Less than 20	Percent	2.9	7.9
20 to 29	“	31.9	38.5
30 to 39	“	33.3	29.8
40 to 49	“	24.6	16.3
50 and over	“	7.3	7.5
Marital Status:			
Single	“	33.3	32.8
Married	“	55.1	57.3
Widowed/separated/divorced	“	11.6	9.9
Household Size:			
Mean	Number	2.7	2.7
Distribution:			
1	Percent	37.7	29.3
2	“	15.9	24.5
3	“	13.0	17.0
4	“	14.5	15.8
5 or more	“	18.8	13.4
Highest Level of Education:			
High School	Percent	17.4	30.7
Trade School	“	18.8	12.0
College (some)	“	63.8	57.4

Table 7. Employment Characteristics of Relocating Workers and Previous Residents, Employees of New and Expanding Firms Responding to Survey, North Dakota, 1997

Characteristic	Relocating Workers	Previous Residents
	-----percent-----	
Is Job Viewed as Temporary or Permanent?		
Temporary	7.3	23.8
Permanent	92.7	76.2
Form of Payment:		
Hourly Wage	72.5	86.5
Annual Salary	27.5	13.5
Hourly Wage Rate:		
Less than \$7.50	12.5	34.5
\$7.50 to \$9.99	35.4	39.2
\$10.00 to \$14.99	29.2	17.2
\$15.00 or more	22.9	9.1
Annual Salary:		
Less than \$20,000	10.0	11.4
\$20,000 to \$29,999	30.0	60.0
\$30,000 or more	60.0	28.6
Is Spouse Employed?		
Yes	69.2	88.0
No	30.8	12.0

Opportunities for Advancement and Training

When the workers were asked whether they saw their jobs as temporary or permanent, most (80%) regarded them as permanent (Table 8). Almost two-thirds of the respondents rated their opportunity for advancement at their current place of employment as *good* to *excellent*, and these ratings were quite similar for manufacturing and service workers.

When asked to rate their opportunities for technical/skills training at their current place of employment, more than 80 percent of the respondents rated these opportunities as *good* or *excellent*. The exported services workers were somewhat more likely to rate these opportunities as *good* or *excellent* than manufacturing workers (87% vs. 63%).

When asked what type of technical/skills training would best enable them to advance at their present place of employment, the most common response, by a wide margin, was training in computers and computer software (Table 8). About 56 percent of service sector employees and 45 percent of manufacturing workers listed this type of training as most helpful to their advancement.

Table 8. Opportunities for Advancement and Training for Employees of New and Expanding Firms Responding to Survey, North Dakota, 1997

Item	Firm Type		Total
	Manufacturing	Services	
	-----percent-----		
Does Respondent See Job as			
Temporary or Permanent?			
Temporary	18.8	20.6	20.1
Permanent	81.2	79.4	79.9
Respondent's Rating of			
Opportunity for Advancement:			
None	17.3	14.7	15.4
Poor	18.5	23.5	22.3
Good	49.4	42.0	43.9
Excellent	14.8	19.8	18.5
Respondent's Rating of Opportunity			
for Technical/Skills Training:			
None	15.4	4.7	7.4
Poor	21.8	8.2	11.6
Good	46.2	48.5	47.9
Excellent	16.7	38.6	33.1
Type of Technical/Skills Training			
That Would Best Enable Advancement:			
Computer/Software	45.2	55.8	53.3
Accounting	8.1	10.6	10.0
Job-specific training	14.5	6.5	8.4
Management skills	3.2	9.6	8.1
College degree	4.8	4.0	4.2
Other*	12.9	6.0	7.7
Level of Interest in Training:			
Definitely	53.1	68.0	64.3
Somewhat	34.4	26.7	28.3
Not at all	12.5	5.7	7.4

*Includes telecommunications and network skills, sales, and electrical training.

When asked how interested they would be in obtaining training in the area they listed as best enabling their advancement, 64 percent of the respondents said they would be definitely interested while another 28 percent would be somewhat interested. Export service sector workers were more likely to say they were definitely interested. Less than one person in ten said they were not at all interested in further training. Among workers less than 30 years old, 95 percent expressed interest in further training.

Current Housing

Almost 62 percent of the respondents owned their current home, while 36 percent rented, and 2.9 percent lived with their parents (Table 9). Marital status was strongly associated with home ownership, as 70.5 percent of single workers rented their housing while 84.7 percent of married workers owned their homes. Home ownership was also associated with age. Of the workers age 20 to 29, about 39.5 percent owned their home, but the percentage climbed to 79.6 percent for the group aged 30 to 39.

Monthly housing payments covered a wide range, with 23 percent of respondents reporting a monthly payment of less than \$250, almost 39 percent reporting payments of \$250-\$499, about 27 percent paying \$500 to \$749, and about 12 percent paying \$750 or more per month. Those who rented their housing were more likely to have payments of less than \$500 whereas those with payments of \$500 or more were generally home owners.

Respondents most commonly lived in single-family houses (62.6%), followed by apartments or duplexes (28.2%), and mobile homes (7.6%). About 84 percent of those who lived in single family houses and 96 percent of those living in mobile homes owned their dwellings (Table 9).

Relocating workers were more likely than previous residents to rent their housing (46% vs. 33%) (Table 10). They were also more likely to live in apartments or duplexes. Relocating workers' average monthly payment for housing was about \$518, or about 16 percent more than the average for previous residents. About 36 percent of the relocating workers anticipated looking for different housing within the next year, compared to 33 percent of the previous residents.

Table 9. Current Housing of Employees of New and Expanding Firms Responding to Survey, North Dakota, 1997

Item	Current Housing			Overall
	Own	Rent	Live with Parents	
	-----percent-----			
Total	61.6	35.5	2.9	100.0
Marital Status:				
Single	20.0	70.5	9.5	30.7
Married	84.7	15.3	0.0	59.0
Widowed/separated/ divorced	53.1	46.9	0.0	10.3
Age:				
Less than 20	6.7	46.7	46.7	4.9
20 to 29	39.5	58.8	1.8	36.9
30 to 39	79.6	20.4	0.0	31.7
40 to 49	79.3	20.7	0.0	18.8
50 or over	83.3	16.7	0.0	7.8
Monthly payment:				
Less than \$250	39.3	60.7	0.0	23.2
\$250 to \$499	38.7	61.3	0.0	38.6
\$500 to \$749	76.6	23.4	0.0	26.6
\$750 or more	100.0	0.0	0.0	11.6
Type of Dwelling:				
Single Family House	84.1	13.8	2.1	62.6
Apartment/Duplex	3.5	96.5	0.0	28.2
Mobile Home	95.7	4.4	0.0	7.6
Other	80.0	0.0	20.0	1.7

Table 10. Housing Characteristics of Relocating Workers and Previous Residents, Employees of New and Expanding Firms Responding to Survey, North Dakota, 1997

Characteristic	Units	Relocating Workers	Previous Residents
Do You Own or Rent Current Home?			
Own	Percent	54.4	63.5
Rent	“	45.6	32.8
Live with parents	“	0	3.7
Type of Dwelling:			
Single Family House	“	58.8	64.0
Apartment/duplex	“	38.2	24.7
Mobile Home	“	1.5	9.2
Other*	“	1.5	2.1
Monthly Payment:			
Mean	Dollars	517.90	446.61
Distribution:			
Less than \$250	Percent	21.7	23.8
\$250 to \$499	“	33.3	40.3
\$500 to \$749	“	26.7	26.5
\$750 or more	“	18.3	9.4
Anticipate Looking for Different Housing Within Next Year:			
Yes	“	35.8	32.9
No	“	64.2	67.1

*Includes those who live with parents.

Plans to Look for Different Housing

Almost one-third of the respondents indicated that they anticipate looking for different housing within the next year (Table 11). The intention to look for different housing differed greatly depending on ownership of present housing. Of those who own their present housing, less than 16 percent expect to look for different housing. Of those who currently rent, about 57 percent will look for other housing, and almost 78 percent of those who live with their parents plan to seek alternative housing.

Table 11. Plans to Look for Different Housing, Employees of New and Expanding Firms Responding to Survey, North Dakota, 1997

Item	Current Housing			Total
	Own	Rent	Live with Parents	
	-----percent-----			
Anticipate Looking for Different Housing Within the Next Year:				
Yes	15.6	57.4	77.8	32.3
No	84.4	42.6	22.2	67.7
Type of Housing Desired:				
Single Family House	82.8	57.4	14.3	61.9
Apartment/Duplex	10.3	36.1	71.4	30.9
Mobile Home	3.4	4.9	0.0	4.1
Condo/Town House	3.4	1.6	14.3	3.1
Desire to Own or Rent:				
Own	100.0	62.9	0.0	68.8
Rent	0.0	37.1	100.0	31.2

The types of housing desired were generally similar to the present housing mix. About 62 percent would seek a single family house, 31 percent would seek an apartment or duplex, 4 percent would look for a mobile home, and 3 percent want a condo/town house (Table 11). The type of housing sought and preference for ownership versus rental differed substantially depending on the respondent's present housing. Among those who presently own, all would prefer to own their new housing unit, and about 83 percent would seek to own a single family house. Among those who currently rent, about 63 percent would like to own their new unit, and about 57 percent of the renters would like to move to a single family house. Among those who currently live with their parents, all would like to rent their new housing, and 71 percent wish to rent an apartment or duplex.

Conclusions and Implications

North Dakota has experienced substantial growth in employment in recent years, with much of that growth occurring in the manufacturing and exported services sectors. However, when expanding employment opportunities lead to in-migration of persons from other areas, questions can arise concerning the adequacy of the host community's housing and public services to meet the needs of the new workers and their families. Increasing employment opportunities are also leading to shortages of skilled workers.

This study was undertaken to gain a better understanding of the employment-related and demographic characteristics of employees at new and expanding manufacturing and exported services firms in North Dakota. Information also was obtained concerning the workers' current housing and plans to look for different housing, their perception of their opportunity for advancement, and the type of training that would best enable their advancement with their current employer. The information obtained should provide a better understanding of the characteristics of the work force involved in new economic development projects in North Dakota. The information regarding the workers' demographic characteristics may be useful to communities that are sites of new or expanding firms and are planning for the needs of in-migrating workers and their families. The information concerning workers' present housing and their plans to look for different housing would provide insights regarding the types of housing that may be desired in communities where new primary sector firms locate. Finally, the workers' assessment of the types of training that would best facilitate their advancement may prove useful to those who are designing skills training programs, and the fact that more than 90 percent of the survey respondents expressed interest in training and skills enhancement indicates that the demand for such programs may be substantial.

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Appendix

WORKER SURVEY

What is your current occupation (job title)? _____

For which company do you work? _____

What is the major product or service of that company? _____

How long have you worked for your current employer? _____ years

Are you paid on an hourly or annual salary basis? **(Check One)** _____ hourly wage
_____ annual salary

If you are paid an hourly wage: hourly wage rate \$ _____

hours worked per week _____ hours

weeks worked per year _____ weeks

average overtime hours per week _____ hours

(Check One)

If you are paid an annual salary, what is your salary: Less than \$10,000 _____

\$10,000 - \$20,000 _____

\$20,001 - \$30,000 _____

More than \$30,000 _____

What is your age? _____ years

What is your gender: Male _____ Female _____

What is your current marital status: _____ single
_____ married
_____ widowed/divorced/separated

How many dependents do you have in each of the following age categories?

_____ 0-5 years of age

_____ 6-12 years of age

_____ 13-18 years of age

_____ 18 years and older

What is the highest level of education you have completed? _____ high school
_____ trade school
_____ college

How far do you commute (one-way) to work? _____ miles

Where do you live? _____
(city/town or nearest town, if rural)

-Over-

Did you move to your current community when you got your current job? Yes _____ No _____

How long have you lived in your current community? _____ years

Where did you live before your current community (city/town and state)? _____ / _____
(city/town) (state)

What was your occupation (job title) before your current job? _____

For which company did you work prior to your current job? _____

Where was your employment prior to your current job (city/town and state)? _____ / _____
(city/town) (state)

Do you view your current job as temporary or permanent? _____ temporary
_____ permanent

At your current place of employment, how do you rate your:

(a) opportunity for advancement ()None ()Poor ()Good ()Excellent

(b) opportunity for technical/skills training ()None ()Poor ()Good ()Excellent

What kind of technical/skills training would best enable you to advance in your current place of employment? _____

How interested would you be in obtaining training in that area? ()definitely () somewhat () not at all

If married, is your spouse employed? Yes _____ No _____

If spouse works, who is spouse's employer? _____

Where is spouse's job location? _____

What is spouse's current occupation (job title)? _____

How long has spouse worked at current job? _____ years

How far does spouse commute (one-way) to work? _____ miles

Do you own or rent your current home? Own _____ Rent _____

Amount of monthly rent or mortgage? \$ _____

What type of dwelling is it? _____ single family house _____ apartment/duplex
_____ mobile home _____ other (specify) _____

Do you anticipate looking for different housing within the next year? _____ Yes _____ No

If yes: Type of housing: _____ single family house _____ apartment/duplex
_____ mobile home _____ other (specify) _____

Do you wish to own _____ or rent _____?

In what city do you make the majority of your retail purchases? _____

Thank you for your cooperation.

