



2 Maquiladoras: Exploitation or Emancipation? An
 3 Overview of the Situation of Maquiladora Workers in
 4 Honduras

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7 **Summary.** — Are offshore assembly workers being exploited or emancipated? The answer depends
 8 largely on what factors are being considered and with whom the workers are being compared. This
 9 paper presents data on 12 indicators, including both economic and social factors, which together
 10 provide an overview of the situation of maquiladora workers in Honduras. Second, it uses an
 11 alternative control group, first time applicants to the maquiladoras. Finally, this paper presents
 12 data collected in Honduras in 1998—providing insights into the industry as it is operating post-
 13 NAFTA and in a non-Mexican setting. © 2001 Published by Elsevier Science Ltd.

14 **Key words** — Latin America, Honduras, offshore manufacturing, maquiladoras, gender, welfare
 15 measures

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 17

In praise of cheap labor: Bad jobs at bad wages are better than no jobs at all.

Paul Krugman

For we are sold, I and my people.

Maria Patricia Fernández-Kelly

23 1. INTRODUCTION

24 The question addressed in this paper is not a
 25 new one, but it is one that is receiving ever-in-
 26 creasing attention. The question usually posed
 27 is this: What is the situation of offshore as-
 28 sembly industry workers? Are they being ex-
 29 ploited and mistreated or are they relatively
 30 well off? The question has received a fair share
 31 of popular press attention, including accusa-
 32 tions of child labor, “slave” wages, sexual har-
 33 rassment and very occasionally, “success”
 34 stories. Cultural icons as diverse as Ross Perot,
 35 Kathy Lee Gifford, Michael Jordan and Mi-
 36 chael Eisner have been pulled into the fray.
 37 Worker welfare has been the focus of ever-in-
 38 creasing scholarly attention. Since Fernández-
 39 Kelly (1983) carried out her study in Mexico in
 40 1978–79, many others have sought to gauge the
 41 overall situation of workers, including Tiano

(1994), Young and Fort (1994), Kopinak (1996) 42
 and Cravey (1998). 43

Despite the attention the question has re- 44
 ceived, however, the debate continues, often 45
 characterized more by heat than light. The two 46
 titles at the beginning of this paper reflect the 47
 polarization of opinion. Rather than engaging 48
 their critics, the parties involved often speak 49
 past each other by citing those factors that 50
 support their arguments or by comparing 51
 workers to control groups which best support 52
 their theses. The maquiladora literature is also 53
 almost exclusively focused on Mexico, which 54
 hosts only a small percentage of the global in- 55
 dustry, thus failing to explore the diversity of 56
 contexts where maquiladoras are functioning. 57
 Some of these studies have also been ques- 58
 tioned methodologically, which compromises 59
 the validity of their findings (Lim, 1990; Selig- 60
 son, 1994). Finally, there is a dearth of recent 61
 (post-NAFTA ¹) rigorous research on the sit- 62
 uation of maquiladora workers and as a result, 63
 much of the debate relies on data collected in 64
 the 1980s and early 1990s. ² 65

This paper seeks to shed light on the debate 66
 in several new ways. First, it will propose 12 67
 indicators, including both economic and social 68
 factors, which together provide an overview of 69

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70 the situation of maquiladora workers. While
71 further in-depth analysis of single factors is also
72 necessary, the purpose here are to give a sum-
73 mary of overall conditions. Second, this paper
74 will propose an alternative control group, first-
75 time applicants, with which workers can be
76 compared. Methodologically, because we were
77 able to negotiate access to the factories, the
78 data presented here are the result of a random
79 sample of workers, including men (who com-
80 prise 37% of workers). Finally, this paper
81 presents data collected in Honduras in 1998—
82 providing insights into the industry as it is op-
83 erating post-NAFTA and in a non-Mexican
84 setting.

(a) *The debate on workers' conditions*

86 Conclusions regarding the situation of ma-
87 quiladora workers vary widely based on the
88 questions posed. First, what factors are being
89 compared? By highlighting one set of factors
90 over others, the situation of the same group of
91 workers may be made to appear either rela-
92 tively good or bad. Authors such as Krugman
93 (1997), Feenstra and Hanson (1997) and Sar-
94 gent and Matthews (1997) look at economic
95 factors, principally jobs, wages and occasion-
96 ally skills, to describe the benefits of maquil-
97 adora employment. Other authors such as
98 Tiano (1994), Cravey (1998) and Kopinak
99 (1996) cite wages but also social factors such
100 as sexual harassment, health risks and the “double
101 shift” of women to critique maquiladora em-
102 ployment. Until researchers agree to address a
103 common set of factors, applied to varying set-
104 tings and times, the discussion cannot go for-
105 ward. In the study presented below, I will
106 address 12 factors, including both social and
107 economic issues that I believe address the con-
108 cerns of both camps.

109 The second source of dissension in the debate
110 is the question: with whom should maquiladora
111 workers be compared? As Tiano (1994) argues,

At the heart of the debate is the question of whether
assembly jobs improve women's lives both absolutely
and relative to their options. Advocates ... tend to
take a “better-than-nothing” approach to export-pro-
cessing jobs and view them as superior to their op-
tions. [Critics] ... are unsatisfied with this relativist
approach and prefer to evaluate export-processing
jobs in terms of absolute standards of human fulfill-
ment and economic well-being.

121 As Tiano asserts, the debate has its “abso-
122 lutist school” as well as several “relativists

schools,” each of which evaluates the maquil- 123
adora workers' situation based on their own 124
criteria—contributing to the “heat” of the de- 125
bate. The absolutists will not be satisfied if 126
maquiladora workers are better off than some 127
comparable group, but argue that maquiladora 128
jobs should provide opportunity for human 129
development in its broadest sense. Problems 130
with this school include determining what these 131
absolute standards should be and identifying 132
who will do the evaluating. It is easy to discern 133
that not only maquiladora sector jobs but also 134
most jobs in Southern³ countries (and proba- 135
bly in Northern countries as well) will fall short 136
of such (yet undetermined) standards. While it 137
is possible to compare how well different oc- 138
cupations measure against some absolute 139
standard, such comparisons are necessarily 140
“relativistic.” Despite the problems with this 141
“absolutist school,” some objective standards 142
could be applied when evaluating the situation 143
of maquiladora workers, such as whether the 144
job provides the income necessary to meet basic 145
needs or upholds internationally recognized 146
human and workers' rights (US Department of 147
Labor, 1989–90). When applicable, I will cite 148
such standards below. 149

One of the relativist schools compares the 150
situation of maquiladora workers to that of 151
workers in Northern countries. This compari- 152
son is most common in popular media but is 153
also implicit in some scholarly work (Balcazar, 154
Denman, & Lara, 1995; Kopinak, 1996; Mo- 155
ure-Eraso *et al.*, 1997). For example, wages are 156
often cited in US dollars and working condi- 157
tions are described or health complaints are 158
cited without comparisons. As a result, the 159
reader is left to compare these wages or con- 160
ditions with their own. The problems with these 161
comparisons are obvious. Until both trade and 162
labor are “free,” workers in the South do not 163
have access to Northern wages and conditions. 164
In addition, factors such as labor laws, cost of 165
living and cultural work patterns differ from 166
country to country. Workers in the North are 167
rarely the most appropriate comparison group 168
for maquiladora workers. 169

The most common relativist school in the 170
maquiladora literature compares maquiladora 171
workers to workers in the service sector, such as 172
restaurants, stores or local manufacturing 173
(Balcazar *et al.*, 1995; Cravey, 1998; Guendel- 174
man & Silberg, 1993; Hovell, 1988; Moure-Er- 175
aso *et al.*, 1997; Tiano, 1994; Young & Fort, 176
1994). Several studies that have used this 177
methodology have concluded that maquiladora 178

179 workers' wages and conditions are worse than
180 those in the service sector (Tiano, 1994; Young
181 & Fort, 1994).

182 The principal problem with this control
183 group has been methodological. It is extremely
184 difficult to find a matched sample of service
185 sector or manufacturing workers. The sample
186 should include economically active individuals
187 who are not working in the maquilas but who
188 share key characteristics with the maquiladora
189 workers (Seligson, 1994), requiring sampling in
190 urban and rural settings, of formal and informal
191 sectors and matching characteristics such as
192 education, access to capital, etc. Researchers
193 have used a snowball approach (Moure-Eraso
194 *et al.*, 1997), a random walk procedure (Hovell,
195 1988) or quota sampling (Balcazar *et al.*, 1995;
196 Cravey, 1998; Guendelman & Silberg, 1993;
197 Tiano, 1994; Young & Fort, 1994). Each in-
198 troduces opportunities for selection bias and
199 results in questionable comparisons and con-
200 clusions.⁴ This study introduces a control
201 group which, while not without its limitations,
202 overcomes many of these methodological is-
203 sues.

204 A final inappropriate "control group" are
205 those who do "nothing" or have "nothing." It
206 is tempting to assume that maquiladora work-
207 ers were previously unemployed and destitute.
208 Or as Krugman (1997) states, "Bad jobs at bad
209 wages are better than no jobs at all," a slogan
210 defended with a vivid description of Filipinos
211 scavenging on a garbage dump before being
212 fortunate enough to find employment in the
213 maquiladoras. The data below demonstrate
214 that 60% of maquiladora workers were em-
215 ployed before entering the maquiladora, a fact
216 which bolsters the argument of many authors
217 that the wages received are not an adequate
218 measure of the contribution to social wealth
219 (Benería & Sen, 1981; Boserup, 1970; Wright,
220 1997). Maquiladora employees were previously
221 helping in family businesses, fields and house-
222 holds. In addition, workers are not the "poor-
223 est of the poor." In this study, workers have
224 more education than the national average and
225 must pass basic dexterity and intelligence
226 screening tests. It is clear that maquiladora
227 workers were neither destitute nor unoccupied
228 before beginning to work in the maquiladoras.

229 This paper uses an alternative control group,
230 individuals who are applying for employment
231 in the maquiladora for the first time. This
232 control group does not allow us insights into
233 individuals who do not apply for employment
234 in the maquiladoras or who discontinue work-

ing there for some reason. But it greatly facili- 235
tates the process of finding a matched sample. 236
Maquiladora job seekers are most likely to be 237
similar in background and experience to those 238
already working there. In fact, as I will describe 239
below, there is no significant difference in age, 240
education, marital status or other key variables 241
for employees and applicants. Comparing em- 242
ployees and applicants also provides a "before 243
and after" picture from which tentative con- 244
clusions can be drawn about the effects of ma- 245
quiladora employment. In addition, the relative 246
ease of random sampling of applicants avoids 247
the sampling errors common to other control 248
groups. 249

(b) *Why Honduras?*

Honduras is an excellent setting for studying 251
the effects of the maquiladora industry on 252
workers. The maquiladora sector is growing 253
fast and has become a cornerstone of the 254
Honduran economy. During 1989-98, the sector 255
grew from 8000 to 100,000 workers (Asociación 256
Hondureña de Maquiladoras, 1998). 257
Maquiladora employment rose from 11% of all 258
manufacturing jobs in 1990 (Torres, 1997) to 259
27% in 1998 (Banco Central de Honduras, 260
1998; Dirección General de Estadística y Cen- 261
sos, 1998). The value added rose from \$14 262
million in 1989 to \$477 million in 1998, two- 263
thirds of which was in salaries (Asociación 264
Hondureña de Maquiladoras, 1998). Maquila- 265
doras' share of export earning has risen from 266
1% in 1988 (Torres, 1997) to 26% in 1998 267
(Banco Central de Honduras, 1998). Ninety- 268
five percentage of maquiladora production in 269
Honduras is in the apparel industry (Torres, 270
1997). The Honduran maquiladora industry is 271
the largest in Central America (by number of 272
workers and value of exports) and the second 273
largest in Latin America by percentage of the 274
labor force (Kalman, 1998). Even compared to 275
the maquiladora heavyweight Mexico, Hon- 276
duras has a higher percentage of its manufact- 277
uring labor force involved in the maquiladora 278
industry (Honduras with 26% *vs.* Mexico with 279
24%) (Instituto Nacional de Estadísticas, Ge- 280
ografía y Información, 1998). 281

Ninety-five percentage of the maquiladora 282
companies in Honduras, and all of the compan- 283
ies in this sample are producing apparel, 284
generally considered to offer the lowest wages 285
and poorer working conditions than other 286
sectors such as automotive and electronics 287
(Kopinak, 1996; Sargent & Matthews, 1997; 288

289 Tiano, 1994). US companies own about half of
 290 the maquiladoras in Honduras and employ an
 291 equal proportion of the maquiladora workers.
 292 The other half of employees and companies are
 293 nearly equally divided between Honduran and
 294 Asian (mostly Korean) ownership. The own-
 295 ership of the companies selected in the sample
 296 reflected these same proportions. Because of
 297 the explosive growth described above, most of
 298 the factories have been built in the last 10 years.
 299 Honduras is also an appropriate study site
 300 because it is a very poor country with high
 301 unemployment—making it ripe for exploitation
 302 according to critics, but for proponents, pre-
 303 cisely the type of country that can most benefit
 304 from maquiladora jobs and opportunities.
 305 Honduras' per capita income is \$660; 74% of
 306 the population lives below the poverty line and
 307 47% live on less than one dollar a day
 308 (UNICEF, 1999). Thirty percentage of the labor
 309 force is un- or underemployed (Dirección
 310 General de Estadística y Censos, 1998). The
 311 labor force is growing by nearly 4% annually
 312 (Dirección General de Estadística y Censos,
 313 1998). As a result, the maquiladoras have be-
 314 come a significant source of jobs, investment
 315 and exports in a very poor country, making
 316 Honduras an opportune site for studying the
 317 effect of this industry on its workers.

(c) *Methodology*

319 The survey of maquiladora workers and first-
 320 time applicants took place in July and August
 321 of 1998. For economic and time reasons we
 322 surveyed only companies in the Department of
 323 Cortés,⁵ Honduras, which hosts 154 of the 175
 324 maquiladoras in Honduras⁶ and 89% of all
 325 maquiladora workers. We divided these com-
 326 panies into cells based on the type of legisla-
 327 tion under which they functioned⁷ and ordered
 328 them by number of employees within each cell.
 329 We then randomly selected within each cell a
 330 number of companies proportional to the total
 331 size of that cell. Thirty companies were chosen.
 332 The number of workers to be interviewed in
 333 each company was assigned proportional to its
 334 number of employees.
 335 Both the Honduran Maquila Association
 336 and the research team then sent a letter to each
 337 of the selected companies, requesting their co-
 338 operation and an appointment with the man-
 339 ager to further explain the study and solicit
 340 their collaboration. Twenty of the 30 compa-
 341 nies (67%) agreed to participate.⁸ The man-
 342 agers then gave us access to their payroll

records from which we selected at random a 343
 number of nonadministrative⁹ employees 344
 proportional to the number of employees 345
 working for the company. Each of these 346
 workers¹⁰ was interviewed for approximately 347
 20 min, in a room off the factory floor (usually 348
 the lunch room). No company managers were 349
 present and participants were assured of the 350
 confidentiality of their responses. Five female 351
 Hondurans, each with over five years of expe- 352
 rience carrying out social surveys for the 353
 United Nations programs in Honduras, inter- 354
 viewed all 270 chosen employees (175 women 355
 and 95 men). 356

In order to interview first-time applicants, 357
 two maquiladora parks in different areas of the 358
 Department of Cortés gave us permission to 359
 apply the survey on their heaviest recruiting 360
 days. Over a period of five days, the inter- 361
 viewers asked all prospective applicants¹¹ if 362
 they had ever worked in a maquiladora; if they 363
 had not, the interviewer proceeded with the 364
 survey. The 149 applicants (129 women and 20 365
 men) were interviewed by the same experienced 366
 interviewers with no management present and 367
 were assured of the confidentiality of their re- 368
 sponses. 369

The same survey was applied to both em- 370
 ployees and applicants, except for questions 371
 that were not appropriate for applicants. In 372
 addition for basic information, the survey 373
 covered 12 areas: (i) income, (ii) household re- 374
 lations, (iii) political power, (iv) health, (v) 375
 unionization, (vi) social life, (vii) overtime, (viii) 376
 stress, (ix) supervision, (x) children, (xi) edu- 377
 cation and (xii) crime.¹² 378

2. MAQUILADORA EMPLOYEES AND 379 APPLICANTS: SIMILARITIES AND 380 DIFFERENCES

An important issue for judging the appro- 382
 priateness of comparing maquiladora employ- 383
 ees with applicants is the degree to which they 384
 are similar. From Table 1, it is clear that the 385
 two populations are very similar. There is no 386
 significant difference in mean age, marital sta- 387
 tus, mean years of education, percentage of 388
 respondents with children, mean number of 389
 children, percentage of respondents who mi- 390
 grated to the Department of Cortés, or the size 391
 of respondents' households. These are plainly 392
 two well-matched groups, so the differences 393
 found between them are likely to be attribut- 394

Table 1. *Similarities between maquiladora employees and first time applicants*

	Employees			Applicants		Significance of difference between	
	Women	Men	Totals	Women	Totals	Women	Totals
<i>N</i>	175	95	270	129	149		
Age: mean	23.58	22.52	23.21	22.94	22.70	$t(302) = 0.938,$ $p = 0.349$	$t(417) = 0.910,$ $p = 0.364$
Marital status: % single	37.7%	52.6%	43%	43.4%	48.3%	$\chi^2 = 9.336, (5)$ $p = 0.096$	$\chi^2 = 9.771, (5)$ $p = 0.082$
Marital status: % married	12.6%	14.7%	13.3%	11.6%	10.1%	$\chi^2 = 9.336, (5)$ $p = 0.096$	$\chi^2 = 9.771, (5)$ $p = 0.082$
Education: mean years	6.82	7.01	6.86	6.51	6.51	$t(302) = 1.010,$ $p = 0.313$	$t(417) = 1.313,$ $p = 0.190$
% have children	56%	43%	51.5%	60.5%	55%	$\chi^2 = 0.607, (1)$ $p = 0.436$	$\chi^2 = 0.486, (1)$ $p = 0.486$
# of children: mean	2.11	1.83	2.03	2.33	2.29	$t(174) = -0.919,$ $p = 0.359$	$t(219) = -1.290,$ $p = 0.227$
Migrants: %	56%	58%	57%	58%	60%	$\chi^2 = 0.139, (1)$ $p = 0.710$	$\chi^2 = 0.550, (1)$ $p = 0.458$
Size of household	4.99	4.66	4.88	5.43	5.27	$t(294) = -1.346,$ $p = 0.179$	$t(396) = -1.438,$ $p = 0.151$

395 able to working in the maquiladora and not
396 other factors.

397 The two significant differences between these
398 populations, demonstrated in Table 2, need to
399 be addressed. First, 35% of employees are men
400 but only 13% of applicants. This resulted from
401 the fact that, unknown to the author, the ma-
402 quiladora parks were hiring only women ap-
403 plicants, and therefore they only let women into
404 the parks on two of the five days we inter-
405 viewed. As a result, the sample of applicants
406 has a disproportionate number of women. In-
407 stead of reporting results for women only and
408 lose 35% of the employees or weighting the
409 data which risks distorting the results, we have
410 chosen to run comparisons on all factors: (i) all
411 employees *vs.* all applicants and (ii) female
412 employees *vs.* female applicants and (iii) female
413 *vs.* male employees. This allows us to determine
414 if the lower percentage of male applicants af-
415 fects the results and permits direct comparisons
416 between female employees and applicants as
417 well as comparisons between female and male
418 employees.¹³

Second, while there is no significant differ- 419
ence between the control group and employees 420
in the percentage of migrants (Table 1) or in 421
their reasons for migrating, applicants have 422
migrated to the Department of Cortés signifi- 423
cantly more recently than employees. This is 424
consistent with the fact that 36% of the appli- 425
cants (28% of women) state that they migrated 426
in order to get a job in the maquiladora. To 427
better distinguish the effect of working in the 428
maquiladora, I have controlled for migration in 429
analysis in which it may play a role, such as 430
crime victimization and religious participation. 431

(a) *Employees circumstances appear better than applicants'*

Based on the results of this survey, it appears 434
that employees in the maquiladora are rela- 435
tively better off than applicants in three of the 436
themes included in the survey. These are: (i) 437
income, (ii) household relations and (iii) polit- 438
ical power. 439

Table 2. *Differences between maquiladora employees and first time applicants^a*

	Employees			Applicants		Significance of difference between	
	Women	Men	Totals	Women	Totals	Women	Totals
Gender	64.8%	35.2%	100%	86.6%	100%		$\chi^2 = 22.835, (1)$ $p < 0.001$
Migration: How long in Cortés?	3.62	3.53	3.59	2.51	2.31	$t(171) = 5.129,$ $p < 0.001$	$t(241) = 6.838,$ $p < 0.001$

^a For *n*, see Table 1.

(i) *Income*

441 One of the most common criticisms of the
442 maquiladora sector is it they pays below market
443 wages, especially to women (Tiano, 1994;
444 Young & Fort, 1994). Young and Fort (1994)
445 argue that women take these lower paying jobs,
446 despite better paying options, due to household
447 pressures. In this study, however, maquiladora
448 employees' mean income is \$141 a month while
449 applicants earned a mean of \$91 in their pre-
450 vious employment. Female employees also earn
451 \$53 more a month than female applicants.
452 Minimum wage in Honduras is \$85 a month,
453 and from the poverty figures above it is clear
454 that many employees in Honduras make at or
455 below minimum wage. Consequently applicants
456 were earning slightly more than minimum wage
457 in their previous jobs but maquila employees
458 are averaging about 50% more than minimum
459 wage.

460 Male employees and applicants both earn
461 more than their female counterparts, control-
462 ling for education, length of time in Cortés and
463 experience ($b = -0.275$, $t = -3.662$, $p < 0.001$).
464 The difference in overall means is partly ex-
465 plained by the fact that the highest paid
466 workers, machine technicians, are all men. But
467 men have a slightly higher mean salary in five
468 of the six jobs we surveyed on the factory floor,
469 including the sewing machine operators who
470 are almost all paid by production.¹⁴ So several
471 explanations will need to be further pursued—
472 whether men work faster or women are being
473 discriminated against or whether there was
474 some sampling bias—to explain the difference
475 in salaries. Nonetheless, female maquiladora
476 workers still earn more than male applicants.
477 So while women maquiladora workers earn less
478 than male workers, they still earn significantly
479 more than minimum wage and more than ap-
480 plicants of both genders did in their previous
481 employment.

482 The maquiladoras are also accused of not
483 economically rewarding education or experi-
484 ence and of driving down wages in general.
485 This study found that, controlling for gender
486 and migration, income is positively correlated
487 with experience ($b = 0.335$, $p < 0.001$) but not
488 with education ($b = -0.004$, $p = 0.960$). In
489 addition, based on a rigorous study done in
490 Honduran maquiladoras in 1993, the mean
491 wage has risen \$27 (\$23 for women)¹⁵ in the
492 last five years, while the dollar value of most
493 salaries in Honduras has dropped (Price-Wa-
494 terhouse, 1993).

Many, especially in the popular press, cri- 495
tique the maquiladora industry for paying be- 496
low poverty level wages. The Central Bank of 497
Honduras estimates that in 1998, a family of 498
five needed to earn \$182.69 a month to cover 499
their food needs and \$443.20 to cover their 500
needs for food, housing, health, education and 501
clothing (Lagos, 1999). As a result, it would 502
take 1.3 maquiladora salaries to meet only the 503
food needs of a family of five and 3.1 maquil- 504
adora salaries to cover their basic needs. In 505
summary, maquiladora employees are earning 506
about 50% than minimum wage and 50% more 507
than applicants did in their previous jobs; ma- 508
quiladora employees in 1998 were making more 509
(in dollars) than they did in 1993; experience 510
but not education is rewarded; the highest 511
paying factory-floor job is closed to women 512
and; maquiladora salaries are not enough to 513
move a Honduran family out of poverty. 514

(ii) *Household relation*

Various authors have questioned the effect of 516
maquiladora employment on both the em- 517
ployees and their households (Kibria, 1995; 518
Young, 1993; Young & Fort, 1994). In this 519
study, employees give significantly greater 520
economic support to their families than appli- 521
cants (Table 3). A positive correlation also is 522
found between the years of experience in the 523
maquiladora and the amount given to families 524
($r = 0.408$, $p < 0.01$), but no significant rela- 525
tionship existed between years of experience 526
and household relationships. Employees are 527
more likely to feel that their relationship with 528
spouse/parents¹⁶ had improved rather than 529
worsened (Table 4). Employees are also more 530
likely to feel that the males in their household 531
help more with household chores since they 532
began working in the maquiladoras (Table 5). 533

Another dramatic change in household rela- 534
tions is that maquiladora employees of both 535
genders are much more likely than applicants 536
to consider themselves the head of the house- 537
hold (Table 6). Since age, size of household and 538
other characteristics are similar between ma- 539
quiladora workers and applicants, it appears 540
that the role of head of household is directly 541
related to employment in the maquiladora. The 542
mean number of salaried workers also is higher 543
in employee homes: 2.6 *vs.* 2.0 ($p < 0.001$), 544
which means that the maquiladora worker 545
usually provides an additional income to the 546
household. 547

In summary, this survey suggests that em- 548
ployees provide more financial support to their 549

Table 3. *Situation of maquiladora employees appear better than first time applicants^a*

	Employees			Applicants		Significance in difference between	
	Women	Men	Totals	Women	Totals	Women	Totals
Income/4 weeks ^b	\$132.66	\$156.74	\$141.19	\$89.63	\$90.87	$t(229) = 5.951,$ $p < 0.001$	$t(339) = 7.408,$ $p < 0.001$
Household—econ. support to	\$65.70	\$81.00	\$71.19	\$25.48	\$26.59	$t(302) = 5.681,$ $p < 0.001$	$t(417) = 7.475,$ $p < 0.001$
Household—# of workers	2.56	2.55	2.56	1.98	2.03	$t(294) = 3.745,$ $p < 0.001$	$t(396) = 3.928,$ $p < 0.001$
Society—% vote	50.3%	52.6%	51.1%	39.5%	41.6%	$\chi^2 = 3.458, (1)$ $p = 0.063$	$\chi^2 = 3.474, (1)$ $p = 0.062$

^a For *n*, see Table 1.

^b *N* = 56 for female applicants and *n* = 71 for total applicants. This question was asked only of those who were employed previous to applying for work in the maquiladora.

550 families, are more likely to feel that their
551 household relationships have improved, and
552 that male members of the household help with
553 chores. In addition, they are much more likely
554 than applicants to consider themselves the head

of their household and to have a higher number
of workers in their household. 555

(iii) *Political power*

Does employment in the maquiladora in- 558
crease or decrease the worker's sense of politi- 559
cal power? Tiano (1994) argues that while 560
maquiladora employment may increase 561
women's power in the household, this increase 562
does not transfer over to the public sphere. This 563
survey looked at three elements of this issue: 564
voting, perception of ability to influence gov- 565
ernment and working for a candidate. Signifi- 566
cantly more employees than applicants voted in 567
the last election (Table 3). The increase is even 568
greater for women than for men. Furthermore, 569
there is a positive correlation between years of 570
experience in the maquiladora and voting be- 571
havior ($r = 0.221, p < 0.01$) and between ex- 572
perience and sense of power ($r = 0.126, p < 573$
0.05). In addition, 29% of employees (26% of 574
women) vs. 20% of applicants (18% of women) 575
feel that maquiladora workers could have "a 576
lot" of influence in government. Finally, while 577
there was no significant difference between 578
employees and applicants, a surprising 11% of 579
employees (9% of women) and 9% of applicants 580
(8% of women) had worked for a political 581
candidate in the last elections (see Table 7). 582

Table 4. *Change in relationship with spouse/parent since began in maquiladora*

	Gender		Total (%)
	Men (%)	Women (%)	
Better	49.2	38.1	41.7
Same	43.1	56.1	52.0
Worse	7.7	5.8	6.4
<i>n</i> = 270	100.0	100.0	100.0

Table 5. *Amount of male help in the household since began in maquiladora*

	Gender		Total (%)
	Men (%)	Women (%)	
More help	23.4	27.1	26.1
Same	66.0	54.2	57.6
Less help	10.6	18.6	16.4
<i>n</i> = 270	100.0	100.0	100.0

Table 6. *Head of household^a*

	Employees			Applicants		
	Men (%)	Women (%)	Totals (%)	Men (%)	Women (%)	Total (%)
Self	52.6	28.0	36.7	10.0	9.3	9.4
Partner	2.1	21.7	14.8	5.0	28.7	25.5
Father	15.8	13.1	14.1	15.0	18.6	18.1
Mother	4.2	12.0	9.3	10.0	10.1	10.1
Brother	10.5	8.6	9.3	20.0	7.0	8.7

^a Women to women: $\chi^2 = 24.781, (9) p = 0.003$; totals to totals: $\chi^2 = 43.624, (9) p = 0.000$.

Table 7. Perception of ability to influence government^a

	Employees			Applicants		
	Men (%)	Women (%)	Total (%)	Men (%)	Women (%)	Total (%)
A lot	33.7	26.3	28.9	35.0	17.8	20.1
Some	22.1	23.4	23.0	30.0	35.7	34.9
Not at all	26.3	21.7	23.3	10.0	20.9	19.5
Do not know	17.9	28.6	24.8	25.0	25.6	25.5

^a Women to women: $\chi^2 = 6.485$, (3) $p = 0.090$; totals to totals: $\chi^2 = 8.556$, (3) $p = 0.036$.

583 The data on political power suggest that
584 maquiladora workers are more likely to vote in
585 elections, to feel that they can influence gov-
586 ernment and that these changes grow stronger
587 over time. They are also equally or slightly
588 more likely to work for a political candidate.
589 These findings may be related to the workers'
590 increases in income and their change in status
591 in the household—employees have an increased
592 sense of power (Young, 1993). Their increased
593 participation and power is even more striking
594 given data we discuss below, which demon-
595 strate that employees have substantially less
596 “free” time, more health problems and lower
597 union membership than applicants.

(b) *Employees circumstances appear worse than applicants'*

600 Based on the results of this survey, it appears
601 that employees in the maquiladora are rela-
602 tively worse off than applicants in three of the
603 themes included in the survey, health, unions
604 and social life.

(i) *Health*

606 Recent surveys on maquiladora health con-
607 ditions have argued that workers are healthier
608 than comparison groups (Guendelman & Sil-

berg, 1993; Hovell, 1988). In this study, 47% of 609
employees (45% of women) *vs.* 11% of appli- 610
cants¹⁷ (7% of women) report having a health 611
problem in the last month that affected their 612
ability to work (Table 8). Forty-three percent- 613
age of employees (39% of women) believe that 614
their health problems are work related. The 615
most common health problems are respiratory 616
(60% of total, 49% of women), followed by 617
“other”¹⁸ (24% of total, 37% of women). 618
There was no significant correlation between 619
health problems or days missed and years of 620
experience in the maquiladoras. 621

This is one of the most disturbing sets of data 622
in the survey. The gap between health problems 623
in employees and applicants is significant and 624
suggests that there *may* be serious health risks 625
in the maquiladoras in Honduras. Because the 626
survey did not focus on health issues we were 627
not able to gain any further insights into the 628
reasons for these differences. These findings 629
clearly contradict recent research in Mexico, 630
making it clear that the need for further re- 631
search on the topic is urgent. 632

(ii) *Unionization*

Maquiladoras around the globe are criticized 634
for resisting unionization (Cravey, 1998). This 635
study finds a lower percentage of maquiladora 636

Table 8. Situation of maquiladora employees appear worse than first time applicants'

	Employees			Applicants		Significance in difference between	
	Women (%)	Men (%)	Total (%)	Women (%)	Total (%)	Women (%)	Total (%)
Health—problems in last month ^a	44.6	51.6	47	7.1	11.3	$\chi^2 = 25.956$, (1) $p < 0.001$	$\chi^2 = 30.075$, (1) $p < 0.001$
Unions—% in union shops	12.0	2.1	8.5	12.5	11.3	$\chi^2 = 7.048$, (2) $p = 0.029$	$\chi^2 = 8.835$, (1) $p = 0.012$
Unions—% want union ^b	37.0	37.6	37.2				$\chi^2 = 0.210$, (2) $p = 0.900^c$
Social life—% with free time	58.3	74.7	64.1	81.4	81.2	$\chi^2 = 18.253$, (1) $p < 0.001$	$\chi^2 = 13.466$, (1) $p < 0.001$

^a For health and unions, $n = 56$ for female applicants and $n = 71$ for total applicants. This question was asked only of those who were employed previous to applying for work in the maquiladora.

^b This question was only asked of employees.

^c This cell describes the significance of the difference between male and female employees attitudes toward unions.

637 workers (8.5% of total, 12% of women) in
 638 union shops *vs.* applicants (11.3% of total, 13%
 639 of women). This is despite the fact that a high
 640 percentage of the applicants had previously
 641 worked as maids or in small restaurants and
 642 shops, which are unlikely to be unionized, while
 643 the size of maquiladora factories range from
 644 several hundred to several thousand employees.
 645 But only 38% of employees (37% of women)
 646 state that they would like a union in their shop,
 647 meaning nearly two-thirds of employees do not.
 648 The reasons for not wanting a union falls into
 649 three categories: distrust of unions and their
 650 leaders (27%), fear of companies' reaction and
 651 implications for their jobs (29%) and not un-
 652 derstanding or not seeing a need for unions
 653 (40%).

654 It is also interesting to note that there is very
 655 little difference between men's and women's
 656 participation in and attitude toward the unions.
 657 This contradicts the conventional wisdom that
 658 maquiladoras employ women because they are
 659 more passive and less supportive of unioniza-
 660 tion than their male counterparts.

661 The decision to place unionization in the
 662 negative "area" was obviously a subjective one.
 663 Two-thirds of employees state that they do not
 664 want a union in their shop. This negative atti-
 665 tude is no doubt in part due to: negative prop-
 666 aganda regarding unions being produced by
 667 business interests in Honduras, a growing per-
 668 ception of corruption within union leadership
 669 in Honduras, and decreasing benefits won by
 670 unions in a more competitive global market.
 671 Through my interviews with maquiladora
 672 managers, however, employees and union rep-
 673 resentatives, it is clear that it is a common, al-
 674 though illegal practice to "let go" employees
 675 who are seeking to organize a union.¹⁹ This
 676 practice is sufficiently commonplace that, be-
 677 cause Honduran labor law requires employers
 678 to provide severance pay to fired workers but
 679 not those who quit, some workers have pre-
 680 tended to start a union movement in order to
 681 be fired and collect their severance pay. It is
 682 because of these illegal practices that I have
 683 placed unionization in the negative category
 684 despite the fact that the majority of workers do
 685 not express a desire for unionization.

(iii) *Social life*

687 Perhaps one of the most predictable findings
 688 in the study is that maquiladora workers have
 689 less "free" time than applicants. Eighty-one
 690 percentage of applicants (81% of women) say
 691 they have "free" time, but only 64% of em-

692 ployees (58% of women) felt the same. Seventy-
 693 five percentage of male employees but only 58%
 694 of women workers feel they have free time,
 695 clearly demonstrating the extra responsibilities
 696 women workers have at home. There is no
 697 significant correlation between "free" time and
 698 number of years of experience in the maquil-
 699 adora. Neither is there any significant difference
 700 in how employees and applicants use their free
 701 time. There is, however, a significant difference
 702 by gender. Thirty-three percentage of male
 703 employees participate regularly in religious ac-
 704 tivities and 44% in sports while 50% of female
 705 employees participate in religious activities and
 706 only 3% in sports.²⁰ Less than 1% of employ-
 707 ees and applicants participate regularly in po-
 708 litical, community, union or women groups.

709 While it was predictable that employees, espe-
 710 cially women, perceive they have less "free"
 711 time than applicants since they must care for
 712 children and do household chores after work, it
 713 is somewhat surprising that 58% of women
 714 employees still believe they have free time and
 715 over 50% regularly participate in religious ac-
 716 tivities. This illustrates the importance of reli-
 717 gion in these workers' lives and demonstrates
 718 that many workers are able to find time for
 719 activities they value.

720 The data in this section raise several concerns
 721 for maquiladora workers in Honduras. First,
 722 there *may* be some serious health problems,
 723 which will require further research to confirm
 724 and detail. Second, the maquiladora workers
 725 have a lower level of unionization than appli-
 726 cants, despite the fact that the maquiladoras are
 727 large factories and many of the applicants are
 728 coming from jobs that are unlikely to be
 729 unionized. This is due in part to illegal har-
 730 rassment and firings by the maquiladoras. Fi-
 731 nally, free time among workers is significantly
 732 lower but over half still manage to participate
 733 in social activities such as church services or
 734 sports.

(c) *No significant differences between employees and applicants*

737 Based on the results of this survey, it appears
 738 that there are no significant differences between
 739 maquiladora employees and applicants in the
 740 following areas: overtime, stress, supervision,
 741 children, education and crime.

(i) *Overtime*

742 Are maquiladora employees forced to put in
 743 longer hours of overtime than other employees
 744

745 in Honduras? This study found that while a
746 higher percentage of maquiladora employees
747 had worked overtime in the previous week
748 (77% vs. 45%, 77% vs. 41% of women), the
749 mean number of hours worked was signifi-
750 cantly less for workers than for applicants (4.7
751 h vs. 8.3 h, 4.02 vs. 8.61 h for women). It is of
752 interest that just as many women as men work
753 overtime in the maquiladora (though the
754 women work fewer total hours); however,
755 among the applicants, women work more
756 overtime than men. Of those who work over-
757 time, 43% of employees (48% of women) and
758 52% of applicants (57% of women) feel that
759 working overtime is mandatory, despite the fact
760 that mandatory overtime is illegal in Honduras.
761 Once again, female employees are more likely
762 to feel their overtime is mandatory but fewer
763 female employees than female applicants feel
764 so.

765 In short, concerning overtime, maquiladora
766 workers and applicants are in roughly similar
767 situations. More employees are likely to work
768 overtime, but work fewer total hours than ap-
769 plicants. Employees are also less likely to feel
770 that their overtime is mandatory. Women em-
771 ployees also work slightly fewer hours than
772 men but are more likely to feel overtime is
773 mandatory.

(ii) *Stress*

775 Do maquiladora workers feel greater
776 amounts of job-related stress? While many as-
777 sume that workers' stress level must be higher,
778 Guendelman and Silberg (1993) find that ma-
779 quiladora workers have lower stress levels than
780 other service sector employees. Table 9 dem-
781 onstrates that employees, especially women, are
782 slightly more likely to "always" feel "worried,
783 nervous or depressed" and less likely to "nev-
784 er" feel that way. It is important to note,
785 however, that the reasons for their anxiety
786 differ significantly. While the motivation for
787 employees' (both men's and women's) stress is
788 largely personal (54%), followed by economic
789 (20%) and work (17%), for applicants it is al-
790 most equally divided between personal (32%),
791 work (33%) and economic (31%). It is also in-
792 teresting that men's stress levels are signifi-
793 cantly lower but of those who feel stress, their
794 reasons are similar to those of women. Finally,
795 there is a small but positive correlation
796 ($r=0.14$, $p < 0.05$) between stress levels and
797 number of years of experience in the maquila-
798 doras.

These findings indicate that stress levels are 799
quite similar between maquiladora applicants 800
and employees. It appears that maquiladora 801
workers do not perceive their lives as less or 802
more stressful but, since they have a steady job 803
and income, their stress reflects more personal 804
rather than economic or work concerns. This 805
stress level appears to increase over time, 806
however, quite probably related to growing 807
family and responsibilities. Once again, women 808
appear to carry a heavier burden than men but 809
both are concerned with similar issues. 810

(iii) *Supervision*

Another common criticism of the maquila- 812
doras is that supervisors verbally, physically 813
and sexually mistreat workers. In this study, 814
however, there is no significant difference be- 815
tween employees and applicants in the fre- 816
quency of problems with supervisors in the last 817
six months, and for both groups, less than 9% 818
report mistreatment by supervisors (Table 9). 819
No significant difference exists by gender; in 820
fact, women report slightly less problems than 821
men. Out of 270 employees surveyed, none re- 822
port sexual harassment, two reported physical 823
abuse and 15 complained of verbal mistreat- 824
ment. 825

It is possible that some mistreatment, espe- 826
cially sexual misconduct, went unreported.²¹ 827
But since the first question about general 828
problems with supervisors was purposefully 829
vague and covered a six-month period, it ap- 830
pears that such problems and mistreatment are 831
relatively infrequent among both groups and 832
roughly equally common among employees 833
and applicants. While no amount of mistreat- 834
ment should be tolerated, a certain amount of 835
conflict is inevitable among large groups of 836
people working together. 837

(iv) *Children*

Who takes care of the children of maquil- 839
adora employees while they are at work? Are 840
mothers sacrificing the care and safety of their 841
children to work? Table 1 demonstrates that 842
there is no significant difference between the 843
percentage of employees and applicants with 844
children or in the average number of children. 845
The data in Table 10 illustrate that approxi- 846
mately 25% of employees and applicants have 847
their children under the care of another 848
household, which means that employees are 849
neither more nor less likely than applicants to 850
keep their children at home. Neither is there 851
any significant difference between the caretak- 852

Table 9. No significant difference between situation of maquiladora employees and first time applicants

	Employees			Applicants		Significance in difference between	
	Women	Men	Total	Women	Total	Women	Total
Worked over-time last week ^a	76.6%	77.9%	77.0%	41.1%	45.1%	$\chi^2 = 24.556, (1)$ $p < 0.001$	$\chi^2 = 27.557, (1)$ $p < 0.001$
Hours of over-time last week	4.02	5.86	4.69	8.61	8.28	$t(134) = -2.136,$ $p < 0.05$	$t(208) = -2.204,$ $p < 0.05$
Stress—always or regularly	53.7%	42.1%	49.6%	49.6%	47.7%	$\chi^2 = 14.022, (3)$ $p < 0.05$	$\chi^2 = 4.613, (3)$ $p = 0.202$
Stress—seldom or never	46.3%	57.9%	50.3%	50.4%	52.4%	$\chi^2 = 14.022, (3)$ $p < 0.05$	$\chi^2 = 4.613, (3)$ $p = 0.202$
Supervision—problem in last 6 months	8.0%	9.5%	8.5%	5.4%	7.0%	$\chi^2 = 0.435, (1)$ $p = 0.510$	$\chi^2 = 0.163, (1)$ $p = 0.687$
Children—mean #children living with respondent	1.51	1.24	1.43	1.56	1.54	$t(173) = -0.221,$ $p = 0.825$	$t(218) = -0.583,$ $p = 0.560$
Children—mean #not living with respondent	0.53	0.56	0.54	0.66	0.64	$t(173) = -0.900,$ $p = 0.369$	$t(218) = -0.782,$ $p = 0.435$
% Children cared for by parents/in-laws	46.6%	25%	40.6%	39.7%	37.7%	$\chi^2 = 4.936, (7)$ $p = 0.668$	$\chi^2 = 11.272, (8)$ $p = 0.187$
Education—% in school	11.4%	11.6%	11.5%	9.3%	8.1%	$\chi^2 = 0.356, (1)$ $p = 0.550$	$\chi^2 = 1.225, (1)$ $p = 0.268$
Crime—% victim in last 6 months	15.4%	16.8%	15.9%	10.9%	9.4%	$\chi^2 = 1.333, (1)$ $p = 0.248$	$\chi^2 = 3.483, (1)$ $p = 0.062$
Crime—#in last 6 months (mean)	1.15	1.25	1.19	1.43	1.43	$t(39) = -1.615,$ $p = 0.208$	$t(55) = -1.380,$ $p = 0.173$

^a For overtime and supervision, $n = 56$ for female applicants and $n = 71$ for total applicants. This question was asked only of those who were employed previous to applying for work in the maquiladora.

853 ers of the children while the employees or ap-
854 plicants are at work. The vast majority leave
855 their children with a spouse or other family
856 member and a small but unfortunate percent-
857 age of employees and applicants leave their
858 children home alone.

859 With regard to the topics covered in this
860 survey, the situation of employees' and appli-
861 cants' children appears quite similar. Appli-
862 cants and employees have a similar number of
863 children, roughly the same percentage of chil-
864 dren is living with their parents and the
865 breakdowns in caretakers are not significantly
866 different. In summary, it appears that working
867 in the maquiladoras neither substantially im-
868 proves nor diminishes workers' ability to keep
869 their children at home or find quality day-care.

(v) Education

871 The maquiladora worker has finished 6.9
872 years of formal education, not significantly
873 different than applicants and more than two
874 years higher than the national average. So while

875 maquiladora workers have above average levels
876 of education, does working in the maquiladoras
877 facilitate or hinder their continuing education?
878 Table 9 shows that there is no significant dif-
879 ference in the percentage of employees and
880 workers currently in school. A significant posi-
881 tive correlation exists between years of educa-
882 tion and years of working in the maquiladora
883 ($r = 0.147, p < 0.05$). This could either mean
884 that the longer employees work in the maquil-
885 adora the more likely they are to continue their
886 education or, more likely, that the maquilado-
887 ras initially hired workers with higher educa-
888 tional levels but, as their worker pool has
889 decreased, their standards have necessarily
890 lowered.

891 In summary, the educational situation of
892 employees and applicants regarding years of
893 education and percentage currently studying
894 are very similar and significantly higher than
895 the national average, and in this case there is no
896 gender difference. Working in the maquiladora
897 seems neither to enhance nor diminish workers' 897

Table 10. *Childcare while the employee or applicant works^a*

	Employees		Total	Applicants	
	Gender			Women (%)	Total
	Men (%)	Women (%)			
Left alone		6.8	5.0	10.3	9.8
Partner	50.0	1.4	14.9	3.4	3.3
Parents/in-laws	25.0	46.6	40.6	39.7	37.7
Siblings	7.1	8.2	7.9	15.5	16.4
Other family		12.3	8.9	12.1	13.1
Other non-family	14.3	17.8	16.8	17.2	18.0

^a Women to women: $\chi^2 = 4.936$, (7), $p = 0.668$ totals to totals: $\chi^2 = 11.272$, (8) $p = 0.187$.

898 ability to continue their education, which appears to mean that it is not their employment in the maquiladora which discourages workers from continuing their studies but that they had already discontinued their studies before entering the maquiladora work force.

(vi) *Crime*

905 Crime is the final factor considered in the survey. Maquiladora workers are often thought to be targets of crime since most are women, they are paid weekly in cash,²² and they travel home together on buses. Surprisingly, the survey results do not substantiate this supposition. 911 While the maquiladora employees are slightly more likely to be victims of crime, the difference (especially between female employees and applicants) is not significant (Table 9). Male employees are actually slightly more likely to be victims of crime than females. Among those who have been victims of a crime, the difference between the mean number of crimes for employees and applicants (totals and women) is not significant. In fact, the mean number for applicants is slightly higher. Differences are still not significant when controlling for amount of time living in the city and there is no significant correlation between years of experience in the maquiladoras and crime victimization or number of crimes. Robbery is the most common crime (55%), followed by assaults (44%). One applicant reports being raped.

929 Knowing the growth of gang activity in the Cortés area, this result is certainly counterintuitive—that young women getting off maquiladora buses on Fridays carrying cash would not be victims of more crimes than applicants. 934 This result is even more surprising given that nearly 60% of employees are immigrants, arguably less familiar with the dangers of life in a big city. One possible explanation is that these

women have come up with methods of reducing their risk by setting up informal “security systems” to make sure they arrive home safely. This appears to be another area warranting further research. In summary, it appears that maquiladora workers are not at higher risk of being victimized by crime than other similar individuals.

(d) *Job satisfaction*

At the end of the interview, maquiladora employees were asked to give their overall satisfaction with their jobs. Ninety-six percent stated that they are either very or somewhat satisfied with their jobs while only 4% said they are not at all satisfied. There is no significant correlation between job satisfaction and years of experience in the maquiladoras. These numbers are surprising given the generally negative perception of maquiladora workers’ situation. It appears that while workers would like improvements, especially in wages, overall they are fairly satisfied with their situation (Table 11).

3. CONCLUSION

It is clear that the answer to the original questions—What is the situation of offshore assembly industry workers? Are they being exploited and mistreated or are they relatively

Table 11. *Job satisfaction*

	Gender		Total
	Men (%)	Women (%)	
Very	52.6	48.6	50.0
Somewhat	44.2	47.4	46.3
Not at all	3.2	4.0	3.7

well off?—is not self-evident. The answer depends on how much weight is given to the different factors in this study and with what group or standard the maquiladora workers are compared. It is clear, however, that several of the findings contradict recent research and much of conventional wisdom. The fact that maquiladora workers in Honduras are earning 50% more than minimum wage, that their wages have risen in real terms in the last five years, that they perceive themselves as politically more powerful and with better household relationships runs counter to several recent studies. Less surprising is the data that suggest they may be endangering their health (although it does contradict a recent study) and are less likely to be able to form a union. Even those areas in which workers and participants are similar may well be unexpected to many. For example the fact that workers and applicants worked similar amounts of overtime, suffered equally from stress and relatively little from mistreatment by supervisors, were victimized equally by crime and that their ability to find childcare and continue their education was very similar. In summary, with regards to the majority of the factors considered in this study, the maquiladoras in Honduras are neither better nor worse (with the possible exception of health problems) than other possible employment opportunities. It seems then that the principal attraction of maquiladora employment is economic, which would explain why hundreds of

applicants wait in line each week hoping to get a job in one of the maquiladoras.

One question does haunt this study, and that is whether large transnational corporations exporting to much wealthier Northern markets should be held to the same standard as small Honduran restaurants, stores and companies producing products and services for an impoverished Southern market. Should we be satisfied if wages, treatment, overtime, educational and child-care opportunities are relatively similar or only slightly better for maquiladora workers and applicants? If we are not satisfied, what are the best mechanisms for improving these aspects? The data in this paper do not answer these questions, but they do provide information from which those questions can be answered more knowledgeably—with more light and less heat.

Finally, I would challenge authors researching the situation of maquiladora workers to seek to develop and address a more common set of economic and social factors. In addition, I encourage other researchers to use first-time applicants as a control group for maquiladora workers. This will facilitate our ability to undertake efforts such as comparing working conditions across nations and understanding global and historical trends. While the conclusions and recommendations of authors will vary, depending on the relative importance they give to specific factors, such weighing will be apparent and allow readers to better draw their own conclusions.

1033 NOTES

1. The NAFTA agreement and its elimination of trade barriers between the US and Mexico, reshaped the maquiladora industry worldwide but especially in Latin America. Countries attempting to attract maquiladoras sought to counterbalance the benefits available in Mexico by offering more benefits, lower wages, etc. It is important then to examine non-Mexican cases to determine how this post-NAFTA competition for investment has affected workers and their conditions.

2. Tiano (1994) uses data collected in 1983–84, Young and Fort (1994) use data collected in 1991, Kopinak (1996) uses data collected in 1990 and Cravey (1998) uses data collected in 1992.

3. I am aware and sympathetic with many of the arguments against using North/South, First/Third

World, Developed/Underdeveloped terminology. But, for ease of use and because I find it least problematic, I will use North/South.

4. Many also have very small sample sizes, making the generalizations they draw very dubious. (Cravey, 1998) $n = 20$, (Tiano, 1994) $n = 60$, (Kibria, 1995) $n = 46$, (Hovell, 1988) $n = 40$, (Tiano & Ladino, 1999) $n = 67$.

5. Honduras is divided into 18 departments. The department of Cortés is the second most populous department and includes the most industrialized city in the country, San Pedro Sula.

6. The Honduran Maquiladora Association, of which all maquiladoras in Honduras must be members, pro-

- 1062 vided the list of companies. It had been updated in June 1108
 1063 of 1998. 1109
- 1064 7. Honduras has three different sets of legislations for 1108
 1065 maquiladoras. *Regimen de Importación Temporal* (RIT) 1109
 1066 is the least restrictive and least supervised. *Zonas Libres* 1110
 1067 (ZOLIs) are slightly more controlled by the state and the 1111
 1068 *Zonas de Procesamiento para Exportación* (ZIPs) are the 1112
 1069 most supervised and also most common. Previous 1113
 1070 studies had demonstrated substantial differences in 1114
 1071 treatment and wages between these groups, so the 1115
 1072 factories were divided into cells based on legislation to 1116
 1073 assure each group would be proportionally represented. 1117
- 1074 8. We consulted with two human rights organizations 1115
 1075 and the maquiladora association to determine if the 1116
 1076 nonparticipants were substantially different than the 1117
 1077 participants. All groups agreed that there seemed to be 1118
 1078 no pattern to the decision to participate, which would 1119
 1079 affect the results of the survey. 1120
- 1080 9. Nonadministrative employees include: machine op- 1121
 1081 erators, maintenance staff, supervisors and trainers. 1122
 1082 Administrative staff include secretaries, engineers, man- 1123
 1083 agers and accountants. 1124
- 1084 10. One hundred percentage of the selected workers 1125
 1085 were willing to be interviewed. The interviewers believe 1126
 1086 that those selected felt privileged and appreciated a paid 1127
 1087 break. While it is certainly possible that there was some 1128
 1088 systematic bias in the answers to the interviewer's 1129
 1089 questions about sensitive issues such as unionization 1130
 1090 and sexual harassment, these experienced interviewers 1131
 1091 were in general surprised by the openness of the workers. 1132
 1092 The researchers believed that the potential for bias in the 1133
 1093 answers due to interviewing on company premises was 1134
 1094 outweighed by the ability to select a clean random 1135
 1095 sample. 1136
- 1096 11. Between 300 and 500 applicants arrived each day 1137
 1097 looking for employment, but the majority had worked 1138
 1098 previously in a maquiladora. 1139
- 1099 12. For a copy of the employee or applicant survey, 1140
 1100 please contact the author. 1141
- 1101 13. The tables do not include a column for male 1142
 1102 applicants because, given the small number of male 1143
 1103 applicants surveyed, comparisons with that group are 1144
 1104 not significant. 1145
- 1105 14. The one job for which women had a higher mean 1146
 1106 salary was supervisor, however the difference was only 1147
 1107 \$2.50 and not statistically significant. 1148
15. The increase is actually slightly higher than this 1149
 since the 1993 study did not exclude management from 1150
 the random sample, raising the mean slightly. 1151
16. Questions depended on whether the employees 1111
 were living with their spouse or their parents. 1112
17. This question was only asked of those who were 1113
 employed in the last month. 1114
18. Options for this question included: respiratory, 1115
 gastrointestinal, spinal, urinary infections, skin, broken 1116
 bones, burns, pregnancy, vision and other. The high 1117
 percentage of "others" is probably due to interviewees 1118
 not knowing how to classify the illness that affected 1119
 them. 1120
19. Maquiladora managers argue that this practice is 1121
 necessary because Honduran labor law requires that if 1122
 25 employees form a union and register it with the 1123
 ministry of labor, that union thereafter represents all 1124
 workers and all labor contracts must be negotiated with 1125
 those union representatives, even if the majority of the 1126
 workers in that plant do not support the union's efforts. 1127
 Managers cite the results of this survey to argue that the 1128
 majority of the workers do not want a union. Union 1129
 representatives defend the current labor legislation, 1130
 arguing that if starting a union required even a simple 1131
 majority of the workers, maquiladora managers would 1132
 intimidate and fire any union activists and unions would 1133
 never be formed. They cite the current, very low 1134
 unionization level of the maquiladoras as evidence of 1135
 the success of these tactics. The managers are working to 1136
 reform this labor law, while union leaders vow to defend 1137
 it at any cost. 1138
20. It is also interesting to note that of those employees 1139
 who participate regularly in religious activities, there are 1140
 nearly three times more Protestants than Catholics. In 1141
 fact, while a recent survey found that 60% of Hondurans 1142
 consider themselves Catholics and 29% Protestants 1143
 (LeVote, 1999), 28% of all employees say the regularly 1144
 participate in Protestant religious activities and only 1145
 12% in Catholic activities. Employees are also more 1146
 likely to be involved in Protestant activities and less 1147
 likely to be involved in Catholic ones than applicants. So 1148
 while employees are less likely to be involved in religious 1149
 activities, the Protestants are more likely to maintain 1150
 their participation after being employed. 1151
21. It is certainly true that what would be considered 1152
 sexual harassment in North America is often tolerated 1153
 by women in Honduras who are commonly unaware of 1154
 their rights. 1155

- 1156 22. Most of the maquiladora managers, two of whom
 1157 have been killed recently while transporting the weekly
 1158 pay from the bank to their factories, would prefer to
 1159 arrange some type of payment by check or direct
 deposit, however, the vast majority of Honduran work-
 ers distrust these arrangements (not without reason, due
 to bounced checks and "lost" transfers) and want
 immediate access to their salary.

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