

## Industrial America

### 1. In Praise of Mechanization (1897)

*As capitalists competed for markets and profits, they pushed their workers ever harder. Factory laborers came to dread the "speedup"—the order to produce more goods in less time. The already screeching din of the shop floor then whined to an even higher pitch, as machines were made to run faster—and more dangerously. Some observers claimed that the peculiarly profit-hungry and competitive U.S. business environment rendered the conditions of labor in the United States particularly intolerable. Yet new workers by the millions fled the farms of both America and Europe to seek work tending the rattling industrial machines. In the following comments by a French economist who visited the United States near the end of the nineteenth century, how does he appraise the overall impact of mechanization? Is he convincing? What differences does he see between work conditions in Europe and those in the United States? What does he identify as the principal complaints of U.S. workers? Does he consider them justified?*

~~AD US: Read by W. (a) J. W. (A)~~

### Thinking Questions

- ★ What arguments are provided "praising" mechanization?
- ★ How might you counter the author's arguments?
- ★ Is industrialism good for America? all Americans?

"The pay here is good, but the labor is hard," said an Alsatian blacksmith employed in a large factory. I could verify nearly everywhere the truth of this remark, for I have seen such activity both in the small industry, where the tailors in the sweating-shops in New York worked with feverish rapidity, and in the great industry, where the butchers of the Armour packing house prepared 5800 hogs a day, where the cotton weavers tended as many as eight looms, or where the rolling-mill in Chicago turned out 1000 tons of rails in a day. Everywhere the machine goes very rapidly, and it commands; the workman has to follow....

In the Senate inquiry of 1883, upon education and labor, a weaver of Fall River, who had been a member of the Massachusetts Legislature, and who was then secretary of the Weavers' Union, said that he had worked seventeen years in England, and that conditions were much better than in America. The manufacturers there were not so desirous as they are here of working their men like horses or slaves; they do not work with the extraordinary rapidity which is customary at Fall River. In England, one man manages a pair of looms with two assistants; one between the looms and the other behind. In America, the manufacturer, with one or two exceptions, will not hear of that, and whatever the number of spindles they do not wish that a man shall have more than one assistant. The spindle is turned more rapidly; the laborers have more to do and for each loom Fall River produces more....

The manufacturers judge that the movement [to mechanize] has been advantageous to workmen, as sellers of labor, because the level of salaries has been raised, as consumers of products, because they purchase more with the same sum, and as laborers, because their task has become less onerous, the machine doing nearly everything which requires great strength; the workman, instead of bringing his muscles into play, has become an inspector, using his intelligence. He is told that his specialized labor is degrading because monotonous. Is it more monotonous to overlook with the eye for ten hours several automatic looms, and to attach, from time to time, one thread to another with the finger, than to push for fourteen hours against the breast the arm of a hand-loom, pressing at the same time the pedals with the feet?

In proportion as the machines require more room, the ceilings become higher, the workshops larger, the hygienic conditions better. From a sanitary standpoint, there is no comparison between the large factory to-day and the hut of the peasant, or the tenement of the sweating system. The improvement of machinery and the growing power of industrial establishments, have diminished the price of a great number of goods, and this is one of the most laudable forward movements of industry whose object is to satisfy, as well as possible, the needs of man.

The laboring classes do not share this optimism. They reproach the machine with exhausting the physical powers of the laborer; but this can only apply to a very small number of cases, to those where the workman is at the same time the motive power, as in certain sewing-machines. They reproach it with demanding such con-

tinued attention that it enervates, and of leaving no respite to the laborer, through the continuity of its movement. This second complaint may be applicable in a much larger number of cases, particularly in the spinning industries and in weaving, where the workman manages more than four looms. They reproach the machine with degrading man by transforming him into a machine, which knows how to make but one movement, and that always the same. They reproach it with diminishing the number of skilled laborers, permitting in many cases the substitution of unskilled workers and lowering the average level of wages. They reproach it with depriving, momentarily at least, every time that an invention modifies the work of the factory, a certain number of workmen of their means of subsistence, thus rendering the condition of all uncertain. They reproach it, finally, with reducing absolutely and permanently the number of persons employed for wages, and thus being indirectly injurious to all wage-earners who make among themselves a more disastrous competition, the more the opportunities for labor are restricted.

In one of the reports of the census of 1880, Mr. [Carroll D.] Wright examined other accusations which have been brought generally against manufacturing: (1) necessitating the employment of an excessive number of women and children, it tends to destroy the family ties; (2) it is injurious to health; (3) it tends toward intemperance, prodigality, and pauperism; (4) it encourages prostitution and criminality. It was not difficult to prove that these accusations rest upon errors or exaggerations.

To these grievances political economy replies by the general results of statistics, which show that the total number of laborers, far from having diminished, has steadily increased from one census to another in the United States; that, on the other hand, the total wages paid to laborers shows an increase of average wages, that the diminution in the price of goods is advantageous to consumers among whom are to be reckoned the wage-earners. These three facts are indisputable.

However, the American laborer is not reassured by such a reply, because he rarely consumes the goods he manufactures, because the average wages of the country is not necessarily the measure of his wages; because when dismissed in consequence of an improvement of machinery, he runs great risk of finding no employment in the same industry, while in another he finds it generally only after long delays; in the meantime, he has a family to support. Although the American is more mobile than the European, the transition is not easy either for one or the other. And on both sides of the Atlantic, there is individual misery and professional crises which touch painfully, very cruelly sometimes, the laboring classes. That fact is not to be disputed.

The chief of the Labor Bureau of New York has made a suggestive comparison: the United States and Great Britain, he says, are the countries which own and use the most machines. Compare the general condition of laborers in those countries with that of any country whatever in the world, where machines are unknown, except in the most primitive forms. Where is the superiority? It is almost a paradox, and yet it is a truth that machines bring about a much larger employment and improvement, not only because they increase production, but because they multiply the chances of employment, and incidentally the consumption of products. In fact, the census of the United States shows that the proportion of laborers to the total number of in-

habitants has increased in the same period that the machine has taken most complete possession of manufactures. From 1860 to 1890, while the population of the United States doubled, the number of persons employed in industry increased nearly threefold (increase of 172 per cent), and at the same time the mechanical power, measured by horse-power, increased fourfold. Inventions have created new industries, such as photography, electricity, telegraphy, electrotyping, railroading, manufacture of bicycles, etc., and have thus given to labor much more employment than they have withdrawn from it. Thus, even in old industries, transformed by machinery, the progress of consumption has generally maintained a demand for hands.

There is no social evolution which does not produce friction. That which urges industry toward machinery and large factories appears to me to-day irresistible, because it leads to cheapness, which the consumer seeks first of all, and which is one of the objects of economic civilization. It is Utopia to believe that the world could come back by some modification of the social order, or of mechanical motive powers to the system of the little family workshop. Such a workshop is far from being an ideal, as the sweating system proves.