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Thinking Machines Aren't Far Away

IT HAS taken more than 40 years to convince my wife that a man can be at work while sitting with his feet propped on the desk and his eyes at ease. She still has doubts about such "thinking" postures when she has a chore to be done.

Thinkers have always been in rather short supply, which is one reason they are highly regarded. Some, such as Thomas Jefferson, Albert Einstein, and Thomas A. Edison, became famous because their thinking produced results people could see, whether understood or not.

Other thinkers are less spectacular, including homemakers who keep their households running in spite of budget deficits and worker shortages. Many businessmen and farmers also are solid thinkers, with thought concentrated on reducing expenses and increasing revenue.

Nevertheless, evidence is abundant that most people don't have time or won't take time to sit down and think. Almost any activity seems to assume greater importance than thinking.

Well, the news is that instead of waiting for a real thinker to be born into each generation, electronics manufacturers now are promising to turn out robots-that-think by the thousands every year.

The automatic age, the era of aviation, and the communications deluge spawned by radio and television came upon us gradually, so that we are able to adjust, more or less to the drastic changes.

The electronics age is moving us into the future so rapidly that we can't keep up with reading about it, much less thinking about it.

Robots have been publicized in fact and in fiction so that pre-school youngsters know about them. Reports show that 150 companies in Japan and about 30 in the United States have jumped into the manufacture of robots. "We're building knowledge processors, not data processors," says one electronics researcher.

By 1990, the Japanese expect to have on the market a thinking machine with a computerized vocabulary in excess of 10,000 words. It has been estimated that the average American has a vocabulary of some 5,000 words, so we might have trouble understanding such smart robots, as well as difficulty in outthinking them.

Having saturated big business with computers, manufacturers are now turning to small businesses while waiting for the home computer market to develop further. It will do so as youngsters now in school mature and get cash to buy their own personal computers/thinkers.

Sales of some 70,000 low-cost personal computers for classroom use were reported last year and growth is expected every year. An educator testified recently that schools are supposed to teach children how to think; not what to think. But who is going to tell robots which know how to think, what to think?

A science magazine suggested that "individuals with humble home computers will triumph over the biggest, most complex electronic brains of government and big business."

This brings up another horrifying thought: What if thinking robots should gain control of our lawmaking process and government?