THE FUSE IS SET

We can date the nuclear explosion to the last count-down second—five-thirty a.m. July 16th 1945. The population explosion cannot be dated so precisely but the fuse was set ten years earlier—February 1935. A young girl, Hildebrandt, was dying from generalized blood infection; the doctors could offer no hope. Her desperate father gave her an injection of a red dye, the chemotherapeutic effects of which had not been tried on any human patient. She recovered. Her father was Dr. Gerhard Domag. The dye—which had a specific action on the germ causing her disease—was prontosil, the first of the sulpha drugs.

The first extensive use of prontosil was in dealing with a “puerperal sepsis” outbreak in Britain. This infection, commonly called “child-bed fever,” had been consistently fatal. Now it was under control.

The significance of the sulpha drugs was that they showed it was possible to attack a germ within the human body. This change in medical thinking produced by the sulphas led to Florey and Chain recognizing in Fleming’s penicillin the capacity to inhibit the growth of germs within the living body. The historic success of that drug led to the search for new antibiotics with their own specificities. The discovery of DDT insecticide, with the persistence which is now considered its deplorable quality, made it possible to mount an offensive on a massive scale against the vector-borne diseases (such as malaria).

"MIRACLE" DRUGS A MILESTONE

During the war the sulphas, the antibiotics and the insecticides were given production priorities equal to those of munitions. In a real military sense they were victorious because they delivered armies from the poisoned wounds and camp diseases which had historically killed more people than weapons did. And, when the war ended, there were stockpiles and productive potential which could be extended to the broken armies, and the displaced persons of war-ravaged countries and then to the less-developed countries. Indeed it could be claimed that penicillin alone in the ten years following the war saved more people than had been lost in all the wars of all human history.

With supplies available and with BCG (Bacillus Calmette Guérin) as a prophylactic against tuberculosis, the world sought which rampaged after the First World War, international agencies moved across the world scene. UNRRA, the United Nations Relief and Rehabilitation Agency, achieved striking successes and, when it was wound up, UNICEF was given responsibility for the care of children, and is now, together with the World Health Organization, spreading supplies and services throughout the world.

The fight against disease and sickness still goes on but the immediate post-war effect was to cut off the peaks of mortality curves of the prevailing killer-diseases which had been the ruthless form of population control.

THE GHOST OF MALTHUS

In 1952, the effects of population increases in the disadvantaged countries were
obvious enough to cause alarm and to raise again the ghost of Thomas Malthus who 170 years before had predicted human catastrophe because the population would increase beyond the capacity of the earth to feed it.

At the British Association for the Advancement of Science in that year, the President, Professor A. V. Hill, a Nobel Prize Winner for Medicine, said:

Had it been possible to foresee the enormous success of this application (of the benefits of science) would humane people have agreed that it could better have been held back, to keep in step with other parallel progress, so that development could be planned and orderly? Some might say, yes, taking the purely biological view that if men will breed like rabbits they must be allowed to die like rabbits, until gradually improving education and a demand for a better standard of life teach them better. Most people will say, no.

But suppose it were now certain that increasing population, uncontrolled by disease, would lead to widespread exhaustion of the soil and other capital resources, but also of increasing international tension and disorder making it hard for civilization itself to survive; would the majority of humane and reasonable people then change their minds? If ethical principles deny our right to do evil in order that good may come are we justified in doing good when the foreseeable consequences are evil?

This was the rhetorical question posed by a pre-eminently humane man who did not see that the answer was no less than genocide—the deliberate discrimination of advanced nations against other races. It meant also that all the international humanitarian work which has offset so much that is squalid and cynical in world politics has been “doing good when the foreseeable consequences are evil.” This is an intolerable attitude.

DEATH CONTROL VERSUS BIRTH CONTROL

What was just as deplorable was the reticence about population control, and the refusal to recognize that it, by Man’s intervention through science, we have death control, we must also have birth control. The reticence, whether imposed by religious objections or by the principle of “free demographic expansion”, hobbled the United Nations and its agencies. The United Nations could present the demography, update the alarming figures, but it could not discuss what might be done about them or disseminate knowledge and means for curtailing families.

Official attitudes have changed. Religious taboos have been modified. More latitude has been allowed in official programmes. More and more governments are actively promoting birth control. Research into human reproduction and into improved methods of contraception is no longer futile.

In the meantime, however, the graph of population has soared like a rocket from a launching pad.

A quarter of a century ago when one was trying to alert people (a dialogue with the deaf) one would say, “Every time the pendulum clock ticks, there is another mouth to be fed.” Ten years later, one was saying, “Every time your wrist-watch ticks, there is another mouth to be fed.” Now, one says, “Every time your pulse beats, there are three more mouths to be fed.”

MULTIPLY BY FOUR

The term “mouths to be fed” is appropriate because it is the survival rate that matters. If the death-rate is lowered (i.e., if better health measures we keep more people alive) and if the birth-rate increases (i.e., if more babies are conceived and delivered) there are that many more people for whom we have to provide. And provide we must; we have to plan to meet the needs of twice as many people in the world in the year 2000 A.D.

That may sound a dogmatic prediction and somebody is bound to say, “Demographers have been wrong before and can be wrong again. They are always altering their figures.” This is true, but nowadays they are altering them upwards.

Today, national censuses are more painstaking and more accurate, and, invariably, countries find that they have more people than they guessed they had and the censuses are revealing not only headcounts but age-structures.

They show, for instance, that in the developing world more than half the population is under fifteen years of age (because the lethality of child-birth, infancy and childhood has been reduced). They will be reproducing and, even with the most effective birth-control propaganda, we might hope that the 2,000 A.D. figures (only 26 years away) will not be more but we would be unwise to expect them to be less. They are biologically committed. The Holocaust of a nuclear war might affect them but no natural calamity will radically discount those figures.

If we continue to succeed in lowering mortality with no corresponding lowering of fertility, sixty years from now there will be four people in the world for every one living today. There is some agreement amongst experts that somewhere around that figure (fifteen to sixteen billion) a levelling out of the population graph is possible. On the other hand there are those who say that the world (with Man’s ingenuity) could sustain fifty billion—twelve and half times as many as we can precariously feed today. By then we would be “eating rocks”—by that I mean that we would be making our food from the original elements, not as scientific sophistication but from necessity.

A RACE AGAINST TIME

It cannot be repeated often enough that it is not eventual numbers but the rate of growth that is the problem. Time is not on our side. If in a locality food production increases by 2% per cent per annum and the population increases by 3 percent, the effect is chronic famine. Nor can we be deluded by global figures of available food (no longer reassuring). Per capita means per head but not per stomach and if by maldistribution, food is not getting to the bellies that need it, that is not much good. The Green Revolution, with its “miracle” wheat and rice, and the efforts to produce indispensable high protein, with all the amino acids essential for wellbeing, have to be localized. Otherwise we have the litany of malnutrition: “Better to walk than to run; better to sit than to walk; better to sleep than to sit; better to die than to wake.”

And it is not just a question of food. Additional people have to be housed and clothed and presently we will be demanding the artifacts of technology, with all that means in terms of natural resources, energy sources and waste-pollution. It means rapidly increasing urbanization. Kingsley Davis, the authority on population and
urbanization, has pointed out that if the present trends continue all the world's population will be in cities within the lifetime of today's children.

The present migrations are producing the squalor and human indignity of shanty towns, of broken homes and juvenile delinquency, of under-employment and unemployment and of social disorder. Of course, by better municipal management we could accommodate them in World City. We could house them in tall-and-deep buildings (skyscrapers with underground stores). We could use the techniques of factory-farming, with a flow-sheet of nutrients and removal of excrement, and put people in cubicles, like the coops of battery-fed chickens or the tall and styes of cows and pigs. What sort of meaning life would acquire in such circumstances is another matter. One might ask how many mental hospitals are included in the present projections for cities of 60 million people.

CONCERN FOR THE WORLD'S CHILDREN

Early in the history of UNICEF (in what I called "the glass-of-milk days") the agency recognized that it must accept continuing responsibility for the children it saves. It is right, therefore, that like the other agencies of the United Nations, it should concern itself with population control so that succeeding generations should be brought up in human dignity.

It is right that it should be assisting governments to set up services which help children not only to grow and develop in health and have the right to adequate nutrition, but to acquire the skills, attitudes and knowledge required to prepare for the responsibilities of life.

This means co-operating with the World Health Organization in helping countries to build up their health services and train personnel to deliver these services, especially auxiliary workers to compensate for the shortage of fully trained doctors and nurses.

This means working with the Food and Agriculture Organization to seek ways of improving nutrition; with the United Nations Educational, Scientific and Cultural Organization to raise educational levels; and with the International Labor Organization to help young people learn a craft or trade which will prevent them from becoming drifters or delinquents.

UNICEF'S GRANDCHILDREN

Now UNICEF has grandchildren. The infants and toddlers who came to the milk-centres and were succoured through the hazardous years of childhood are now married and have children of their own.

The question is, how many? Their sexual libido will not be constrained by demographic arguments. Asetic continence is asking too much. They must have the knowledge and the means to practice "responsible parenthood." The means must be reliable, cheap, simple to use, not irreversible (sterilization, like abortion, is a last resort) and psychologically acceptable.

"Responsible parenthood" means "to support a family in dignity and to save." How can there be any "dignity" when every successive child takes food and opportunity away from the others in increasing degradation of living conditions? And how can there be any saving, to provide investment in tools and better seeds and improved methods when a peasant with an increasing family is struggling for mere subsistence?

How can the children hope for education and better qualifications when schools are being swamped? The rate of illiteracy is improving in less developed countries but the number of illiterates, by addition and multiplication, is greater than it was a quarter of a century ago.

We give lip-service to "the quality of life" but that quality begins in the home. A poor family gets poorer and poorer with every unwanted child.

While recognizing the need for population control, the world community, and especially the well-to-do nations, have also to recognize the facts of life, present and foreseeable. Hundreds of millions, short of starvation, are not getting the sort of food necessary for well-being. With increasing numbers that will worsen. Human ingenuity, so often selfishly, dangerously or vaingloriously misapplied, must be addressed to human needs.

The race is between production and reproduction.