

*Human Environmental Studies*

Later he writes:

The death rate from bronchitis and emphysema in the United States is nine times as high as it was 20 years ago. At the present rate of increase, 180,000 Americans will die of these lung ailments in 1983.

Let us look at noise now. One thing we can say for sure is that we are up to our ears in noise in Canada. Some of the problems that come from noise relate to the eyes—the pupils dilate blood vessels constrict, stomachs turn, and nerves jump. Yet for many people in this society there is no escape. Some experts claim that the noise level in Canada is increasing at a rate of about one decibel per year. Most people feel extreme discomfort at 115 decibels. If loud sounds persist, undoubtedly permanent hearing loss will result.

Noise can also affect the cardiovascular system. Research in both the United States and Europe indicates that noise increases the level of cholesterol in the blood and raises blood pressure. German and Italian medical researchers have found that even moderate noises cause small blood vessels to constrict. This vasoconstrictive reflex is the body's automatic way of responding to the stress of noise. It also occurs during sleep, as is shown by Dr. Gerd Jansen of Essen, West Germany. He measured the vasoconstriction that occurs in the fingers of sleeping subjects when he played recorded noise at only 55 decibels, the level of nearby traffic. The vasoconstriction took place even when the noise exposure lasted only a fraction of a second. Even with this limited exposure the blood vessels took minutes to return to normal. Dr. Jansen concluded that the sound of traffic at night heard by sleeping individuals can endanger their hearts and arteries.

In Italy Dr. Giovanni Straneo found that noise not only causes the blood vessels in fingers and eyes to constrict, but also has the opposite effect on the blood vessels of the brain. The dilation in the brain could be a reason why noises cause headaches. He also found that noise threatens the heart itself by directly altering the rhythm of its beat. In addition it makes the heart work harder by thickening the blood while constricting its flow in peripheral vessels. One of his associates at the university of Pavia found that noise also increases the stomach's flow of acid.

We are only trying to point out that unless we give due consideration to the whole environment then obviously society is making a wrong judgment if it simply decides how to punish people for what is held to be abnormal behaviour. We create the society, Mr. Speaker, and we create the kind of situation that causes people to behave the way they do.

To give another example of the effect of noise I would like to quote from the 1973 edition of *Psychology Today* which states that children living at street level on busy streets had significantly lower reading and language acquisition levels than those who lived above the fifth floor. In controlled experiments in the laboratory it was discovered that noise levels as low as 55 decibels could negatively affect a testing program requiring concentration and manipulative skills.

The fact is, Mr. Speaker, that noise can cause distress, irritability, and abnormal human behaviour. But here we are just a few weeks away from talking about bills that will deal with capital punishment and whether to put people in jail for 25 years or longer. What we ought to be

[Mr. Malone.]

focusing on is how to build the kind of Canada in which minimal negative behaviours are elicited.

Let us look at the space relationships on this continent. In the city of Los Angeles 60 per cent of the land area is devoted to the automobile. If we look at our spatial needs in a diatic situation we find that from one culture to another there is a difference in spatial needs. A person who has come here from England usually will communicate with another person by focusing on that person's both eyes. In the French culture there is a closer spatial relationship. We note the Italians do considerably more touching than the English, while we find that the Arabs get right into the breath stream of the other person, and even in business relationships speak only a few inches from the other person's mouth.

In Canada we build cities where the parks are miles away, where picture window looks into picture window, and then we tend to blame the abnormal behaviours of society on those who commit them, irrespective of the fact that we have in our culture done a great deal to cause those behaviours. The question should not be how to punish or not to punish, but how to focus on what we can do to create a society which is happy.

We can make any species of animal act abnormally simply by controlling the following factors: the amount of light or darkness, the increase or decrease of temperature, space limitations or crowding factors.

The motion reads:

That in the opinion of this House, the government should consider setting up, in co-operation with the provinces, an institute of human environmental studies to determine among other matters (a) the degree of air, soil, water and noise pollution the human species can tolerate without serious effects on physical and mental health (b) the type of environment which stimulates the most desirable qualities of physical and mental health in the human species (c) the type of national development which would give satisfactory environment to the greatest possible number of Canadians—

Today we should ask the House to consider that if as a nation we consider we have the right to punish people who act in some form extraneous from those mores outside the law, then surely we bear an obligation to reshape the kind of environment that causes that behaviour. I think we have ample information to illustrate quite clearly that environment definitely has its effect on all of the animal species and in many cases, as is clearly demonstrated, on the human organism.

● (1620)

We know how high noise levels can affect children and their ability to learn, how pollution can affect health, and how lack of living space can give rise to aggressive and abnormal behaviour. The motion asks the federal government, in conjunction with the provinces, to take seriously its obligations and responsibilities to those who act outside the law but, at the same time, to recognize its responsibilities for creating an environment which will stimulate a positive and constructive response. Let us create an environment which will elicit from people positive and constructive behaviour. I commend this motion to the House, Mr. Speaker, and wish to tell hon. members that it has been a pleasure to participate in this debate.