

The Trouble with DDT

We are pleased to note that the city councils in both Regina and Saskatoon have discussed the problem of DDT and have decided to put curbs on its use. We commend them for their conscientious consideration of the problem and for their decision to stop using DDT pending further investigation. This is in keeping with our increasing awareness of the dangerous potential of persistent pesticides such as DDT. Sweden and the states of Michigan and Arizona now have completely banned the use of DDT and in California it will be banned from home and garden use beginning January 1, 1970.

For several years naturalists, especially ornithologists, have been concerned about DDT for it is toxic and persistent. It does not break down quickly in the environment and so the residue increases each year as more of it is used. It is stored in certain animal tissues and animals at the top of a food chain get such large quantities that they may be killed or at least lose their ability to reproduce. It is now a proven fact that DDT can cause and is causing the extinction of the Peregrine Falcon, the Bald Eagle and some other forms of wildlife.

There will be considerable protest from chemical companies and some agricultural groups against movements to limit or ban the use of DDT for it is the most effective and the least costly of major pesticides. There will be claims that there is lack of evidence that DDT is harmful to man, although there is evidence that it is carcinogenic in mice. The average level of DDT in humans in North America is now 12 parts per million, an amount considered unsafe for food if present in cattle. There will also be claims that DDT is a great benefactor of mankind for it has saved millions of lives by safeguarding food production.

If we ban the use of DDT attention will have to be given to preventing the use of pesticides that are even more toxic and persistent. Many related hydrocarbons, including dieldrin, aldrin, heptachlor, chlordane, lindane, endrin and toxaphene remain toxic for many years and they all accumulate in animals, including man, at the top of the ecological ladder. The persistent pesticides must be replaced by degradable chemicals such as malathion.

In March 1969 the United States Food and Drug Administration confiscated 22,000 pounds of Lake Michigan coho salmon which contained dangerous levels of DDT. These fish contained DDT residues ranging from 13.67 to 19.48 ppm. Although no tolerance level for DDT in fish products had been set the FDA consider 3.5 ppm. as the top allowable level. Strong representations have been made by local vested interests and the FDA have set the tolerance level in fish temporarily at 5 ppm. (Considerably higher levels have been recorded in some Canadian fish). As a result of these events the Michigan Department of Agriculture has dropped its support of DDT; registration of the chemical in Michigan has been cancelled, and it is expected that it will soon become illegal to sell DDT in Michigan.

We once thought that the earth was big enough to absorb anything in its air, soil, rivers and seas, but persistent pesticides like DDT have spread so that even the Eskimos have DDT in their tissues. After 20 years of spraying for mosquitoes, salt marshes on Long Island were found to contain up to 32 pounds of DDT per acre. Pesticide residues will continue to increase and irreparable damage will likely be done to the environment and even to the human race unless prompt action against such pollutants is taken.

In March Sweden banned the use of DDT for two years, the first country to put a complete ban on the use of DDT. The U.S. Department of the Interior is advocating a phasing out of the use of DDT throughout the next few years. Our city councils in Saskatchewan are taking steps against DDT but in addition gardeners and farmers must stop using DDT if increasing accumulation and damage is to be halted.