

THE METRONOME
AS A POPULATION TEACHING TOOL
By John Tanton

Those of us concerned with the human population problem are often confronted with the mesmerism of numbers, and the general human failing of an inability to comprehend and relate to numbers that run into the millions and billions. World population is now increasing about 90 million per year. How can this be put into terms that we can grasp more easily?

One way is to break the 90 million per year rate down into smaller units of time that are closer to our ordinary experience. For instance, that number of new people reduces to:

246,500 per day
10,270 per hour
171 per minute.

The rate per minute is within range of most metronomes which run up to about 220 strokes per minute. I sometimes will start a metronome running at the beginning of a talk and explain the idea of relating population growth to time. Since the noise and motion are distracting, I shut the metronome off during the speech and then turn it back on at the end of my remarks to remake the point about the rate of increase.

It should be noted that the 90 million per year is the net increase. There are actually about three people born for each one that dies, so the total births per year are around 135 million, with 45 million deaths, leaving the net gain of 90 million. Since the 45 million dying are those on whom society has already spent resources, the situation is actually more difficult than the 90 million figure indicates. We are losing 45 million people who have been educated and trained to some degree. We are gaining 135 million who need the expenditures of many resources to make them into productive citizens.

Every day it grows more imperative that we do all we can to grasp the reality of the constant growth of world population and its effects on the resources of the planet as well as the nature of our life together.

In the 60 seconds it took you to read this page, 171 more people were added to the population of our earth.