

March, 2006 From: Nelson Fugate, nfugate@mii.org Every American Born Will Need ...



3.7 million pounds of minerals, metals, and fuels in their lifetime

—free download at <u>www.mii.org</u>

47,502 pounds of Newly Mined Minerals for Every American last year

The 2006 *mii Baby* is out . . . and it reflects the mining of more than 7 billion tons of mineral and energy fuels last year. Maintaining the American standard of living last year required the production of 47,502 pounds of newly-mined resources for every person in the country, a 1,100 pound increase from the previous year.

With the average life expectancy for Americans now up to 77.6 years, this means that 3.7 million pounds of minerals, metals, and fuels must be provided to meet each person's needs during their lifetime.

Nearly half of the demand (11 ½ tons) was for sand, gravel, stone, and cement used for the construction and maintenance of roads, for residential and commercial buildings, and to build public facilities, such as airports, water treatment plants, schools, and hospitals. The need for energy creates half the demand for mined materials: coal consumption, primarily to generate electricity, grew to nearly 7,600 pounds per person in 2005, and every person's share of petroleum consumption averaged 1,073 gallons and nearly 75,000 cu. ft. of natural gas.

Every year the Mineral Information Institute provides calculations on the amount of mineral and energy fuels that are consumed in the United States, and converts those statistics to show everyone's fair share of the amount of materials that need to be mined to maintain the standard of living for 295 million Americans. The Institute, a Denverbased educational nonprofit, specializes in providing natural resource educational materials for classroom teachers.

^{© 2006,} Mineral Information Institute

Process for Calculating the mii Baby

- inquiries should be addressed to <u>nfugate@mii.org</u>

Per Capita Annual Consumption

To annually update the MII Baby, statistics from the US Geological Survey Mineral Commodity Summaries (annual reports available on-line at <u>minerals.usgs.gov/</u>minerals/pubs/commodity/) and the Energy Information Administration (http://www.eia.doe.gov/) provide the amounts of various minerals and energy fuels that are consumed in the United States. Both sources provide annual "apparent consumption" data that is used, rather than production statistics.

Leslie Coleman with the Statistic Services group of the National Mining Association provides the analysis to generate the per capita mineral usage, by converting these statistics from (in most cases) metric tonnes to pounds and dividing by the most current U.S. population estimate (which increases a little more than 1% each year). This provides the U.S. Annual Mineral Use Per Person statistic. To provide a weight statistic, the petroleum and natural gas numbers are converted from volume to weight measurements.

The USGS statistics we use are preliminary data, compiled early in the year from the previous year's production and consumption information. These statistics are always honed and refined, but we do not recalculate the mii Baby when the preliminary data is updated. For this reason, if you recalculated the information from previous years, your statistics would be different than those we originally provided for that year.

To create the lifetime statistic-

This annual per capita consumption (which varies between 46,000 lbs. and 48,000 lbs.) is multiplied by the average life expectancy for newborns in the US, provided by the Center for Disease Control. This estimate is usually two to three years out of date. The life expectancy statistic between men and women is averaged.

The most current MII Baby can be downloaded from www.mii.org

Note for 2005 Calculations

Calculations for the *Other Minerals & Metals* category for 2005 is more than twice that reported last year because of a mis-calculation. We did not provide an accurate conversion for gypsum consumption in 2004.