Principle difference of a human being-consumer of the previous epochs is the fact that all these mentioned components of the personal human being's development becomes a consumption aim, but not a means to get material welfares in future (e.g. a car becomes a transport means to go to the forest to have a rest and reproduction of the spiritual forces but not to go to the garden only to grow and to gather in a good harvest).

A human being-producer influences more and more on information than the material welfares. Even in case he produces the material goods his aim to from information programs of combinations and interaction of the material blocks in space and time but not the transformation of the material substances (this function will be performed by machines).

A human being-constructor designs outlines of the environment he will live and work in and the products to be consumed. In all probability one can foresee two key transformations in a human being-constructor's activity:

- sphere of consumption: change from designing concrete goods and serviced to the formation of the welfare complexes that create condition for the comfortable life of a "bio" human being, maximum development of a "socio" human being and create realization of a "labour" human being;
- field of production: change from creation of the not typical for nature matters of labour and "unlinked" productive processes to the formation of the allied to nature matter of nature, production of which is organized at the circled cycles.

A group of the supposed changes given in the table 8.1 is symbolical and can characterize only some features of a complicated many sided phenomenon called an information revolution. A part of the changes given in the table 8.1 has been described in detail in the previous chapters and it lets us be more laconic explaining the certain phenomena and pay more attention to examine the other moments.

INFORMATION BASIS OF ECOLOGICAL MANAGEMENT

Alla Anchurova,
Sumy State University, Ukraine

The information is the items of information on the environmental world and processes, proceeding in him perceived by the man or the special device. For ecology it is the items of information on a condition of an environment, factors of influence on it and demographic data, which allow to spend monitoring and to accept the decisions on the basis of the received information.

As a result of accumulation of the large files of the information there is a necessity for its ordering and simplified access to her. With this purpose the databases and cartographical systems are created.

As have shown special researches, 80-90 % of all items of information in our information field, make geographical information, that is not the simply abstract, impersonal data, and the information having the certain place on a map, scheme, plan etc. Therefore it is no wonder, that 25 years back was created technology, united operations of job with databases and the high-grade geographical analysis.

In its work the geographical information systems operate with any data, which can be placed on a map or circuit. In effect, the GIS is a combination of maps to databases. As the geographical information systems include advantages of databases (volume of the information) and maps (presentation), GIS in the greater measure are accessible to perception. The important feature of the GIS is also that these systems allow leading both account, and planning, and forecasting.

Working GIS includes five key components: hardware, software, information, executors and methods (plan and rules of the work).

The given technology is applied in all spheres of human life. For example it helps to solve problems of territory's pollution of, reduction of forests, search of the best route of movement between items, various municipal tasks. Besides GIS promotes development of ecological education, ecological tourism and restoration of environment.

The GIS are effective in all spheres, where the account & management of territory and objects on it is carried out. It practically all directions of activity of bodies of management and administrations: land resources and objects of the real estate, transport, engineering communications, development of business, provision of law and order, management of extreme situations, demography, ecology, public health services etc.

The GIS allow exactly taking into account coordinates of objects and area of sites. Due to a complex opportunity, in view of set of geographical, social and other factors, analysis of the information about quality & value of territory and objects on it, these systems allow most objectively to estimate sites and objects. So, for example, in scientific researches of A.M. Telizhenko and S.V. Glivenko the new approach to optimization of atmospheric-safe expenses is developed within the limits of Europe. The developed models require constant information filling and the geographical information systems optimum approach for this purpose.

Thus, GIS is an effective means of maintenance of the administrative decisions. And if the 21st century - is the century of the information, the GIS - is the control facility by it.