

Technosphere Development in the 21st Century. Patterns and Features

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We believe that the most typical state of the technosphere in the 21st century will be the joint use of traditional and new technologies.

The development of the technosphere through the integration of technologies is a multi-stage evolutionary synergetic process. In this context, the entire history of technosphere formation and development can be viewed through the prism of synergetic integration mechanisms. High-tech products (HTP) are already manifestations of self-organization.

Thus, the complex nature of technological, technical, economic and other problems associated with the creation of high-tech products and technologies necessitates the development of a comprehensive methodological approach to the problems of technosphere innovative development based on the self-organization principles.

The most important task in the technosphere development is the phased, systematic and coordinated evolutionary synergetic integration of existing and new technologies in the creation of new HTP products. Such integration will significantly improve the quality of HTP products at the same or lower cost of resources for their creation.

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