Sustainability of Economic Dynamics of High-tech Products Creating

A.V. Leonov[1], FSBI 46 Central Research Institute (FSBI 46 CRI) of the RF Defense Ministry, Prof. Dr., alex.clein51@yandex.ru
A.Yu. Pronin[2], FSBI 46 CRI of the RF Defense Ministry, Assoc. Prof. PhD, pronin46@bk.ru

[1] Senior Researcher, Moscow, Russia
[2] Deputy Head of Department, Moscow, Russia

Citation: Leonov A.V., Pronin A.Yu. Sustainability of Economic Dynamics of High-tech Products Creating, *Kompetentnost' / Competency (Russia)*, 2021, no. 4, pp. 40–49. DOI: 10.24412/1993-8780-2021-4-40-49

key words

sustainability, state program, project, integrated approach

Comprehensive approach to improving the sustainability of the economic dynamics of high-tech products in government programs and projects, based on the joint use of program-target planning and nonlinear dynamics methods, is developed and presented. Theoretical approaches and methods for studying the stability of economic dynamics are presented in a generalized form, which includes:
(a) diffusion methods for studying the dynamics of correlations;
(b) methods for establishing the relationship between the dynamics of correlations and economic dynamics;
(c) methods for assessing the stability of economic dynamics.
On the basis of the established relationship between the dynamics of correlations and economic dynamics, the criteria for assessing stability and a methodological approach based on the general stability theorem of A.M. Lyapunov are developed.
We believe that the results obtained can be used to improve the methodological tools for managing the creation of high-tech products in the development of long-term technological programs, reduce the risk of their implementation, identify ways and means of sustainable innovation and technological development of the country, as well as to develop a methodology for the sustainable development of economic systems.

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