



General energy. ¹Blinov I.V., ²Denysyuk S.P., ³Жужиков V.Y., ⁴Kyrylenko O.V., ⁵Kyseleva A.G., ⁶Lukyanenko L.M., ⁷Osypenko K.S., ⁸Pavlovskii V.V., ⁹Parus E.V., ¹⁰Sopel M.F., ¹¹Stelyuk A.O., ¹²Tankevych S.E. (Edited by Kyrylenko O.V.) Intelligent electric power systems: elements and modes. – Kyiv: Institute of Electrodynamics of NAS of Ukraine, 2014. – 408 p.

ISBN 978-966-02-7207-1

1, 4, 6, 8–12 – Institute of Electrodynamics of NAS of Ukraine,
2, 3, 5, 7 – National Technical University of Ukraine “KPI”

In the monograph general trends of Smart Grid concept formation are determined; problems of electric power systems development are defined; main directions of the development of intelligent electric power systems are evaluated. A description of the corresponding technological basis is given. Principles of the development of electricity market in the UPS of Ukraine are proposed. Analysis of the development of Smart Grid concept in relation to the development of power electronics means is

conducted to solve the problems of transformation of electrical energy parameters.

This monograph is oriented towards the specialists engaged in research in the field of intelligent electric power grids and systems, and towards the postgraduate students and students of electrotechnical specialities.