



CONCEPTUAL APPROACH TO THE PERSONNEL MANAGEMENT PROBLEMS IN THE ORGANIZATION MANAGEMENT SYSTEMS AND THEIR MODELING

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Development of modern information technologies opened wide opportunities for improvement of management process. Today in most of commercial, social and governmental institutions important decisions are made by using elements of computer analysis. Thus nowadays when information turned to be a resource growth, abundance, complicity, contradictions of information scope received directly by decision-making person or managing organization, the importance of taking into consideration the number of numerous mutually relative factors and, finally, constantly changing situation turned the application of important technologies within the decision-making process, i.e working out of intelligent computational decision-making supporting systems into inevitable process.

From this point of view investigation of problems of personnel management in organization management systems, explorations of their characteristic features, defining of their distinctive features and dependence on these features, so the creation of conceptual models of these problems is necessary.

Problems frequently met in OMS concerning management for instance may be shown as follows:

- (1) personnel employment;
- (2) compliance of employees to their positions;
- (3) distribution of rights among employees;
- (4) distribution of workplaces among employees;
- (5) distribution of work scope among employees;
- (6) distribution of remunerations (premiums) among employees;

Decision-making person to provide correctness and objectivity determines indices characterizing the brought up raised problem and evaluates them by defining the level at which these indices meet given decision versions.

According to the results of investigations distinctive features of the problems given below were determined:

- (1) multi criteria of the personnel managing problems in the organization management systems
- (2) difficulty of criterion simple definition and high alternation level of their diffuseness borders
- (3) hierarchic nature of the criteria
- (4) expediency of experts attraction as a source of information in the criteria defining
- (5) necessity in uncertainty formalization of linguistic expressions cause by uncertainties of natural language at the estimation of qualitative indicators
- (6) taking into consideration different significance of criteria characterizing organization management problems and their relative importance
- (7) necessity of collective decision-making on the part of several experts

The listed features of OMS personnel management problems defined fuzziness of introductory information, and "load" estimation problems into fuzzy surrounding. Modeling and estimation of personnel management matters requires diffuseness of indices, selection of adequate formalisms allowing to take into account an illegibility and border diffuseness of parameters and uncertainty of linguistic character, connected with formalization of expert knowledge. From this point of view there emerge a necessity of application of fuzzy mathematics device for realization of estimation stage of organization management problems and implementation of this stage in the fuzzy conditions referring to the decision-making methodology.

According to fuzzy mathematics device used in decision-making process the satisfaction degree of decision alternative i to criterion j is represented by criterion membership function $\varphi_{kj}(x_i) : X \times K \rightarrow [0, 1]$ considered as a nucleus of fuzzy mathematics and is estimated by suitable methods of using of appropriate device.