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Water Contaminants Monitoring in Moldova

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One of the main priorities of the 21st century – worldwide struggle for clean water. The water monitoring and it's resources management is one of the key problem for all countries including Republic of Moldova. In some cities of RM groundwater has become an exclusive source of drinking water. In this work are presented results, obtained in the frame of the project EAP.SFP.984403, devoted to monitoring of the water quality. Some chemical parameters of water by study of groundwater in Prut river basin were determined, which were used for the groundwater classification. Monitoring wells were sampled by the field trial in 2014 year. The results of chemical analysis were used for the preliminary identification, characterization and classification of groundwater bodies. The chemical content of water shows a status of studied groundwater bodies and is important for monitoring. Several heavy metals were analyzed in surface water from national monitoring network. One dangerous spot (contaminated region) is the old pesticide deposit "Chismichioi", which is studied for the assessment of actual status at the surrounding territory. It is one of the biggest deposit of toxic substances at the Low Danube Euro-region. The following spectrum of POPs was identified in the samples: DDE, DDD, DDT, a-HCH, b-HCH, g-HCH. The other toxic organic substances were studied also at this site: PAHs, triazine pesticides and some heavy metals. The general conclusion about the situation around "Chismichioi deposit" is that the level of pollution from the time of it's origination (in 1979) is not changed in general. The zones with high pollution were eliminated and recommendation was proposed for the mitigation of negative impact on the environmental and water resources in this area.

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