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## LEGISLATION ON UNIVERSAL SALT IODINATION IN FEDERAL REPUBLIC YUGOSLAVIA

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Iodine deficiency disorders/ IDD/ are recognized as the most common causes of preventable mental retardation and brain damage in the world. Iodine deficiency leads to a wide range of abnormalities including increased incidence of miscarriages, stillbirths, perinatal and infant mortality, impaired mental and physical development, goiter and endemic cretinism.

Iodine is required for the synthesis of thyroid hormones, which are involved in the maintenance of normal metabolism of all cells. Normal development of brain cells is essential in early growth and development of the body.

By signing the World Declaration and Plan of Action the World Summit for Children/1990/ and International Conference on Nutrition/1992/, governments of more than 90 countries have committed to the virtual elimination of IDD by 2000. Related to this document International Committee on Control Iodine Deficiency Disorders /ICCIDD/ was established. The activities of this committee are supported and assisted by the World Health Organization/WHO/ and UNICEF.

A recent ICCIDD/ WHO/UNICEF document "Progress Towards the Elimination of IDD" estimated that about 2.225 million people are currently at risk of IDD.

According to the data prepared by the Subregional ICCIDD for the Eastern Europe, Central Asia and Baltic countries, around 159 million people from this region which include 24 countries, are at risk for IDD. This population which is at risk for IDD represents 40% of total population of these countries.

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Balkan Peninsula is a region where existence of IDD is historically proven for ages. The frescoes of Orthodox saints drawn in the monasteries of Serbia in Middle Ages vividly showed existence of goiter

In Yugoslavia IDD were recognized as a public health problem relatively early. Epidemiological and clinical research conducted in 1950, leading by professor Miodjub Kicic endocrinologist /Medical Military Academy/ and professor Sergey Ramsin specialist of hygiene/Institute of Public Health of Serbia/ indicated that around 650 thousand persons suffered from endemic goiter. More than 20 thousand were suffering from endemic cretinism /up to 3% of entire population/. Goiter prevalence in some regions in western Serbia/Badovinci and Novi Pazar/exceeded 84% and 88% of total population of school children.

Based on these investigations in 1951, the Federal Commission on Endemic Goiter was formed by the Central Hygienic Institute/ now Federal Institute of Public Health/ which duty was to prepare a national programme on IDD eliminating. In 1953 the Regulation for universal salt iodination was adopted. This regulation prescribed that all salt that was intended to be used by human and domestic animals had to be iodized by 10 mg QUI/Kg. The implementation of this regulation in the whole country started in 1956/57.

The epidemiological and clinical investigations conducted 10 years later showed spectacular results. The prevalence of goiter in school children in Badovinci dropped to 22.6% and in Novi Pazar dropped to 25.3%. These results supported the adoption of the Standard on coffee and species quality in 1963/ Official Journal 22/63/. According to the provisions of this Standard, table salt and salt for food processing industry had to be iodized by 10 mg of QUI. This Standard was in force up to 1993. Related to the recommendation the content of KI in table salt increased to 20 +/- 4 mg/Kg. According to the provision of rearranged standard, besides the use of KI the use of KIO<sub>3</sub> was also recommended as a source of iodine. The content of pure iodine in table salt as well as salt for food processing industry had to be 12 +/- 3 mg/Kg. After the adoption of the above mentioned standard, the forthcoming period was extremely important for the stability of national programme for IDD elimination. The dissolution of former Yugoslavia started in 1991. Despite of the dissolution of the country, when the traditional and the main source left in neighboring state, the programme on IDD prevention sustained. In 1999 ICCIDD/UNICEF initiated and

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supported survey on IDD in Serbia and Montenegro. The survey based on the methodology created by ICCIDD was finished in 2000 and in Montenegro is still going on.

The results obtained from Serbia, showed that IDD were virtually eliminated in the population. These data also showed that about 73% tested salt samples contained prescribed amount of iodine/above 15 mg /Kg/. The content of the remaining 27% samples were below the above mentioned amount. Related to this data the Subregional ICCIDD recommended reestablishing National Committee on IDD which main duty was to provide technical assistance to the Federal Government in ensuring IDD programme sustainability and strengthening of the legislation of universal salt iodination. The National Committee on IDD was formed by the Federal Institute of Public Health in 2000. One of the first visible activities of the National Committee on ICCIDD that has been done was its official nomination as a body responsible for the survey of universal salt iodination programme in the country.