Introducing salt reduction strategies without jeopardizing salt iodization: a WHO workshop in South-East Asia

To harmonize national strategies to control iodine deficiency and reduce the burden of cardiovascular disease, the WHO Regional Office for South-East Asia and the All India Institute of Medical Sciences conducted a Regional Workshop on sodium intake and iodized salt on 29–30 September 2014 in New Delhi, India.

In South-East Asia, many countries have effective salt iodization programs while others are in the process of developing or strengthening salt iodization. But nearly all still lack legislative measures or strategies to reduce salt consumption. The workshop’s objective was to help identify a path to successful integration of both strategies across the region. The rising prevalence of non-communicable diseases (NCDs) in South-East Asia is an escalating problem for the economy and population health. A recent UN Summit recommended reducing salt intake by 30% from current levels by 2025.

The WHO recommends reducing salt consumption to 5 g/day as a cost-effective way of preventing hypertension and the overall burden of NCDs in adults. In parallel, it promotes universal iodization of edible salt as an effective way to prevent and control IDD. Integration of both strategies by promoting their commonalities and complementarities is essential to ensure that they both succeed.

Stressing commonalities and removing barriers to harmonization

Over the past two decades, the iodization of edible salt has reduced the prevalence of iodine deficiency disorders around the world, with only 25 countries remaining iodine–deficient in 2015 compared to 131 countries in 1993. Country experiences have shown that iodization can be effective over a range of salt intakes, from 6–15 g/day. If salt intakes fall, salt iodine levels could be titrated upwards without technical or sensory barriers. And crucially, no evidence exists that adding iodine to salt increases salt consumption or impedes reduction in salt intake.

The United Kingdom is an example of a country which achieved a 15% reduction in salt intake (from 9.5 to 8.1 g/day over 7 years) through a well-designed and successfully implemented strategy. The UK program has several components which could serve as a model for South-East Asia, including strong leadership, policies and commitment, availability of population data regarding dietary salt intake (DSI) and common sources of dietary salt, setting progressively lower salt targets for different categories of food for voluntary adoption by the industry within a given time frame, technological support for reformulation of food products, food nutrition labeling, as well as promoting consumer awareness and monitoring progress by frequent surveys.

In developing countries, where salt reduction is still in its infancy, priority should be given to adopting strong policies, and to establishing the baseline salt intake in the population and the main sources of salt in the diet. Throughout South-East Asia, approximately 70% of dietary salt is added during cooking or at the table, which means that reducing salt in processed foods would have little impact. The importance of street foods in contributing to salt intake must not be overlooked, and innovative approaches may be needed to address this sector. The initial efforts should also focus on educating consumers, through a comprehensive public health strategy, about the adverse effects of excess salt. In parallel, efforts are needed to lower the salt content of convenience foods, introduce mandatory food nutrient labeling by multinationals, help small local companies with product reformulation, and monitor salt and iodine intake.

Workshop participants learned standard analytical methods for measuring urinary and salt iodine.
Salt reduction efforts in Thailand and Indonesia
In promoting low sodium intake, Thailand has seen successes and failures. The traffic light system adopted to promote low-salt products was not effective due to low consumer demand. “Healthy choice” labeling of processed foods using a cut-off score system has been proposed as more appropriate and will be implemented by late 2014. Currently, the few low-salt products on the market are used by a select group of consumers. Behavior changes need to be promoted through nutrition education for consumers and the industry. Development of low-sodium seasoning sauces and seasoning powders for routine preparation of street and restaurant foods and home-cooking should be promoted. If salt consumption per capita decreases to the recommended 5 g/day, salt iodization may need to be increased by 59%.

Indonesia has policy and legislation on salt and has implemented some salt reduction strategies. A dietary survey identified monosodium glutamate as the highest contributor to sodium in the diet (80%) and as the food most associated with NCDs. Indonesian initiatives for promoting NCD reduction include mandatory food labeling and warning messages about salt on food labels. But at the same time as multisectoral support is being established to implement salt reduction, Indonesia also faces challenges in the implementation of its salt iodization program: USI has not yet been achieved and gaps remain to be addressed. There are also challenges in integrating the simultaneous promotion of iodized salt and low salt intake.

Key messages emphasize compatibility
The workshop’s key message was that the twin strategies of reducing dietary salt and promoting intake of iodized salt are compatible but are often at different stages of maturity in terms of implementation. Therefore, programs for reducing dietary salt intake need to be moved forward rapidly throughout the South-East Asia Region.

Common areas of work for salt reduction and salt iodization strategies include policy development and implementation, monitoring and evaluation of programs, communication and advocacy, surveillance of sodium and iodine intake, as well as joint strategies and shared forums with the food industry. Salt reduction requires multisectoral efforts and cooperation among all stakeholders including health, education, science and technology, and trade and industry sectors as well as food manufacturers. The salt industry, who have been willing partners in salt iodization programs, should also be educated to become active stakeholders in salt reduction. Reducing sodium intake will not jeopardize delivery of iodine to populations through salt iodization as long as the levels of iodine in salt are monitored and adjusted when necessary. Joint monitoring of sodium and iodine intakes using the existing systems for monitoring iodine could be cost-effective.

Recommendations and next steps
• Public health messages on dietary salt reduction should be clear and simple and not contradict or confuse the messages regarding promoting consumption of iodized salt.
• National-level committees should be set up to monitor and regulate dietary salt reduction and salt iodization programs, and to ensure cooperation and safeguard optimization of both strategies. This should be planned from the initiation of salt reduction programs.
• Iodine content in salt should be adjusted based on regular monitoring of salt consumption and urinary iodine to minimize problems that may ensue following dietary salt reduction, if salt is the main vehicle of iodine delivery to the population.
• Potential integration of salt intake assessments with National Health Surveys, Demographic and Health Surveys, and NCD risk factor surveys (STEPS) should be assessed.

References

The WHO Regional Workshop on 29-30 September 2014 was attended by more than 40 delegates from all countries in the WHO South-East Asia region.