

Obesity: Preventing and managing the Global Epidemic - Report of a WHO Consultation on Obesity, 3-5 June 1997, Geneva, WHO/NUT/NCD/98.1 (This is an interim version of the report. The final version will be published in the WHO Technical Report Series (TRS)).

The following is the executive summary of the report:

Executive summary

An expert consultation on Obesity was convened by WHO in Geneva from 3 to 5 June 1997 with the aim of reviewing current epidemiological information on obesity, and drawing up recommendations for developing public health policies and programmes for improving the prevention and management of obesity which is emerging as a global public health problem.

The specific objectives of the Consultation were:

1. To review global prevalence and trends of obesity among children and adults; factors contributing to the problem of obesity; and associated consequences of obesity, such as chronic noncommunicable diseases;
2. To examine health and economic consequences of obesity and their impact on development;
3. To develop recommendations to assist countries in developing comprehensive public health policies and strategies for improving the prevention and management of obesity;
4. To identify the issues which need further research.

The Consultation immediately recognized that overweight and obesity represent a rapidly growing threat to the health of populations and an increasing numbers of countries worldwide. It recognized obesity as a disease, which is prevalent in both developing and developed countries and affects children and adults alike. Indeed, overweight and obesity are now so common that they are replacing the more traditional public health concerns such as undernutrition and infectious diseases as some of the most significant contributors to ill health.

The Consultation noted that a coherent system for classifying overweight and obesity in adults is now available and should be adopted internationally. This is based on the Body Mass Index (BMI), calculated as the weight in kilograms divided by the square of the height in metres, with BMI ≥ 25 denoting "overweight" and BMI ≥ 30 denoting "obesity". The health burden of obesity would be more easily predicted if the hazards of accumulating intra-abdominal fat were also documented by simple measures such as waist circumference or waist/hip ratio. New criteria and methods for documenting obesity in children are now being developed, and the particular susceptibility of some ethnic groups to weight gain and abdominal fat accumulation is being explored. Many dietary, lifestyle and possibly ethnic factors may also

prove to be important in determining the magnitude of the metabolic and mechanical complications associated with obesity. They include non-insulin-dependent diabetes mellitus, cardiovascular diseases, cancers, gastrointestinal diseases and arthritis which are major medical conditions that have hitherto been considered as unrelated to overweight and obesity.

The Consultation concluded that the fundamental causes of the obesity epidemic are sedentary lifestyles and high-fat, energy-dense diets. The rising epidemic reflects the profound changes in society and in the behavioural patterns of communities although some individuals may become obese, partly because they have a genetic or other biological predisposition to gain weight more readily when they are exposed to an unfavourable environment. Identifying environmental and behavioural factors that contribute to weight gain is particularly difficult. There are two principal factors which tend to overwhelm an individual's normal subconscious adjustments in food intake and metabolism that occur as part of a biological capacity to maintain energy balance. These are a fall in spontaneous and work-related physical activity, and a readiness to overconsume high-fat, energy-dense foods.

Because of the interaction of these two principal factors, people who sustain moderately high levels of physical activity throughout life may be able to tolerate high-fat diets, e.g. fat constituting between 30% to 40% of total energy intake. However, the widespread decline in physical activity in most societies, combined with rising fat intake, are associated with rapidly rising rates of obesity. These observations, together with physiological studies, suggest that lower fat intakes—around 20–25% of energy—are needed to minimize energy imbalance and weight gain in relatively sedentary individuals and societies. Other factors, for example, dietary energy density and behavioural aspects of eating, may also contribute to the obesity epidemic, but they need to be evaluated further.

To limit the impact of obesity on individuals, the Consultation called for the development of both preventive and therapeutic strategies. A systematic assessment and management approach is proposed based on evidence available from scientific studies and clinical trials, with primary care playing a central role. Therapeutic interventions among overweight and obese individuals, where support to patients is critical to achieving success, include dietary change, alterations in physical activity, and behaviour modification. These are long-term therapies that emphasize weight management, rather than relying on short-term extreme weight reduction. Strategies for supporting patients depend on individual health care systems. High-risk patients may benefit from carefully monitored drug therapy as part of a comprehensive management scheme, thereby limiting to extreme cases only the need for new forms of gastrointestinal surgery to slow or reverse life-threatening conditions.

The Consultation concluded that global epidemic projections for the next decade are so serious that public health action is urgently required. Analyses show that merely concentrating on children and adults who have a high BMI and associated health problems will not stem the escalating numbers of people entering the medically defined categories of ill health. It is thus essential to develop new preventive public health strategies which affect the entire society. Without societal changes, a substantial and steadily rising proportion of adults will succumb to the medical complications of obesity; indeed, the medical burden of obesity already threatens to overwhelm health services. The spectrum of problems seen in both developing and developed countries is having so negative an impact that obesity should be regarded as today's principal neglected public health problem.

The Consultation's report is divided into five sections. Section A examines the definition and classification of obesity and presents up-to-date regional data on the prevalence of and secular trends in obesity. Section B considers the true costs of obesity both in terms of physical and mental ill health, and the human and financial resources being diverted to deal with it. Section C examines the etiological factors implicated in weight gain and obesity. While most of the information about risk factors comes from studies in developed countries, findings have worldwide relevance for predicting the impact in developing countries. Section D lays the foundation for a comprehensive strategy for preventing and managing of obesity through health care services and public health policy. Section E presents the Consultation's conclusions and recommendations.