

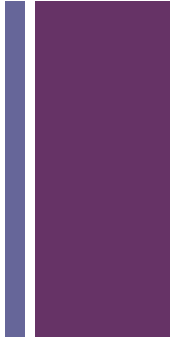


Latest Nutritional Guidelines: What's new for practice?

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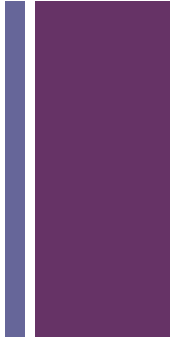
Evidence Based Guidelines



- Last nutritional guidelines published in 2003.
- New guidelines published in May 2011.
- Diabetes UK Nutrition Working Group adopted the review of the evidence base for nutritional recommendations for diabetes undertaken by the American Diabetes and Dietetic Associations.
- The guidelines are specific to adults with Type 1 and 2 diabetes and people at risk of developing Type 2 diabetes.



Evidence Based Guidelines



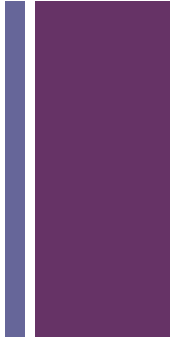
- Recommendations have been graded based on a paper published by the Scottish Intercollegiate Guidelines Network (SIGN).
- Previous or competing guidelines have been sign posted through out the document.
- Recommendations for children are covered by the International Society of Paediatric and Adolescent Diabetes (ISPAD) publication in 2009.

+ SIGN grading

Classification of evidence		Factors related to reduced risk	
Ia	Evidence from meta analysis of randomised controlled trials	A	Based on category I evidence
Ib	Evidence from at least one randomised controlled trial		
IIa	Evidence from at least one controlled study without randomisation	B	Based on category II evidence or extrapolated from category I
IIb	Evidence from at least one other of quasi experimental study		
III	Evidence from non- experimental descriptive studies such as comparative studies, correlation studies and case control studies	C	Based on category III or extrapolated from category I or II
IV	Evidence from expert committee reports or opinions and/or clinical experience of respected authorities	D	Based on category IV evidence or extrapolated from category I, II or III



Aims & Goals



- Support self management to reduce risk of Type 2 diabetes and its associated co-morbidities.
- Promote quality of life and healthy lifestyles.
- Provide flexibility and meet the needs of all individuals, including those with co-morbidities such as Coeliac disease and Cystic fibrosis.

+ 2003 to 2011

2003	2011
Carbohydrate - 45-60% of energy intake.	Main consideration for glycaemic control with both the amount and type having an effect on post prandial blood glucose levels. Low Glycaemic Index diets seen to reduce HbA _{1c} .
Sucrose – up to 10% of energy intake per day if not overweight.	Sucrose does not affect glycaemic control any differently from other types of carbohydrate. Individuals consuming a variety of sugars and starches show no difference in glycaemic control if total carbohydrate is similar. Fructose may reduce post prandial glycaemia when it is used as a replacement for sucrose or starch.

+ 2003 to 2011

2003	2011
Total Fat <35% of energy intake	Saturated fats should be limited and replaced by unsaturated fats predominantly monounsaturated fats.
Saturated & trans-unsaturated <10%	
Polyunsaturated <10%	
Monounsaturated 10-20%	Oily fish should be consumed at least twice a week.
Omega 3 – oily fish 1-2 times per week but no supplements	Use of plant sterols or stanol esters (2-3g/day) effective in lowering total and LDL cholesterol independent of statin therapy.
	In type 2 diabetes with elevated triglycerides supplementation with up to 3g omega fish oils can be beneficial.



2003 to 2011

2003	2011
Fibre – no recommendation.	Dietary fibre has many health benefits – high fibre diets <u>may</u> be beneficial for diabetes.
Vitamins & antioxidants – encourage foods naturally high in these and no general recommendation for use of supplements.	
Salt - ≤ 6 g per day.	As per UK guidelines of 5-6g per day – but potential benefits for reducing to 3g per day.

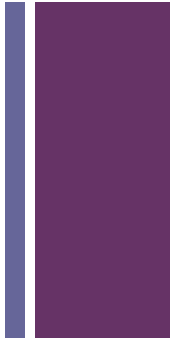
+ Weight management

- Weight loss is the most important predictor of risk reduction for Type 2 diabetes. Weight loss of at least 5 to 7 per cent is effective for Type 2 diabetes prevention. (A)
- Weight management should be the primary nutritional strategy in managing glucose control in Type 2 diabetes for people who are overweight or obese. (A)
- The main requirement of a dietary approach to weight loss is that total energy intake should be less than energy expenditure. (D)

+ Weight management

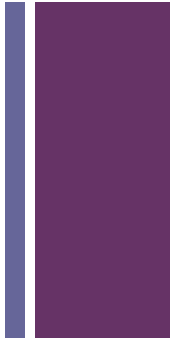
- Lifestyle interventions that incorporate energy restriction, low fat diets and increased physical activity can effectively reduce the risk of Type 2 diabetes in high risk groups. (A)
- Interventions promoting diet alone, increased physical activity alone or a combination of the two is equally effective in reducing risk. (A)
- There is no evidence for the most effective dietary approach over another to achieve weight loss and prevent Type 2 diabetes. (D)

+ Physical Activity



- Increased physical activity offers general health benefits although there is no evidence of benefit in glycaemic control in people with Type 1 Diabetes. (A)
- Regular, moderate physical activity can reduce HbA1c by 0.45 – 0.65% independent of weight loss in people with Type 2 Diabetes. (A)
- 30 to 60 minutes of aerobic exercise on a minimum of three occasions per week (minimum of 150 minutes each week) and resistance training at least twice per week lower blood pressure. (B)

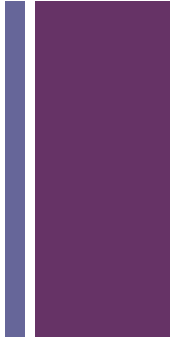
+ Specific Sections



- Nutrition Management and Models of Education.
- Prevention of Type 2 diabetes in high risk groups.
- Nutrition recommendations for people with diabetes.
- Nutrition recommendations for managing diabetes related complications.
- Additional considerations.
- Micronutrients , supplements and functional foods.



Additional considerations



- Nutrition support
- Disorders of the pancreas
- Older person
- Cystic fibrosis
- Pregnancy and lactation
- HIV and insulin resistance
- Nutrition provided by external agencies
- Fasting
- Eating disorders

+ Bullet Points for New Clinical Solutions

- New evidence based nutritional standards are available on the Diabetes UK website
<http://www.diabetes.org.uk/Documents/Reports/Nutritionalguidelines>
- Nutrition management is effective in people with diabetes and those at high risk of developing Type 2 diabetes, when it is an integrated component of education and clinical care.
- Everyone with diabetes should receive individual, ongoing nutritional advice from a registered dietitian.