

CAMBRIDGE INTERNATIONAL EXAMINATIONS
Joint Examination for the Higher School Certificate
and General Certificate of Education Advanced Level

FOOD STUDIES

PAPER 1 Theory

9336/1

OCTOBER/NOVEMBER SESSION 2002

3 hours

Additional materials:
Answer paper

TIME 3 hours

INSTRUCTIONS TO CANDIDATES

Write your name, Centre number and candidate number in the spaces provided on the answer paper/ answer booklet.

Answer **four** questions.

Answer **two** questions from Section A and **two** questions from Section B.

Write your answers on the separate answer paper provided.

If you use more than one sheet of paper, fasten the sheets together.

INFORMATION FOR CANDIDATES

The number of marks is given in brackets [] at the end of each question or part question.

You are reminded of the need for good English and clear presentation in your answers.

Section A

Answer **two** questions from this section.

- 1 An adequate supply of iron and calcium is necessary in a balanced diet.
- (a) For each of these minerals:
- (i) describe its absorption and use in the body;
 - (ii) discuss the effects of a deficiency;
 - (iii) identify groups of the population who might suffer from a deficiency. [22]
- (b) Suggest how adequate amounts of iron and calcium could be obtained from foods available locally. [3]
- 2 (a) Discuss dietary advice recommending the reduction of fat, sugar and salt and the increased intake of fresh fruit and vegetables. [20]
- (b) Explain why people who consume convenience foods regularly could have difficulty following this advice. [5]
- 3 (a) What do you understand by Recommended Daily Intakes (RDIs)? [3]
- (b) Explain the different nutritional needs of a teenage girl and a moderately active elderly woman. [12]
- (c) Discuss factors which influence an individual's choice of food. [10]
- 4 (a) Explain the structure and characteristics of different groups of carbohydrates and give examples of where each can be found. [14]
- (b) Describe the digestion of carbohydrates. [5]
- (c) Explain and identify factors which affect BMR. [6]

Section B

Answer **two** questions from this section.

- 5 (a) Explain the importance of each of the following for achieving successful flaky pastry:
- (i) ingredients;
 - (ii) method;
 - (iii) baking.
- [20]
- (b) Discuss the use of frozen, ready-made puff pastry. [5]
- 6 (a) Discuss the relationship between temperature control and food preservation. [13]
- (b) Explain and give examples of the following methods of preservation:
- (i) Accelerated Freeze Dried (AFD);
 - (ii) pickling;
 - (iii) irradiation.
- [12]
- 7 (a) Define the term *enzymes*. [3]
- (b) Discuss the part played by enzymes in:
- (i) tenderising meat;
 - (ii) making bread with yeast;
 - (iii) food spoilage;
 - (iv) the destruction of vitamin C in green vegetables;
 - (v) the digestion of protein.
- [22]
- 8 Eggs are an excellent source of High Biological Value (HBV) protein.
- (a) Discuss the different uses of eggs in food preparation, giving scientific explanations for the processes involved in each of the uses mentioned. [15]
- (b) State and explain the effect of temperature and cooking time on eggs. [5]
- (c) Explain the changes which take place in eggs during storage. [5]

