



Workroom temperatures in places where food is handled

Food Information Sheet No 3 (Revised)

Introduction

1 Many employers have expressed concern at what they see as a conflict between food hygiene law which sets maximum food product temperatures lower than those required as 'reasonable' for employee health, safety and welfare in health and safety law. Additionally, employees and trade unions are concerned at the increasing trend towards more work at increasingly lower temperatures. This guidance, prepared between HSE's Food Section, Department of Health, the Ministry of Agriculture, Fisheries and Food and relevant trade associations and trade unions, indicates there is no conflict in law and sets out how you can meet both hygiene and health and safety objectives. If difficulties remain it is hoped that discussions between employers and the relevant enforcing authorities could find a mutually acceptable solution.

Summary

2 Food businesses will need to determine how the requirements of food safety law can be achieved while maintaining 'reasonable temperatures' in the workroom in a particular case. There is not a conflict in the law. Generally food hygiene law regulates the temperatures of food while health and safety law regulates the air temperature of the workroom. (The few exceptions where hygiene law does specify a maximum air temperature can be accommodated as described in paragraph 10.) This information sheet explains how both objectives can be met.

3 Health and safety requirements can be met by:

- (a) maintaining a 'reasonable' temperature of at least 16 °C (or at least 13 °C if the work involves serious physical effort) throughout the workroom. This may mean chilling the food locally or minimising its exposure to ambient air (see paragraph 10), or, if this is not practical;
- (b) providing a warm working station within a room where the overall temperature may be lower (see paragraph 11), or, if this is not practical;
- (c) keeping the individual warm by the various methods identified in paragraph 12.

Food hygiene requirements

4 In recent years a number of requirements for temperature controls on particular foods have been introduced, not only in UK law but also in European

Directives implemented in national legislation. The Food Safety (Temperature Control) Regulations 1995 relate to the control of the temperature of food at production and retail levels, unless covered by more product specific regulations, and not of the workroom atmosphere.

Although some other more specific EC measures do contain workroom air temperatures. Page 3 lists the EC Directives which do contain an air temperature requirement, and details of the requirement.

5 The Department of Health has published guidance on the Food Safety (Temperature Control) Regulations 1995 which gives advice on the types of foods which are required to be held under temperature control. It also gives guidance on the circumstances when the Regulations allow some flexibility from the temperature requirements including during food preparation. The Regulations require that foods which are likely to support the growth of pathogenic micro-organisms or the formation of toxins be held at or below 8 °C (or above 63 °C). Certain tolerances are allowed. Other temperature requirements for product specific foods are given on page 3. Lower workroom temperatures in premises where particular foodstuffs requiring temperature control are produced, may be justified (see paragraph 10).

6 Food business operators must decide which foods (other than those specified on page 3) need to be held under temperature control. In addition, in September 1995 the Food Safety (General Food Hygiene) Regulations came into force. These Regulations require food business proprietors to identify food hazards and ensure that controls are in place to eliminate or minimise risks to consumers. This will include the temperature control of certain foods.

7 The detail of food temperature control differs in Scotland.

Health and safety legislation

8 Regulation 7 of the Workplace (Health, Safety and Welfare) Regulations 1992 (The Workplace Regulations) requires that the 'temperature in all workplaces inside buildings shall be reasonable during working hours'. The supporting Approved Code of Practice (ACOP) indicates a 'reasonable' temperature is one that provides reasonable comfort without special clothing and is normally to be taken as at least 16 °C or at least 13 °C where much of the work involves serious physical effort (eg repeated exertion so that a temperature of 16 °C would be uncomfortably warm).

9 The ACOP recognises that temperatures of 16 °C or 13 °C may be impractical because of hot or cold processes, but in such cases expects all reasonable steps to be taken to achieve a comfortable temperature which is as close as possible to 16 °C or 13 °C.

10 This relaxation is acceptable, where justified, for food where it is impractical to achieve the required food product temperatures without lower workroom temperatures. This can be the case where food products **have** to be kept in lower temperatures because either a lower **air** temperature is specified in other legislation (see page 3) or because not to do so would prejudice the quality and hygienic safety in respect of the physical or microbiological status of the food **and** because it is impractical to achieve reasonable temperatures throughout the workroom by measures such as:

- (a) enclosing or insulating the product, (eg using localised refrigerated enclosures to insulate the product such as enclosed chilled hoppers or conveyors; or working at chilled booths or at chilled tables so that the product is chilled rather than the workroom);
- (b) keeping chilled areas as small as possible;
- (c) pre-chilling the product;
- (d) exposing the product to workroom temperatures as briefly as possible.

11 Where a combination of the workroom temperature and the measures above do not achieve a reasonably comfortable temperature throughout the workroom, measures to reduce discomfort should be taken where practical:

- (a) local heating should be provided for the worker with minimum effect on the produce; and
- (b) insulated cleanable duck boards (or other floor coverings) should be provided if workers would otherwise have to stand for long periods on cold floors - unless special footwear is provided which prevents discomfort;
- (c) draughts should be excluded (including fitting self-closing doors).

12 Where, despite these measures, temperatures which give reasonable comfort to exposed workers cannot be achieved, the following measures should be taken, as appropriate, to achieve the highest level of comfort practical:

- (a) suitable protective clothing should be provided and worn (see the Personal Protective Equipment at Work Regulations 1992);
- (b) provide suitable heated rest facilities (eg heated areas) and allow workers ready access to them;

- (c) institute systems of work to minimise the length of time of exposure to uncomfortable temperatures and, through task rotation, allow opportunities for staff to go to heated areas.

13 Guidance on assessing and evaluating cold indoor environments, the effect on workers, minimising the effect and guidance on clothing specification/insulation values is contained in BS 7915:1998 *Ergonomics of the thermal environment - Guide to the design and evaluation of working practices for cold indoor environments*. Two other publications on the thermal environment are also listed in the References section on page 3.

Particular situations

14 If short periods only are worked (eg entry into refrigerated rooms) the measures to reduce discomfort set out in paragraph 12 alone may be sufficient. Where work is done in low temperature cold stores use local heating in vehicle cabs where practicable and the measures described in paragraph 12 to achieve the highest level of comfort practical.

15 Where other legislation (see page 3) sets maximum air temperatures lower than those indicated as 'reasonable' in the ACOP (ie at least 16 °C or 13 °C) the measures in paragraphs 11 and 12 should be taken to reduce discomfort.

Practical application

16 Employers will first need to consider alternative ways of controlling product temperatures for foods as outlined in paragraphs 9 and 10 rather than simply adopting workroom temperatures lower than those specified in the ACOP. However, if such measures are not practical, it may be justified for hygiene reasons as specified in paragraph 10 for workrooms to be maintained at temperatures lower than 16 °C (or 13 °C). Where such lower workroom temperatures are adopted, employers should be able to justify this action and demonstrate to visiting inspectors that they have taken measures as set out in paragraphs 11 and 12 to ensure the thermal comfort of employees.

17 Food companies report that adopting localised chilling of foodstuffs or short processing times which minimise product temperature rises within reasonable workroom temperatures can bring cost benefits compared with the overall installation and running costs of refrigerating whole workrooms.

18 Meeting the twin objectives of controlling food product temperatures as required by hygiene legislation and workroom air temperatures as required by health and safety legislation may require some employers to consider and develop new processing methods, equipment and techniques. Some food companies are stimulating research and development work to this end, eg with research organisations.

19 The measures to secure '**reasonable**' temperatures have to be taken where '**practical**'.

However such measures will clearly be more reasonable for new plant planned since the first edition of this guidance (1994). In some cases, for older plant, it will be more reasonable to take the measures to ensure comfort set out in paragraphs 11 and 12 as an interim measure while longer term process and plant changes in accordance with paragraph 10, 17 and 18 are assessed and, if practicable, developed and installed. In deciding what action will be reasonable in the circumstances, employers are advised to take a balanced view of the nature and extent of low temperature exposure against the cost and availability of technical solutions allowing reasonable temperatures throughout the workroom.

EC directives setting maximum temperatures for certain foods

- (a) Fresh meat, includes offals: Directive 91/497/EC, implemented by the Fresh Meat (Hygiene and Inspection) Regulations 1995.
- (b) Meat products: Directive 95/5/EC, implemented by The Meat Products (Hygiene) Regulations 1994.
- (c) Minced meat and meat preparations: Directive 94/65/EC, implemented by The Minced Meat and Meat Preparations (Hygiene) Regulations 1995.
- (d) Wild game meat: Directive 92/45/EC, implemented by The Wild Game Meat (Hygiene and Inspection) Regulations 1995.
- (e) Poultry meat, farmed game bird and rabbit meat: Directive 91/494/EC, implemented by The Poultry Meat, Farmed Game Bird Meat and Rabbit Meat (Hygiene and Inspection) Regulations 1995 (as amended).

Maximum air temperatures in cutting rooms (and relevant product temperatures)

Fresh (red) meat and large farmed game:	12 °C air temperature <7 °C for carcasses/cuts
Offals:	12 °C air temperature <3 °C product temperature
Meat products:	12 °C air temperature Product temperature (<12 °C or <8 °C or <5 °C as assessed using Regulation 4(3) of the Food Safety (General Food Hygiene) Regulations 1995.
Minced meat and meat preparations:	12 °C air temperature 2 °C – 7 °C product temperature (dependent on type of production)
Wild game:	12 °C air temperature <7 °C for large wild game <4 °C for small wild game
Poultry meat, farmed game bird and rabbit meat:	12 °C air temperature <4 °C for poultry, farmed game bird and rabbit meat

References

Guidance on the Food Safety (Temperature Control) Regulations 1995 Department of Health, Room 501A, Skipton House, 80 London Road, London SE1 6LH

Workplace health, safety and welfare. Workplace (Health, Safety and Welfare) Regulations 1992. Approved Code of Practice L24 HSE Books ISBN 0 7176 0413 6

Personal protective equipment at work. Personal Protective Equipment at Work Regulations 1992. Guidance on Regulations L25 HSE Books ISBN 0 7176 0415 2

BS7915:1998 *Ergonomics of the thermal environment - Guide to the design and evaluation of working practices for cold indoor environments* BSI Sales Department, 389 Chiswick High Road, London W4 4AL Sales Dept. Tel: 0181 996 7000.

The thermal environment (2nd edition) 1996 British Occupational Hygiene Society Technical Guide No.12 Leeds: H and H Scientific Consultants Ltd ISBN 0 9482 3729 5

Human thermal environments K C Parsons 1993 London: Taylor and Francis ISBN 0 7484 0041 9

Further information

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This leaflet contains notes on good practice which are not compulsory but which you may find helpful in considering what you need to do.

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