



Priorities for health and safety in the biscuit manufacturing industry

Food Sheet No 10

Introduction

This sheet has important information for employers and employees in the biscuit manufacturing industry. Your attention will be drawn to the particular aspects of the working environment which deserve special attention. The information in this sheet is based on an analysis of the accidents, reported to HSE and local authorities by employers. The information is also based on HSE investigations. You should assess all the aspects discussed in this sheet carefully to make sure that adequate precautions are in place, and that they are in place permanently. Usually, once a risk is identified, it will be clear what the appropriate precaution is. If you need further guidance on a particular topic, please refer to the Useful information section.

The priorities

Table 1 lists the causes of accidents to employees in 1989-92, in order of priority. It also outlines which aspects of the working environment are involved. The table shows that it is important to focus on the following, as they cause 70% of all injuries:

- (a) slips and trips are particularly significant in the biscuit manufacturing industry, especially in relation to major injuries, accounting for almost half;
- (b) handling, eg of heavy or sharp loads;
- (c) falls from stairs;
- (d) machinery, especially conveyors and packaging machinery.

Occupational ill health

Because accident reports do not include occupational ill health, the tables only cover safety. But experience of the industry suggests the occupational health priorities are likely to be:

- (a) chronic ill health from manual handling;
- (b) upper limb disorders.

The risks compared with other industries

In 1991-92 the overall incidence rates, that is the number of injuries per 100 000 employees, were 156 for major injuries and 2954 for injuries causing over a three day absence (O3D), totalling 3110 overall.

This makes the industry the ninth most risky in the 19 sectors of the food industry as a whole, with an overall rate two-and-half times the average for the manufacturing industry generally, which has an incidence rate of 1269.

Scope of this guidance

This guidance uses reports from employers whose main activity is coded to Standard Industrial Classification (1980) 4197. This covers the manufacture of biscuits and crispbread.

The figures used are from 1991-92, the last year for which detailed incidence rates are available. These are typical of recent years, although the current trend is one of improvement.

The analysis was confined to injuries reported to employees, on and off site. Visitors contractors and the self-employed were excluded.

Safety checklist

This checklist includes the most common situations which cause accidents, as well as a list of preventative measures.

Slips

- (a) take measures to avoid spillage and leakages to the floor;
- (b) take measures to contain unavoidable spillages, so they do not contaminate the floor;
- (c) take measures to clear up spillages and dry the floor immediately;
- (d) use cleaning effectively, preferably out of hours;
- (e) dry wet floors after cleaning.

Trips

- (a) avoid obstructions in walkways and at work stations;
- (b) avoid uneven floors.

Handling

- (a) avoid heavy, sharp or awkward lifting and pulling movements;

Table 1

<i>Kind</i>	<i>Relative importance</i>	<i>Significant factors</i>
Slips and trips	31% of reported injuries. 46% of major injuries.	49% are slips; 20% trips.
Handling	24% of reported injuries. 4% of major injuries.	59% are due to the weight of the load and 23% to its sharpness.
Struck by moving object	13% of reported injuries. 7% of major injuries.	
Struck against object	12% of reported injuries.	70% against fixed objects.
Falls from a height	8% of reported injuries. 12% of major injuries.	47% involved stairs; 16% were off ladders; 3% from vehicles.
Machinery	6% of reported injuries. 13% of major injuries.	31% involved conveyors. Packaging machinery accounted for 25% of investigated accidents. 66% of those investigated occurred while cleaning or clearing material from machines.
Transport	2% of reported injuries.	60% involved fork lift trucks.
Exposure to harmful substances	1% of reported injuries.	46% involved splashes and 26% release of substances.

- (b) where it is not reasonably practicable to mechanise handling, assess the factors leading to a risk and take appropriate precautions.

Falls

- (a) identify all areas where access is likely to be needed, and arrange safe access;
- (b) check condition of stairs and maintain them free of slip risks, and make sure they have adequate handrails;
- (c) set up a safe system of work when ladders are used;
- (d) make sure there is safe access onto vehicles.

Machinery

- (a) check guarding and hazards, especially all conveyors and packaging machinery;
- (b) make sure machinery can be set, maintained, fed, and blockages cleared and cleaned, with guarding in place or with machine isolated and stationary.

Transport

- (a) select and train fork lift truck operators.

Exposure to harmful substances

- (a) assess how risks arise and how they can be controlled;
- (b) set up safe systems for handling cleaning substances, and make sure that correct use of personal protective equipment is carried out.

Useful information

- 1 *Essentials of health and safety at work* 1994 HSE Books ISBN 0 7176 0716 X
- 2 *An index to health and safety guidance for the food industry* FIS7(rev1) 2001 HSE Books
- 3 *A recipe for safety: Health and safety in the food industry* TOP05(rev1) 1994 HSE Books (single copy free or priced packs of 5 ISBN 0 7176 2432 3)
- 4 *Workplace transport safety, guidance for employers* HSG136 1995 HSE Books ISBN 0 7176 0935 9
- 5 *Safe handling of combustible dusts: Precautions against explosions* HSG103 1994 HSE Books ISBN 0 7176 0725 9
- 6 *Dust explosions in the food industry* Food Information Sheet FIS2 1992 HSE Books

- 7 *Health and safety in retail and wholesale warehouses* HSG76 1992 HSE Books ISBN 0 11 885731 2
- 8 *Slips and trips: guidance for the food processing industry* HSG156 HSE Books 1996 ISBN 0 7176 0832 8
- 9 *Manual handling: Solutions you can handle* HSG115 1994 HSE Books ISBN 0 7176 0693 7
- 10 *The Manual Handling Operations Regulations 1992 . Guidelines for employers in the baking industry (including retail outlets)* Health and Safety in Bakeries Liaison Committee October 1993. Available from the National Association of Master Bakers, 21 Baldock Street, Ware, Hertfordshire SG12 9DH. Tel: 01920 468061
- 11 *General outline assessment of manual handling operations in relation to bread, roll or confectionery baskets* The Federation of Bakers, 6 Catherine Street, London WC2B 5JW. Tel: 020 7420 7100
- 12 *Safety in working with lift trucks* HSG6 (Second edition) 2000 HSE Books ISBN 0 7176 1781 5
- 13 *Rider operated lift trucks. Operator training. Approved code of practice* L117 1999 HSE Books ISBN 0 7176 2455 2
- 14 *Work related upper limb disorders: A guide to prevention* HSG60 (Second edition) 2000 HSE Books ISBN 0 7176 1978 8
- 15 *A pain in your workplace? Ergonomic problems and solutions* HSG121 1994 HSE Books ISBN 0 7176 0668 6
- 16 *Risk assessment in bakeries* Health and Safety in Bakeries Liaison Committee May 1994. Available from the National Association of Master Bakers, 21 Baldock Street, Ware, Hertfordshire SG12 9DH. Tel: 01920 468061

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This guidance is issued by the Health and Safety Executive. Following the guidance is not compulsory and you are free to take other action. But if you do follow the guidance you will normally be doing enough to comply with the law. Health and safety inspectors seek to secure compliance with the law and may refer to this guidance as illustrating good practice.

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