#### SCOTTISH STATUTORY INSTRUMENTS

### 2006 No. 209

## WATER SUPPLY

## The Private Water Supplies (Scotland) Regulations 2006

Made - - - - 19th April 2006
Laid before the Scottish
Parliament - - - - 20th April 2006
Coming into force - 3rd July 2006

The Scottish Ministers, in exercise of the powers conferred by sections 76F(5) to (8), 76J, 101(1) and (1A) and 109(1) of the Water (Scotland) Act 1980(1) and section 2(2) of the European Communities Act 1972(2), and of all other powers enabling them in that behalf, hereby make the following Regulations:

## PART I

#### **GENERAL**

#### Citation and commencement

**1.** These Regulations may be cited as the Private Water Supplies (Scotland) Regulations 2006 and shall come into force on 3rd July 2006.

#### Interpretation

- **2.**—(1) In these Regulations—
  - "the 1980 Act" means the Water (Scotland) Act 1980;
  - "the 1992 Regulations" means the Private Water Supplies (Scotland) Regulations 1992(3);
  - "the 2002 Act" means the Water Industry (Scotland) Act 2002(4);
- (1) 1980 c. 45. Sections 76F and 76J were inserted by the Water Act 1989 (c. 15), Schedule 22, paragraph 1. Section 101(1A) was inserted by the Natural Heritage (Scotland) Act 1991 (c. 28), Schedule 10, paragraph 9(5). Section 109(1) contains a definition of "prescribed" relevant to the exercise of the statutory powers under which these Regulations are made. The functions of the Secretary of State were transferred to the Scotlish Ministers by virtue of section 53 of the Scotland Act 1998 (c. 46).
- (2) 1972 c. 68. Section 2(2) was amended by the Scotland Act 1998 (c. 46), Schedule 8, paragraph 15(3). The functions conferred on the Minister of the Crown under section 2(2) of the European Communities Act 1972, insofar as within devolved competence, were transferred to the Scottish Ministers by virtue of section 53 of the Scotland Act 1998 (c. 46).
- (3) S.I.1992/575, as amended by S.I. 1998/1856. Regulation 23(b) was revoked by the Water Supply (Water Quality) (Scotland) Regulations 2001 (S.S.I. 2001/207, regulation 39(1)(c)).
- (4) 2002 asp3, as amended by the Water Services etc. (Scotland) Act 2005 (asp 3).

"appropriate local authority" in relation to an authorisation of a temporary departure under Part V or an application for any such authorisation, means the local authority whose area contains the source of the private water supply to which the authorisation relates or, in the case of such an application, would apply if a departure were authorised in the terms sought;

"consumer" means a person to whom a private water supply is provided for human consumption purposes;

"disinfection" means a process which removes or renders inactive pathogenic microorganisms so as to satisfy the requirements of Part IV in respect of micro-organisms (other than parameters), parasites and the parameters listed in Schedule 1 to these Regulations; and "disinfected" shall be construed accordingly;

"distribution network" means the system (including pipes, fittings and tanks) used to convey a private water supply from its source or point of collection to its point of connection with a domestic distribution system;

"domestic distribution system" means the pipework, fittings and appliances which are installed between the taps that are normally used for human consumption purposes and the distribution network, which is the responsibility of a responsible person;

"health board" means a Health Board constituted by order under section 2(1)(a) of the National Health Service (Scotland) Act 1978(5);

"human consumption purposes" in relation to a private water supply, means a supply—

- (a) for such domestic purposes as consist in or include cooking, drinking, food preparation or washing (including the maintenance of personal hygiene); or
- (b) for any of these domestic purposes to premises in which food is produced;

"indicator parameter" means a parameter listed in Table C of Schedule 1;

"local authority" means a council constituted under section 2 of the Local Government etc. (Scotland) Act 1994(6); and "area", in relation to a local authority, means the local government area (within the meaning of that Act) for which the council is constituted;

"monitoring local authority" means the local authority in whose area any premises served by a private water supply are located;

"parameter" means a property, element, organism or substance listed in the second column of the Tables in Schedule 1 as read, where appropriate, with the notes to that Schedule and those Tables;

"pesticides and related products" means—

- (a) any organic insecticide;
- (b) any organic herbicide;
- (c) any organic fungicide;
- (d) any organic nematocide;
- (e) any organic acaricide;
- (f) any organic algicide;
- (g) any organic rodenticide;
- (h) any organic slimicide; and
- (i) any product related to any of (a) to (h) (including any growth regulator),

and includes their relevant metabolites, degradation and reaction products;

<sup>(</sup>**5**) 1978 c. 29.

<sup>(6) 1994</sup> c. 39.

"prescribed concentration or value", in relation to any parameter, means the maximum or minimum concentration or value specified in relation to that parameter in the Tables in Schedule 1 as measured by reference to the unit of measurement so specified, and as read, where appropriate, with the notes to those Tables;

"private water supply" means a supply of water (including an abstraction of water from a source situated on the premises in which it is used or consumed) other than a supply provided by Scottish Water in pursuance of its core functions (within the meaning of section 70(2) of the 2002 Act);

"relevant person" has the meaning assigned by regulation 4;

"responsible person", in relation to a domestic distribution system, means the person who owns or is otherwise responsible for that system;

"Scottish Water" means the body corporate established by section 20(1) of the 2002 Act;

"specification", in relation to a parameter, means the concentration, value or state, shown as applicable to that parameter in the Tables in Schedule 1 as measured by reference to the unit of measurement so specified;

"state" in relation to an indicator parameter, means the state specified in relation to that parameter in Table C of Schedule 1 as measured by reference to the unit of measurement so specified;

"Type A supply" means a private water supply for human consumption purposes which—

- (a) on average, provides 10 or more cubic metres of water per day or serves 50 or more persons, or
- (b) regardless of the volume of water provided or the number of persons served, is supplied or used as part of a commercial or public activity,

#### and references in this definition

- (i) to the average volume of water provided by such a supply, are references to such volume (calculated as a daily average) as may be reasonably estimated to have been distributed or, if not distributed, used or consumed from the supply during the year prior to the year in which these Regulations come into force; and that estimate may be on the assumption that five persons use one cubic metre of water per day; and
- (ii) to the average number of persons served by such a supply, are references to such number of persons as may be reasonably estimated to be the maximum number served by the supply on any one day during the year prior to the year in which these Regulations come into force;

"Type B supply" means a private water supply for human consumption purposes, other than a Type A supply; and

"year" means a calendar year.

- (2) Other expressions used both in these Regulations and in Council Directive 98/83/EC of 3 November 1998 on the quality of water intended for human consumption(7) have the same meaning in these Regulations as they have in that Directive.
  - (3) Any reference in these Regulations to
    - (a) a level, followed by a number, is a reference to a level of Type A supply determined in accordance with Part III;
    - (b) a numbered regulation shall be treated as the regulation bearing that number in these Regulations;

- (c) a numbered paragraph shall be treated as the paragraph bearing that number in the regulation in which it appears; and
- (d) a Schedule shall be treated as a reference to a Schedule to these Regulations.
- (4) A reference in these Regulations to anything done in writing or produced in written form includes a reference to an electronic communication, as defined in the Electronic Communications Act 2000(8) which has been recorded in written form and is capable of being reproduced in that form.

#### **Application of Regulations**

- **3.**—(1) These Regulations, apart from regulations 34(2) and 35, do not apply to a private water supply which is used—
  - (a) solely for washing a crop after it has been harvested; or
  - (b) during the distillation of spirits-
    - (i) solely in the mashing process;
    - (ii) solely for washing plant; or
    - (iii) for both the purposes described in sub–paragraphs (i) and (ii) above but for no other purpose,

and which does not affect, either directly or indirectly, the fitness for human consumption of any food or drink or, as the case may be, spirits in their finished form.

- (2) These Regulations, apart from regulations 34(2) and 35, do not apply to a private water supply which is—
  - (a) a natural mineral water within the meaning of the Natural Mineral Water, Spring Water and Bottled Drinking Water Regulations 1999(9); and
  - (b) a medicinal product within the meaning of the Medicines Act 1968(10) or a product in respect of which any provision of that Act has effect as if it were such a medicinal product.

#### PART II

#### **RELEVANT PERSONS**

#### Determination and notification of relevant person

- **4.**—(1) A local authority shall, in relation to each private water supply to any premises within its area, determine, for their respective interests, those persons who—
  - (a) provide the supply;
  - (b) occupy the land from, or on which, the supply is obtained or located; or
  - (c) exercise powers of management or control in relation to the supply,

and a person so determined shall, in these Regulations, be referred to as a "relevant person".

(2) As soon as reasonably practicable after making a determination under paragraph (1), the local authority shall notify each relevant person in writing of its determination and the reasons for it.

<sup>(8) 2000</sup> c. 7.

<sup>(9)</sup> S.I. 1999/1540 as amended by S.S.I. 2000/62, 2003/139 and 2004/132.

<sup>(10) 1968</sup> c. 67, as relevantly amended by S.I. 1994/3119 and S.I. 2005/50, regulation 25. "Medicinal product" and related expressions are defined in section 130 of that Act.

#### Appeal against determination of relevant person

- **5.**—(1) A person aggrieved by a decision of a local authority to determine that person to be a relevant person may appeal to the sheriff against that determination, and the decision of the sheriff in that matter shall be final.
  - (2) An appeal to the sheriff under paragraph (1) shall be by way of summary application.
- (3) The period within which an appeal under paragraph (1) may be brought shall be 21 days from the date on which notification of the local authority's determination was served on the person desiring to appeal.
- (4) Where a person has been determined to be a relevant person under regulation 4(1), that determination shall not have effect until the period within which an appeal may be brought has expired or until an appeal which has been brought has been disposed of or is withdrawn.

#### PART III

#### CLASSIFICATION OF PRIVATE WATER SUPPLIES

#### Classification and level of supplies

- **6.**—(1) A monitoring local authority shall classify all private water supplies used or to be used in its area as a Type A or a Type B supply.
- (2) For the purposes of classifying a private water supply under paragraph (1), a monitoring local authority shall estimate the average volume of water provided by that supply in relation to the current year rather than by reference to the year prior to it.
- (3) Where a private water supply is classified a Type A supply, its level shall be determined in accordance with the following Table, by reference to the maximum average daily volume of water provided during any period of maximum supply for human consumption purposes by such supplies.

**TABLE** 

Level	Maximum average daily volume of water supplied for human consumption purposes in m <sup>3</sup> /day
1	≤ 100
2	$> 100 - \le 1,000$
3	> 1,000

(4) A monitoring local authority shall at least once in each year, review and update the classification of, and the level of, private water supplies serving premises in its area.

#### **PART IV**

#### WHOLESOMENESS

#### **Wholesomeness: Private Water Supplies**

- 7.—(1) Water supplied to any premises from a private water supply for human consumption purposes shall be regarded as wholesome for the purposes of Part VIA of the 1980 Act, as it applies to the supply of water for those purposes, if—
  - (a) in respect of a Type A supply, the requirements of paragraph (2) are satisfied; or
  - (b) in respect of a Type B supply, the requirements of paragraph (3) are satisfied.
  - (2) The requirements of this paragraph are—
    - (a) that the water does not contain—
      - (i) any micro-organism (other than a parameter) or parasite; or
      - (ii) any substance (other than a parameter),

at a concentration or value which would constitute a potential danger to human health;

- (b) that the water does not contain any substance (whether or not a parameter) at a concentration or value which, in conjunction with any other substance it contains (whether or not a parameter), would constitute a potential danger to human health;
- (c) that the water does not contain concentrations or values of the parameters listed in the second column of Tables A and B in Schedule 1 in excess of or, as the case may be, less than the prescribed concentration or values; and
- (d) that the water satisfies the formula [nitrate]/50 + [nitrite]/3  $\leq$  1, where the square brackets signify the concentrations in mg/l for nitrate (NO<sub>3</sub>) and nitrite (NO<sub>2</sub>).
- (3) The requirements of this paragraph are—
  - (a) that the water does not contain-
    - (i) any micro-organism (other than a parameter) or parasite; or
    - (ii) any substance (other than a parameter),
    - at a concentration or value which would constitute a potential danger to human health;
  - (b) that the water does not contain any substance (whether or not a parameter) at a concentration or value which, in conjunction with any other substance it contains (whether or not a parameter), would constitute a potential danger to human health; and
  - (c) that the water does not contain concentrations or values of the parameters listed in the second column of Table D in Schedule 1 in excess of or, as the case may be, less than the prescribed concentration or values.
- (4) The point at which the requirements of paragraph (2) are to be complied with is—
  - (a) in the case of water supplied from a tanker or an intermittent short term supply, the point at which the water emerges from the tanker or the supply;
  - (b) in the case of water supplied for use in a food production undertaking, the point where the water is used in that undertaking;
  - (c) in the case of water supplied from a distribution network, at the point, within premises or an establishment, at which it emerges from the tap or taps that are normally used for human consumption purposes; and
  - (d) in any other case, the point which, in the reasonable opinion of the monitoring local authority, is representative of the quality of water consumed or available for consumption

throughout the year and which would otherwise be available at any of the points of compliance referred to at sub-paragraphs (a) to (c).

(5) The point at which the requirements of paragraph (3) are to be complied with are those specified in sub-paragraphs (a), (c) and (d) of paragraph (4).

#### PART V

# TYPE A SUPPLIES: TEMPORARY DEPARTURE FROM REQUIREMENTS OF PART IV

## Application for authorisation of temporary departure in respect of a Type A supply that is not wholesome

- **8.**—(1) Where a relevant person has reason to believe that a Type A supply fails, or is likely to fail, to satisfy a requirement of regulation 7(2), that person may make an application in writing to the appropriate local authority in respect of that supply, in so far as it relates to a parameter specified in Table B in Schedule 1, for the authorisation of a temporary departure from the provisions of Part IV on the application form approved by that authority for that purpose.
  - (2) An application under paragraph (1) shall include—
    - (a) a statement—
      - (i) of the grounds on which the authorisation is sought;
      - (ii) about the location of the supply in respect of which the authorisation is sought, including the source of the supply, and the addresses of any premises served by that supply;
      - (iii) of the parameters in respect of which the prescribed concentration or value cannot be met;
      - (iv) in respect of each parameter to which paragraph (iii) applies, of the results of the analysis of the samples (if any) taken in relation to the supply in question during the 12 months immediately preceding the first day on which the prescribed concentration or value could not be met:
      - (v) in respect of each parameter to which paragraph (iii) applies, of the results of the analysis of the samples (if any) taken in relation to the supply in question between the first day on which the prescribed concentration or value could not be met and the date of the application;
      - (vi) estimating the average daily volume of water provided by the supply in so far as that can readily be ascertained and the average number of persons served by the supply;
      - (vii) as to whether, if a departure were authorised in the terms sought, any food production undertaking would be affected;
      - (viii) of the period for which the authorisation is sought; and
      - (ix) of the reasons why the supply cannot be maintained by other reasonable means;
    - (b) a scheme for monitoring the quality of water provided by that supply during the period for which the authorisation is sought; and
    - (c) a summary of the steps that the relevant person proposes to take in order to secure that the supply fully satisfies the requirements of Part IV by the end of the period specified in paragraph 2(a)(viii), including—
      - (i) a timetable for the work;

- (ii) an estimate of the cost of the work; and
- (iii) provisions for reviewing the progress of the work and for reporting the result of the review to the appropriate local authority; and
- (d) the names and addresses of the persons to be notified for the purposes of paragraph (4).
- (3) The applicant shall provide to the appropriate local authority such additional information as may be required by that authority to allow proper consideration of the application.
- (4) At the same time as a relevant person makes an application under paragraph (1), that person shall notify—
  - (a) any other relevant person in relation to the supply likely to be affected by the departure;
  - (b) every consumer served by that supply likely to be affected by the departure;
  - (c) every appropriate local authority in relation to the supply;
  - (d) every monitoring local authority in relation to the supply; and
  - (e) every health board in whose area the supply is located,

with a copy of the application, and the statement, scheme and summary referred to in paragraph (2), and shall provide details of the notification to the appropriate local authority.

- (5) A body or person who has been notified in accordance with paragraph (4) may make representations to the appropriate local authority in connection with the application; and any such representations shall be made not later than the end of the period of 28 days beginning with the date on which the application for the authorisation was made.
- (6) An appropriate local authority shall, on the request of the relevant person, provide such advice or assistance as is reasonably required to enable that person to—
  - (a) complete an application for the purposes of paragraph (1); and
  - (b) comply with the requirements of paragraph (4).

#### Authorisation of temporary departure: terms and conditions

- 9.—(1) An appropriate local authority shall only determine an application for an authorisation—
  - (a) after the expiry of the period for making representations specified under regulation 8(5);
  - (b) where it receives a representation within that period, and that representation is not withdrawn, after having considered that representation; and
  - (c) where it is satisfied that the relevant person has complied with the notification requirements of regulation 8(4).
- (2) An appropriate local authority shall not grant an application for an authorisation made under regulation 8 unless it is satisfied—
  - (a) that the authorisation is necessary to maintain a supply of water for human consumption purposes;
  - (b) that a supply of water for those purposes cannot be maintained by any other reasonable means; and
  - (c) that the supply of water in accordance with the authorisation does not constitute a potential danger to human health.
- (3) Subject to paragraphs (4) and (6), an appropriate local authority may authorise a departure for such period ("the departure period") which, in the opinion of the appropriate local authority, is no longer than is reasonably required in order to secure a supply of water for human consumption purposes which satisfies the requirements of Part IV.
  - (4) No departure period shall exceed three years.

- (5) Subject to paragraph (6), an authorisation under paragraph (3)—
  - (a) shall specify—
    - (i) the grounds on which it is granted;
    - (ii) the location of the supply in respect of which it is granted, including the source of the supply, and the addresses of any premises served by that supply;
    - (iii) the extent to which a departure from the prescribed concentration or value of any parameter is authorised;
    - (iv) in respect of each parameter to which paragraph (iii) applies, the results of the analysis of the samples (if any) taken in relation to the supply in question during the 12 months immediately preceding the first day on which the prescribed concentration or value could not be met:
    - (v) in respect of each parameter to which paragraph (iii) applies, the results of the analysis of the samples (if any) taken in relation to the supply in question between the first day on which the prescribed concentration or value could not be met and the date of application;
    - (vi) the average daily volume of water provided by the supply, in so far as that can readily be ascertained, and the estimated number of persons served by the supply;
    - (vii) whether or not any food production undertaking would be affected; and
    - (viii) the departure period; and
  - (b) shall require the implementation of a scheme for monitoring the quality of water supplied by that supply in the area in question during the departure period (which may be, but need not be, the scheme submitted in accordance with regulation 8(2)(b)); and
  - (c) shall—
    - (i) require the carrying out of the steps which, in the appropriate local authority's opinion, are reasonably required in order to secure that the supply fully satisfies the requirements of Part IV (whether or not the steps are those proposed in the summary submitted in accordance with regulation 8(2)(c)) by the end of the departure period; and
    - (ii) specify, in relation to those steps—
      - (aa) the timetable for the work;
      - (bb) an estimate of the cost of the work; and
      - (cc) provisions for reviewing the progress of the work and for reporting to the appropriate local authority the result of the review;
  - (d) shall require the taking of such steps as may be specified to give to the persons served by the supply to which the authorisation applies and, in particular, to those groups of such persons for which the supply of water in accordance with the authorisation could present a special risk, advice as to the measures (if any) that it would be advisable in the interests of their health for those persons to take for the whole or any part of the departure period; and
  - (e) such additional matters as the appropriate local authority considers necessary.
- (6) Where the appropriate local authority is of the opinion—
  - (a) that the extent of the contravention of the requirements of Part IV as respects any parameter is trivial; and
  - (b) that the prescribed concentration or value as respects that parameter is likely to be achieved within the period of 30 days beginning with the day on which the prescribed concentration or value in respect of that parameter was contravened,

the particulars to be specified in the authorisation shall be those required by paragraph (5)(a)(iii) and (viii), and sub-paragraphs (b) to (e) of that paragraph shall not apply.

(7) An appropriate local authority shall, as soon as reasonably practicable, notify the relevant person of the authorisation and its terms.

#### Authorisation of a second temporary departure

- 10.—(1) An appropriate local authority shall, before the expiry of the departure period specified in any authorisation granted under regulation 9, review whether the supply fails or is likely to fail to satisfy a requirement of regulation 7(2) by the end of that period.
- (2) Where, following the review, it appears to the appropriate local authority that the supply fails or is likely to fail to satisfy a requirement of regulation 7(2) by the end of the departure period, it may, subject to the provisions of this regulation, authorise a second departure.
- (3) Where an appropriate local authority proposes to authorise a second departure, it shall notify the relevant person and the Scottish Ministers of—
  - (a) the results of the review undertaken in accordance with paragraph (1); and
  - (b) the reasons for proposing to authorise a second departure.
- (4) Paragraphs (2) to (5) and (7) of regulation 9 shall apply to the authorisation of a second departure as they apply to an authorisation under regulation 9.

#### Authorisation of a third temporary departure

- 11.—(1) An appropriate local authority shall, before the expiry of the departure period specified in any authorisation granted under regulation 10, review whether the supply fails or is likely to fail to satisfy a requirement of regulation 7(2) by the end of that departure period.
- (2) Where, following the review, it appears to the appropriate local authority that the supply fails or is likely to fail to satisfy a requirement of regulation 7(2) by the end of the departure period, it may, if it considers there are exceptional circumstances for doing so, and subject to the provisions of this regulation, request that the Scottish Ministers seek the authorisation of a third departure from the European Commission, in accordance with Article 9(2) of Council Directive 98/83/EC(11).
- (3) Where paragraph (2) applies, the appropriate local authority shall notify the relevant person and the Scottish Ministers of—
  - (a) the results of the review undertaken in accordance with paragraph (1); and
  - (b) the exceptional circumstances which the authority considers justify its proposal to authorise a third departure.
- (4) The Scottish Ministers shall, as soon as reasonably practicable, request an authorisation of a third departure from the European Commission if satisfied that there are grounds for a third departure.
- (5) The appropriate local authority shall provide to the Scottish Ministers such information as may be required to enable them to be satisfied that there are grounds for a third departure.
- (6) The Scottish Ministers shall, as soon as reasonably practicable, notify the European Commission's decision as regards the third departure to the appropriate local authority.
- (7) Paragraphs (2) to (5) and (7) of regulation 9 shall apply to the authorisation of a third departure as they apply to an authorisation under regulation 9; and paragraph (5) of that regulation shall apply to a departure under this regulation, but with the substitution for the words in paragraph (5) "Subject to paragraph (6)" of the words "Subject to any decision of the European Commission".

#### Authorisation of temporary departure: other limitations

- **12.** An authorisation under regulation 9, 10 or 11 (as the case may be), may be limited to water supplied—
  - (a) from a particular source or class of source;
  - (b) to or from a particular area of supply or to/from an area of a particular description; or
  - (c) to particular premises or classes of premises.

#### Authorisation of temporary departure: publicity

- **13.**—(1) As soon as reasonably practicable after a departure has been authorised and notified to the relevant person under regulation 9, 10 or 11 (as the case may be), that person shall—
  - (a) notify the persons specified in regulation 8(4)(a) to (e), of the departure and of the matters specified in regulation 9(5)(a) to (e); and
  - (b) give such other public notice of the authorisation, and of its terms and conditions, as the appropriate local authority may, by notice in writing to the relevant person, reasonably require.
- (2) An appropriate local authority shall, upon the request of the relevant person, provide such advice and assistance as is reasonably required to enable that person to comply with the requirements of paragraph (1).
- (3) Where a departure has been authorised under regulation 9 or 10 (as the case may be) in respect of a private water supply which is determined a level 3 supply under Part III, the appropriate local authority shall notify the Scottish Ministers in writing of the departure and its terms within 14 days of its authorisation.

#### Refusal of temporary departure: notification and publicity

- **14.**—(1) As soon as reasonably practicable after the refusal, either in whole or in part, of a departure under regulation 9, 10 or 11 (as the case may be) the appropriate local authority shall—
  - (a) in the case of a refusal under regulation 9 or 10, provide reasons in writing for its decision to the relevant person; and
  - (b) in the case of a refusal under regulation 11, notify the relevant person of the European Commission's decision.
- (2) Where the appropriate local authority considers it necessary or desirable to do so, at the same time as it provides reasons or notifies the European Commission's decision under paragraph (1), it shall advise the relevant person of the steps or measures (if any) that it is advisable in the interests of their health for persons for which the supply of water, in respect of which the departure has been refused, could present a special risk, to take.
- (3) As soon as reasonably practicable after the relevant person has received reasons or notification under paragraph (1), that person shall notify the persons specified in regulation 8(4)(a) to (e)–
  - (a) of the refusal and the reasons therefor;
  - (b) of any steps or measures advised under paragraph (2); and
  - (c) of any other matters the appropriate local authority may, by notice in writing to the relevant person, reasonably require.

#### Revocation and modification of temporary departure

**15.**—(1) Subject to the provisions of this regulation, an appropriate local authority may at any time modify or revoke an authorisation under regulations 9, 10 or 11 (as the case may be).

- (2) Subject to paragraph (3), the appropriate local authority shall not revoke or modify an authorisation without giving at least 28 days' notice in writing of its intention to do so, to—
  - (a) the relevant person to which the authorisation relates and to any other relevant person in relation to that supply;
  - (b) every consumer served by that supply;
  - (c) every monitoring local authority in relation to that supply;
  - (d) every health board in whose area the supply is located;
  - (e) in the case of an authorisation granted in respect of a private water supply to which the provisions of regulations 10, 11 or 13(3) apply, the Scottish Ministers; and
  - (f) such other persons as it considers appropriate.
- (3) An appropriate local authority may revoke or modify an authorisation without notice if it appears to it that immediate revocation or modification is required in the interests of public health.
- (4) A body or person on whom notice has been served in accordance with paragraph (2), may make representations to the appropriate local authority in connection with the proposed modification or revocation within the period specified in the notice, and the authority shall have regard to any such representations.
- (5) The relevant person on whose application a departure has been authorised under this Part shall notify the appropriate local authority as soon as the circumstances which gave rise to the departure cease to exist.
- (6) As soon as reasonably practicable after receiving notification under paragraph (5), the appropriate local authority shall revoke the authorisation without the need for prior notice, only on being satisfied that the circumstances which gave rise to the departure cease to exist.

#### PART VI

## TYPE A SUPPLIES: RISK ASSESSMENTS, INVESTIGATIONS AND REMEDIAL ACTION

#### Type A Supplies: Risk Assessments

- **16.**—(1) Subject to paragraph (2), a monitoring local authority shall carry out an assessment ("risk assessment") of the potential health risks associated with all Type A supplies in their area taking into account the matters specified in Schedule 4, in order to establish whether such supplies satisfy the requirements of Part IV.
  - (2) A monitoring local authority shall carry out a risk assessment—
    - (a) where the supply is a new supply and is to be used for the first time, or for the first time after being out of use for a period of 12 months or more, within 6 months of that supply being classified a Type A supply in accordance with Part III; or
    - (b) where the monitoring local authority considers, whether as a result of monitoring that supply in accordance with Part VII of these Regulations or otherwise, that the supply is no longer wholesome, as soon as reasonably practicable.
- (3) A monitoring local authority shall use the information obtained as a result of carrying out a risk assessment under paragraphs (1) and (2) to inform any remedial action as may be required under regulations 17 and 18.
- (4) At the same time as a monitoring local authority reviews and updates the classification of a Type A supply in accordance with Part III, it shall review and update the terms of the risk assessment, carried out under this regulation.

#### **Investigations: Schedule 1 microbiological and chemical parameters**

- 17.—(1) Subject to paragraph (3), where a monitoring local authority considers a Type A supply fails, or is likely to fail, to satisfy a requirement of regulation 7(2) that authority shall immediately take such steps as are considered necessary to identify the following matters—
  - (a) the cause and extent of the failure, or as the case may be, the apprehended failure;
  - (b) the microbiological and chemical parameters listed in Tables A and B in Schedule 1 in respect of which the prescribed concentration or value has not been, or is unlikely to be, achieved; and
  - (c) in relation to each parameter so identified, whether the failure, or apprehended failure, to achieve the prescribed concentration or value is attributable to—
    - (i) the domestic distribution system;
    - (ii) the maintenance of that system; or
    - (iii) neither of those matters.
  - (2) Where a departure has been authorised under Part V—
    - (a) paragraph (1) shall apply only in respect of the microbiological and chemical parameters listed in Tables A and B in Schedule 1 (if any) that are not specified in the authorisation; and
    - (b) a monitoring local authority which has reason to believe that the Type A supply fails, or is likely to fail, to satisfy the concentration or value required by the authorisation in relation to any of those, it shall immediately take such steps as are necessary to identify the matters specified in paragraph (1).
- (3) As soon as reasonably practicable after the matters specified in paragraph (1) have been identified, the monitoring local authority shall notify the relevant person and the appropriate local authority—
  - (a) of those matters; and
  - (b) in relation to each parameter identified in accordance with paragraph (1)(b) whether the monitoring local authority considers a failure in respect of the parameter is likely to recur;
  - (c) of the action (if any) taken by that authority in relation to a failure which is attributable to the domestic distribution system or the maintenance of that system; and
  - (d) details of the steps (if any) that the authority considers it is necessary or desirable for consumers of the supply likely to be affected by the matters specified in paragraph (1) to take in the interests of their health.
- (4) As soon as reasonably practicable after the relevant person receives notification given under paragraph (3), that person shall notify, in writing—
  - (a) every consumer of that supply; and
  - (b) where directed to do so by the monitoring local authority, every consumer the relevant person reasonably believes may have been or was likely to have been affected by the matters specified in paragraph (1), where the address or contact details of those consumers are known to that person or are readily ascertainable,

of the matters referred to in paragraph (3)(a) to (d).

- (5) Where the monitoring local authority has identified a failure which is attributable to a domestic distribution system or the maintenance of that system, it shall, at the same time as notice is given under paragraph (3)—
  - (a) notify in writing the responsible person in relation to that domestic distribution system, and having consulted with the health board in whose area the supply is located, inform that person of the nature of the failure and provide details of the steps (if any) that the

- authority considers it is necessary or desirable for that person and any other consumers of that supply to take in the interests of their health; and
- (b) send a copy of the notification under sub-paragraph (a) to the relevant person in relation to the private water supply.
- (6) Where the monitoring local authority considers such a failure as is mentioned in paragraph (5) is likely to affect the supply of water to the public in premises in which water is so supplied, the authority shall at the same time as notice is given under paragraph (5)—
  - (a) by notice in writing to the responsible person in respect of that domestic distribution system, inform that person of the nature of the failure and provide details of the steps (if any) that the authority considers it is necessary or desirable for that person and any other consumers of that supply to take in the interests of their health; and
  - (b) send a copy of that notice to the relevant person in relation to the private water supply.
- (7) As soon as reasonably practicable after a responsible person receives a notification given under paragraph (6)(a), that person shall—
  - (a) where directed to do so by the monitoring local authority, serve a copy of that notice on every consumer the responsible person reasonably believes may have been or was likely to have been affected by the failure, where the address or contact details of those consumers are known to that person or are readily ascertainable;
  - (b) prominently display a copy of the notice given under paragraph (6)(a) so that it might be conveniently read by any consumer that may attend at the premises; and
  - (c) take all such other steps as the monitoring local authority may reasonably require to inform the public of the failure.
- (8) Where such a failure as is mentioned in sub-paragraphs (a) to (c) of paragraph (1) relates to the copper or lead parameter, the monitoring local authority shall, as soon as reasonably practicable after the occurrence, advise the responsible person to modify or replace such of the pipes and their associated fittings as it knows or has reason to believe have the potential for contributing to copper or lead in the water supplied to the premises served by that supply, so as to eliminate that potential (whether or not the presence of copper or lead in those pipes contributed to the failure).

#### **Investigations: Schedule 1 indicator parameters**

- **18.**—(1) Where a monitoring local authority considers a Type A supply does not meet the specifications for indicator parameters set out in Table C in Schedule 1, it shall immediately take such steps as are necessary to identify—
  - (a) the indicator parameters in respect of which the specifications are not met;
  - (b) the reason why the specifications are not met; and
  - (c) if the specification for the coliform bacteria or colony count parameter (items 4 and 5 in Table C in Schedule 1) is not met, whether the inability to meet that specification is attributable to—
    - (i) the domestic distribution system;
    - (ii) the maintenance of that system; or
    - (iii) neither of those matters.
- (2) As soon as reasonably practicable after the matters specified in paragraph (1) have been identified, the monitoring local authority shall notify the relevant person and the appropriate local authority—
  - (a) of those matters;

- (b) in relation to each parameter identified in accordance with paragraph (1)(a), whether the authority considers a recurrence of the inability to meet the specification in respect of that parameter is likely; and
- (c) details of the steps (if any) that the authority considers it is necessary or desirable for consumers of the supply likely to be affected by the matters specified in paragraph (1) to take in the interests of their health.
- (3) As soon as reasonably practicable after a relevant person receives notification given under paragraph (2), that person shall notify in writing every consumer of that supply of the matters referred to in paragraph (2)(a) to (c).
- (4) Where, in a case to which paragraph (1)(c) applies, the inability to meet the specification has been identified as attributable to the domestic distribution system or to the maintenance of that system, the monitoring local authority shall, at the same time as notice is given under paragraph (2)—
  - (a) notify in writing the responsible person in relation to that system of the nature of the failure and provide details of the steps (if any) that the authority considers it is necessary or desirable for that person and any consumers served by the supply to take in the interests of their health; and
  - (b) send a copy of the notification to the relevant person in relation to the supply.
- (5) As soon as reasonably practicable after a responsible person is notified under paragraph (4) (a), that person shall notify—
  - (a) every consumer of that supply likely to be affected by the failure;
  - (b) where directed to do so by the monitoring local authority, every consumer the responsible person reasonably believes may have been or was likely to have been affected by the failure referred to in paragraph (4)(a), where the address or contact details of those consumers are known to that person or are readily ascertainable; and
  - (c) the relevant person in relation to the supply.
- (6) Where the monitoring local authority considers such an inability as is mentioned in paragraph (4) is likely to affect the supply of water to the public in premises in which water is so supplied, the authority, at the same time as notification is given under paragraph (2), shall—
  - (a) by notice in writing to the responsible person in respect of that domestic distribution system, inform that person of the nature of the failure and provide details of the steps (if any) that the authority considers it is necessary or desirable for the responsible person and any other consumers of that supply to take in the interests of their health; and
  - (b) send a copy of the notice to the relevant person in relation to the supply.
- (7) As soon as reasonably practicable after a responsible person receives notification given under paragraph (6)(a), that person shall—
  - (a) where directed to do so by the monitoring local authority, serve a copy of that notice on every consumer the responsible person reasonably believes may have been or was likely to have been affected by the failure, where the address or contact details of those consumers are known to that person or are readily ascertainable;
  - (b) prominently display a copy of the notice given under paragraph (6)(a) so that it might be conveniently read by any member of the public that might attend at the premises; and
  - (c) take all such other steps as are reasonably required to inform the public of the failure.

#### **PART VII**

#### TYPE A SUPPLIES: MONITORING

#### Check monitoring – interpretation

- **19.** In this Part, "check monitoring" means monitoring a Type A supply for the purpose of obtaining representative information at regular intervals—
  - (a) as to the organoleptic and microbiological quality of water; and
  - (b) where relevant, as to the effectiveness of drinking water treatment (particularly of disinfection).

for the purpose of determining—

- (i) as regards the parameters listed in Tables A and B in Schedule 1, whether water supplied for human consumption purposes satisfies the provisions of Part IV or, if a departure has been authorised under Part V in relation to that supply, those provisions as read with the terms of that departure; and
- (ii) as regards indicator parameters listed in Table C in Schedule 1, whether water supplied for human consumption purposes meets the specifications for those parameters.

#### Audit monitoring - interpretation

- **20.**—(1) In this Part, "audit monitoring" means monitoring a Type A supply for the purpose of obtaining representative information at regular intervals from which it may be established—
  - (a) as regards the parameters listed in Tables A and B in Schedule 1, whether water supplied for human consumption purposes satisfies the provisions of Part IV or, if a departure has been authorised under Part V in relation to that supply, those provisions as read with the terms of that departure; and
  - (b) as regards indicator parameters listed in Table C in Schedule 1, whether water supplied for human consumption purposes meets the specification for those parameters.

#### Monitoring duties and powers

- **21.**—(1) Subject to regulation 26, for the purpose of determining whether a Type A supply satisfies the provisions of Part IV or, if a departure has been authorised under Part V in relation to a Type A supply, those provisions as read with the terms of that authorisation, a monitoring local authority shall take or cause to be taken, and analyse or cause to be analysed, from any Type A supply located within its area, not less than the number of samples of water specified in, or in accordance with, the provisions of this Part.
- (2) Except in a case to which paragraph (3) applies, the parameters listed in Tables A to C in Schedule 1 shall be subject—
  - (a) as regards a parameter listed in column (2) of Table A in Schedule 2, to check monitoring; and
  - (b) as regards a parameter listed in column (2) of Table B in Schedule 2, to audit monitoring.
  - (3) Where the distribution of water—
    - (a) is by tanker; or
    - (b) is, or is likely to be, an intermittent short term supply,

samples of water from each tanker or intermittent short term supply from which water is distributed shall be taken 48 hours after the commencement of the distribution from that tanker or supply and every 48 hours thereafter until the distribution is discontinued.

#### Monitoring: general provision

- **22.**—(1) Samples from a Type A supply shall be taken such that they are representative of the quality of water intended for human consumption purposes throughout the year and, in a case where a Type A supply serves a number of premises, from such premises selected at random unless, by notice in writing to a monitoring local authority (whether or not on the application of that authority), the Scottish Ministers otherwise direct.
- (2) Samples are to be taken at the point of compliance determined in accordance with regulation 7(4)(a) to (d).
- (3) Where a monitoring local authority is required in accordance with Schedule 2 to take more than one sample within a specified period, the samples shall be taken so that they are representative of the quality of water intended for human consumption purposes throughout that period.
- (4) A monitoring local authority shall take and analyse a sample of water from every Type A supply to which regulations 19 and 20 apply, for the parameters referred to in Schedule 1, using the methodology specified in Schedule 5 as soon as it has been classified as a Type A supply under Part III
- (5) A monitoring local authority shall as soon as reasonably practicable and, in any event, within 28 days of being requested to do so by a relevant person, take and analyse a sample of water from a Type A supply which is representative of the quality of water intended for human consumption purposes throughout the year for compliance with the prescribed concentration or value or state for the parameters specified in regulation 7(2).
- (6) Without prejudice to the monitoring obligations in this Part, a monitoring local authority shall have power to take and analyse a sample from a Type A supply in order to—
  - (a) confirm or clarify the results of the analysis of a previous sample;
  - (b) ascertain the effectiveness of remedial action taken in relation to the supply (whether or not such action was taken following service of a notice under section 76G of the 1980 Act(12)).

#### **Numbers of samples: Type A supplies**

- **23.**—(1) Subject to paragraph (2) and regulations 21 and 22, in each year a monitoring local authority shall take, or cause to be taken the standard number of samples of water as regards residual disinfectant and each parameter listed in column (2) of Tables A and B in Schedule 2, and shall analyse the samples for compliance with the prescribed concentrations or values or states given in Schedule 1 for those parameters.
- (2) Subject to paragraphs (4) and (5), where in respect of a parameter subject to check monitoring—
  - (a) a monitoring local authority is of the opinion that the quality of water provided by a Type A supply is unlikely to deteriorate;
  - (b) in each of two successive years the requirement mentioned in paragraph (3) is satisfied in relation to a parameter listed in Table A in Schedule 2; and
  - (c) the monitoring local authority considers the concentration or value in respect of that parameter is unlikely to increase or, in the case of hydrogen ion (item 9 in Table A in Schedule 2), decrease to any significant extent in the following year,

the number of samples to be taken in that year in respect of that parameter may be the reduced number.

- (3) The requirement referred to in paragraph (2)(b) is that an analysis of each sample taken in relation to the parameter in question has shown no significant variation and has established—
  - (a) if the parameter is colony counts, no abnormal change;
  - (b) if the parameter in question is hydrogen ion, a pH value that is not less than 6.5 and not more than 9.5; and
  - (c) in any other case, a concentration or value or state given in Schedule 1 that is constant and significantly better than the prescribed concentration or value or state for that parameter.
- (4) Paragraph (2)(b) shall apply in the period from 3rd July 2006 to 2nd July 2008, so that the reduced number of samples may be taken in that period in relation to a parameter if—
  - (a) it would have been permissible if these Regulations had been in force throughout the period of at least two years mentioned in that paragraph; or
  - (b) the monitoring local authority did not sample as frequently as required by paragraph (1) during the period from 3rd July 2004 to 2nd July 2006 ("the relevant period") before these Regulations came into force but an assessment of the samples actually taken during that period, whether or not for the purpose of the 1992 Regulations, justify the reduction.
- (5) Except in a case where the provisions of paragraph (6) apply, in the period from 3rd July 2006 to 31st December 2006 the number of samples taken shall be—
  - (a) not less than one half of the standard number of samples, which number shall be rounded up, if necessary, to the nearest whole number; or
  - (b) where paragraph (2) applies, not less than one half of the reduced number of samples, which number shall be rounded up, if necessary, to the nearest whole number.
- (6) Where, in the period 3rd July 2006 to 31st December 2006, the number of samples to be taken by virtue of paragraph (5) in relation to a parameter is 1, the monitoring local authority need not sample that parameter if a sample has been taken by that authority in respect of that supply in the period 1st January 2006 to 2nd July 2006, whether or not for the purposes of the 1992 Regulations.
- (7) Where the analysis of the reduced number of samples taken by a monitoring local authority has established in respect of any parameter listed in Tables A and B in Schedule 2 that the prescribed specification for that parameter or, as the case may be, the relaxed specification for that parameter or, as the case may be, the relaxed specification therefor specified in an authorisation granted under Part V has been contravened, the monitoring local authority shall revert to carrying out—
  - (a) the number of samples proportionate to the remainder of that year in respect of that parameter; and where the result is not a whole number, that proportion rounded up to the nearest whole number; and
  - (b) for subsequent years, the standard number of samples.
- (8) Samples required to be taken by this regulation shall be taken so that they are representative of the quality of water intended for human consumption purposes throughout the year.
- (9) In this regulation, "the standard number" means, in relation to each parameter listed in column (2) of Tables A and B in Schedule 2, the relevant number shown for each parameter in those Tables in the columns for levels 1 to 3 respectively; and "the reduced number" means, in relation to each parameter listed in column (2) of Table A of that Schedule, the relevant number shown for each parameter in brackets in the columns for those levels.

#### Monitoring: total indicative dose and tritium

- **24.**—(1) Where the Scottish Ministers determine that either of the conditions specified in paragraph (2) is satisfied in respect of any area within the area of a monitoring local authority, they shall by notice in writing to that authority—
  - (a) specify that area;
  - (b) specify which condition or conditions in paragraph (2) is or, as the case may be, are satisfied; and
  - (c) confirm that any Type A supply in that area need not be monitored in respect of the parameter to which the relevant condition relates.
- (2) The conditions specified in this paragraph are that Type A supplies in the area specified in the notice under paragraph (1) would—
  - (a) give rise to a calculated total indicative dose in respect of radioactivity that is well below the value specified in column (3) of Table C in Schedule 1; or
  - (b) as the case may be, contain a level of tritium that is well below the concentration specified in column (3) of Table C in Schedule 1.
- (3) Where the Scottish Ministers determine that a condition in paragraph (2) specified in a notice under paragraph (1) is no longer satisfied, they shall, by notice in writing, revoke any notice given under paragraph (1) to the extent it applies in respect of that condition.
- (4) Where a notice under paragraph (1) has been given to a monitoring local authority, and until such time as that notice is revoked, the monitoring local authority need not monitor any Type A supply in the area to which the notice relates in respect of a parameter to which the condition or conditions, as the case may be, in the notice applies.

#### Additional monitoring

- **25.**—(1) This regulation applies to every Type A supply sampled by a monitoring local authority in accordance with this Part.
- (2) A monitoring local authority shall sample every supply in its area in respect of any property, element, micro-organism, parasite or substance which fulfils the conditions specified in paragraph (3).
  - (3) The conditions specified in this paragraph are that—
    - (a) the supply may have or contain a property, element, micro-organism, parasite or substance not listed in Schedule 1; and
    - (b) the monitoring local authority considers that the concentration, amount or number of the property, element, micro-organism, parasite or substance may be such that it may (whether alone or in combination with a parameter or any other property, element, micro-organism, parasite or substance) cause the supply to fail to satisfy the provisions of Part IV or, if a departure has been authorised under Part V in relation to that supply, those provisions as read with the terms of that departure.
- (4) A monitoring local authority shall cause to be taken such samples at such frequency as it considers appropriate having regard to any anticipated risk of danger to human health, and which are representative of the quality of water intended for human consumption purposes throughout the year.

#### **Decision on audit monitoring**

**26.**—(1) Where a monitoring local authority has completed an investigation in accordance with Schedule 3 and is satisfied, taking into account the matters specified in Schedule 4, that one or more parameters referred to in column 2 of the Table in Schedule 3 is, or are, not likely to be present in a

Type A supply in its area in concentrations which could lead to the risk of a breach of the prescribed specification in respect of such parameter or parameters as specified in Tables B and C in Schedule 1, it may decide not to monitor that parameter or those parameters in respect of that supply.

- (2) Before making a decision under paragraph (1), the monitoring local authority shall notify—
  - (a) the relevant person and any responsible person in relation to the supply;
  - (b) the Health Board in whose area the supply is located; and
  - (c) any neighbouring monitoring local authority which may have an interest in the supply.
- (3) The notification under paragraph (2) shall include the following details concerning the particular Type A supply—
  - (a) the average volume of water provided by the supply and the number of persons served by it;
  - (b) the parameter or parameters to which the decision relates and the results of the investigations undertaken in accordance with Schedule 3;
  - (c) the period during which the decision will have effect (which, subject to paragraph (6), shall be such period as the monitoring local authority considers reasonable);
  - (d) the period (which shall be not less than 28 days) in which representations may be made to the monitoring local authority in respect of the decision; and
  - (e) such other information which the monitoring local authority considers necessary.
- (4) A monitoring local authority shall not implement the decision until after the expiry of the period for making representations specified in any notification under paragraph (2), and after considering any representations made in response to such a notification.
- (5) As soon as reasonably practicable after implementing any decision, the monitoring local authority shall notify the persons specified in paragraph (2) of—
  - (a) the parameter or parameters listed in column 2 of the Table in Schedule 3 which the authority considers is, or are, not likely to be present in the supply in concentrations which could lead to the risk of a breach of the prescribed specification in respect of such parameter or parameters as specified in Tables B and C in Schedule 1;
  - (b) the conditions specified in column 4 of the Table in Schedule 3 which, the authority considers are satisfied, and a statement of the reasons for this;
  - (c) in respect of each parameter, the period during which the decision will have effect; and
  - (d) any other information which the authority considers necessary.
- (6) A monitoring local authority shall, at least once in every 5 years, review any decision made under this regulation, and may modify or revoke it at any time.
- (7) A monitoring local authority shall notify the persons specified in paragraph (2) about any decision to modify or revoke any decision made under this regulation.
- (8) Where a decision has been revoked under paragraph (6), a monitoring local authority shall not make a further decision under this regulation in respect of that parameter or those parameters before the expiry of a period of 2 years from the date on which the revocation takes effect.

#### **PART VIII**

## TYPE B SUPPLIES: RISK ASSESSMENTS, INVESTIGATIONS AND MONITORING

#### Type B Supplies: Risk Assessments

- **27.**—(1) A monitoring local authority shall, in respect of a Type B supply, provide such advice and assistance to a relevant person as will enable that person to undertake an assessment ("risk assessment") of the potential risks to human health arising from their supply.
- (2) A monitoring local authority may carry out a risk assessment (whether or not on the request of a relevant person or consumer), taking into account the matters specified in Schedule 4, of the potential health risks associated with any Type B supply in their area.

#### Investigations: Table D of Schedule 1 microbiological and chemical parameters

- **28.**—(1) Where a monitoring local authority has reason to believe that a Type B supply fails, or is likely to fail, to satisfy a requirement of regulation 7(3), that authority may take such steps as it considers necessary to identify the following matters—
  - (a) the cause and extent of the failure, or as the case may be, the apprehended failure;
  - (b) the microbiological and chemical parameters listed in Table D of Schedule 1 in respect of which the prescribed specification has not been, or is unlikely to be, achieved; and
  - (c) in relation to each parameter so identified, whether the failure, or apprehended failure, to achieve the prescribed specification is attributable to—
    - (i) the domestic distribution system;
    - (ii) the maintenance of that system; or
    - (iii) neither of those matters.
- (2) As soon as reasonably practicable after the matters specified in paragraph (1) have been identified, the monitoring local authority shall notify the relevant person and the appropriate local authority of those matters and of the steps that the authority considers it is necessary or desirable to take in the interests of health.
- (3) As soon as reasonably practicable after the relevant person receives notification given under paragraph (2), that person shall notify in writing every consumer, if any, of that supply likely to be affected by the matters specified in paragraph (1) of the cause and effect of the failure or, as the case may be, the apprehended failure, and shall provide to those consumers, details of the steps (if any) specified in accordance with paragraph (2).

#### Monitoring duties and powers

- **29.**—(1) For the purpose of determining whether a Type B supply satisfies the provisions of regulation 7(3), a monitoring local authority may take or cause to be taken, and analyse, or cause to be analysed, from any Type B supply located within its area such number of samples, if any, of water which the authority considers is necessary to establish whether the supply is wholesome.
- (2) Samples from a Type B supply or from premises served by such a supply, shall be taken so that they are representative of the quality of water intended for human consumption purposes throughout the year and, in a case where a Type B supply serves a number of premises, from such premises selected at random as will ensure, insofar as is reasonably practicable, that their analysis will produce data which is representative of the quality of water so sampled.

- (3) Samples are to be taken at the point of compliance determined in accordance with regulation 7(5).
- (4) A monitoring local authority may at any time take and analyse a sample of water from any Type B supply (whether or not on the request of a relevant person or a consumer served by such a supply) for the parameters referred to in Table C of Schedule 2 to these Regulations, using the methodology specified in Schedule 5.
- (5) A monitoring local authority shall as soon as is practicable and in any event, within 28 days of being requested to do so by a relevant person in relation to a Type B supply, or a consumer of such a supply serving premises in their area, take and analyse a sample from the supply representative of the quality of water intended for human consumption purposes throughout the year for compliance with the parameters specified in regulation 7(3).
- (6) Without prejudice to the monitoring powers and duties in this regulation, a monitoring local authority shall have power to take and analyse a sample from a Type B supply in order to—
  - (a) confirm or clarify the results of the analysis of a previous sample;
  - (b) ascertain the effectiveness of remedial action taken in relation to the supply (whether or not such action was taken following service of a notice under section 76G of the 1980 Act(13)).

#### **Additional Monitoring**

- **30.**—(1) This regulation applies to any Type B supply sampled by a monitoring local authority in accordance with regulation 29.
- (2) A monitoring local authority may sample every appropriate Type B supply in its area in respect of any property, element, micro-organism, parasite or substance which fulfils the conditions specified in paragraph (3).
  - (3) The conditions specified in this paragraph are that—
    - (a) the supply may have or contain a property, element, micro-organism, parasite or substance not listed in Table C of Schedule 2; and
    - (b) the monitoring local authority reasonably believes that the concentration, amount or number of the property, element, micro-organism, parasite or substance may be such that it may (whether alone or in combination with a parameter or any other property, element, micro-organism, parasite or substance) cause the supply to fail to satisfy the provisions of regulation 7(3).
- (4) A monitoring local authority may cause to be taken such samples at such frequency as it considers appropriate having regard to any anticipated risk of danger to human health, and which are representative of the quality of water intended for human consumption purposes throughout the year.

#### **PART IX**

### PRIVATE WATER SUPPLIES: SAMPLING, ANALYSIS AND CHARGING

#### Collection and analysis of samples

**31.**—(1) A monitoring local authority shall secure, so far as is reasonably practicable, that in taking, handling, transporting, storing and analysing any sample taken for the purposes of these Regulations, or causing any such sample to be taken, handled, transported, stored and analysed, the appropriate requirements are satisfied.

- (2) In paragraph (1), "the appropriate requirements" means such of the following requirements as are applicable—
  - (a) that the sample is representative of the quality of the water intended for human consumption purposes at the point of compliance specified in regulation 7(4) or (5) at the time of sampling;
  - (b) that the sample is not contaminated when being taken or subsequently;
  - (c) that the sample is kept at such temperature and in such conditions as will secure that there is no material alteration of the concentration or value or specification for the measurement or observation of which the sample is intended;
  - (d) that the sample is analysed as soon as may be after the time it has been taken—
    - (i) by, or under the supervision of, a person who is competent to perform that task; and
    - (ii) with the use of such equipment as is suitable for the purpose;
  - (e) that any laboratory at which samples are analysed has a system of analytical quality control that is subject from time to time to checking by a person who is—
    - (i) not under the control of either the laboratory or the monitoring local authority; and
    - (ii) approved by the Scottish Ministers for that purpose.
- (3) A monitoring local authority shall maintain such records as are sufficient to enable it to establish, in relation to each sample taken for the purposes of these Regulations that such of the appropriate requirements as are applicable to that sample have been satisfied.
- (4) Subject to paragraph (6), for the purpose of establishing, within acceptable limits of deviation and detection, whether the sample contains concentrations or values or specifications which contravene the prescribed concentrations or values or specifications, or exceed the specifications for indicator parameters—
  - (a) the method of analysis specified in column (2) of Table A in Schedule 5 shall be used for determining compliance with the parameter specified in relation to that method in column (1);
  - (b) the method of analysis used for determining compliance with a parameter specified in column (2) of Table B in Schedule 5 must be capable, at the time of use—
    - (i) of measuring concentrations or values or specifications equal to the parametric value with the trueness and precision specified in relation to that parameter in columns (3) and (4) of that Table; and
    - (ii) of detecting the parameter at the limit of detection specified in relation to that parameter in column (5) of that Table;
  - (c) the method of analysis used for determining compliance with hydrogen ion parameter must be capable, at the time of use, of measuring concentrations equal to the parametric value with a trueness of 0.2 pH units and a precision of 0.2 pH units; and
  - (d) the method of analysis used for odour and taste parameters must be capable, at the time of use, of measuring values equal to the parametric value with a precision of 1 dilution number at 25°C.
  - (5) For the purposes of paragraph (4)—

"limit of detection" is to be calculated as—

- (a) three times the relative within batch standard deviation of a natural sample containing a low concentration of the parameter; or
- (b) five times the relative within batch standard deviation of a blank sample; and

"precision" (the random error) is to be calculated as twice the standard deviation (within a batch and between batches) of the spread of results about the mean; and

"trueness" (the systematic error) is to be calculated as the difference between the mean value of the large number of repeated measurements and the true value.

- (6) Subject to paragraph (8), the Scottish Ministers may, on the application of any person, authorise a method of analysis other than that specified in paragraph (4)(a) ("the prescribed method").
- (7) An application for the purpose of paragraph (6) shall be made in writing and shall be accompanied by—
  - (a) a description of the method of proposed analysis; and
  - (b) the results of the tests carried out to demonstrate the reliability of that method and its equivalence to the prescribed method.
- (8) The Scottish Ministers shall not authorise the use of the method proposed in an application under paragraph (6) unless they are satisfied that the results obtained by the use of that proposed method are at least as reliable as those produced by the use of the prescribed method.
- (9) An authorisation under paragraph (6) may be subject to such conditions as the Scottish Ministers think fit.
- (10) The Scottish Ministers may at any time by notice in writing to the person to whom an authorisation under paragraph (6) has been given, revoke the authorisation; and no such notice shall be served later than 3 months before the date on which the revocation is stated to take effect.
- (11) Within 28 days of the results of analysis of any sample of a private water supply taken from any premises being available to the monitoring local authority which took the sample, or caused it to be taken, the monitoring local authority shall notify the relevant person of the results of that analysis, and any other person who is to be charged under regulation 33 for the taking and analysis of the sample from those premises.

#### Sampling of private water supplies: further provision

- **32.** As soon as a monitoring local authority has reasonable grounds for believing that any element, organism or substance, other than residual disinfectant or a parameter, whether alone or in combination with a parameter or any other element, micro-organism, parasite or substance, may cause a private water supply serving premises located in the area of that authority to be a supply which does not satisfy—
  - (a) the provisions of Part IV; or
  - (b) if a departure has been authorised under Part V in respect of a Type A supply, those provisions as read with the terms of that authorisation,

it shall take, or cause to be taken, sufficient samples from the private water supply in respect of that element, organism or substance, in order to establish whether the supply is wholesome.

#### Charges for sampling, analysis and risk assessment

- **33.**—(1) A local authority may charge a person for expenses reasonably incurred by it—
  - (a) in respect of a Type A supply, for—
    - (i) sampling a supply in accordance with these Regulations, up to a maximum of £70 per visit to any premises for that purpose;
    - (ii) the analysis of samples—
      - (aa) subject to check monitoring (regulation 19), up to a maximum of £75 per visit:

- (bb) subject to audit monitoring (regulation 20), up to a maximum of £435 per visit;
- (iii) preparatory work, including if required, visiting premises or the source of a Type A supply, in relation to a risk assessment to be carried out under regulation 16(1) and (2), up to a maximum of £70;
- (iv) the carrying out of a risk assessment under regulation 16(1) and (2), up to a maximum of £50;
- (v) the review of a risk assessment under regulation 16(4), up to a maximum of £50; and
- (b) in respect of a Type B supply, for—
  - (i) sampling a supply in accordance with these Regulations, up to a maximum of £70 per visit to any premises for that purpose;
  - (ii) the analysis of samples, up to a maximum charge of £48 per visit to any premises for that purpose;
  - (iii) preparatory work, including if required, visiting premises or the source of a Type B supply, in relation to a risk assessment to be carried out under regulation 27(2), up to a maximum of £70; and
  - (iv) the carrying out of a risk assessment under regulation 27(2), up to a maximum of £50;
- (2) Where a local authority has undertaken additional monitoring of a private water supply under regulation 25 or 30, that authority may charge a person for the expenses reasonably incurred by it.
- (3) A local authority shall not charge for the expenses incurred by it in the taking and analysis of any sample taken for the purposes of regulation 22(6)(a) or 29(6)(a).
- (4) Where in relation to any private water supply there is more than one person who may be charged, the local authority shall, in determining who is to be charged and any apportionment of that charge, have regard to the terms (if any) on which the water is supplied and the purposes for which it is used.

#### PART X

#### PRIVATE WATER SUPPLIES: RECORDS AND INFORMATION

#### Register of private water supplies

- **34.**—(1) Subject to paragraph (2), a local authority shall prepare and maintain, in respect of every private water supply to premises in its area, a register containing information about—
  - (a) whether the supply is—
    - (i) Type A and, if so, its level as determined under Part III;
    - (ii) Type B; or
    - (iii) subject to paragraph (2), a supply in respect of which the provisions of regulation 3 apply:
  - (b) the name and address of every relevant person in relation to the supply;
  - (c) the addresses of premises which are served by the supply, and the purposes for which the water is supplied;
  - (d) a description of the source of the supply, including—
    - (i) whether the supply is taken from a watercourse, loch, spring, well or borehole, or any other source or combination of sources; and

- (ii) the location of the source of the supply (whether or not in the area of that local authority), including the appropriate Ordnance Survey National Grid Reference as regards the location of that source;
- (e) the estimated maximum average volume of water provided by the supply and the number of persons served by the supply on any one day;
- (f) any treatment carried out in relation to the supply;
- (g) in respect of a Type A supply, any applications for a departure under Part V in relation to the supply, any departures authorised, and any revocations or modifications of such departures;
- (h) the results of any samples taken and analysed in relation to the supply under these Regulations;
- (i) any investigations carried out, and any action taken following such investigations in relation to the supply;
- (j) any enforcement notices served by the authority in relation to the supply under section 76G of the 1980 Act (whether or not confirmed by the Scottish Ministers under section 76H of that Act), including—
  - (i) the particulars of the person on whom the notice was served;
  - (ii) the date of service of the notice;
  - (iii) the matters specified in subsection (2) of that section;
- (k) a copy of any risk assessment carried out under these Regulations in relation to the supply;
- (l) in respect of a Type A supply, details of any decisions made under regulation 26 in respect of the supply; and
- (m) such other information as the local authority may decide.
- (2) In respect of a private water supply—
  - (a) which is used in the circumstances provided for in regulation 3(1), the requirements of paragraph (1) shall apply only in relation to sub-paragraphs (a) to (f) of that paragraph; and
  - (b) to which provisions of regulation 3(2) apply, the requirements of paragraph (1) shall apply only in relation to sub-paragraphs (a), (b) and (d) to (f) of that paragraph.
- (3) Subject to paragraph (4), a local authority shall make—
  - (a) initial entries in the register in respect of the matters mentioned in paragraph (1) within six months after the date of coming into force of these Regulations;
  - (b) entries in respect of the matters mentioned in paragraph (1)(g) and (j) and within 28 days of the date of the authorisation and notice respectively; and
  - (c) entries relating to the results of the analysis of samples taken in accordance with regulation 31 within 28 days of the day on which the result is first known to the authority.
- (4) Where it appears to a local authority that a private water supply is to be used or is being used for the first time (or for the first time after being out of use for a period of twelve months or more), that local authority shall make initial entries in the register in respect of the matters mentioned in paragraph (1) within 3 months of first becoming aware of the private water supply.
- (5) Without prejudice to paragraphs (3) and (4), the local authority shall at least once, and no later than 31st March, in each year review and bring up to date the register required to be kept by paragraph (1).
- (6) Nothing in this regulation shall require a local authority to retain a record of any information mentioned in paragraph (1) at any time more than fifteen years after the date on which the information was first entered in the register.

#### **Provision of information**

- **35.**—(1) A local authority shall make available for inspection by the public, in such places as it reasonably considers appropriate to ensure adequate accessibility, at all reasonable hours and free of charge, any register maintained by it in accordance with regulation 34.
- (2) A local authority shall afford to any person, facilities for obtaining copies of entries, on payment of reasonable charges.
  - (3) A local authority shall provide, upon reasonable request, to—
    - (a) the Scottish Ministers;
    - (b) the Scottish Environment Protection Agency;
    - (c) the Health Board in whose area the supply is located,

such information as may be required from time to time on the matters contained within the register maintained in accordance with regulation 34.

- (4) A local authority shall afford to any—
  - (a) neighbouring local authority, upon request, such information relating to an entry within the register maintained in accordance with regulation 34 as is considered necessary to enable that authority to fulfil its obligations under these Regulations; and
  - (b) to a neighbouring local authority, upon request, such information as is reasonably required to ascertain whether premises in its area are served by a private water supply.
- (5) Not later than 31st March in each year, in respect of the preceding calendar year, a local authority shall provide the Scottish Environment Protection Agency with a copy of the register required to be kept under regulation 34.
- (6) Not later than 31st March in each year, in respect of the preceding calendar year, a local authority shall provide—
  - (a) the Drinking Water Quality Regulator for Scotland(14);
  - (b) the Scottish Environment Protection Agency; and
  - (c) the Health Board in whose area the supply is located,

with a completed annual return in accordance with the form provided for that purpose by the Scottish Ministers.

(7) Paragraph (6) is without prejudice to section 16 of the Water Industry (Scotland) Act 2002(15).

#### **Information Notice on premises**

**36.** At any premises where a private water supply is supplied or used as part of a commercial or public activity, there shall be prominently displayed in a location to which the public reasonably have access, an information notice which has been provided by the monitoring local authority for that purpose.

<sup>(14)</sup> The office of the Drinking Water Quality Regulator for Scotland was established by Part 2 of the Water Industry (Scotland) Act 2002 (asp 3).

<sup>(15) 2002 (</sup>asp3), as amended by the Water Services etc. (Scotland) Act 2005 (asp 3).

#### PART XI

#### **MISCELLANEOUS**

#### Revocations and savings

- **37.**—(1) With effect from 3rd July 2006—
  - (a) the 1992 Regulations;
  - (b) the Private Water Supplies (Scotland) Amendment Regulations 1998(16); and
- (c) regulation 39(1)(c) of the Water Supply (Water Quality) (Scotland) Regulations 2001(17), are revoked.
- (2) Notwithstanding the revocation of the 1992 Regulations by paragraph (1), the following provisions shall continue to have effect on and after 3rd July 2006 as they had effect immediately before that date—
  - (a) regulation 20 (collection and analysis of samples), in respect of any sample of water from a private supply taken on or before 2nd July 2006; and
  - (b) regulation 21 (charges for sampling and analysis) in respect of expenses incurred by a council on or before 2nd July 2006.
- (3) Notwithstanding the revocation of the 1992 Regulations by paragraph (1), a local authority shall, as at 3rd July 2006, retain all information obtained in accordance with Part IV of those Regulations for a period of fifteen years from the date upon which it was obtained.

St Andrew's House, Edinburgh 19th April 2006

RHONA BRANKIN
Authorised to sign by the Scottish Ministers

<sup>(16)</sup> S.I. 1998/1856

<sup>(17)</sup> S.S.I. 2001/207. Regulation 39(1)(c) revokes regulation 23(b) of the Private Water Supplies (Scotland) Regulations 1992 (S.I. 1992/575).

#### SCHEDULE 1

Regulations 2(1), 7, 8, 17-26 and 28

#### PRESCRIBED CONCENTRATIONS AND VALUES

**Table A**Microbiological parameters

### Part I: Directive requirements

(1)	(2)	(3)	(4)
Item	Parameters	Concentration or Value (maximum)	Units of Measurement
1.	Enterococci	0	number/100ml
2.	Escherichia coli (E. coli)	0	number/100ml
	Part II: Natio	onal requirements	
(1)	(2)	(3)	(4)
Item	Parameters	Concentration or Value (maximum)	Units of Measurement
1.	Coliform bacteria	0	number/100ml

**Table B**Chemical parameters

### **Part I: Directive requirements**

(1)	(2)	(3)	(4)
Item	Parameters	Concentration or Value (maximum)	Units of Measurement
1.	Acrylamide(i)	0.10	μg/1
2.	Antimony	5.0	μgSb/l
3.	Arsenic	10	μgAs/l
4.	Benzene	1.0	μg/l
5.	Benzo(a)pyrene	0.010	μg/l
6.	Boron	1.0	mgB/l
7.	Bromate	10	$\mu g Br O_3/l$
8.	Cadmium	5.0	μgCd/l

(1)	(2)	(3)	(4)
Item	Parameters	Concentration or Value (maximum)	Units of Measurement
9.	Chromium	50	μgCr/l
10.	Copper	2.0	mg Cu/l
11.	Cyanide	50	$\mu gCN/l$
12.	1,2 dichloroethane	3.0	$\mu g/l$
13.	Epichlorohydrin(i)	0.10	$\mu g/l$
14.	Fluoride	1.5	mg F/l
15.	Lead	(a) (a) 25, from 3/7/06 until 24/12/13	μgPb/l
		(b) (b) 10, from 25/12/13	$\mu g P b / l$
16.	Mercury	1.0	$\mu g H g / l$
17.	Nickel	20	$\mu g Ni/l$
18.	Nitrate	50	$mgNO_3/l$
19.	Nitrite	0.50	$mgNO_2/l$
20.	Pesticides(ii)-		
	Aldrin	0.030	μg/l
	Dieldrin	0.030	$\mu g/l$
	Heptachlor	0.030	$\mu g/l$
	Heptachlor epoxide	0.030	$\mu g/l$
	other pesticides	0.10	$\mu g/l$
21.	Pesticides: Total(iii)	0.50	$\mu g/l$
22.	PAH(iv)	0.10	$\mu g/l$
23.	Selenium	10	$\mu g S e / l$
24.	Tetrachloroethene & Trichloroethene(v)	10	$\mu g/l$
25.	THM: Total(vi)	100	$\mu g/l$
26.	Vinyl chloride(i)	0.50	μg/l

Notes:

(ii)

(iii)

(iv)

The parametric value refers to the residual monomer concentration in the water as calculated according to specifications of the maximum release from the corresponding polymer in contact with the water. This is controlled by product specification. See the definition of "pesticides and related products" in regulation 2(1). The parametric value applies to each individual pesticide. "Pesticides: Total" means the sum of the concentrations of the individual pesticides detected and quantified in the monitoring procedure. "PAH" means Polycyclic Aromatic Hydrocarbons, the specified compounds being: (i)

Status: This is the original version (as it was originally made).

- benzo(b)fluoranthene

benzo(k)fluoranthene
 benzo(ghi)perylene
 indeno(1,2,3-cd)pyrene.

The parametric value applies to the sum of the concentrations of the individual compounds detected and quantified in the monitoring process.

- The parametric value applies to the sum of the concentrations of the individual compounds detected and quantified in the monitoring process.

  "THM: Total" means total Trihalomethanes, the specified compounds being:

   chloroform
- (vi)

  - bromoform dibromochloromethane
  - bromodichloromethane.

The parametric value applies to the sum of the concentrations of the individual compounds detected and quantified in the monitoring process.

Part II: National requirements

(1)	(2)	(3)	(4)
Item	Parameters	Concentration or Value (maximum unless otherwise stated))	Units of Measurement
1.	Aluminium	200	μgA1/1
2.	Colour	20	mg/l Pt/Co
3.	Hydrogen ion	9.5	pH value
		6.5 (minimum)	
4.	Iron	200	μgFe/l
5.	Manganese	50	$\mu g M n / l$
6.	Odour	3 at 25°C	Dilution number
7.	Silver(i)	10	μg Ag/l
8.	Sodium	200	mgNa/l
9.	Taste	3 at 25°C	Dilution number
10.	Tetrachloromethane	3	μg/l
11.	Turbidity(ii)	4	NTU
12.	Zinc	5000	μg Zn/l

Notes:

If Silver is used in a water treatment process, 80 may be substituted for 10. Every effort should be made to achieve 1 NTU whenever possible.

<sup>(</sup>i) (ii)

**Table C** Indicator parameters

#### **Directive requirements**

(1)	(2)	(3)	(4)
Item	Parameters	Concentration or Value (maximum) or State	Units of Measurement
1.	Ammonium	0.50	mgNH <sub>4</sub> /l
2.	Chloride(i)	250	mgC1/1
3.	Clostridium perfringens (including spores)	0	Number/100 ml
4.	Coliform bacteria	0	Number/100 ml
5.	Colony count	No abnormal change	Number/1 ml at 22°C
6.	Conductivity(i)	2500	μS/cm at 20°C
7.	Sulphate(i)	250	$mgSO_4/l$
8.	Total indicative dose (for radioactivity)(ii)	0.10	mSv/year
9.	Total organic carbon (TOC)	No abnormal change	mgC/l
10.	Tritium (for radioactivity)	100	Bq/l

Notes:

(i) (ii)

The water should not be aggressive. Excluding tritium, potassium – 40, radon and radon decay products.

**Table D** Microbiological and Chemical Parameters: Type B Supplies

#### **National Requirements**

(1)	(2)	(3)	(4)
Item	Parameters	Concentration or Value (maximum)	Units of Measurement
1.	Coliform Bacteria	0	number/100ml
2.	Conductivity (i)	2500	μS/cm at 20°C
3.	Enterococci	0	number/100ml
N-4			

The water should not be aggressive.

Status: This is the original version (as it was originally made).

(1)	(2)	(3)	(4)
Item	Parameters	Concentration or Value (maximum)	Units of Measurement
4.	Escherichia coli (E.coli)	0	number/100ml
5.	Hydrogen ion	9.5	pH value
		6.5 (minimum)	
6.	Lead	(a) (a) 25, from 3/7/06 until 24/12/13 (b) 10, from	μgPb/l
		25/12/13	
7.	Nitrate	50	mgNO3/l
8.	Odour-qualitative		
9.	Taste-qualitative		
10.	Turbidity	4	NTU

## SCHEDULE 2 Regulations 21-23, 29 and 30

## Table A

PARAMETERS, MONITORING AND SAMPLING FREQUENCIES

Check Monitoring: Type A Supplies

		Annual sampling frequency (iv)(v)  Volume of water distributed or produced each day within a supply zone $(m^3)$ (ii)(iii)		
(1)	(2)	(3)	(4)	(5)
Item	Parameter	≤100	> 100-	> 1000
		Level 1	≤1000	Level 3(i)
			Level 2	
1.	Aluminium (vi)	1	4(2)	X(X/2)
2.	Ammonium	1	4(2)	X(X/2)
3.	Clostridium perfringens (vii)	1	4	X

		Volume of wo	pling frequency (iv)(v) vater distributed or produced each day variety zone (m³)(ii)(iii)		
(1)	(2)	(3)	(4)	(5)	
Item	Parameter	≤100	> 100-	> 1000	
		Level 1	≤1000	Level 3(i)	
			Level 2		
	(including spores)				
4.	Coliform bacteria	1	4	X	
5.	Colony counts	1	4	X	
6.	Colour	1	4(2)	X(X/2)	
7.	Conductivity	1	4(2)	X(X/2)	
8.	Escherichia coli (E.coli)	1	4	X	
9.	Hydrogen ion	1	(2)	X(X/2)	
10.	Iron (vi)	1	4(2)	X(X/2)	
11.	Nitrite (viii)	1	4(2)	X(X/2)	
12.	Odour	1	4(2)	X(X/2)	
13.	Taste	1	4(2)	X(X/2)	
14.	Turbidity	1	4	X	

#### Notes:

The sampling frequency (X) shall be determined as X = 4 + (3 for each 1,000 m3/d and part thereof of the total volume). A supply zone is a geographically defined area within which water intended for human (i)

(ii) consumption comes from one or more sources and within which water quality may be

considered as being approximately uniform.

The volumes are calculated as averages taken over a calendar year or using consumption based on the number of inhabitants, assuming a water consumption rate of 200 l/day/capita. Values in (brackets) in columns (4) and (5) are reduced sampling frequencies which may be (iii)

(iv) applied if-

the values of the results obtained from samples taken during a period of at least two successive years are constant and significantly better than the limits laid down in Schedule 1, and

no factor is likely to cause a deterioration of the quality of the water.

As far as possible, the number of samples should be distributed equally in time and location and should be representative of the quality of water consumed or available for consumption throughout the year.

(vi) Necessary only when used as a flocculant. In all other cases the parameter will be sampled according to the frequency specified for audit monitoring (Table B of Schedule 2).
 (vii) Necessary only if the water originates from, or is influenced by, surface water. In all other cases the parameter will be sampled according to the frequency specified for audit monitoring (Table B of Schedule 2).
 (viii) Necessary only when observation is used as a disinfector. In all other cases the parameter will be sampled according to the frequency specified for audit monitoring (Table B of Schedule 2).

(viii) Necessary only when chloramination is used as a disinfectant. In all other cases the parameter will be sampled according to the frequency specified for audit monitoring (Table B of Schedule 2).

Table B Audit Monitoring: Type A Supplies

		Annual sampling frequency Volume of water distributed or produced each day within a supply zone $(m^3)$ (ii)(iii)		
(1)	(2)	(3)	(4)	(5)
Item	Parameters	≤100	> 100 -	> 1000
		Level 1	≤1000	Level 3(i)
			Level 2	
1.	Acrylamide	1	1	Y
2.	Aluminium	1	1	Y
3.	Antimony	1	1	Y
1.	Arsenic	1	1	Y
5.	Benzene	1	1	Y
	Benzo(a)pyrene	1	1	Y
•	Boron	1	1	Y
	Bromate	1	1	Y
).	Cadmium	1	1	Y
0.	Chloride	1	1	Y
1.	Chromium	1	1	Y
2.	Clostridium perfringens	1	1	Y
	(including spores)	)		
3.	Copper	1	1	Y
4.	Cyanide	1	1	Y
5.	1,2 dichloroethane	1	1	Y
16.	Enterococci	1	1	Y

Volume of water supplied each day (m <sup>3</sup> )	Y
> 1000 - \le 10,000	$1 + (1 \text{ for each } 3,300 \text{ m}^3/\text{d} \text{ and part thereof of total volume})$
> 10,000 - \le 100,000	$3 + (1 \text{ for each } 10,000 \text{ m}^3/\text{d} \text{ and part thereof of total volume})$
> 100,000	$10 + (1 \text{ for each } 25,000 \text{ m}^3/\text{d} \text{ and part thereof of total volume})$

		Annual sampling frequency Volume of water distributed or produced each day within a supply zone (m³)(ii)(iii)		
(1)	(2)	(3)	(4)	(5)
Item	Parameters	≤100 Level 1	> 100 - ≤1000	> 1000 Level 3(i)
		17.	Epichlorohydrin	1
18.	Fluoride	1	1	Y
19.	Iron	1	1	Y
20.	Lead	1	1	Y
21.	Manganese	1	1	Y
22.	Mercury	1	1	Y
23.	Nickel	1	1	Y
24.	Nitrate	1	1	Y
25.	Nitrite	1	1	Y
26.	Pesticides	1	1	Y
27.	Pesticides – Total	1	1	Y
28.	Polycyclic Aromatic Hydrocarbons	1	1	Y
29.	Selenium	1	1	Y
30.	Silver	1	1	Y
31.	Sodium	1	1	Y
32.	Sulphate	1	1	Y
33.	Tetrachloroethene and Trichloroethene	1	1	Y
34.	Tetrachloromethan	e1	1	Y

Notes: (i) The sampling frequency (Y) shall be determined by—

<i>Volume of water supplied each day (m³)</i>	Y		
> 1000 - \le 10,000	$1 + (1 \text{ for each } 3,300 \text{ m}^3/\text{d} \text{ and part thereof of total volume})$		
> 10,000 - \le 100,000	$3 + (1 \text{ for each } 10,000 \text{ m}^3/\text{d} \text{ and part thereof of total volume})$		
> 100,000	$10 + (1 \text{ for each } 25,000 \text{ m}^3/\text{d} \text{ and part thereof of total volume})$		

		Annual sampling frequency Volume of water distributed or produced each day within a supply zone $(m^3)$ (ii)(iii)		
(1)	(2)	(3)	(4)	(5)
Item	Parameters	≤100	> 100 -	> 1000 Level 3(i)
		Level 1	≤1000	
			Level 2	
35.	Total indicative dose	1	1	Y
36.	Total organic carbon	1	1	Y
37.	Trihalomethanes  – Total	1	1	Y
38.	Tritium	1	1	Y
39.	Vinyl chloride	1	1	Y
40.	Zinc	1	1	Y

# Volume of water supplied each day $(m^3)$ Y > 1000 − ≤ 10,000 1 + (1 for each 3,300 m³/d and part thereof of total volume) > 10,000 − ≤ 100,000 3 + (1 for each 10,000 m³/d and part thereof of total volume) > 100,000 10 + (1 for each 25,000 m³/d and part thereof of total volume)

# Table C

# Routine Monitoring: Type B Supplies

#### Parameters

- 1. Coliform bacteria
- 2. Conductivity
- 3. Enterococci
- 4. Escherichia coli (E. coli)
- 5. Hydrogen ion
- 6. Lead
- 7. Nitrate(i)
- 8. Odour qualitative(ii)
- 9. Taste qualitative(ii)

#### 10. Turbidity

#### Notes:

- (i) Samples need not be analysed for nitrate if there are reasonable grounds for believing that nitrate levels in the locality concerned are below 25 mg NO3/l.
- (ii) Samples should not be assessed qualitatively if there are reasonable grounds for suspecting that the water may give rise to a health hazard.

#### SCHEDULE 3

Regulation 26

# CIRCUMSTANCES AND CONDITIONS TO BE CONSIDERED BY A MONITORING LOCAL AUTHORITY: DECISION ON AUDIT MONITORING

- (1) Where a monitoring local authority carries out an investigation in relation to a Type A supply for the purposes of regulation 26, it shall do so in accordance with the provisions of this Schedule and shall take into account the matters specified in Schedule 4.
- (2) Where a monitoring local authority considers that one or more of the parameters listed in the Table in this Schedule is not likely to be present in a Type A supply in its area in concentrations which could lead to the risk of a breach of the parametric value in respect of the parameters specified in Table B of Schedule 2, it shall undertake such investigations as are considers reasonable to satisfy itself—
  - (a) that the circumstances referred to in column 3 of the Table in this Schedule in respect of that parameter do not exist; and
  - (b) whether any of the conditions referred to in column 4 of the Table in this Schedule in respect of that parameter, apply.
- (3) Where a monitoring local authority is satisfied, as a result of its investigations under paragraph (2), that in respect of the supply, one or more of the parameters referred to in column 2 of the Table in this Schedule is not likely to be present in that supply in concentrations which could lead to the risk of a breach of the said parametric value in respect of such parameters, it may make a decision in accordance with regulation 26.

#### **Table**

(1)	(2)	(3)	(4)
Item No.	Parameter	Circumstances in which parameter is likely to be present	Conditions to be satisfied before a decision may be made
(1)	Acrylamide	<ul> <li>Residual acrylamide monomer occurs in polyacrylamide coagulants used in drinking water treatment.</li> <li>May also be used as</li> </ul>	<ul> <li>Coagulation is not practised.</li> <li>Grouting agents are present but that they do not have an acrylamide content.</li> </ul>
		3.9	

(1)	(2)	(3)	(4)
Item No.	Parameter	Circumstances in which parameter is likely to be present	Conditions to be satisfied before a decision may be made
		grouting agents (polyacrylamide) in wells/borehole linings.	
(2)	Aluminium	<ul> <li>Aluminium salts are widely used in water treatment as coagulants to reduce organic matter, colour, turbidity and micro organism levels.</li> </ul>	Coagulation is not practised.
(3)	Antimony	<ul> <li>Most common source of antinomy in drinking water appears to be dissolution from metal plumbing fittings.</li> </ul>	• If the monitoring local authority is satisfied that antimony is not present at or above 75% of PCV then an exemption may be granted under regulation 26, otherwise it should be sampled for at the frequency specified in Schedule 2.
(4)	Arsenic	<ul> <li>Arsenic is introduced into drinking water sources primarily through the dissolution of naturally occurring minerals and ores.</li> <li>Arsenic in drinking water is a significant source of health</li> </ul>	• If the monitoring local authority is satisfied that arsenic is not present at or above 75% of PCV, then an exemption may be granted under regulation 26, otherwise it should be sampled for at the frequency

(1)	(2)	(3)	(4)
Item No.	Parameter	Circumstances in which parameter is likely to be present	Conditions to be satisfied before a decision may be made
		effects in some areas.  • Arsenic is considered to be a high-priority substance for screening in drinking water sources.  • Concentrations are highly dependent on the depth to which a well or borehole is sunk.	specified in Schedule 2.
(5)	Benzene	<ul> <li>Benzene is used principally in the production of other organic chemicals.</li> <li>As benzene is present in petrol, vehicular emissions constitute the main source of the chemical in the environment.</li> <li>Benzene may be introduced into water by industrial effluents and atmospheric pollution.</li> </ul>	<ul> <li>Where the source of the supply comprises groundwater (well, spring, borehole or similar) the area in which the source is located must be an area devoid of industrial activity (current or historic) or hydrocarbon stores (current or historic) eg, underground petroleum tanks.</li> <li>Where the source of the supply comprises surface water, the area in which the source is located must be an area remote from areas of industrial activity (current or historic)</li> </ul>

(2)	(3)	(4)
Parameter	Circumstances in which parameter is likely to be present	Conditions to be satisfied before a decision may be made
		or remote from areas of high vehicular activity.
Benzo(a)pyrene	• See PAH	• See PAH
Boron	• Boron is found naturally in groundwater but its presence in surface water is frequently a consequence of the discharge of treated sewage effluent, in which it arises from its use in detergents, to surface water.	• If the monitoring local authority is satisfied that Boron is not present at or above 75% of PCV, then an exemption may be granted under regulation 26, otherwise it should be sampled for at the frequency specified in Schedule 2.
Bromate	<ul> <li>Bromate is not normally found in water but may be formed during ozonation when the bromide ion is present in water.</li> <li>Under certain conditions bromate may also be found in concentrated hypochlorite solutions used to disinfect drinking water including electrolytic production of chlorine from</li> </ul>	No ozonation or chlorination to be undertaken on the supply.
	Parameter  Benzo(a)pyrene Boron	Benzo(a)pyrene Boron  - See PAH  - Boron is found naturally in groundwater but its presence in surface water is frequently a consequence of the discharge of treated sewage effluent, in which it arises from its use in detergents, to surface water.  - Bromate  - Bromate is not normally found in water but may be formed during ozonation when the bromide ion is present in water.  - Under certain conditions bromate may also be found in concentrated hypochlorite solutions used to disinfect drinking water including electrolytic

(1)	(2)	(3)	(4)
Item No.	Parameter	Circumstances in which parameter is likely to be present	Conditions to be satisfied before a decision may be made
(9)	Cadmium	<ul> <li>Cadmium is released into the environment in wastewater.</li> <li>Diffuse pollution is also caused by contamination from fertilizers and local air pollution.</li> <li>Contamination in drinking water may also be caused by impurities in the zinc of galvanised pipes and solders and some metal fittings.</li> </ul>	• If the monitoring local authority is satisfied that Cadmium is not present at or above 75% of PCV, then an exemption may be granted under regulation 26, otherwise it should be sampled for at the frequency specified in Schedule 2.
(10)	Chromium	• Chromium is widely distributed in the Earth's crust. Soils and rocks may contain small amounts.	• If the monitoring local authority is satisfied that Chromium is not present at or above 75% of PCV, then an exemption may be granted under regulation 26, otherwise it should be sampled for at the frequency specified in Schedule 2.
(11)	Copper	<ul> <li>Copper concentrations in drinking water vary widely with the primary source most often being the corrosion of</li> </ul>	• If the monitoring local authority is satisfied that Copper is not present at or above 75% of PCV, then an exemption may be granted under

(1)	(2)	(3)	(4)
Item No.	Parameter	Circumstances in which parameter is likely to be present	Conditions to be satisfied before a decision may be made
		interior copper plumbing.  Copper concentrations in treated water often increase during distribution, especially in systems with an acid pH or high carbonate waters with an alkaline pH.  Consumption of standing or partially flushed water from a distribution system that includes copper pipes or fittings can considerably increase total daily copper exposure, especially for infants fed formula reconstituted with tap water.	regulation 26, otherwise it should be sampled for at the frequency specified in Schedule 2.
(12)	Cyanide	Cyanides are occasionally found in drinking water primarily as a consequence of industrial contamination.	• If the monitoring local authority is satisfied that Cyanide is not present at or above 75% of PCV, then an exemption may be granted under regulation 26, otherwise it should be sampled for at the frequency

(1)	(2)	(3)	(4)
Item No.	Parameter	Circumstances in which parameter is likely to be present	Conditions to be satisfied before a decision may be made
			specified in Schedule 2.
(13)	1,2 dichloroethane	<ul> <li>1,2 dichloroethane is used mainly as an intermediate in the production of vinyl chloride and other chemicals and to a lesser extent as a solvent.</li> <li>It may enter surface waters via effluents from industries that manufacture or use the substance.</li> <li>It may also enter groundwater, where it persists for long periods, following disposal in waste sites.</li> </ul>	• If the monitoring local authority is satisfied that 1,2 dichloroethane is not present at or above 75% of PCV, then an exemption may be granted under regulation 26, otherwise it should be sampled for at the frequency specified in Schedule 2.
(14)	Epichlorohydrin	<ul> <li>Epichlorohydrin is used for the manufacture of glycerol, unmodified epoxy resins and water treatment resins.</li> <li>It is also found in some polyamine flocculants.</li> </ul>	<ul> <li>Coagulation is not practiced using polyamine flocculants.</li> <li>If ion exchange resins are present in the system then it should be sampled for against the prescribed frequency specified in Schedule 2.</li> </ul>
(15)	Fluoride	• Fluoride is present in a number of minerals.	• If the monitoring local authority is satisfied that Fluoride is not present at or

(1)	(2)	(3)	(4)
Item No.	Parameter	Circumstances in which parameter is likely to be present	Conditions to be satisfied before a decision may be made
		Fluoride may also be present in phosphate fertilizers.	above 75% of PCV, then an exemption may be granted under regulation 26, otherwise it should be sampled for at the frequency specified in Schedule 2.
(16)	Iron	<ul> <li>Iron is found in natural fresh waters.</li> <li>Iron may also be present in drinking water as a result of iron coagulants or the corrosion of steel and cast iron pipes during water distribution.</li> </ul>	• If the monitoring local authority is satisfied that Iron is not present at or above 75% of PCV, then an exemption may be granted under regulation 26, otherwise it should be sampled for at the frequency specified in Schedule 2.
(17)	Lead	<ul> <li>Lead is rarely present in tap water as a result of its dissolution from natural sources.</li> <li>The presence of lead is primarily from household plumbing systems containing lead in pipes, solder, fittings or the service connections to homes.</li> </ul>	• If the monitoring local authority is satisfied that Lead is not present at or above 75% of PCV, then an exemption may be granted under regulation 26, otherwise it should be sampled for at the frequency specified in Schedule 2.
(18)	Manganese	<ul> <li>Manganese is naturally</li> </ul>	• If the monitoring local authority

(1)	(2)	(3)	(4)
Item No.	Parameter	Circumstances in which parameter is likely to be present	Conditions to be satisfied before a decision may be made
		occurring in many surface and groundwater sources, particularly in anaerobic or low oxidation conditions.  • Manganese greensands are used in some locations for potable water treatment.	is satisfied that Manganese is not present at or above 75% of PCV, then an exemption may be granted under regulation 26, otherwise it should be sampled for at the frequency specified in Schedule 2.
(19)	Mercury	<ul> <li>Mercury can be used in the electrolytic production of chlorine.</li> </ul>	• If electrolytic production of chlorine is used as part of the treatment process the supply should be sampled as specified in Schedule 2;
			• if electrolytic production of chlorine is not used as part of the treatment process, and if the monitoring local authority is satisfied that mercury is not present at or above 75% of PCV, then an exemption under regulation 26 may be granted, otherwise it should be sampled for at the frequency

(1)	(2)	(3)	(4)
Item No.	Parameter	Circumstances in which parameter is likely to be present	Conditions to be satisfied before a decision may be made
			specified in Schedule 2.
(20)	Nickel	Nickel may be present as a result of plumbing fittings eg from nickel-or chromium-plated taps.	• If the monitoring local authority is satisfied that Nickel is not present at or above 75% of PCV, then an exemption may be granted under regulation 26, otherwise it should be sampled for at the frequency specified in Schedule 2.
(21)	Nitrate	• Nitrate is used mainly in inorganic fertilisers. The nitrate concentration in groundwater and surface water is normally low but can reach high levels as a result of leaching or runoff from agricultural land or contamination from human or animal wastes as a consequence of oxidation of ammonia or similar sources.	<ul> <li>If the supply is in an area where agricultural fertilisers are used then the supply should be sampled as specified in Schedule 2;</li> <li>if the supply is in an area where agricultural fertilisers are not used, and if the monitoring local authority is satisfied that nitrate is not present at or above 75% of PCV, then an exemption under regulation 26 may be granted, otherwise it should be sampled for at the frequency</li> </ul>

(1)	(2)	(3)	(4)
Item No.	Parameter	Circumstances in which parameter is likely to be present	Conditions to be satisfied before a decision may be made
			specified in Schedule 2.
(22)	Nitrite	• Nitrite is formed during the decomposition of organic matter but high concentrations are usually associated with poor control of chloramination or chlorine disinfection of water containing significant amounts of ammonium ions.	• If the monitoring local authority is satisfied that Nitrite is not present at or above 75% of PCV, then an exemption may be granted under regulation 26, otherwise it should be sampled for at the frequency specified in Schedule 2.
(24)	Pesticides	<ul> <li>See definition of "pesticides and related products" in regulation 2(1).</li> <li>The range of pesticides and related products that may be being used in any one area should be assessed on an individual supply basis.</li> </ul>	• If the monitoring local authority is satisfied that Pesticides are not present at or above 75% of PCV, then an exemption may be granted under regulation 26, otherwise they should be sampled for at the frequency specified in Schedule 2.
(25)	Pesticides – Total	• "Pesticides – Total" means the sum of the concentrations of the individual pesticides detected and quantified in the monitoring procedure.	See Pesticides.

(1)	(2)	(3)	(4)
Item No.	Parameter	Circumstances in which parameter is likely to be present	Conditions to be satisfied before a decision may be made
(26)	Polycyclic Aromatic Hydrocarbons (PAH)	• The main source of PAH contamination in drinking water is usually the coaltar coating of drinking water distribution pipes used to protect the pipes from corrosion.	• If the monitoring local authority is satisfied that PAH are not present at or above 75% of PCV, then an exemption may be granted under regulation 26, otherwise they should be sampled for at the frequency specified in Schedule 2.
(27)	Selenium	• Selenium is present in the Earth's crust, often in association with sulphurcontaining minerals and hence the concentration in drinking water will vary with local geology and geography.	• If the monitoring local authority is satisfied that Selenium is not present at or above 75% of PCV, then an exemption may be granted under regulation 26, otherwise it should be sampled for at the frequency specified in Schedule 2.
(28)	Silver	• Silver may be used in some water treatment devices where it is used for disinfection purposes.	• If the monitoring local authority is satisfied that Silver is not present at or above 75% of PCV, then an exemption may be granted under regulation 26, otherwise it should be sampled for at

(1)	(2)	(3)	(4)
Item No.	Parameter	Circumstances in which parameter is likely to be present	Conditions to be satisfied before a decision may be made
			the frequency specified in Schedule 2.
(29)	Sodium	Concentrations in potable water are typically low but some water softeners can add significantly to the sodium content of drinking water.	• If the monitoring local authority is satisfied that Sodium is not present at or above 75% of PCV, then an exemption may be granted under regulation 26, otherwise it should be sampled for at the frequency specified in Schedule 2.
(30)	Sulphate	<ul> <li>Sulphates         occur naturally         in numerous         minerals         and are used         commercially         but the highest         levels found in         groundwaters         are from natural         sources.</li> <li>Sulphates may         occur in surface         waters that         have received         industrial         discharges.</li> </ul>	• If the monitoring local authority is satisfied that Sulphate is not present at or above 75% of PCV, then an exemption may be granted under regulation 26, otherwise it should be sampled for at the frequency specified in Schedule 2.
(31)	Tetrachloroethene and Trichloroethene	• These chemicals are used primarily as solvents in dry cleaning industries and as degreasing solvents.	• If the monitoring local authority is satisfied that Tetrachloroethene and Trichloroethene are not present at or above 75% of PCV, then an

(1)	(2)	(3)	(4)
Item No.	Parameter	Circumstances in which parameter is likely to be present	Conditions to be satisfied before a decision may be made
			exemption may be granted under regulation 26, otherwise they should be sampled for at the frequency specified in Schedule 2.
(32)	Tetrachloromethane	• Chlorinated organic compound (also known as carbon tetrachloride) that is a very efficient solvent for fats and greases, and was at one time the main constituent of household dry-cleaning fluids and of fire extinguishers used with electrical and petrol fires.	• If the monitoring local authority is satisfied that Tetrachloromethane is not present at or above 75% of PCV, then an exemption may be granted under regulation 26, otherwise it should be sampled for at the frequency specified in Schedule 2.
(33)	Total indicative dose	• Routine monitoring for Total indicative dose is achieved through screening for gross alpha and gross beta.	• If a monitoring local authority is satisfied that on the basis of other monitoring carried out, the Total indicative dose in a supply is well below the prescribed value, the authority may seek a regulation 24 notice from the Scottish Ministers confirming that the supply need not be monitored

(1)	(2)	(3)	(4)
Item No.	Parameter	Circumstances in which parameter is likely to be present	Conditions to be satisfied before a decision may be made
			in respect of Total indicative dose.
(34)	Trihalomethanes – Total	• These compounds are generated principally as by-products of the chlorination of drinking water, being formed from naturally occurring organic compounds.	No chlorination is undertaken on the supply.
(35)	Tritium	• Tritium is produced naturally in the upper atmosphere when cosmic rays strike air molecules. Tritium is also produced during nuclear weapons explosions, as a by-product in reactors producing electricity, and in special production reactors, where the isotope Lithium-6 is bombarded to produce Tritium.	• If a monitoring local authority is satisfied that on the basis of other monitoring carried out, the level of Tritium in a supply is well below the prescribed value, the authority may seek a regulation 24 notice from the Scottish Ministers confirming that the supply need not be monitored for Tritium.
(36)	Vinyl chloride	<ul> <li>Vinyl chloride is used primarily for the production of PVC.</li> <li>When unplasticised</li> </ul>	<ul> <li>Unplasticised PVC pipes not present.</li> <li>If the monitoring local authority is satisfied that Vinyl chloride</li> </ul>

(1)	(2)	(3)	(4)
Item No.	Parameter	Circumstances in which parameter is likely to be present	Conditions to be satisfied before a decision may be made
		PVC is in contact with water it is possible for the vinyl chloride monomer to be released into the water.  • Unplasticised PVC pipes should not be used for drinking water supplies. This is controlled by product specification.	is not present at or above 75% of PCV, then an exemption may be granted under regulation 26, otherwise it should be sampled for at the frequency specified in Schedule 2.
(37)	Zinc	• Traces of zinc occur naturally in many water sources but significant concentrations may occur as a consequence of the use of brass fittings and galvanised iron pipes.	• If the monitoring local authority is satisfied that Zinc is not present at or above 75% of PCV, then an exemption may be granted under regulation 26, otherwise it should be sampled for at the frequency specified in Schedule 2.

#### **SCHEDULE 4**

Regulations 16 and 26 and 27  $\,$ 

# REQUIREMENTS FOR RISK ASSESSMENT

- (1) When undertaking or reviewing and updating a risk assessment for the purposes of regulations 16 and 27, a monitoring local authority shall do so in accordance with the provisions of this Schedule.
  - (2) A risk assessment shall comprise the following-
    - (a) documentation on and a description of the private water supply, including the catchment from which the supply draws water;
    - (b) a hazard assessment and risk characterisation;

- (c) an identification of the measures by which risks may be controlled; and
- (d) establishment of verification procedures,

and for the purposes of this paragraph, "hazard" means a biological, chemical, physical or radiological agent that has the potential to cause harm or danger to human health; and "risk" means the likelihood of identified hazards causing harm in exposed populations in a specified time, including the magnitude of that harm and/or the consequences of such harm.

- (3) In respect of a private water supply which comprises, either alone or in any combination thereof, catchments, surface water or ground water, the risk assessment shall include provision in relation to the relevant matters specified in Table A of this Schedule.
- (4) In respect of a private water supply which receives treatment, including treatment at source and at any point thereafter, the risk assessment shall make provision in relation to the relevant matters specified in Table B of this Schedule.
- (5) In respect of a private water supply which comprises intermediate tanks and distribution, the risk assessment shall include provision in relation to the relevant matters specified in Table C of this Schedule.

Table A

Hazard Information and Risk Characterisation

(1)	(2)
Source of private water supply	Information to be considered in the risk assessment
(1) Catchments	<ul> <li>(i) geology and hydrology</li> <li>(ii) meteorology and weather patterns</li> <li>(iii) general catchment and river health</li> <li>(iv) wildlife</li> <li>(v) competing water uses</li> <li>(vi) nature and intensity of development and land use</li> <li>(vii) other activities in the catchment that potentially release contaminants into source water</li> <li>(viii) planned future activities</li> </ul>
(2) Surface water	<ul> <li>(i) description of water body type (e.g. river, reservoir, dam)</li> <li>(ii) flow and reliability of source water</li> <li>(iii) retention times</li> <li>(iv) water constituents (physical, chemical, microbial)</li> <li>(v) protection (e.g. enclosures, access)</li> <li>(vi) recreational and other human activity</li> <li>(vii) bulk water transport</li> </ul>
(3) Groundwater	<ul> <li>(i) confined or unconfined aquifer</li> <li>(ii) aquifer hydrogeology</li> <li>(iii) flow rate and direction</li> <li>(iv) dilution characteristics</li> <li>(v) recharge area</li> <li>(vi) wellhead protection</li> </ul>

(1)	(2)
Source of private water supply	Information to be considered in the risk assessment
	(vii) depth of casing (viii) bulk water transport

Table B

# Treatment: Hazard Identification and Risk Characterisation

- (i) treatment processes
- (ii) equipment design
- (iii) monitoring equipment and automation
- (iv) water treatment chemicals used
- (v) treatment efficiencies
- (vi) disinfection removals of pathogens
- (vii) disinfection residuals/contact time
- (viii)

#### Table C

# Intermediate Tanks and Distribution: Hazard Identification and Risk Characterisation

- (i) reservoir/tank design
- (ii) retention times
- (iii) seasonal variations
- (iv) protection (e.g. covers, enclosures, access)
- (v) distribution system design
- (vi) hydraulic conditions (e.g. water age, pressures, flows)
- (vii) backflow protection
- (viii) disinfectant residuals

# SCHEDULE 5

Regulations 22, 29 and 31  $\,$ 

# ANALYTICAL METHODOLOGY

 $\label{eq:approx} \textbf{Table A}$  Parameters for which, subject to regulation 31(4), methods of analysis are prescribed

(1)	(2)	
Parameter	Method	
Clostridium perfringens (including spores)	Membrane filtration followed by anaerobic incubation of the membrane on m–CP agar(i) at $44 \pm 1$ °C for $21 \pm 3$ hours. Count opaque yellow colonies that turn pink or red after exposure to ammonium hydroxide vapours for 20 to 30 seconds.	
Coliform bacteria	ISO 9308-1	
Colony count 22°C – enumeration of culturable micro-organisms	prEN ISO 6222	
Enterococci	ISO 7899–2	
Escherichia coli (E.coli)	ISO 9308-1	
(i) The composition of m-CP agar is: Basal medium		
Tryptose	30g	
Yeast extract	20g	
Sucrose	5g	
L-cysteine	1g	
MgSO4 . 7H2O	0.1g	
Bromocresol purple	40mg	
Agar	15g	
Water	1,000ml	
Dissolve the ingredients of the basal 121°C for 15 minutes. Allow the med	medium, adjust pH to 7.6 and autoclave at dium to cool and add:	
D-cycloserine	400mg	
Polymyxine-B-sulphate	25mg	
Indoxyl–β-D-glucoside	60mg	
to be dissolved in 8ml sterile water before addit	ion	
Filter – sterilised 0.5% phenolphthalein disphos solution	phate 20ml	
Filter – sterilised 4.5% FeC13 . 6H2O	2ml	

Table B Parameters in relation to which methods of analysis must satisfy prescribed characteristics

(1)	(2)	(3)	(4)	(5)
Item No.	Parameters	Trueness % of prescribed concentration or value or specification	Precision % of prescribed concentration or value or specification	Limit of detection % of prescribed concentration or value or specification
1.	Aluminium	10	10	10
2.	Ammonium	10	10	10
3.	Antimony	25	25	25
4.	Arsenic	10	10	10
5.	Benzene	25	25	25
6.	Benzo(a)pyrene	25	25	25
7.	Boron	10	10	10
8.	Bromate	25	25	25
9.	Cadmium	10	10	10
10.	Chloride	10	10	10
11.	Chromium	10	10	10
12.	Colour	10	10	10
13.	Conductivity	10	10	10
14.	Copper	10	10	10
15.	Cyanide(i)	10	10	10
16.	1,2– dichloroethane	25	25	25
17.	Fluoride	10	10	10
18.	Iron	10	10	10
19.	Lead	10	10	10
20.	Manganese	10	10	10
21.	Mercury	20	10	20

# Notes:

- The method of analysis should determine total cyanide in all forms. The performance characteristics apply to each individual pesticide and will depend on the pesticide concerned.

  The performance characteristics apply to the individual substances specified at 25% of the parametric value in Table B in Schedule 1. The performance characteristics apply to the individual substances specified at 50% of the parametric value in Table B in Schedule 1. The performance characteristics apply to the prescribed value of 4NTU. (i) (ii)
- (iii)
- (iv)
- (v)

(1)	(2)	(3)	(4)	(5)
Item No.	Parameters	Trueness % of prescribed concentration or value or specification	Precision % of prescribed concentration or value or specification	Limit of detection % of prescribed concentration or value or specification
22.	Nickel	10	10	10
23.	Nitrate	10	10	10
24.	Nitrite	10	10	10
25.	Pesticides and related products(ii)	25	25	25
26.	Polycyclic aromatic hydrocarbons(iii	25	25	25
27.	Selenium	10	10	10
28.	Sodium	10	10	10
29.	Sulphate	10	10	10
30.	Tetrachloroether	ne( <b>i</b> 2)5	25	10
31.	Tetrachlorometh	ane20	20	20
32.	Trichloroethene(	(iv) 25	25	10
33.	Trihalomethanes	:To <b>2al(iii)</b>	25	10
34.	Turbidity(v)	10	10	10

#### Notes:

- The method of analysis should determine total cyanide in all forms. The performance characteristics apply to each individual pesticide and will depend on the pesticide concerned.

  The performance characteristics apply to the individual substances specified at 25% of the parametric value in Table B in Schedule 1. The performance characteristics apply to the individual substances specified at 50% of the parametric value in Table B in Schedule 1. The performance characteristics apply to the prescribed value of 4NTU.
- (iv)

# **EXPLANATORY NOTE**

(This note is not part of the Regulations)

These Regulations supplement Part VIA (quality of water) of the Water (Scotland) Act 1980 ("the 1980 Act") and are directed at the achievement of the objective set out in article 1(2) of Council Directive 98/83/EC (O.J. No. L 330, 5.12.98, p.32) on the quality of water intended for human

consumption ("the Directive"), namely, to protect human health from the adverse effects of any contamination of water intended for human consumption, by ensuring that it is wholesome and clean. The Regulations implement the Directive insofar as it concerns private water supplies (within the meaning of regulation 2(1)).

Part I of the Regulations provides for the Regulations to come into force on 3rd July 2006, and defines terms that are used in the Regulations. In particular, regulation 2(1) defines "private water supplies", which comprise "Type A" and "Type B" supplies.

Part II contains provisions in relation to the determination of a person to be a "relevant person", and for an appeal to the sheriff against that determination.

Part III excludes certain private water supplies from the application of the Regulations (except regulations 34(2) and 35)

Part IV contains provisions in relation to the classification of private water supplies and for the review of classifications.

Part V prescribes standards of wholesomeness in respect of Type A and Type B supplies for human consumption purposes. A supply is regarded as wholesome if it contains concentrations or values in respect of the properties, parameters, organisms and substances that do not contravene prescribed maxima or minima.

Part VI makes provision further to article 9 of the Directive to exempt Type A supplies from the wholesomeness requirements of Part V in specified circumstances, and for specified periods.

Regulation 8 requires a relevant person to make an application for an authorised departure (from the requirements of Part V) where a Type A supply is believed to fail, or likely to fail, a requirement of regulation 7(2), and specifies the matters to be included in such an application, and who requires to be notified of application. Regulation 9 provides for the application process in relation to authorised departures.

Article 9(1) of the Directive recognises that in certain circumstances it may not be possible to bring a Type A supply up to the wholesomeness standards of Part V by the end of the departure period specified under regulation 9 and regulation 10 makes provision for a second departure period. Article 9(2) of the Directive recognises that in exceptional circumstances, compliance with the requirements of Part V may not be achieved by the end of a second departure period and regulation 11 makes provision in this regard. On being satisfied there are grounds for a third departure, the Scottish Ministers shall seek from the European Commission a decision whether to grant a third departure.

Regulation 13 makes provision in relation to the persons to be notified when a departure is granted and regulation 14 makes provision in relation to the refusal of a departure, and the giving of reasons for such a refusal.

Part VI contains provision in relation to Type A supplies. It requires a monitoring local authority to carry out a risk assessment of every Type A supply in its area, and for the results of such an assessment to inform any remedial action as may be required under regulation 17 or 18. A monitoring local authority is also required to identify whether such supplies meet the requirements of Part V (or those requirements as read with the terms of any authorisation granted under Part VI). Where those requirements are not met, regulations 17 and 18 require the monitoring local authority to notify the relevant person in relation to the supply and advise of any failure attributable to a domestic distribution system. Where a failure is attributable to a domestic distribution, the responsible person in relation to that system is required to notify consumers of the supply of the steps considered by the authority necessary or desirable to take in the interests of their health. Where a failure affects a supply of water to the public, the responsible person requires to prominently display a notice advising of the steps considered by the authority necessary or desirable for consumers of the supply to take in the interests of their health.

Part VII contains provisions in relation to the monitoring of Type A supplies.

Regulation 21 requires a monitoring local authority to take and analyse the number of samples specified in Tables A and B in Schedule 2 for parameters, organisms and substances. It also makes specific provision for monitoring supplies from tankers.

Regulation 23 provides for the number of samples of Type A supplies which a monitoring local authority requires to take, and specifies the circumstances in which a reduced sampling regime applies. Regulation 24 makes provision in relation to the monitoring of tritium and total indicative dose. Regulation 25 gives powers to a monitoring local authority to sample Type A supplies for properties, elements, micro-organisms and substances not listed in Schedule 1. Regulation 26 specifies the circumstances in, and parameters in respect of which a monitoring local authority may make a decision in relation to the parameters to be subject to audit monitoring (regulation 20).

Part VIII contains provisions in relation to Type B supplies. Regulation 27 makes provision equivalent to regulation 16 (in relation to risk assessments carried out in respect of Type A supplies). Regulation 18 enables a monitoring local authority to investigate a Type B supply in its area, and Regulations 29 to 31 make provision in relation to the monitoring and sampling of Type B supplies.

Part IX contains provisions in relation to the sampling of private water supplies. Regulation 31 specifies the mechanisms for sampling, including the transportation and analysis of samples. Regulation 32 enables a monitoring local authority to take and analyse a sample from a private water supply at any time and in respect of any element, organism or substance (whether or not specified in any Schedule to the Regulations) in order to establish whether the supply is wholesome.

Regulation 33 makes provision in relation to the charges a local authority may levy in the exercise of its powers and duties under the Regulations.

Part X contains provisions an the information and records to be maintained by local authorities on private water supplies in their area and premises served by such supplies. Regulation 34 requires local authorities to hold information in the form of a register and paragraph (1) of that regulation prescribes the information to be contained in that register. Regulation 35 specifies the circumstances in which information in the register may be inspected or obtained and requires a copy of the register to be provided to SEPA annually. Regulation 36 requires all commercial premises and premises which are used as part of a public activity and which are supplied with a private water supply to prominently display at those premises a notice provided by the local authority for that purpose.

Part X (regulation 36) contains revocation and savings provisions.

There are five Schedules to the Regulations. Schedule 1 comprises Tables A to D (together with the associated notes thereto) and specifies the prescribed concentrations and values for the range of parameters which require to be investigated to determine whether a private water supply is wholesome. Schedule 2 comprises Tables A to C, and specifies the parameters, monitoring and sampling frequencies for check and audit monitoring Type A supplies, and the monitoring parameters for Type B supplies. Schedule 3 specifies the matters a local authority must consider before making a decision for the purposes of regulation 26. Schedule 4 contains the matters which a local authority requires to take into account when undertaking a risk assessment for the purposes of regulations 16 or 27. Schedule 5 prescribes the analytical methodology against which samples taken under the Regulations must be analysed.

The Regulatory Impact Assessment in relation to these Regulations has been placed in the library of the Scottish Parliament and a copy can be obtained from the Water Division, Scottish Executive Environment and Rural Affairs Department (SEERAD), Victoria Quay, Leith, Edinburgh, EH6 6QQ.