

**SHEEP DIPPING CODE OF PRACTICE FOR
SCOTTISH FARMERS, CROFTERS AND
CONTRACTORS**

Water Environment (Controlled Activities) (Scotland)
Regulations ('CAR') 2005

Version 1 July 2006

Contents

EXECUTIVE SUMMARY

USEFUL DOES AND DON'TS1

1. INTRODUCTION.....4

1.1	UPDATE OF THE CODE OF PRACTICE.....	4
1.2	THE IMPORTANCE OF SHEEP DIPPING AND THE WATER ENVIRONMENT	4
1.3	THE WATER ENVIRONMENT (CONTROLLED ACTIVITIES) (SCOTLAND) REGULATIONS 2005	4
1.4	PURPOSE OF THE CODE.....	5
1.5	RELATIONSHIP TO OTHER GUIDANCE.....	6
1.6	OTHER LEGISLATION.....	6

2. RESPONSIBLE USE OF SHEEP DIP6

2.1	ENVIRONMENTAL HAZARDS ASSOCIATED WITH SHEEP DIPS.....	6
2.2	POSSIBLE ROUTES OF CONTAMINATION	6

3. GOOD PRACTICE FOR THE SAFE USE OF SHEEP DIP8

3.1	GOOD PRACTICE – BEFORE DIPPING.....	8
3.2	GOOD PRACTICE – DURING DIPPING.....	13
3.3	GOOD PRACTICE – AFTER DIPPING.....	14

4. EMERGENCY CONTACT SHEET18

5. REFERENCES.....19

6. SEPA AND OTHER AGENCIES' ADDRESSES20

7. SCOTTISH EXECUTIVE ADDRESSES.....22

8 Glossary of Terms24

EXECUTIVE SUMMARY

This Code of Practice for Sheep Dipping provides straightforward guidance on good practice for Scottish farmers, crofters and contractors on preventing pollution of the water environment, and in particular groundwater. It applies to all operations before, during and after Sheep Dipping including purchase, transport and storage of sheep dip, siting, design and use of dippers, use of mobile dippers by contractors, ensuring authorised disposal of waste sheep dip etc. The Code is for use by any farmer, crofter or contractor involved in any aspect of sheep dipping. It is also for use by SEPA in ensuring sheep dipping practices are minimising the risk of pollution of the water environment and by SEERAD officers evaluating farming practice and Common Agricultural Policy (CAP) cross compliance as part of any farm payment scheme requirements.

The Code converts the Scottish Executive's March 2003 (Paper 2003/7) Code of Practice under the Groundwater Regulations (1998) into a document consistent with the Water Environment (Controlled Activities) (Scotland) Regulations 2005, referred to hereafter as CAR (2005). From 1st April 2006, CAR (2005) superseded both the Groundwater Regulations (1998) and parts of the Control of Pollution Act (1974), as amended (CoPA).

The Code applies to numerous activities which, if carried out in accordance with good practice, should not normally cause pollution of the water environment e.g. the transport and storage of chemicals. **All sheep dip products, including cosmetic dips and pour-ons, contain chemicals that are potentially very harmful if used incorrectly.** Significant harm to the aquatic environment, wildlife and humans can occur if such chemicals are not stored, handled, used and disposed of safely and responsibly.

The Code deals with intentional discharges of waste sheep dip to land, only through reference to the need for a licence under CAR (2005), and how to obtain such a licence. Existing (Groundwater Regulations, 1998) authorisations for disposal to land will automatically become licences under CAR (2005) and with time these will be subject to review.

The Code provides a summary of the 'Do's' and 'Don'ts' of the best practice and is then backed by an overview on the importance of both sheep dipping and the water environment, the pertinent legislation, and the link to Good Farming Practice (up to 2007), cross compliance and various farm payment schemes. A section is also provided on the hazards posed by sheep dip chemicals and the possible pathways through which sheep dip could pollute the water environment. Against this background, more detailed discussion is given on each of the possible polluting activities and best practice to reduce their risk of polluting the water environment.

USEFUL DO'S AND DON'TS

**You should alert SEPA immediately regarding any pollution incident involving sheep dip by telephoning
0800 80 70 60**

BEFORE YOU START DIPPING

DO

- Assess whether dipping is the most effective method of parasitic control
- Record all dip treatments used
- Have staff trained in the correct use of dips and dipping practice
- Carefully select sites for mobile dippers to prevent losses of sheep dip
- Routinely inspect the dip bath and other areas for signs of cracking, wear, damage or corrosion and assess the need for repair or replacement. Check that the dip bath is impermeable by filling with water and leaving overnight
- Have contingency measures in the event of spillage of dip concentrate or contamination of groundwater supplies or watercourses
- Plan your waste dip disposal by either obtaining a licence under CAR (2005) from SEPA or confirming an alternative disposal route with an approved waste contractor

DO NOT

- Transport the dip concentrate in an insecure manner
- Place the dip concentrate in an unmarked container or in unsecured storage
- Site any new dipper within 50 metres of a watercourse or within 50 metres of water supplies
- Dip when heavy or prolonged rain is forecast

DURING DIPPING OPERATIONS

DO

- Work carefully when dipping to prevent excessive splashing
- Check that drip pens and silt traps are preventing leakage or overflow and ensuring operator safety
- Offer clean, empty dip concentrate containers back to the supplier or prevent their re-use by crushing, puncturing or flattening
- Monitor weather conditions and routinely check the dip bath level to prevent overflow
- Wear appropriate Personal Protective clothing

DO NOT

- Let the dip bath overflow
- Store or accumulate part-used or empty dip concentrate containers at the dipper
- Dispose of dip concentrate containers without first rinsing them thoroughly and adding their contents to the dip bath
- Dispose of dip concentrate containers by burning or ignore your responsibilities to dispose of these safely via a licensed contractor or through the local authority waste collection service.

ONCE DIPPING HAS FINISHED

DO

- Hold dipped sheep in a drip pen for a minimum period of 10 minutes and consider turning them into an enclosed grassed paddock away from water course and water supplies for 24 hours and in accordance with the label instructions
- Comply with the conditions in the Licence issued by SEPA with respect to disposal of waste sheep dip. Use only those areas Licensed by SEPA for waste dip disposal, or else use an approved contractor, for the disposal of waste dip.
- Dilute waste dip with a minimum of 1 part waste dip solution to 3 parts water and/or slurry as soon as possible after dipping. If detoxification is being undertaken such dilution should be carried out after detoxification.
- Contractors intending to transport waste sheep dip off site should ensure that they provide notice to SEPA and complete a Special Waste Consignment note. Ensure that waste sheep dip is securely contained within the transport outfit and that all chances of spillage are minimised.
- Wash down the drip pens and Empty the dipper as soon as practicable after the cessation of dipping activities.
- When transporting waste dip for disposal, plan routes to avoid crossing watercourses and ensure container holding waste dip is leakproof.
- Dispose of waste sheep dip as soon as reasonably possible to minimise the risk of pollution due to the dipper overflowing.

DO NOT

- Let newly dipped sheep return to grazing using a route that allows them contact with springs, wells, boreholes, ditches, ponds, burns or rivers
- Transport newly dipped sheep if there is potential for runoff from the vehicle to drain into roadside ditches or gulleys.
- Leave a water hose running to the dip bath unattended
- Stockpile used dip solution, whether treated or untreated
- Use a by-pass or valve on silt traps to a drain or watercourse
- Use soakaways for the disposal of waste sheep dip
- Delay emptying the dip bath unless weather conditions do not permit safe disposal
- Drain spent dip from the dipper into slurry storage facilities.

1. INTRODUCTION

1.1 Update of the Code of Practice

This Code of Practice converts the Scottish Executive's March 2003 (Paper 2003/7) Code of Practice under the Groundwater Regulations (1998) into a document consistent with the Water Environment (Controlled Activities) (Scotland) Regulations 2005, referred to hereafter as CAR (2005). CAR (2005) supersedes both the Groundwater Regulations (1998) and much of the Control of Pollution Act (1974 as amended), (CoPA).

The update deals with this legislative change and the need to consider the water environment as a whole rather than just groundwater. Consideration has also been given to changes to legislation affecting agricultural waste

1.2 The Importance of Sheep Dipping and the Water Environment

Sheep dipping can play an important part in the maintenance of good animal welfare. The treatment chemicals used are effective against parasites, but can also be hazardous to the aquatic environment and human health if not used carefully. Using best practice and careful planning can help to reduce the amount of chemicals used, thus lowering farmer costs and reducing the risks to the water environment. **Groundwater and surface waters are interlinked and therefore pollution of one can seriously affect the quality of the other.** Groundwater is an important source of drinking water in rural areas and is essential to the maintenance of wetlands and the wider aquatic environment. Groundwater moves into watercourses and helps to maintain river flow in periods of dry weather. For the purposes of this Code, and as defined by the Water Environment and Water Services (Scotland) Act 2003 (the 'WEWS Act', 2003), groundwater is defined as all water which is below the surface of the ground in the saturation zone in direct contact with the ground or subsoil. The WEWS Act 2003 gave powers to make regulations to control activities which could affect the water environment and the Water Environment (Controlled Activities) (Scotland) Regulations (CAR) 2005 provides such regulations. **This Sheep Dipping Code takes account of these Regulations; the aim is to safeguard the quality of the water environment, by preventing the entry of sheep dip chemicals into the water environment.**

1.3 The Water Environment (Controlled Activities) (Scotland) Regulations 2005

These Regulations have been made to ensure that certain substances either do not enter, or do not cause pollution of, the water environment. Schedule 2 of the Regulations lists those substances which should not be directly or indirectly discharged into groundwater. Chemicals used to control ectoparasites on sheep (i.e. sheep dips and pour-on products) and certain cosmetic dip products (e.g. bloom dips) fall within the categories of substances listed in Schedule 2. It is the role of the Scottish Environment Protection Agency (SEPA) to ensure that these Regulations, which implement the EC Groundwater Directive and the Water Framework Directive, are followed. SEPA contact details, including the addresses of local offices, are given in SECTION 7. **If you are farming near the border with England, and your sheep dipping operation is located there, you should be aware**

that a separate Code of Practice for the use of sheep dip exists for England and Wales. The Environment Agency is responsible for the protection of the water environment in England and Wales (contact details are also given in Section 7).

The Regulations give SEPA powers to issue an Enforcement Notice on persons involved in any activity where there is a risk of causing significant adverse impacts on any part of the water environment or a direct or indirect discharge into groundwater of Schedule 2 (List I) substances. SEPA considers groundwater pollution to be a significant adverse impact on the water environment. Groundwater pollution may be caused by any substance but particularly by those contained within List II of the Annex to the Groundwater Directive. An indirect discharge is one that filters through the soil and subsoil to the groundwater. The Regulations do not permit Schedule 2 substances to be discharged directly to groundwater. Therefore, in cases where dip baths are below the ground, extreme care must be taken to prevent leakage or loss of sheep dip chemicals from such structures that would lead to their direct entry to groundwater.

An Enforcement Notice issued by SEPA may either prohibit a person from carrying out an activity or authorise the person to carry out that activity, subject to conditions necessary to protect the water environment and ensure compliance with the Regulations. In deciding whether or not to issue an Enforcement Notice under the Regulations, SEPA will consider whether or not guidance contained in an appropriate Code of Practice has been, or is likely to be, followed.

1.4 Purpose of the Code

The purpose of this Code is to provide practical guidance to farmers, crofters and contractors regarding the steps to take before, during and after dipping so as to prevent adverse impacts on the water environment and human health. This Code extends to conventional or mobile dip baths as well as other forms of treatment (*e.g.* showering, jetting or the use of pour-ons). The activities covered include all aspects of handling, transport and use of the dip from supply through to (**but not including**) the point at which the waste dip is disposed of, in accordance with a licence under CAR (2005) issued by SEPA. Contact SEPA for details on the disposal of waste dip licensing process and how you should apply for one.

IMPORTANT: If you or your contractor intends to dispose of waste dip to land, you must seek prior permission from SEPA to do so.

By following the guidance in this Code, you should:

- achieve more effective treatment of sheep for ectoparasites, thereby saving money and improving the animals welfare;
- ensure the protection of the water environment from pollution, including your own, or your neighbours drinking water supplies;
- reduce the likelihood of regulatory action being taken by SEPA, which as a minimum could include SEPA reporting the lack of compliance to the Scottish

Executive's Environmental and Rural Affairs Department (SEERAD). This could potentially result in penalties against direct scheme payments including the Single Farm Payment Scheme, Scottish Beef Calf Scheme, Protein Crop Premium and Energy Crop Scheme and/or payments made under Rural Development Regulation Schemes for example the Rural Stewardship Scheme or Less Favoured Area Support Scheme.

- reduce the risk of breaching the requirements of cross compliance and, until 2007, Good Farming Practice

1.5 Relationship to Other Guidance

A range of other literature exists that provides guidance on issues related to sheep dipping *e.g.* obtaining Certificates of Competence, animal welfare concerns and the protection of human health. This Code replaces the Code of Practice issued by the Scottish Executive under the Groundwater Regulations 1998. A full list of references is provided in the Reference section of this Code. These are referred to at various points in this Code and should be used as appropriate.

1.6 Other Legislation

Movements for sheep dipping no longer need to be licenced under the Animal Movement Regulations. However, if sheep are to be moved to another farm for dipping (except on common grazing or within crofting townships) further movement of the sheep would be caught by the 6 day standstill requirements. More advice on whether your dipping procedures come within the scope of this requirement can be sought from your local SEERAD office (see Section 7 for contact details).

As noted in Section 1.4, non compliance with this code could also lead to penalties against a number of direct scheme payments provided by SEERAD.

2. RESPONSIBLE USE OF SHEEP DIP

2.1 Environmental Hazards Associated with Sheep Dips

All sheep dip products, including cosmetic dips and pour-ons, contain chemicals that are potentially very harmful if used incorrectly. Significant harm to the aquatic environment, wildlife and humans can occur if such chemicals are not stored, handled, used and disposed of safely and responsibly. **Under no circumstances should sheep be dipped using crop protection chemicals. Only products approved for the treatment of ectoparasites in sheep should be used.** At the present time, products containing synthetic Pyrethroids (SPs) have been suspended from the market.

2.2 Possible Routes of Contamination

Treatments containing organophosphates (OPs) and synthetic pyrethroids (SPs) are extremely toxic even at very low concentrations. Their improper use and their disposal pose a significant risk of contaminating drinking water supplies (*e.g.* from

springs, wells or boreholes) and, if allowed to enter a watercourse, these chemicals can cause significant damage to aquatic life over a very wide area. Contamination of the water environment may occur *via* the following routes:

- Spillage of sheep dip concentrate or pour-ons while handling containers.
- Leakage and loss from a dip bath. This is especially a risk to groundwater where the bath is sited below the ground, especially at locations with permeable soil and subsoil.
- Overflow of working strength sheep dip solution from a dip bath to adjacent ground during and after use.
- Losses of sheep dip concentrate from part-used or empty dip containers that have not been adequately rinsed out.
- Drips from freshly treated stock.
- Drainage from drip pens which are no longer impermeable and/or which do not drain effectively back to the dip bath.
- Treated sheep crossing or accessing watercourses.
- Spillages or leaks whilst transporting waste dip to disposal sites.
- Use of unsuitable disposal sites
- The use of by pass drains on the drip pens

3. GOOD PRACTICE FOR THE SAFE USE OF SHEEP DIP

3.1 Good Practice – Before Dipping

3.1.1 Treatment Selection

Sheep scab is a highly contagious disease and an outbreak may occur with no prior warning. Farmers should follow Scottish Sheep Scab Initiative advice during an outbreak. However, when not treating for sheep scab, careful planning of treatment and the use of appropriate ectoparasite control methods helps reduce the total amount of dip concentrate used. This reduces farmers' costs and helps reduce the risk to the water environment. Sheep farmers and crofters should discuss plans for treatment with their veterinary surgeon who will be aware of the animal health issues associated with the unit and of the neighbouring area. Pours, showers and jettors are not effective for the control or treatment of scab. For treatment selection, refer to SAC Technical Note TN567: *Control of Sheep Scab and Other Ectoparasites of Sheep* (2005). A record of sheep dip treatment used should be kept.

3.1.2 Purchase, Transport and Storage of Dip Concentrate

The purchaser of any sheep dip product must hold a Certificate of Competence in the Safe Use of Sheep Dips to demonstrate that they will use dips responsibly. The procedure for attaining this certificate is given in the National Proficiency Tests Council (NPTC) publication, *Certificate of Competence in the Safe Use of Sheep Dips* (1998).

Limiting the purchase of dip concentrate to the minimum quantity necessary to meet the manufacturers dipping instructions is both cost effective and reduces risks associated with retaining surplus concentrated dip, or of having to dispose of excess amounts of diluted waste dip. Care is required when transporting dip concentrate from the supplier to the farm store or from farm store to the dipper. **The preferred method of transport is in a lockable secure chemical cabinet** on a trailer, or in a vehicle with a floor to ceiling bulkhead between the driver/passenger compartment and the load area. Keep the dip concentrate in this secure area when it is not required for filling or replenishing the dip bath.

On arrival at the farm, dip concentrate must be stored either in the pesticide or medicine store, securely locked and clearly identified, as described in HSE Agricultural Information Sheet 16: *Guidance on Storing Pesticides for Farmers and Other Professional Users* (1997, reprinted November 2004).

3.1.3 Siting and Design of Dippers

The siting and design of dippers should be such that the risk of polluting the water environment is reduced to a minimum. **To safeguard drinking water sources, static or mobile dippers, spray races or showers should all be sited at least 50 metres away from springs, wells and boreholes. In addition, to protect surface waters, it**

is strongly recommended that a minimum distance of at least 50 metres is maintained between any type of dipper/shower and surface watercourses and drains.

Dip baths that are sited below ground level must be constructed in such a way as to prevent entry of water from surrounding land, and to ensure no loss or leakage from the dip bath occurs above or below ground. The dip bath must be designed to contain the dip solution and to enable gravity flow back to the dipper from the drip pens and any other area contaminated by drippings from the fleeces. The proximity of most dippers to watercourses is merely a reflection of past farming practices, and should not be continued. However, subject to provisions in Section 2.6 – Other Legislation - farmers are encouraged to share facilities that meet the standards given in this Code so as to reduce the risk of pollution and optimise the effectiveness of treatment.

The size and type of dip bath and drip pens will be determined by flock size, site constraints, design for correct dipping procedures (*i.e.* immersion for 1 minute) and overall throughput. Allowance should be made for a minimum of two drip pens to allow for a minimum draining down period of 10 minutes, as recommended in the *Prevention of Environmental Pollution From Agricultural Activity (PEPFAA): A Code of Good Practice (2005)*, or as specified by manufacturers in their label instructions.

New dip baths must be constructed as one-piece pre-fabricated units or one-piece in-situ concrete and the overall unit should have the following key design features:

- impermeable construction to ensure no loss or leakage occurs;
- no drain or outlet for below ground structures;
- impermeable drip pens draining or directing all drippings (*i.e.* excess dip solution from fleeces) back to the dip bath;
- kerbs and splashboards in place;
- suitable access for cleaning and emptying, preferably by a vacuum tanker;
- removable covers to prevent access or entry and to reduce rainfall on the dip bath

Care in the construction and operation of the whole unit is important. The dipper should feature suitable kerbs and splashboards, well graded (1 in 30) impermeable floors and a silt trap. These features will retain the dip solution within the dipper, reducing the risk to operators, and prevent pollution of the water environment. Where a foot bath facility is included in the design, this must drain back into the dip bath for collection prior to disposal. **The silt trap should drain only to the dip bath.**

3.1.4 Use of Mobile Dipping, Showering, Jetting or Spraying Equipment

Reliance on mobile treatment units, often operated by contractors, has become more popular in recent years. For reasons of convenience and access the farm steading is used as the site for treatment instead of sheep dipping areas. However, in some cases, this has led to increased risks of pollution due to the presence of farm drains, yards, roads and limited holding areas for sheep after treatment. Leaks or losses, drainage and drippings can more easily run off and enter drains or watercourses or be discharged onto or into land at farm steadings.

Therefore, it is essential to carefully select suitable sites where treatment is to take place and for treated sheep to move onto. Areas specifically designed and constructed for mobile treatment units are required in the longer term either in the field or at the farm stading. In the meantime, all areas should be fully contained and assessed as being safe from the point of view of preventing pollution of groundwater or watercourses.

The following additional guidance should be followed to reduce the risks of pollution from mobile dippers:

- Prevent dip chemicals escaping into surrounding ground or into nearby drains. Sealed drainage systems and suitable collection facilities should be provided to contain any spillages, leaks or drainage from equipment or sheep immediately after treatment.
- Do not move or relocate any mobile treatment units containing fresh or used sheep dip solution or spray solution, unless it is specifically designed to do so.
- Ensure that any drainage or drippings from treated sheep is collected in a similar manner to that for static sheep dippers (*i.e. via* drip pens to a containment facility).
- Check the condition of the area of land onto which sheep disperse after treatment. Poaching or churning of the area may increase the risk of pollution due to ponding, run-off or by soaking into the ground. Move the animals to another suitable area of land if poaching has reduced the vegetative cover significantly. Using protective mats or absorbent material across exit ramps can reduce damage.

Certain field sites may be more suited to carrying out mobile treatments and should be investigated for their suitability. In particular, the site should be assessed to ensure that it is not located near to any spring, well or borehole or watercourse. Ideally, such mobile treatment sites should be flat or gently sloping, with well established grass cover and be underlain by at least 150mm top soil, preferably to a depth of 600mm to rock. The area should be free from flooding, surface ponding or waterlogging and not be frozen or compacted.

If it is intended to use mobile treatment systems within a Site of Specific Scientific Interest (SSSI) or Natura 2000 site, then SEPA would consult with Scottish Natural Heritage to ensure that conservation interests are not harmed. This consultation process is driven by the Nature Conservation (Scotland) Act 2004 (Section 15) for SSSIs and the Conservation (Natural Habitats) Regulations 1994 (as amended) for Natura 2000 sites.

3.1.5 Inspection of Dippers

You should inspect the empty dipper before use to ensure that there are no cracks and worn or damaged areas. Before use, the dip bath should be filled with clean water and, after ensuring that no drainage or rainfall can enter, the level monitored. After a

minimum waiting period of 24 hours, any leakage(s) that are detected must be rectified before dipping. Leaking dip baths are more likely to pollute the water environment and SEPA will serve an Enforcement Notice containing conditions requiring their repair before use. If the problem cannot be rectified the notice will prohibit the use of the dip bath. If you consider that the conditions imposed by SEPA are unreasonable, you have a right of appeal to Scottish Ministers under CAR (2005), see Part VIII of the Regulations, and you will be advised of this by SEPA in the Enforcement Notice.

3.1.6 Briefing Operators and Checking Personal Protective Equipment

The operator responsible for dipping must have a Certificate of Competence in the Safe Use of Sheep Dips. All persons involved should read the instructions on the dip concentrate container label, should be familiar with a Control of Substances Hazardous to Health (CoSHH) Risk Assessment and be aware of proper dip concentrate handling procedures. Emphasis must be placed on risks to the environment, the safety of operators and welfare of the sheep. Minimum recommendations for handling dip concentrate and Personal Protective Equipment (PPE) are given in Health and Safety Executive (HSE) Publication AS29r: *Sheep Dipping* (1998). The HSE website address is www.hse.gov.uk.

3.1.7 Contingency Measures in the Event of Spillage

The farmer, crofter or contractor should contact SEPA immediately in the event of a spillage or incident that could cause a risk of pollution to either groundwater or any watercourse, on SEPA's 24 hour Emergency Hotline number 0800 80 70 60.

It is important to be prepared for any spillage as swift action can prevent it from becoming a serious pollution incident. **To ensure a prompt response to any incident, a list of Emergency Contacts should be displayed in the sheep dip store and should be drawn to the attention of all operators.**

Any accidental spillage should be immediately washed into the dip bath. Dip concentrate containers should be opened only in the drip pen. If a container is damaged and/ or spillage occurs away from the immediate vicinity of the dipper, first ensure appropriate PPE is being worn. After using absorbent material (*e.g.* sawdust, sand or proprietary product) to contain the spillage, collect and transfer all contaminated material, including soil, to a clearly labelled sealed container for collection by a licensed waste contractor. Any spillage of waste dip during dipping or emptying should be drained back into the dip bath.

Examples of the type of operational failure that may require contingency measures include:

- Spillage to land or watercourses of dip concentrate, dip solution or diluted waste dip;
- Run-off from holding pens discharging onto land or water courses;

- Run-off from land into watercourses of diluted waste dip after spreading to a disposal area.

Advice on action to be taken in the event of suspected effects on human health arising from the use of sheep dips can be found in HSE Leaflet AS29r: *Sheep Dipping* (1998). If you think that people or animals have suffered an adverse reaction following exposure to sheep dip, you can report it by completing the Veterinary Medicines Directorate (VMD, www.vmd.gov.uk) form MLA252A. This form can be obtained from the VMD, veterinary practices, Veterinary Investigation Centres, Animal Health Offices and HSE Regional Offices.

Prompt action can help to prevent an accident becoming a major pollution incident or health hazard.

3.1.8 Ensure an Authorised Disposal Route

Before dipping commences, ensure that the site for land disposal has been licensed under CAR (2005) by SEPA (an existing Groundwater Regulations authorisation is deemed a CAR authorisation) and is in a suitable condition to receive waste dip. Remember, to fulfil the requirements of the Landfill Regulations (2003) only one disposal is allowed per site per year so ensure sufficient sites for all disposals are identified in the authorisation.

If disposal of waste dip is to be off-site, confirm who is responsible for the transport and disposal of this special waste (under the Special Waste Regulations 2004) to the licensed disposal area. **When using mobile dipping contractors, it is essential to establish beforehand between the farmer/crofter and contractor who will take responsibility for the disposal of the waste dip. This is because the sheep dip (used or unused) is a hazardous waste as classified under the Waste (Scotland) Regulations 2005 and as such falls under the Duty of Care requirements of the Environmental Protection (Duty of Care) Regulations (1991) (as amended). Information on 'Agricultural Waste' is provided in a leaflet of that title produced by SEPA.**

SEPA considers that soakaways are not suitable as disposal route for sheep dip compounds and are unlikely to authorise disposal by this means. Farmers considering this option will have to supply significantly more information for authorisation to be approved and should discuss this option with their local SEPA office before application

If SEPA authorisation for disposal of waste dip has not been granted, the farmer/crofter/contractor should contact their local SEPA office (see Section 6) to discuss possible temporary storage, whilst the disposal licence application is being considered. The temporary storage tank must be secure, labelled, sealed and situated at least 50 metres away from surface watercourses and drains and at least 50 metres away from any spring, well or borehole.

3.1.9 Filling the Dip Bath

Once filled, unless in use, a dip bath should not be left uncovered and never left unattended. Ensure an adequate supply of both water and sheep dip concentrate is available. Sheep dip concentrate containers should be opened only in the drip pen when filling or topping up the dip bath. Once all preparations have been completed and no rain is forecast, fill the dip bath according to the instructions on the product label. **Never over-fill the dip bath, as any overflow could cause major contamination and pollution.** To eliminate the risk of sheep dip solution back siphoning into the water supply system, ensure that the water hose is not placed directly in the dip bath but is filled by directing the hose over the drip pens. Hoses should not be connected to taps that do not have anti-siphon devices fitted.

3.1.10 Monitor Weather Conditions

Always ensure that the influence of weather conditions is taken account of by using local forecasts. Be prepared to postpone treatment or take additional precautions as conditions dictate. Heavy rainfall will increase the amount of water draining from the drip pens and adjoining areas and this can result in a greater risk of the dip bath overflowing. Freezing conditions may also cause damage to the dipper and any chemical containers left at the dipper. Heavy rainfall following spreading of waste dip to land will increase the risk of contaminating groundwater and watercourses.

3.2 Good Practice – During Dipping

CORRECT OPERATIONAL PROCEDURES ARE DESIGNED TO PREVENT CONTAMINATION OF THE WATER ENVIRONMENT

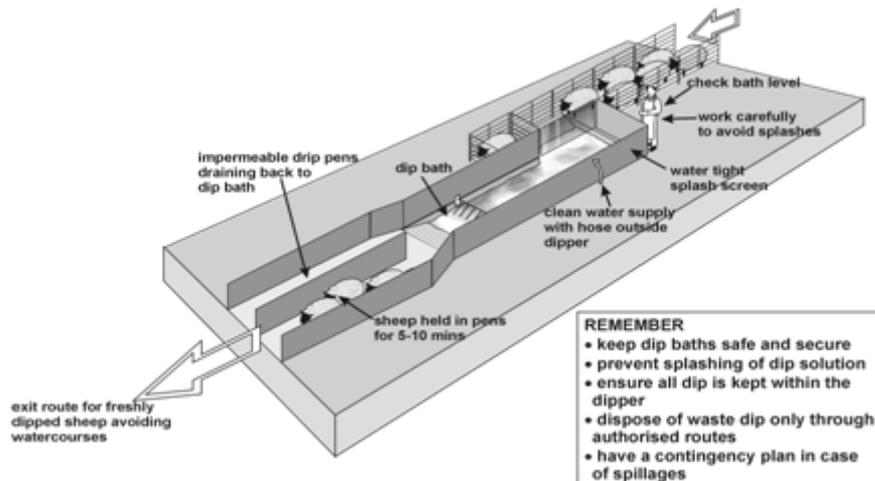
3.2.1 Replenishing the Dip Bath

Follow manufacturer's instructions on the quantity of dip concentrate to be used for topping-up and the frequency with which it should be done. Mix the dip bath over its full length, taking care to minimise splashing, before recommencing dipping.

Skim any floating debris from the dip bath and place the scum at the side of the dip bath so that any drainage is returned to the dip bath. Do not position the scum where it may become a hazard to the operator or to the sheep. The scum may be spread on the site authorised by SEPA for waste dip disposal.

3.2.2 Correct Dipping Procedures to Avoid Spillage

Effective dipping should be carried out in accordance with the manufacturer's instructions on the product label. To reduce excess splashing and plunging, work to a routine, calmly, quietly and with control. An exit gate is required to retain sheep in the dip bath for the prescribed time. Screens guarding the dip bath should have a substantial top rail to provide stability to the operator dunking the sheep. As sheep exit the dip bath, shaking will produce a spray of droplets and a flow of excess dip.



SEPA HOTLINE 0800 80 70 60

Both the spray and runoff from the drip pen must be contained and allowed to drain back into the dip bath through a silt trap.

3.2.3 Ensure Safe Rinsing and Disposal of Empty Dip Containers

Empty dip concentrate containers and measuring vessels must be thoroughly rinsed out a minimum of 3 times following the manufacturer's instructions and the rinse water returned to the dip bath. Empty the containers or decommission them by crushing, puncturing or flattening to prevent re-use. Try to keep the label legible in this process. **The cleaned containers can be disposed of via either the Local Authority waste collection service (if available) or by a private registered waste disposal contractor.** Used containers must never be reused or left lying about the tank, as they may prove to be a source of pollution due to the presence of chemical residues.

3.3 Good Practice – After Dipping

ONCE DIPPING IS OVER THERE IS STILL A RISK OF GROUNDWATER AND SURFACE WATER CONTAMINATION.

3.3.1 Movement of Sheep

Two drip pens with the capacity to retain the sheep for a minimum period of 10 minutes are recommended, but if this not practicable the sheep should be retained in a drip pen for at least 5 minutes. However, even after a 10 minute dripping period there can still be residual dripping from the fleece and wherever possible sheep should be retained in holding areas such as paddocks for 24 hours after dipping. **Holding areas and return routes to grazing should be chosen with care to avoid contact with ditches, ponds, burns and rivers for as long as possible (i.e. areas with no, or limited, access to watercourses or within 50 metres of any spring, well or borehole used as a drinking water supply).** **Poached or waterlogged ground and hard surfaces, such as metalled roads, should be avoided.** While

stock need drinking water, preventing access to surface watercourses for a period of two days after treatment will significantly reduce the risk of contamination.

3.3.2 Washing Equipment and Clothing

A low pressure hose connection to the water supply should be sufficient to wash down the drip pens, dipper area and associated equipment, including clothing. Washings should go into the dip bath. The only time the hose should be in the dip bath is during washing out, when it is under the direct control of the operator. Other precautions are described above.

3.3.3 Treatment/ Detoxification of Dip

Sheep dip chemicals are known to break down in the presence of some common, readily available chemicals, for example, hydrated lime. **It is important that any treatment employed for waste dip is one recommended for the dip type and formulation used.** If using such a 'detoxification' method, you must:

- follow the manufacturer's label instructions, if given, specific to the type and formulation of sheep dip used. Under no circumstances must sheep dip be treated using a method designed for another product.
- use strong and effective-leak proof covers over the dip bath while treatment is taking place

Detoxification treatment methods can take up to a fortnight to work effectively. It is essential that environmental and safety precautions are taken into account for the period during which the waste dip is being treated.

- treat only in a well sealed, watertight dip bath or other suitable leak proof holding tank
- avoid the risk of overflow by regularly checking the level of sheep dip solution in the bath whilst detoxification treatment is taking place, especially if wet weather is forecast
- record the detoxification treatment method, the date employed and the date of final disposal
- untreated and treated waste dip should be disposed of at a site licensed under CAR by SEPA
- adopt the same level of care when handling treated dip solution as is the case when handling untreated dip

For further information, refer to the manufacturer's instructions and SAC Technical Note T475: *Waste Sheep Dip Treatment and Disposal* (1998).

3.3.4 Emptying the Dip Bath

The storage of waste dip must be in a sound, secure and leak-proof container. The dip bath should be emptied as soon as possible after dipping and the dipper, drip pens and associated areas washed down with all drainage going to the dip bath for emptying. Delay in emptying can be justified only if treatment (or detoxification) of the waste dip is to take place or if the weather conditions make it unsuitable to arrange for immediate disposal to an authorised disposal area. Temporary covers or roofing of the drip pens and dip bath will help to minimise the volume of rainwater collected in the dip bath between treatments.

Provide suitable access to the dipper to allow the vacuum tanker suction hose to reach into the dip bath. Partly fill the tanker with water and/ or farm slurry to achieve a dilution of at least 1:3 (1 part waste dip solution to 3 parts water and/ or slurry) of the waste dip before vacuuming the dip bath. If possible use a smaller (*e.g.* 50 mm diameter) pipe, to remove as much of the waste dip as possible and ensure that when coupling and de-coupling of suction hoses any drips or drainage from them returns to the dip bath. Where contractors are being used, it may be necessary to transfer the waste dip to a holding tank so that further dipping can proceed.

The storage of waste dip must be in a sound, secure and safely located container (*i.e.* more than 50 metres from any watercourse and 50 metres from any spring, well or borehole so as to minimise the risk of spillage and possible pollution. **Storage of waste dip is suitable only for a short period, prior to disposal. Do not store waste dip for re-use.**

3.3.5 Disposal of Waste Dip to Land

Never discharge waste dip, whether treated or untreated, to a watercourse.

- **Disposal of waste dip, scum and silt trap contents into or onto land must be licensed by SEPA.** Before such a licence can be issued, the proposed disposal area(s) must be assessed for suitability. The assessment aims to prevent disposal at locations that could result in a risk to groundwater or any watercourses. An application form for a CAR (2005) licence is available from all SEPA Offices.
- Minimise transport routes to disposal areas and wherever possible try to avoid crossing watercourses. Try to avoid transporting waste dip on busy roads where the possibility of road accidents will be higher
- **Disposal of waste sheep dip to land without a CAR Licence or failing to comply with the conditions of such a Licence will constitute a breach of cross compliance** and, until 2007, Good Farming Practice and may result in penalties being applied, by SEERAD, to any Single Farm Payment or agri-environment scheme payments. SEPA also have the option to take enforcement action resulting in possible financial penalty being incurred.

3.3.6 Disposal of Waste Dip via a Registered Contractor

In certain situations, where a licence to dispose of waste dip to land is not held, it may be possible to dispose of such waste via other appropriately licensed routes. This type of disposal is likely to require a specific licence. **You should note that the handling of agricultural wastes in general and liquid wastes in particular is affected by the Waste (Scotland) Regulations 2005. Information on how these regulations affect 'Agricultural Waste' is provided in a leaflet of that title produced by SEPA.** Contact your local SEPA office for information on how to obtain a copy of the leaflet.

4. EMERGENCY CONTACT SHEET

NAME OF FARMER/CROFTER _____

FARM/CROFT ADDRESS _____

Post Code _____ Telephone _____

Email address _____ @ _____

EMERGENCY CONTACTS

EMERGENCY CONTACT NAME _____

EMERGENCY TEL. NO. _____

DOCTOR'S SURGERY _____

SEPA HOTLINE TEL. NO. _____ **0800 80 70 60**

SEPA LOCAL OFFICE TEL. NO. _____

HEALTH & SAFETY EXECUTIVE LOCAL OFFICE _____

LOCAL CONTRACTOR with VACUUM TANKER _____

SHEEP DIP SUPPLIER _____

NATIONAL POISONS INFORMATION SERVICE _____ **0131 536 2300**

SCOTTISH WATER _____ **0845 600 8855**

A copy of this list should be displayed in the sheep dip store and should be drawn to the attention of all operators.

5. REFERENCES

- HSE Guidance: *A Step by Step Guide to CoSHH Assessment* (1993).
- SAC: *Design and Construction Guidelines for Farm Waste Storage* (1995).
- EA Leaflet: *Mobile Sheep Dipping – A Guide to Reducing Pollution Risks* (1997).
- HSE Agricultural Information Sheet 16: *Guidance on Storing Pesticides for Farmers and Other Professional Users* (1997, reprinted November 2004).
<http://www.hse.gov.uk/pubns/ais16.pdf>
- SEERAD Code of Good Agricultural Practice: *Prevention of Environmental Pollution from Agricultural Activity* (2005), ISBN 0-7559-4106-3,
<http://www.scotland.gov.uk/library5/environment/pepfaa.pdf>.
- SEERAD Code of Good Agricultural Practice: *Prevention of Environmental Pollution from Agricultural Activity – Do's and Don'ts Guide*.
- HSE Agricultural Safety Leaflet AS29r: *Sheep Dipping* (1998).
- NPTC Assessment Schedule: *Certificate of Competence in the Safe Use of Sheep Dips* (1998).
- SAC Technical Note T475: *Waste Sheep Dip Treatment and Disposal* (1998).
- SAC Technical Note TN567: *Control of Sheep Scab and Other Ectoparasites of Sheep* (2005), ISBN 1 85482 807 X, January 2005, www.sac.ac.uk/mainrep/pdfs/sheepscab.pdf
- Agricultural Wastes: Pamphlet produced by SEPA.
http://www.sepa.org.uk/pdf/publications/leaflets/agric/agric_and_waste.pdf

6. SEPA AND OTHER AGENCIES' ADDRESSES

Scottish Environment Protection Agency (SEPA) EMERGENCY HOTLINE 0800 80 70 60

CORPORATE OFFICE

Erskine Court
The Castle Business Park
STIRLING
FK9 4TR
Tel: 01786 457700
Fax: 01786 446885

HIGHLANDS, ISLANDS & GRAMPIAN OFFICES

Aberdeen Office

Greyhope House
Greyhope Road
Torry
ABERDEEN
AB11 9RD
Tel: 01224 248338
Fax: 01224 248591

Dingwall Office

Graesser House
Fodderty Way
Dingwall Business Park
DINGWALL
IV15 9XB
Tel: 01349 862021
Fax: 01349 863987

Elgin Office

28 Perimeter Road
Pinefield
ELGIN
IV30 6AF
Tel: 01343 547663
Fax: 01343 540884

Fort William Office

Carr's Corner Industrial Estate
Lochybridge
FORT WILLIAM
PH33 6TL
Tel: 01397 704426
Fax: 01397 705404

Fraserburgh Office

Shaw House
Mid Street
FRASERBURGH
AB43 9JN
Tel: 01346 510502
Fax: 01346 515444

Orkney Office

Norlantic House
Scott's Road
Hatson Industrial Estate
KIRKWALL
ORKNEY
KW15 1RE
Tel: 01856 871080
Fax: 01856 871090

Shetland Office

The Esplanade
LERWICK
SHETLAND
ZE1 0LL
Tel: 01595 696926
Fax: 01595 696946

Thurso Office

Thurso Business Park
Thurso
CAITHNESS
KW14 7XW
Tel: 01847 894422
Fax: 01847 893365

Western Isles Office

2 James Square
James Street
STORNOWAY
ISLE OF LEWIS
HS1 2QN
Tel: 01851 706477
Fax: 01851 703510

SOUTHEAST OFFICES

Arbroath Office

62 High Street
ARBROATH
DD11 1AW
Tel: 01241 874370
Fax: 01241 430695

Edinburgh Office

Clearwater House
Heriot Watt Research Park
Avenue North
Riccarton
EDINBURGH
EH14 4AP
Tel: 0131 449 7296
Fax: 0131 449 7277

Galashiels Office

Burnbrae
Mossilee Road
GALASHIELS
TD1 1NF
Tel: 01896 754797
Fax: 01896 754412

Glenrothes Office

Pentland Court
Saltire Centre
GLENROTHES
KY6 2DA
Tel: 01592 776910
Fax: 01592 775923

Perth Office

7 Whitefriars Crescent
PERTH
PH2 0PA
Tel: 01738 627989
Fax: 01738 630997

Stirling Office

Bremner House
The Castle Business Park
STIRLING
FK9 4TF
Tel: 01786 452595
Fax: 01786 461425

SOUTHWEST OFFICES

Ayr Office
31 Miller Road
AYR
KA7 2AX
Tel: 01292 294000
Fax: 01292 611130

Dumfries Office
Rivers House
Irongray Road
DUMFRIES
DG2 0JE
Tel: 01387 720502
Fax: 01387 721154

East Kilbride Office
5 Redwood Crescent Peel Park
EAST KILBRIDE
GLASGOW
G74 5PP
Tel: 01355 574200
Fax: 01355 574688

Glasgow Office
Law House
Todd Campus
West of Scotland Science Park
Maryhill Road
GLASGOW
G20 0XA
Tel: 0141 945 6350
Fax: 0141 948 0006

Lochgilphead Office
2 Smithy Lane
LOCHGILPHEAD
PA31 8TA
Tel: 01546 602876
Fax: 01546 602337

Newton Stewart Office
Penkiln Bridge Court
Minnigaff
NEWTON STEWART
DG8 6A
Tel: 01671 402618
Fax: 01671 404121

Environment Agency of England and Wales EMERGENCY HOTLINE 0800 80 70 60

**North East Region
Northumbria Area Office
Tyneside House
Skinnerburn Road
Newcastle Business Park
NEWCASTLE UPON TYNE
NE4 7AR
Tel: 08708 506 506
Fax: 0191 2034004**

**North West Region
Northern Area Office
Ghyll Mount
Gillan Way
Penrith Business Park
PENRITH
CA11 9BP
Tel: 08708 506 506
Fax: 01768 685 606**

Scottish Natural Heritage

12 Hope Terrace
EDINBURGH
EH9 2AS
Tel: 0131 4474784
Fax: 0131 4462277

Health and Safety Executive in Scotland

**Belford House
59 Belford Road
EDINBURGH
EH4 3UE
Tel: 0131 247 2000
Fax: 0131 247 2121**

**375 West George Street
GLASGOW
G2 4LW
Tel: 0141 275 3000
Fax: 0141 275 3100**

7. SCOTTISH EXECUTIVE ADDRESSES

Scottish Executive

Water Environment Unit
Environment and Rural Affairs Department
1 H North
Victoria Quay
EDINBURGH
EH6 6QQ
Tel: 0131 244 7844
Fax: 0131 244 0245
Email: waterenvironment@scotland.gsi.gov.uk

Scottish Executive Environment and Rural Affairs Department Local (in capitals) and Sub Offices

Email: SEERAD.(location of office)@scotland.gsi.gov.uk

AYR SEERAD Office
Russell House
King Street,
AYR
KA8 0BE
Tel: 01292 610188
Fax: 01292 611483

Hamilton SEERAD Office
Cadzow Court
3 Wellhall Road
HAMILTON
ML3 9BG
Tel: 01698 281166
Fax: 01698 285277

DUMFRIES SEERAD Office
161 Brooms Road
DUMFRIES
Dunfriesshire
DG1 2SH
Tel: 01387 255292
Fax: 01387 274440

GALASHIELS SEERAD Office
Cotgreen Road
Tweedbank,
GALASHIELS
Selkirkshire
TD1 3SG
Tel: 01896 758333
Fax: 01896 892424

INVERNESS SEERAD Office
Government Buildings
28 Longman Road
Longman East

INVERNESS
IV1 1SF
Tel: 01463 234141
Fax: 01463 714697

Portree SEERAD Office
Estates Office
PORTREE
Isle of Skye
IV51 9DH
Tel: 01478 612516
Fax: 01478 613128

INVERURIE SEERAD Office
Thainstone Court
Inverurie
Aberdeenshire
AB51 5YA
Tel: 01467 626222
Fax: 01467 626217

Elgin SEERAD Office
32 Reidhaven Street
ELGIN
Morayshire
IV30 1QH
Tel: 01343 547514
Fax: 01343 552312

KIRKWALL SEERAD Office
Government Buildings
Tankerness Lane
KIRKWALL
Orkney
KW15 1AQ
Tel: 01856 875444
Fax: 01856 873309
Lerwick SEERAD Office

Charlotte House
Commercial Road
LERWICK
Shetland
ZE1 0HF
Tel: 01595 695054
Fax: 01595 694254

OBAN SEERAD Office
Cameron House
Albany Street,
OBAN
PA34 4AE
Tel: 01631 563071
Fax: 01631 566756

Stornoway SEERAD Office
10 Keith Street
STORNOWAY
Isle of Lewis
HS1 2QG
Tel: 01851 702392
Fax: 01857 705793

Benbecula SEERAD Office
Balivanich
Isle of Benbecula
HS7 5LA

Tel: 01870 602346
Fax: 01870 602077

PERTH SEERAD Office
Broxden Business Park
Lamberkine Drive
PERTH
PH1 1RZ
Tel: 01738 602000
Fax: 01783 602001

Thurso SEERAD Office
Strathbeg House
Clarence Street
THURSO
KW14 7JS
Tel: 01847 893104
Fax: 01847 895983

Lairg SEERAD Office
Ord Croft
LAIRG
Sutherland
IV27 4AZ
Tel: 01549 402167
Fax: 01549 402117

8 Glossary of Terms

Dip concentrate	Undiluted dip solution as purchased from suppliers
Dip solution	Sheep dip that has been initially diluted (and where relevant, replenished) for use as an approved treatment for ectoparasites or cosmetic formulation in sheep (<i>i.e.</i> working strength dip solution)
Dipper	The entire dipping area, including collection areas, drip pens, and dip bath
Dip bath	Tank in which sheep are immersed for treatment and which may be above or below ground, depending on the nature of the dipper
Drip pens	Impermeable areas draining back to the dip bath where newly dipped sheep are held to allow dripping
Waste dip	A mixture of working strength dip solution, washings, detoxified/ treated or untreated dip solution and solid matter from the dipping process
Water Environment	All surface water, groundwater and wetlands
Direct discharge	The introduction into groundwater of any pollutant without percolation through the ground or subsoil
Indirect discharge	The introduction into groundwater of any pollutants after percolation through the ground or subsoil
CAR (2005)	The Water Environment (Controlled Activities) (Scotland) Regulations 2005, Statutory Instrument 2005 No.348. This supersedes the Groundwater Regulations (1998) in translating the EC Groundwater Directive (80/68/EEC) into Scottish Law. Through the Water Environment and Water Services (Scotland) Act 2003, it also helps to implement the EC Water Framework Directive (2000/60/EC).
Enforcement Notice	A legal instrument available to SEPA under CAR (2005) for prohibiting or controlling activities which are likely to cause significant adverse impacts on the water environment or cause a direct or indirect discharge into groundwater of any of the substances listed in Schedule 2 of the regulations.

Licence	A licence issued by SEPA which subjects activities to legally binding conditions so as to protect the water environment
Pollutant	Any substance or heat liable to cause pollution, including those listed in Schedule 1 of CAR, and for the purpose of this definition “substance” includes bacteria and other pathogens
List I substance	A substance on List I of the Annex of the EC Groundwater Directive (80/68/EEC) (also detailed in Schedule 2 of CAR) which should be prevented from entering groundwater
Schedule 2 substance	A substance in Schedule 2 of CAR (2005) which reproduces substances on List I of the Annex of the EC Groundwater Directive (80/68/EEC) and for which entry into groundwater should be prevented

