Freshcare

Environmental
Edition 3

Code of Practice

www.freshcare.com.au

Contents

Introduction

Purpose and scope

The Freshcare Code of Practice Environmental is an industry owned standard, describing the practices required on farm to provide assurance that produce has been grown and packed with care for the environment.

The Freshcare program offers benefits to both suppliers and customers. It verifies that an industry recognised environmental assurance program is followed. Certification to the Freshcare program is achieved through independent third party auditing to this Code of Practice by approved auditors.

Freshcare Limited continues to work closely with key customer groups and industry stakeholders, maintaining a level of awareness of program developments and ensuring continued compliance with market requirements and community expectations.

Disclaimer

Freshcare Limited endeavours to ensure that the content of this Code of Practice is accurate, complete and current. However, Freshcare Limited makes no representation in relation to the accuracy, completeness or currency of the content of this Code of Practice. Reliance on the content of this Code of Practice is at the user's own risk. The user should always make independent enquiries and seek professional advice regarding its compliance with applicable laws and other legal obligations.

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Acknowledgments

Many individuals and organisations have been involved in the development of the third edition of the Freshcare Code of Practice Environmental. Their contribution and support is much appreciated.

Freshcare also acknowledges the support and commitment of Horticulture Innovation Australia (HIA) to the Freshcare Program.

Freshcare also thanks contributors to previous editions of the Freshcare Code of Practice Environmental.

Code Review Process

The Freshcare Technical Committee is responsible for the review and amendment of this Code of Practice. Participating Freshcare businesses are advised of all Code updates and should ensure that they are operating with the current edition of the Code of Practice at all times.

The Technical Committee encourages suggestions for improving this Code of Practice from all users. Suggestions should be submitted in writing to Freshcare Limited.

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Using the Code

The requirements of the Code of Practice, called elements, are grouped into two sections – Management and Environmental.

Each element describes the outcomes required and the practices needed to ensure compliance. This forms the basis of Freshcare Training and together with the Freshcare Forms and Resources, provides the foundations for effectively implementing the Freshcare Program on farm.

Freshcare resources are available to participating businesses electronically via FreshcareOnline for Growers. To have your FreshcareOnline logon reissued, please email info@freshcare.com.au or contact the Freshcare Office.

For more information, visit the Freshcare website www.freshcare.com.au.

Management

Code Element		Compliance Criteria	Records
M1	**Scope and commitment**		
M1.1	Define the business scope and the scope of Freshcare certification.	1. The scope of Freshcare certification is defined by the owner or appropriate senior manager. 2. All business enterprises and activities undertaken are recorded. 3. Flowcharts are completed to document the crops and activities for which Freshcare certification is required.	Form – M1 Scope Form – M1 Flowchart
M1.2	Identify property areas, infrastructure and surrounds on a property map.	1. A property map is documented and maintained. The map identifies: • property boundaries, roads and surrounds (farming, school, sports fields, residential, etc.) • sensitive areas adjacent to the property boundary such as National Parks, World Heritage-listed areas, Ramsar-listed wetland areas, wildlife sanctuaries/corridors or other specified conservation areas • production areas and growing sites • farm houses, buildings, sheds, on-farm roads and access points • toilet facilities, septic tanks and seepage pads • worker accommodation and facilities • bulk fuel storage, including underground tanks • chemical storage areas, mixing areas, equipment clean-down areas, dip sites (postharvest, livestock) and disposal trenches/evaporation ponds • storage sites for waste, including controlled wastes (empty chemical containers awaiting collection, tyres) • fertiliser and soil additive storage areas, composting/ageing and mixing/loading areas • water sources, extraction points and delivery infrastructure • drainage lines and discharge points • natural waterways, wetlands, riparian areas and lakes • areas that are, or are at risk of being, highly degraded, eroded or contaminated • significant stands of remnant native vegetation • threatened species • other sensitive areas with high conservation value.	Property map

Code Element		Compliance Criteria	Records
M1.3	Define the business organisational structure.	1. The organisational structure of the business is documented and must include: • workers responsible for the management of environmental compliance • reporting relationships of all workers whose roles may affect environmental compliance.	Organisational chart
M1.4	Document the business commitment to the Freshcare Code of Practice.	1. The owner or appropriate senior manager signs a commitment statement to support and comply with the Freshcare Code of Practice Environmental, Freshcare Rules, Environmental Action Plan (E1) and all legislative requirements. 2. The commitment statement is communicated to all workers. 3. The commitment statement is reviewed annually in conjunction with the Environmental Action Plan (E1).	Form – M1 Commitment statement

Freshcare Resources

- Factsheet – M1 Scope and commitment
- Freshcare Crop List (available via FreshcareOnline)

External Resources

Code Element		Compliance Criteria	Records
M2	**Documentation**		
M2.1	Verify compliance with the Freshcare Code of Practice through relevant documents and records.	1. The current editions of the Freshcare Code of Practice Environmental and the Freshcare Rules are kept. 2. All records and documents required to verify compliance to this Code of Practice are legible and must include: • title • date of issue or version number • business name • name of the person completing the record, and date of completion. 3. As documents and records change, out-of-date versions are replaced. 4. All records are kept for a minimum of two years (or longer if required by legislation, customers or this Code of Practice).	Freshcare Code of Practice Environmental Freshcare Rules
	**Freshcare Resources** • Factsheet – M2 Documentation	**External Resources**	

Code Element		Compliance Criteria	Records
M3	**Training**		
M3.1	Complete Freshcare training.	1. A management representative completes approved Freshcare Environmental training. Evidence is kept. *(See Appendix A-M3).*	Training certificate
M3.2	Train all workers who complete tasks relevant to this Code of Practice to ensure a base level of environmental awareness.	1. Training is provided for workers who complete tasks relevant to this Code of Practice. 2. Training is provided in the relevant language for workers, or pictorially. 3. A record of internal and external training is kept and must include: • name and signature of trainee • name of trainer or training provider • title or topic of the training • date of training and expiry date (when applicable). 4. A review of training is conducted at least annually or when tasks and/or workers change.	Form – M3 Training record – internal ENV Form – M3 Training record – other
	Freshcare Resources • Appendix – A-M3 Approved Freshcare training • Factsheet – M3 Training	**External Resources**	

Code Element		Compliance Criteria	Records
M4	**Internal audit and corrective action**		
M4.1	Conduct internal audits to verify ongoing compliance with this Code of Practice.	1. An internal audit of all activities and records relevant to the Freshcare Code of Practice Environmental is conducted at least annually. A record is kept. 2. Workers responsible for completing sections of the internal audit are identified and, where possible, are independent of the practices being assessed.	Form – M4 Internal audit report
M4.2	Complete corrective actions for any non-compliance.	1. A Corrective Action Record (CAR) must be completed when the requirements of the Freshcare Code of Practice Environmental, Freshcare Rules or legislation are not being met, as identified by: • routine activities • annual internal audits • annual external audits • a valid complaint received from a neighbour, customer or regulatory authority • environmental harm has occurred/may occur as a result of property activity, neighbouring activity or a natural event. 2. A Corrective Action Record must include: • description of the problem • cause of the problem • whether or not the problem has occurred before • short term fix (action taken to fix the problem) • long term fix (action taken to prevent the problem recurring) • date action completed and the name of the person responsible • review and verify that short term and long term actions are complete and effective • name of the person completing the review and date of review. 3. Reoccurrences of non-compliance are reviewed by the owner or appropriate senior manager. 4. Corrective Action Records are retained for a minimum period of five years (or longer if required by legislation or customers).	Form – M4 Corrective action record (CAR)
	**Freshcare Resources** • Factsheet – M4 Internal audit and corrective action	**External Resources**	

Code Element		Compliance Criteria	Records
M5	**Customer requirements**		
M5.1	Comply with customer requirements.	1. Where a customer requires compliance with specific environmental, sustainable agriculture or greenhouse gas emission practices not covered in this Code, a written copy of these practices is kept. 2. These practices are complied with and included in M4 Internal audits.	Customer contract, agreement or specifications. Form – M4 Internal audit report

	Freshcare Resources	External Resources
	• Factsheet – M5 Customer requirements	

Environmental

Code Element		Compliance Criteria	Records
E1	**Environmental action planning**		
E1.1	Establish an Environmental Action Plan to identify planned future actions to manage environmental issues and improve the property's environmental values.	1. Conduct an assessment of the property and business operations to identify any environmental issues and assess environmental values. 2. Establish an Environmental Action Plan (EAP) that documents the actions planned to address the environmental issues and improve the environmental values of the property. The EAP must include: • date of plan development • environmental issue/value being addressed • location on the property of environmental issue/value • actions planned to address the issue and/or improve the value • worker/s responsible • target date of completion for each action • evaluation of action/s undertaken • date, name and signature of the person verifying action has been completed. 3. Evidence of progress towards and/or changes to planned actions is kept. 4. The Environmental Action Plan is reviewed and updated at least annually. The name of the person completing the review and the date of the review are documented.	Form – E1 EAP assessment Form – E1 Environmental Action Plan
	Freshcare Resources • Factsheet – Environmental action planning		**External Resources** HIA Guidelines for Environmental Assurance www.horticulturefortomorrow.com.au

Code Element		Compliance Criteria	Records
E2	**Land and soil**		
E2.1	Manage land and soil, and minimise degradation, erosion compaction and contamination.	1. Soil conservation and crop production practices are chosen to: • minimise soil degradation, erosion, compaction and contamination • optimise soil organic matter and fertility relevant to the particular business enterprise. For identified areas, applicable records of these practices are kept.	
E2.2	Manage areas with highly degraded, eroded or contaminated soil.	1. Areas identified as being highly degraded, eroded or contaminated are: • managed to minimise further degradation, erosion or contamination • for contaminated soil, contained to minimise movement on and off-site. 2. Remediation activities for areas identified in E2.2.1 are documented in the Environmental Action Plan.	Form – E1 Environmental Action Plan
	**Freshcare Resources** • Factsheet – E2 Land and soil	**External Resources** HIA Guidelines for Environmental Assurance Chapter 1: Land and soil management www.horticulturefortomorrow.com.au	

Code Element		Compliance Criteria	Records
E3	**Biosecurity**		
E3.1	Manage biosecurity on the property.	1. A Biosecurity Management Program is documented and must include: • date developed • name of the person documenting the Program • biosecurity threats related to crops grown • strategies/practices to minimise risk (including quarantine regulations and requirements) • worker/s responsible. 2. Access to the property and growing sites is restricted to authorised persons.	Form – E3 Biosecurity Management Program Signage
E3.2	Monitor and report unusual findings.	1. Any unusual plant pest, disease or weed identified on the property must be reported to the local department of agriculture or Plant Health Australia.	
	**Freshcare Resources** • Factsheet – E3 Biosecurity	**External Resources** Plant Health Australia www.planthealthaustralia.com.au Farm biosecurity www.farmbiosecurity.com.au	

Code Element		Compliance Criteria	Records
E4	**Chemicals**		
E4.1	Select pest and disease control strategies to minimise risk to the environment.	1. Consideration is given to all available methods of pest and disease control (for example biological, chemical, cultural, mechanical and technological) before a control program is chosen. A record of control methods used is kept. 2. When necessary to apply agricultural chemicals, those which are less hazardous to beneficial organisms and/or have a lower environmental impact must be considered. 3. The decision to use agricultural chemicals is based on one or more of the following: • Crop and/or weather monitoring for pest and disease pressure. Records must include: o date o area/crop and/or weather parameters monitored o monitoring result and action recommended o name of the person who carried out the monitoring activity. • External agency pest and disease alerts. Records must include: o evidence of subscription alerts o date of alert o pest or disease the alert is issued for o source/agency that issued the alert. • Documented preventive pest and disease control programs. Records must include: o date the program was documented o crop or area to be treated o target pest/disease/weed o chemical to be used o frequency of use (including any limitations on the frequency of chemical use per crop/season) or the stage of crop development o name of the worker/person/organisation that documented the control program. • Industry preventive control programs or phytosanitary specifications. Records must include: o An up-to-date copy of the industry program or phytosanitary specification.	Form – E4 Pest and disease monitoring record Form – E4 Preventive pest and disease control program
E4.2	Obtain, check and record chemicals.	1. Chemicals are purchased from approved suppliers. *(See Appendix A-E4).* 2. Chemical containers are adequately labelled and in acceptable condition on receival. 3. All chemicals purchased are recorded in a chemical inventory. A record is kept and must include: • date purchased/received *(Continues over page)*	Form – E4 Chemical inventory

Code Element		Compliance Criteria	Records
E4.2 *(cont.)*		• place of purchase • name of chemical • batch number (where available) • expiry date or date of manufacture • quantity.	
E4.3	Store, manage and dispose of chemicals to minimise the risk of environmental harm.	1. Chemical storage areas must be: • located and constructed to minimise the risk of contaminating the site and surrounding environment • structurally sound, adequately lit and constructed to protect chemicals from direct sunlight and weather exposure • equipped with a spill kit to contain and manage chemical spills • secure, with access restricted to authorised workers. 2. Chemicals are stored in designated separate areas for each category of chemical, and for chemicals awaiting disposal. 3. A current Safety Data Sheet (SDS) is kept for all chemicals stored in the chemical storage area. 4. Chemicals are stored in original containers according to directions on the container label. If a chemical is transferred to another container for storage purposes, the new container is a clean chemical container and a copy of the chemical label is transferred to the new container. 5. Deteriorating chemical labels are replaced immediately with a legible copy. 6. Stored chemicals are checked at least annually to identify and segregate chemicals for disposal that have: • exceeded the label expiry date • exceeded the permit expiry date • had their registration withdrawn • containers that are leaking or corroded or have illegible labels. 7. A record of the check is kept and must include: • date of the check • name and quantity of chemicals awaiting disposal • name of the authorised person conducting the check. *(Continues over page)*	Safety Data Sheet/s for all chemicals stored Form – E4 Chemical inventory Disposal receipts/records

Code Element		Compliance Criteria	Records
E4.3 *(cont.)*		8. Unusable chemicals and empty chemical containers are legally disposed of through registered collection agencies, or in approved off-farm disposal areas. A record of disposal is kept.	
E4.4	Train and authorise workers who store, handle, apply and/or dispose of chemicals.	1. Workers involved in the supervision of storage, handling, application and disposal of chemicals must: • have successfully completed a recognised chemical users course or equivalent *(See Appendix A-E4).* • be competent in chemical storage, handling, application and disposal as specified by the Freshcare Code of Practice Environmental. 2. Workers authorised to store, handle, apply and/or dispose of chemicals are trained in practices that minimise the risk of environmental contamination from chemicals and in actions to be taken in the event of chemical spills, leakage or spray drift. 3. A register of workers authorised to store, handle, apply and/or dispose of chemicals is maintained and displayed in the chemical storage area.	Record of completion of farm chemical users course Form – E4 Spill response procedure Form – E4 Chemical authorisation record
E4.5	Use chemicals according to regulatory, label and customer requirements.	1. Chemicals are used and applied: • according to label directions, or • under 'off-label permits' issued by the Australian Pesticides and Veterinary Medicines Authority (APVMA), with a current copy of the permit kept, or • according to relevant state legislation for 'off-label use', and • according to specific customer and/or destination market requirements.	Copies of applicable off-label permits
E4.6	Avoid potential for spray drift.	1. Chemicals are not applied when the risk of contaminating off-target areas with spray drift is high. 2. Spray drift incidents are identified. A record is kept.	
E4.7	Maintain and calibrate chemical application equipment.	1. Chemical application equipment is maintained and checked for effective operation before and during each use. 2. Equipment is calibrated at least annually or as per manufacturer's instructions and immediately after spray nozzles are replaced. 3. Equipment is calibrated using a recognised method. A record of calibration is kept and must include: • description of method and calibration results • date of calibration • name of the person calibrating the equipment	Calibration records

Code Element		Compliance Criteria	Records
E4.8	Manage mixing and disposal of chemical solutions to minimise risk to the environment.	1. Chemical mixing areas are located, constructed and maintained to minimise the risk of contaminating the site and surrounding environment. 2. Leftover chemical solutions are disposed of according to label directions where specified, or in a manner that minimises environmental harm.	
E4.9	Record all chemical applications.	1. Records of all preharvest chemical applications are kept and must include: • application date • start and finish times • location and crop • chemical used (including batch number if available) • rate of application and quantity applied • equipment and/or method used to apply the chemical • wind speed and direction • withholding period (WHP) or earliest harvest date (EHD) • method of disposal of leftover chemical solutions • name and signature of the person who applied the chemical. 2. Records of all postharvest chemical treatments are kept and must include: • treatment date • chemical used (including batch number if available) • rate of application and/or the quantity applied • equipment and/or method used to apply the chemical • method of disposal of leftover chemical solutions • name and signature of the person who carried out the chemical treatment.	Form – E4 Preharvest chemical application record Form – E4 Postharvest chemical application record

Freshcare Resources

- Appendix – A-E4 Approved suppliers for chemical purchases
- Appendix – A-E4 Freshcare requirements for chemical user training
- Factsheet – E4 Chemicals

External Resources

HIA Guidelines for Environmental Assurance Chapter 3: Chemical management www.horticulturefortomorrow.com.au

Australian Pesticides and Veterinary Medicines Authority (APVMA): Database of registrations and permits for Agvet chemicals www.apvma.gov.au

Infopest: Comprehensive Agvet chemical database www.infopest.com.au

ChemClear: Disposal of Agvet chemicals www.chemclear.com.au

DrumMUSTER: Disposal of Agvet chemical containers www.drummuster.com.au

Code Element		Compliance Criteria	Records
E5	**Fertilisers and soil additives**		
E5.1	Select fertilisers and soil additives to minimise risk to the environment.	1. The decision to use fertilisers and soil additives is based on one or more of the following: • results of soil/plant tissue/sap testing • crop monitoring with monitoring records kept • a recognised nutrition program. 2. Fertilisers and soil additives used comply with heavy metal limits specified in AS4454-2012 Composts, soil conditioners and mulches. *(See Appendix A-E5).* 3. Workers responsible for crop nutrition are competent to make recommendations relevant to the crops under their management.	Test results, crop monitoring records
E5.2	Store and manage fertilisers and soil additives to minimise risk to the environment.	1. Storage sites for fertilisers and soil additives are located, constructed and maintained to minimise harm to off-target and sensitive areas from nutrient runoff or leaching. 2. A current Safety Data Sheet (SDS) (where available) is kept for fertilisers and soil additives stored on the property. 3. Workers are trained in practices that minimise the risk of environmental contamination from fertilisers and soil additives.	Safety data sheet/s for fertilisers and soil additives
E5.3	Maintain and calibrate fertiliser and soil additive application equipment.	1. Equipment used to apply fertilisers and soil additives is maintained and checked for effective operation before and during each use. 2. Equipment used to apply fertilisers and soil additives is calibrated at least annually or as per manufacturer's instructions. A record of calibration is kept and must include: • description of method and calibration results • date of calibration • name of the person calibrating the equipment.	Calibration records
E5.4	Record all fertiliser and soil additive applications.	1. Records of all fertiliser and soil additive applications are kept and must include: • application date • location and crop • product used • rate of application • wind speed and direction • method of application/incorporation • name and signature of the person applying the fertilisers and soil additives. *(Continues over page)*	Form – E5 Fertiliser and soil additive application record

Code Element		Compliance Criteria	Records
E5.4 *(cont.)*		2. A record of hydroponic nutrient solution monitoring is kept and must include: • monitoring date • location and crop • pH and electrical conductivity (EC) of the feed solution • pH and electrical conductivity (EC) of the drainage solution • quantity of drainage solution • name and signature of the person conducting the monitoring activity.	Form – E5 Hydroponic nutrient solution monitoring record

	Freshcare Resources	External Resources
	• Appendix – A-E5 Limits for heavy metal contaminants in fertiliser and soil additives (AS4454-2012). • Factsheet – E5 Fertilisers and soil additives.	Australian Standard: AS4454 (2012) Composts, soil conditioners and mulches. HIA Guidelines for Environmental Assurance Chapter 4: Nutrient management www.horticulturefortomorrow.com.au

Code Element		Compliance Criteria	Records
E6	**Water**		
E6.1	Manage water use on the property.	1. A Water Management Program is documented and must include: • date developed • name of the person documenting the Program • water resources available • crop water requirements • water budget • irrigation method • irrigation program including justification and schedule • contingency plans if water resources are unavailable. 2. Irrigation requirements are determined using soil/growing medium, crop or weather monitoring methods, or a combination thereof. 3. Irrigation systems are checked and maintained for operational efficiency. 4. Water efficiency must be considered in the selection and design of new irrigation systems and water storages. 5. The Water Management Program is reviewed and updated at least annually. The name of the person completing the review and the date of the review are documented.	Form – E6 Water Management Program
E6.2	Water is harvested, extracted, stored, used and discharged in accordance with licences and permits.	1. Applicable licences and permits for infrastructure and activities in water harvesting, extraction, storage, use and discharge are current. 2. Water licences and permits are adhered to.	Water licenses and permits
E6.3	Manage water to minimise environmental harm.	1. Water used for irrigation is assessed for risk of causing soil degradation by increasing soil salinity, soil acidity, soil alkalinity or soil sodicity. 2. Water that may cause soil degradation is, where possible, treated before use or managed to avoid soil degradation. 3. Water runoff or water discharge from property activities is managed or treated to minimise environmental harm on and off-site. 4. Strategies are implemented to prevent contamination and sedimentation of water sources.	
	Freshcare Resources • Factsheet – E6 Water	**External Resources** HIA Guidelines for Environmental Assurance Chapter 2: Water management www.horticulturefortomorrow.com.au	

Code Element		Compliance Criteria	Records
E7	**Biodiversity**		
E7.1	Manage biodiversity on the property.	1. A Biodiversity Management Program is established using strategies and practices to: • protect areas of biodiversity identified on the property map • reduce threatening processes • manage feral animals, invasive species, pests, environmental weeds and diseases on the property. 2. The Biodiversity Management Program is documented and must include: • date developed • name of the person documenting the Program • biodiversity issues or values • strategies/practices • worker/s responsible. 3. The Biodiversity Management Program is reviewed and updated annually. The name of the person completing the review and the date of the review are documented.	Form E7 – Biodiversity Management Program
E7.2	Develop strategies to protect and improve biodiversity.	1. Biodiversity protection and improvement strategies are developed with consideration of regional biodiversity priorities.	
	**Freshcare Resources** • Factsheet – E7 Biodiversity	**External Resources** HIA Guidelines for Environmental Assurance Chapter 5: Biodiversity management www.horticulturefortomorrow.com.au	

Code Element		Compliance Criteria	Records
E8	**Waste**		
E8.1	Manage waste on the property.	1. A Waste Management Program is documented and must include: • date developed • name of the person documenting the Program • waste type and location • management methods • worker/s responsible. 2. Waste that cannot be avoided, reused or recycled, is disposed of in approved off-site facilities. 3. Records of waste transport and disposal of controlled wastes are kept. 4. All stored waste is managed to minimise the risk of contaminating onsite and off-site areas. 5. The Waste Management Program is reviewed and updated annually. The name of the person completing the review and the date of the review are documented.	Form E8 – Waste Management Program Transport and disposal receipts/records
E8.2	Review input materials to reduce waste.	1. Raw material inputs, size, quantity/weight, the potential for reuse or recycling, and the residual waste product must be considered in the selection of input materials.	

	Freshcare Resources	External Resources
	• Factsheet – E8 Waste	HIA Guidelines for Environmental Assurance Chapter 6: Waste management www.horticulturefortomorrow.com.au

Code Element		Compliance Criteria	Records
E9	**Air**		
E9.1	Manage air quality.	1. An Air Quality Management Program is documented and must include: • date developed • name of the person documenting the Program • issue/s to be addressed • area/location • management methods • worker/s responsible. 2. The Air Quality Management Program is reviewed and updated annually. The name of the person completing the review and the date of the review are documented.	Form – E9 Air Quality Management Program

	Freshcare Resources	External Resources
	• Factsheet – E9 Air	HIA Guidelines for Environmental Assurance Chapter 7: Air management www.horticulturefortomorrow.com.au

Code Element		Compliance Criteria	Records
E10	**Energy and fuel**		
E10.1	Energy and fuel efficiency is optimised throughout the production system.	1. Electricity and fuel consumption is reviewed at least annually. 2. Efficient operating practices for premises, vehicles, machinery and equipment are identified and implemented. 3. Servicing and maintenance records are kept for vehicles, machinery and equipment. 4. Energy and fuel efficiency must be considered in the selection and/or design of new premises, vehicles, machinery and equipment.	Electricity and fuel consumption review Form – E10 Service and maintenance record
E10.2	Bulk fuel is stored to minimise environmental harm.	1. Bulk fuel storages are located, constructed and maintained to minimise the risk of environmental contamination and contain spillage. 2. A current Safety Data Sheet (SDS) is kept for all bulk fuel stored on the property.	Safety data sheet/s for bulk fuel
	**Freshcare Resources** • Factsheet – E10 Energy and fuel	**External Resources** HIA Guidelines for Environmental Assurance Chapter 8: Energy and greenhouse gas management www.horticulturefortomorrow.com.au	

Appendix

Reference	Compliance Criteria
A-M3	Approved Freshcare training includes: • Freshcare Environmental Edition 3 Code of Practice training • Freshcare Environmental 2nd Edition Code of Practice training • Freshcare Environmental 1st Edition Code of Practice training • Freshcare Environmental Viticulture 2nd Edition Code of Practice training • Freshcare Environmental Viticulture 1st Edition Code of Practice training.

A-E4	Approved suppliers for chemical purchases can be demonstrated by:
	• AgSafe accreditation.
	• supplier listed as a Freshcare Recognised Supplier.
	• establishing a supplier agreement that ensures:
	  ○ all chemicals provided are adequately labelled and in acceptable condition
	  ○ all chemicals provided are within Use By dates.

	The following national competencies must be included in all farm chemical user training qualifications: • AHCCHM303 – Prepare and apply chemicals • AHCCHM304 – Transport and store chemicals.
A-E5	Limits for heavy metal contaminants in fertilisers and soil additives comply with those specified in AS4454-2012: • Cadmium <1mg/kg (dry weight basis) • Lead <150mg/kg (dry weight basis).

Glossary

Term	Definition
Adjacent	Immediately adjoining, neighbouring, surrounding, lying near or close by.
Air Quality	The state of the air around us. To maintain air quality, pollution from horticultural production, such as odours, dust, smoke and noise should be managed and minimised.
Approved supplier	A supplier who is approved by the business to provide a product or service that meets defined specifications.
AS4454 Composts, soil conditioners and mulches	An Australian Standard that specifies requirements for organic products and mixtures of organic products that are to be used to amend the physical and chemical properties of natural or artificial soils and growing media.
Audit	A systematic examination of compliance, to determine whether practices that have been introduced are being followed and to ensure that the system achieves its aims.
Australian Pesticides and Veterinary Medicines Authority (APVMA)	Australian government authority responsible for the assessment and registration of agricultural and veterinary chemical products.
Authorised person	A person delegated the right to perform a task or access specific areas of a business. Authorisation may be in consideration of training completed or position held.
Beneficial organism	Any organism that benefits the growing process, including insects, arachnids, other animals, plants, bacteria, fungi, viruses, and nematodes. Benefits include pest control, pollination, and maintenance of soil health. The opposite of beneficial organisms are pests, which are organisms deemed detrimental to the growing process.
Biodiversity	The variety of species of plants, animals and microorganisms, and the ecosystems they comprise, often considered in relation to a particular area.
Biosecurity	Managing and minimising the risk and spread of pests and diseases on-farm.
Business enterprise	Any business undertaking occurring on the property that may cause environmental harm. May include, but is not limited to horticulture, broadacre, livestock and dairy operations.
Calibrate	To check, adjust, make corrections or determine accuracy by comparison with a standard.
Chemical	Products such as insecticides, acaricides, herbicides, fungicides, growth regulators, pheromones and other organic treatments used to control pest, disease, weeds and growth, applied on or around the property, production areas and on harvested produce. It also includes other products used on-farm such as fruit waxes, sanitisers, cleaning agents and grease.

Term	Definition
Commitment statement	A formalised statement on behalf of a business committing to meeting the requirements of the Freshcare Code of Practice Environmental and Freshcare Rules. A commitment statement must be signed by the owner or appropriate senior manager, and communicated to all workers.
Competent	Demonstration of knowledge and skills to complete tasks to specified performance criteria.
Conservation	The preservation, protection and management of the environment and natural resources.
Contamination	The introduction or occurrence of a hazard in the environment. In the case of soils, contamination may include, but is not limited to, persistent chemicals and heavy metals.
Controlled waste	A waste that, unless properly managed, can harm human health and the environment. It is the most hazardous category of waste, and disposal of controlled wastes is regulated. Types of controlled waste include agricultural chemicals, chemical containers, tyres and oil.
Corrective Action Record (CAR)	A written record of an issue, or issues, which must be addressed to demonstrate compliance with the Freshcare Code of Practice Environmental or Freshcare Rules. They may be documented during internal audits (self-assessment), external audits, or during routine farm activities.
Customer	A commercial packer, marketing group, wholesaler, exporter, processor, retailer or consumer who receives produce from a supplier.
Customer requirements	A written specification, agreement or contract between a customer and grower.
Ecological Communities	A unique group of plants, animals and micro-organisms that occupy, and interact within the same geographical space. Each ecological community is adapted to occur in a particular habitat type, usually determined by factors such as soil type, position in the landscape, climate and water availability.
Environment	Surroundings in which an organisation or property operates, including landscape, soil, air, water, flora, fauna, humans and their interrelation.
Environmental Action Plan	The plan by which a business will take action on environmental issues, and the protection and improvement of environmental values on their property. The EAP must be reviewed and updated annually to record progress.
Environmental harm of significance	Significant adverse (negative) change in the environment, wholly or partially resulting from the organisation/property's activities, products or services.
Environmental issue	The result of the negative impacts of human activity on the natural environment.
Environmental management	The management of the environment, particularly in relation to the balancing of the often conflicting requirements of natural and human-made resources, so that the maximum use of the land can be achieved without causing environmental harm of significance.

Term	Definition
Environmental Protection and Biodiversity Conservation Act 1999 (EPBC Act)	Australian Government legislation relating to the protection of the environment and the conservation of biodiversity. It provides a legal framework to protect and manage nationally and internationally important flora, fauna, ecological communities and heritage places.
Environmental value	Worth that a community or society places on environmental resources or services for their life sustaining, recreational, aesthetic or intrinsic ecological aspects.
Environmental weeds	A plant that requires some form of action to reduce its effect on the environment. They can be an exotic or a native species that colonises and persists in an ecosystem in which it did not previously exist.
External audit	A third party audit of a business' operations and records against the Freshcare Code of Practice Environmental and Freshcare Rules to independently assess performance to the Freshcare Standard.
Facility	A structure or building in which produce is grown, packed or stored.
Feral animals	An introduced animal, formerly in domestication, with an established, self-supporting population in the wild.
Fertiliser and soil additives	Products that are added to the soil to improve fertility and structure or control weeds. Examples include inorganic (chemical) fertilisers such as lime and gypsum; and those of organic origin such as animal manure, sawdust, compost, compost tea, seaweed, fish-based products, other biological compounds and those derived from food waste.
Flowchart	A diagram identifying the sequence of activities undertaken in a procedure or process.
Freshcare Environmental training	Training to the Freshcare Code of Practice Environmental, provided by an approved Freshcare trainer or via completion of the Freshcare Environmental eLearning course.
Freshcare Rules	A document released by Freshcare Limited, detailing the requirements of businesses participating in the Freshcare Program.
Fuel	Petrol, diesel, LPG, kerosene, ethanol, oil, or any other gaseous, liquid or solid resource combusted for power or heat.
Good agricultural practices	Practices used to prevent or minimise the risk of hazards occurring during growing, harvesting, packing, storage and transport of produce. The scope of hazards in this Code of Practice is environmental.
Growing Site	Anywhere that fresh produce is produced. Includes paddocks, orchards, greenhouses, shade houses and growth rooms/chambers.
Hazard	A source of potential environmental harm or a situation with the potential to cause harm.
Heavy metal	Usually defined as metals with a specific gravity of four or more, meaning they are at least four times heavier than water for a given volume. Some (not all) heavy metals are toxic, particularly cadmium, lead and mercury.
Highly degraded soil	Soil with three or more degradation factors (see soil degradation).
Input materials	Products, materials and services used by the business, that are received from an external source.

Term	Definition
Integrated pest management (IPM)	Combines several pest management strategies to provide effective, economical control of pests, while minimising damage to the environment. An understanding of the lifecycle and biology of pests underpins the IPM approach. A pest can be an insect, mite, vertebrate (such as birds), disease, or weed.
Internal audit	An audit conducted by the business to review its own processes and system management.
Invasive species	A species occurring, as a result of human activities, beyond its accepted normal distribution and which threatens environmental or other resources by the damage it causes.
Irrigation	The application of water to cultivated land or open space, to promote the growth of vegetation.
Irrigation program	An approach to irrigation developed in consideration of the water resources available, crop water requirements, soil or substrate water holding capacity, soil moisture monitoring methods, irrigation system delivery efficiency and uniformity, nutrient management and potential off-target impacts from water use.
Management representative	An employee, worker, agent, officer, director, advisor, partner, consultant, contractor or sub-contractor who is appointed to represent and/or manage on behalf of a business.
Monitoring	A planned sequence of observations and measurements to assess whether control measures are effective.
Non-compliance	A failure to comply with the requirements of the Freshcare Code of Practice Environmental, or Freshcare Rules.
Off-target	Any misplacement or movement away from the target to which the property activity is directed, for example spray drift on to neighbouring area/crop, or nutrient runoff into sensitive areas.
Organisational chart	A diagram that depicts the organisational structure of a business and relationships of workers' roles in relation to environmental management.
Organisational structure	The chain of command or hierarchy of workers within an organisation or business.
Persistent chemicals	Organochlorine pesticides and other chemicals that remain in the soil, water and surrounding environment for a significant time.
Pest (plant pest)	Organisms deemed detrimental to the growing process of crops.
Phytosanitary specifications	The plant health status of products and compliance requirements for approved treatment protocols to control crop pest and disease for market access.
Planting materials	Seeds, seedlings, young plants, roots, corms, bulbs, bits and suckers used for planting to establish crops.
Postharvest	Any activity that is undertaken to produce that has been harvested.
Preharvest	Any activity that is undertaken on-farm prior to the harvest of a crop.

Term	Definition
Produce (fresh produce)	Includes but is not limited to fresh fruit, vegetables, herbs and nuts.
Property	The whole property/farm and/or areas leased from other landholders for the purpose of agricultural production. It includes all houses, buildings, paddocks, production areas, roads, fauna and flora, watercourses, etc. within the surveyed boundaries of the property title and/or leased areas specified.
Property activity	Movement, development, commercial cropping, stock management, residential and maintenance activities conducted within and around the surveyed boundaries of the property and/or other leased sites.
Property map	Any combination of aerial photographs, topographical maps, cadastral maps, self-drawn maps or overlays that document the required features, infrastructure and natural resources on, or adjacent to the property.
Regional biodiversity	Biodiversity that is endemic; specific to an area, region, community or state.
Ramsar	A term adopted following an international conference, held in 1971 in Ramsar in Iran, to identify wetland sites of international importance. Often in relation to habitat for migratory birds.
Record	Documentary evidence to support compliance with the Freshcare Code of Practice Environmental. The medium can be paper, photographic, magnetic and electronic or optical disc or any combination thereof.
Riparian vegetation	Vegetation on or near the banks of a waterway (creeks, streams, rivers, wetlands).
Risk	The chance of a hazard occurring, measured in terms of likelihood and severity.
Safety Data Sheet (SDS)	A reference document for chemicals, fuels and other hazardous products that includes information on the products: physical and chemical properties; safe handling, storage, transport and disposal procedures; first aid; health hazards; impacts on the environment; and what to do in accidents and emergencies. Also known as Material Safety Data Sheet, in 2012, the term 'material' was removed with a 5 year transition period for naming change.
Salinity	The presence and level of soluble salts in soil or water. Salinity occurs both naturally and as a result of human activity. Its use here is taken to mean salinity increase, caused by property (human) activity.
Scope	Business production activities undertaken, for which Freshcare Certification is required. The Scope will include a description of the business type (grower only, grower and packer, or packer only), site addresses, the crops grown, and the destination market (if known).
Sensitive areas	Areas at high risk of environmental harm caused by property activity. Sensitive areas may include, but are not limited to: Regionally Significant Vegetation, National Parks, World Heritage-listed areas, Ramsar-listed wetlands, biodiverse areas, other crops, livestock, watercourses, marine areas, wetlands, remnant native bushland, soils, neighbouring properties and public areas.
Signature	A personal recording by the individual of their name or a mark representing it. Signatures must be produced manually by the individual in written, digital or electronic format.

Term	Definition
Significant harm	Harm (to the environment) that is irreversible, of high impact or wide-spread, or occurs in an area of high conservation value.
Sodicity	A relatively high proportion of Sodium ions adsorbed to clay particles in the soil, causing soil structure decline and soil instability on wetting.
Soil	Ground or earth. Environmental harm to soil means the degradation of soil chemical, biological and physical characteristics in response to an additive or activity.
Soil acidity	Increasing the acidity of soil. This can occur naturally or be increased through prolonged heavy use of some nitrogenous fertilisers, the removal of alkaline soil materials and the leaching of calcium and magnesium. Soil acidity development can reduce soil productivity, soil biology and runoff water quality.
Soil carbon	Organic carbon stored within soil that is part of the soil organic matter (SOM). SOM is made up of plant and animal materials in various stages of decay and includes other important elements such as calcium, hydrogen, oxygen, and nitrogen. Materials on the surface of the soil, such as leaf litter, are not part of the organic matter until they start to decompose.
Soil degradation	Loss of soil structure or function. Degraded soil has poor structure and/or organic carbon, salinity, pH and nutrient levels that are outside the acceptable range for producing healthy crops in an economically and environmentally sustainable manner.
Soil fertility	A measure of the ability of soil to provide plants with sufficient amount of nutrients and water, and a suitable medium for root development to assure proper plant growth and maturity.
Supplier	An individual or business that supplies materials or services.
Target	The item or site to which property activity is directed. For example, the application of a chemical to a target crop for control of a target pest/disease or the application of a fertiliser to a target paddock for target crop nutrition.
Threatened species	Any native species (including animals, plants, fungi) that is listed as vulnerable, endangered or critically endangered under the *Environment Protection and Biodiversity Conservation Act 1999*. Threatened species are also listed and recognised on a State by State basis under relevant State or Territory legislation.
Training	Provision of knowledge and skills to perform tasks to a specified competency. Training can be delivered on-the-job or through qualified external providers.
Vegetative inputs	Includes mulches, fertilisers and soil additives containing or made from vegetative origins.
Verification	A set of procedures, processes and tests designed to ensure the system is working effectively.
Waste	Unwanted, unusable and rejected materials.
Weed of National Significance (WONS)	Weeds that have been identified by Australian governments because of their invasiveness, impacts on primary production and the environment, potential for spread, and socioeconomic impacts.

Term	Definition
Withholding Period (WHP)	The required period of time that must elapse between the crop treatment and harvest.
Workers	All people working in the business, including family members, staff and contractors working on the property or in the business.
World Heritage listed	Properties forming part of the cultural and natural heritage which the World Heritage Committee considers as having outstanding universal value.