

# CIWM/WAMITAB Continuing Competence

Medium Composting Biodegradable wastes Composting in Open Windrows Composting in Closed Vessels	4MBTOW6 4MBTVE	Including SR2010No14, SR2011No1 SR2008No16 &17  SR2012No7 SR2012No8  SR2012No3 SR2012No4	VRQ Unit 6b: Biological Processing Within the Wastes and Resources Management Industry	treatment of non-hazardous waste  WM1b – Manage the reception of non-hazardous waste WM2 - Manage the movement, sorting and storage of waste HSS3 – Monitor procedures to safely control work operations MSCE9 – Manage the environmental impact of your work  <b>OWR</b> WM4e – Manage site operations on a biological, open windrow composting treatment facility, non-hazardous waste WM21a – Manage the transfer of outputs and disposal of residues from biological, open windrow composting treatment operations  <b>IVC</b> WM4f - Manage site operations on a biological, in-vessel composting treatment facility, non-hazardous waste WM21b – Manage the transfer of outputs and disposal of residues from biological, in-vessel composting treatment operations  WM1b – Manage the reception of non-hazardous waste	AC
Medium Anaerobic Digestion Facility Inclusion use of the resultant	4MBTAD6	Including SR2010No15	VRQ Unit 6b:		AD

## Aerobic Composting

### Revision Summary

Version 1, January 2019

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## Introduction

### About WAMITAB

WAMITAB is an awarding organisation and charity that develops qualifications for those working in cleaning; street cleansing; facilities management; resource management and recycling and parking from operative through to management level.

Since it was formed in 1989, WAMITAB has evolved in line with the convergence between the sectors with a clear focus on promoting and supporting environmental sustainability. With over 120 qualification pathways and 70 quality assured centres, WAMITAB offers an unrivalled specialist network to support staff development.

### What is Continuing Competence?

The CIWM/WAMITAB continuing competence scheme is designed to ensure that the technically competent person (holds a certificate of technical competence, units or a qualification that is part of the CIWM/WAMITAB Operator Competence Scheme) on a waste site has knowledge and skills that keep pace with changes made across the waste management industry, such as the introduction of new legislation, technologies and techniques.

The CIWM/WAMITAB continuing competence scheme requires technically competent people in England and Wales to pass an assessment that demonstrates individuals have kept their competence up to date.

Keeping competence up to date is becoming increasingly important across the UK as society starts to recognise the crucial role that waste and resource management industry professionals play in ensuring that the 434 million tonnes of waste generated every year can be treated, reused and recycled to produce a product that will contribute to further economic growth.

### About this Revision Summary

WAMITAB recognise the diverse needs of learners within the sectors we represent. To support those individuals undertaking their Continuing Competence test, we have developed this revision summary.

This revision summary is designed to support you preparation by linking the learning outcomes with the areas that may come up during the Continuing Competence test.







## 4. Odour Control



### Learning Outcomes

- 4.1 Know under what circumstances odours may be produced during aerobic biological treatment processes.
- 4.2 Know the odour problems associated with aerobic biological treatment processes and how to control them.
- 4.3 Know the methods used to monitor odour on an aerobic composting facility.
- 4.4 Know alternative methods to biofilters for odour control.
- 4.5 Know the limitations of using sniff testing for monitoring odours.
- 4.6 Know the information required in an odour management plan and why it is necessary.
- 4.7 Know how to ensure a biofilter is appropriately designed to meet the need of an aerobic treatment facility.
- 4.8 Know the optimal operating conditions for biofilters and how these can be designed/maintained.



### Where do I find this information?

- [Environment Agency \(2013\) How to comply with your environmental permit. Additional technical guidance for composting and aerobic treatment sector](#)
- [Environment Agency \(2011\) H4 Odour Management](#)
- [Natural Resources Wales \(2014\) How to comply with your environmental permit Additional guidance for: H4 Odour Management](#)
- [Environment Agency \(2010\) Odour Management Plans for Waste Handling Facilities](#)
- [Organics Recycling Group \(2007\) An industry guide for the prevention and control of odours at biowaste processing facilities](#)

### Notes

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## 6. Standards

### Learning Outcomes

6.1 Know what is required to ensure that a fully recovered product may be used without being classed as waste.

6.2 Know the characteristics of:

- a sanitisation regime.
- a stabilisation regime.

6.3 Know the requirements of a Hazard Analysis Critical Control Point plan for a PAS 100 certified facility.

6.4 Know the maximum contaminant concentrations permitted under PAS 100.

6.5 Know the records required in order to comply with PAS 100 and the Quality Protocol.

6.6 Know under what conditions a compost or compost-like output can be applied to land from a non PAS 100 certified facility.

6.7 Know the storage requirements on land for both compost and compost-like outputs.

6.8 Know the requirements and methods for source separation of feedstocks to meet PAS 100.



### Where do I find this information?

- [Environment Agency \(2012\) Quality protocol: compost](#)
- [BSI PAS 100: producing quality compost](#)
- [Environment Agency \(2013\) How to comply with your environmental permit. Additional technical guidance for composting and aerobic treatment sector](#)
- [Environment Agency \(2012\) Compost Quality Protocol](#)
- [DEFRA \(2013\) Mechanical Biological Treatment of Municipal Solid Waste](#)

### Notes

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## 7. Process Principles



### Learning Outcomes

- 7.1 Know each phase of the aerobic composting process and how to manage it.
- 7.2 Know the monitoring and control requirements for the aerobic composting process.
- 7.3 Know the importance of pH during the process and how to manage it.
- 7.4 Know the nutrient ratios for feedstocks and why they are important for effective treatment.
- 7.5 Know the required moisture content for each phase of the aerobic composting process and how to manage it.
- 7.6 Know the effects of temperature on an aerobic composting process and how to manage it.
- 7.7 Know how to manage feedstocks in relation to:
  - Optimum size of input materials.
  - Preventing anaerobic conditions.
  - Moisture levels.
- 7.8 Know how to manage the aerobic composting process in accordance with regulatory and process requirements prevent/in the event of:
  - Plant breakdown.
  - Equipment breakdown.
- 7.9 Know what is good practice for using collected leachate within the aerobic composting process.



### Where do I find this information?

- [Environment Agency \(2013\) How to comply with your environmental permit. Additional technical guidance for composting and aerobic treatment sector](#)

### Notes

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