



West Midlands Waste Capacity Study

Waste Capacity Database Gatekeeper Guidance Notes

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solutions for today's environment

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1 INTRODUCTION

1.1 Background

This document has been drafted to assist the designated database Gatekeeper find their way around the regional waste capacity database (WCD) developed for the West Midlands.

A comprehensive database of waste facilities in the region has been collated (the database is in Microsoft Excel format). The database brings together the latest available information from the Environment Agency, SLR's previous studies for the RTAB and Advantage West Midlands, and the Scott Wilson RTAB landfill data. In future years the database will be maintained and updated on a regular basis to keep the facility list and capacity data up to date. These guidance notes provide support and direction to WPA officers to assist with future updates.

The field headings of the database are colour coded depending on the source or how important the data is deemed to be. All data provides value, however given restrictions in WPA Officer time to complete such a task, the colour coding should be referred to direct attention. The following key is applied to the database field headings:

ENVIRONMENT AGENCY RATS DATA
ESSENTIAL FIELD
DESIRABLE FIELD
OTHER

1.2 Purpose of Database

The database is designed to be a tool to support the annual monitoring process at the regional and local authority level. Specifically, the purpose of the database can be summarised as follows:

- Register of individual waste facilities and their respective known capacity;
- Understanding of capacity by facility type and Local Authority or Region; and
- Allows monitoring of changes in infrastructure and capacity over time.

1.3 Role and Responsibilities of the Gatekeeper

The identified Gatekeeper of the Waste Capacity Database will have the following role and responsibilities with respect to retaining, maintaining, updating and distributing the database:

- **Maintain Version Control:** Retain master copy of the waste facilities database;
- **Liase** with the Environment Agency for annual updates to REGIS (Regulation Information System) / RATS (Regional Attached Tonnage System) data;
- **Update** database with new EA data;
- **Disseminate** relevant data to each WPA Officer;
- **Collate** responses from WPA Officers;
- **Report** any incorrect information identified to the EA;
- **Manage** requests for information; and
- **Distribute** information as required.

2 DATABASE UPDATE PROTOCOL

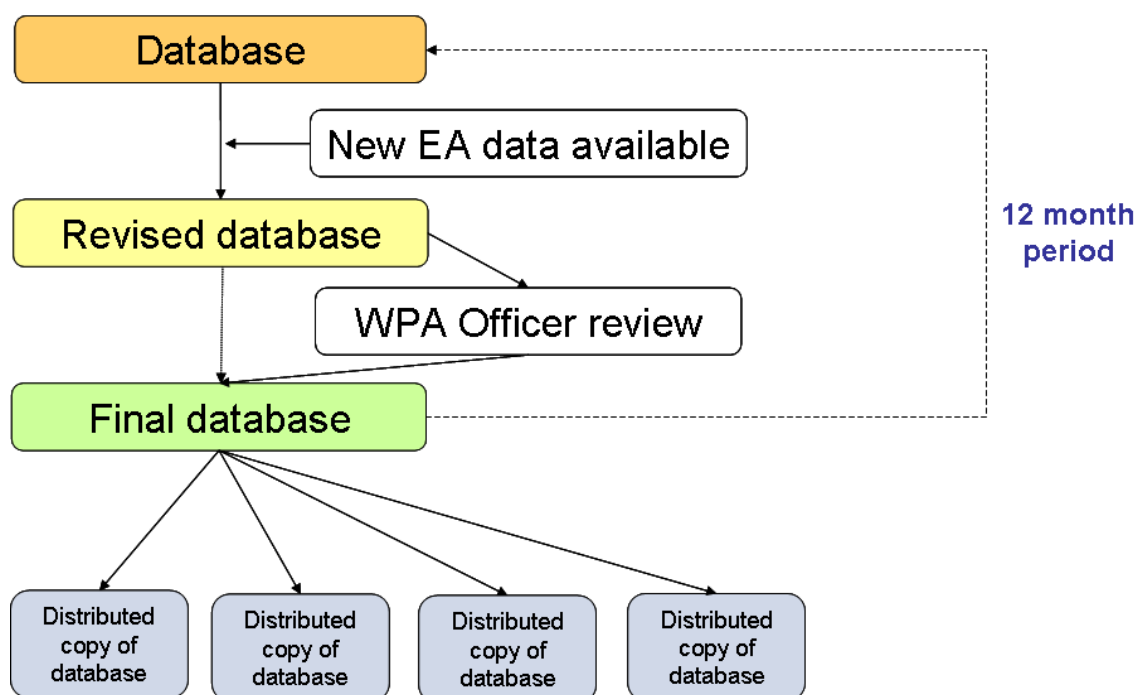
2.1 Gatekeeper Requirement Overview

The database will be updated annually to ensure it remains fit for purpose. The gatekeeper is in charge of maintaining the master copy of the database. **Version control of this information is vital to its development.** This master copy will be updated annually with information from the Environment Agency RATS database.

In addition to the Environment Agency upgrades, each individual WPA is expected to monitor and report on changes to the baseline every twelve (12) months. The Gatekeeper will distribute the relevant section / cut of the waste capacity database (for their authority area) to WPA Officers, who will be requested to review the database and cross check the details with their own records to improve information on existing facilities in the register and incorporate new facilities to the register which are missing, or have recently been granted planning permission (but are yet to be granted an Environmental Permit (WML) from the Environment Agency). The gatekeeper will then integrate the WPA updates into the master copy of the database.

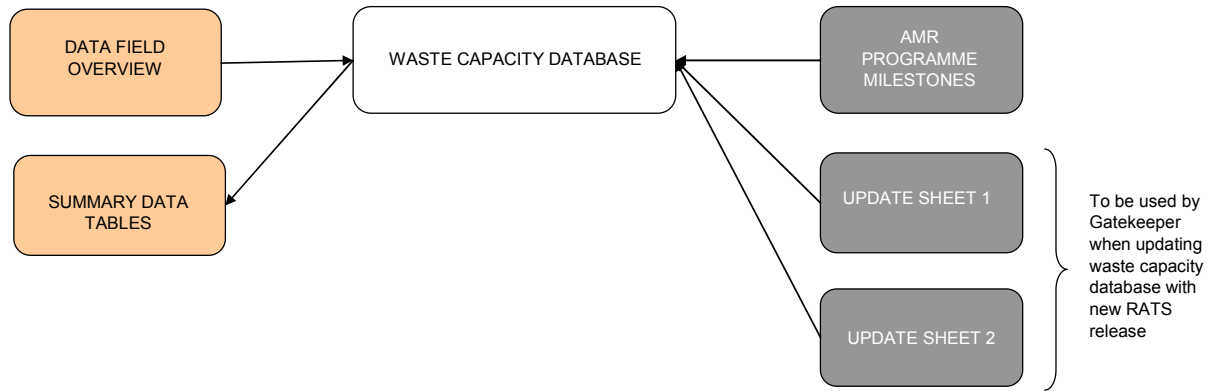
Figure 2-1 gives a diagrammatic explanation of the process for updates to the Waste Capacity Database.

Figure 2-1
Flow diagram to show database update process



2.2 Finding your way round the Database

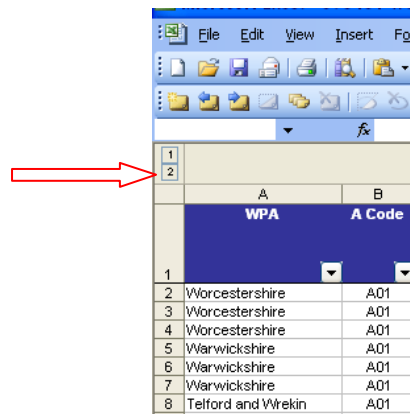
The overview sheet provides a simple route map that summarises the key elements of the database itself, as is shown in the diagram below. Each element is hyperlinked to speed up access.



2.3 Detailed Methodology for Database Update

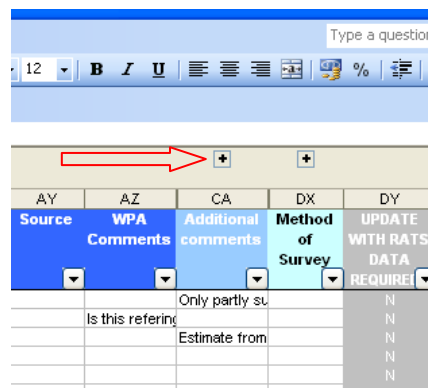
Currently the 'desirable' and 'other' fields of the database are hidden. In order to update the database, all fields need to be displayed.

- To display all of the columns of data, click the 2 button on the top left hand corner of the spreadsheet.



Alternatively the hidden fields can be revealed one at a time:

- To display all of the desirable fields click on the + above column CC; and
- To display all of the other fields click on the + above column DZ.



To hide the fields once more, click on the – that appears in place of the + above columns CC and DZ or click the 1 button on the top left hand corner of the spreadsheet to hide the essential, desirable and other fields together.

2.3.1 Amendments to fields / additional fields of data

The Gatekeeper is only person with permission to add new fields or move existing fields – as they hold the master copy of the database.

The initial 28 columns (A to AB inclusive) of the WCD are identical to RATS database field headings. The only exception is column G, data on duplicates has been added to this column, which is blank in the original RATS database. These 28 columns need to be maintained (with the same field headings and in exactly the same order) in the WCD for ease of incorporating future RATS data releases. Amendments can be made to any of the additional columns of data (currently columns AC to DZ). The Gatekeeper should keep an archive record of each year's database on file.

When a future EA RATS release is available, the data in these initial 28 fields will be overwritten and replaced with the latest RATS information. It will be useful to maintain the previous RATS data regarding throughput (input – shown in column D) to allow comparisons between years and trends to be observed. The process of retaining the earlier throughput data is described in more detail in below.

Columns AQ to AU of the current database display the historic EA throughput data for the last 5 years. In order to maintain 5 years of historic data, before overwriting the current 2007 RATS data, delete the data for the earliest year from the database (currently 2002) and move the data for 2006, 2005, 2004 and 2003 into columns AR, AS, AT and AU respectively. Copy and paste the 2007 input data into column AQ (from column D), amending the year in historic data column headings accordingly. The latest 2008 RATS data can then be pasted over the previous data in the initial 28 columns of the database.

The minimum, maximum and average throughput data is currently calculated from the 3 throughput entries from 3 sources:

- EA RATS throughput (column D)
- SLR Capacity Study throughput (column AL)
- WPA officer added throughput (column AM)


When the latest RATS data is added to the database, it may be necessary to either update the SLR and WPA throughput figures to 2008 figures, or amend the minimum, maximum and average calculation formula.

In time, the fields contained and the order of the fields within the database should be reviewed and amended if deemed necessary.

2.3.2 Incorporation of future RATS/REGIS data release

The updated RATS database is provided by the Environment Agency annually. The following steps should be followed to update the WCD with the new RATS data:

- Select the 'Region by A code' sheet of the new RATS data;
- Display all levels of data in the 'Region by A code' sheet (there are 5 levels of data – to display all levels, click the '5' button on the top left corner of the sheet);

- Check that the headings in columns A to AB match those in the WCD (with the exception of column G which is blank in the RATS database);
- Copy columns A to AB of the 'Region by A code' sheet and paste **as values** into columns A to AB of 'Update Sheet 1' within the WCD workbook;
- Remove any rows which identify totals in the WPA and A-code columns (columns A and B) to leave a list containing only the individual facilities – use the AutoFilter function to select any entries which are totals, then delete these rows;
- Amend the format of the 'WML no' column so that the data is displayed as a number - highlight all cells containing data, click on the error function displayed  then click on **convert text to number**.

Before pulling through the RATS data into the WCD the gatekeeper must cross check the facilities in the Waste Capacity Database to prevent double counting. WPA officers will incorporate new facilities to the register which have recently been granted planning permission but are yet to be granted an Environmental Permit from the Environment Agency – these facilities will not have an EP (WML) number, therefore will be assigned a reference number by the WPA Officer based on the first 3 digits of the WPA and a 3 digit number (e.g. STA001).

The gatekeeper must cross check the WPA referenced facilities in the Waste Capacity Database against the newly permitted facilities in the latest RATS release (filter the new RATS data on the basis on issue date – column W – to facilitate this search). If a permit has been granted for a particular facility, the WML number should be inputted into column H of the WCD overwriting the WPA reference number; the remaining information / fields will be carried into the database through the process described below. If a permit has not yet been granted, the entry in the WCD can be kept the same.

a) Incorporating the New Facilities (facilities currently not contained within the WCD)

To identify which WML numbers in the new RATS data do not appear in the existing waste capacity database, pull down the format in cell AC2 of 'Update Sheet 1' to the bottom of the list of data – any entries that show 'N' do not appear in the existing WCD.

These new WML numbered facilities can be added straight to the database – insert new rows into the database, and cut and paste the information for these new facilities into the database (do not copy over the information in column AC). If any duplicate WML's exist within this new facilities list (i.e. one WML that refers to 2 or more different A codes, therefore appears on more than one row of the list), place a Y in column G of the WCD (Duplicate WML / Permit number).

To identify which of the new WML numbers are duplicates, paste a list of the WML's that are being added to the database into a new spreadsheet. Filter the list in ascending order and use an equals function to determine any of the WML numbers are the same as the WML on the row below.

For example, if the WML numbers are pasted into column A (starting from cell A1) of a new spreadsheet and sorted in ascending order (Highlight the cells containing WML numbers then Data → Sort → Ascending). Add the following formula into cell B1:

=A1=A2

Copy this formula into every cell in column B that is adjacent to a WML number in column A. The formula will return the answer 'TRUE' where duplicates appear; where there is no duplication, the formula will return 'FALSE'. Therefore, if 'TRUE' appears, this is a duplicate

WML, and will need to be noted within the database. For any NEW duplicates identified, put a tick in column G – column G should now show a Y for every new duplicate that is identified.

b) Updating the Existing Facilities

For the WML numbers that appear in both the new RATS database and are contained in the existing Waste Capacity Database (Y in column AC of 'Update Sheet 1'). The data shown in columns A to F and I to AB of the Waste Capacity Database will need to be updated with the new RATS information. Any duplicate entries, where one WML number refers to more than one A code/operation at the same site, will need to be updated individually.

Identify and highlight any duplicate WML or Permit numbers in the RATS list and also identify if any of the RATS WML's refer to a site which is a duplicate in the existing Waste Capacity Database (Y in column G of the WCD). These entries will need to be updated individually.

To identify WML that appear twice in the RATS list – copy this list of WML into a new spreadsheet and sort the list of REGIS WML's, in ascending order, then complete an equals function (as described above) to see where TRUE appears. Duplicate WML that appear in the WCD are already highlighted, these WML's can be cross checked against the RATS list.

It is easiest to split the RATS database at this point to separate out the updates that refer to duplicate WML numbers and those which refer to single WML entries. Cut any updates that refer to duplicates from 'Update Sheet 1' and paste them into 'Update Sheet 2'.

For all WML numbers that only appear once in both the RATS database and the WCD, the information can be pulled into the database using an INDEX MATCH function on the WML number and pasted over the existing data. If there is a Y in column EA of the WCD, the data requires updating, therefore use the AutoFilter to display only entries with a Y – and update columns A to F and I to AB of these entries with the new RATS data using an INDEX MATCH function for each field.

For example assuming the first row of data that requires updating is row 2 of the WCD (the first row of data):

The formula in column A of the WCD (WPA) will read:

=INDEX('Update Sheet 1'!A:A,MATCH(\$H2,'Update Sheet 1'!\$H:\$H,0))

When completing the first formula in column A, the number **highlighted** in the formula below must correspond to the row number that is being updated. Therefore if the first row in the WCD that requires updating is row 8, the formula in column A will read:

=INDEX('Update Sheet 1'!A:A,MATCH(\$H8,'Update Sheet 1'!\$H:\$H,0))

This formula can be copied across to column F (Sub total input (tonnes)). To ensure all the correct column formats are maintained, copy the cell containing the formula, highlight the cells in columns B to F that you want to copy the formula into and paste as a formula using the Paste Special function (Edit → Paste Special → Formulas). The formula in column F should read:

=INDEX('Update Sheet 1'!F:F,MATCH(\$H2,'Update Sheet 1'!\$H:\$H,0))

The formula can then be copied and pasted from column F into columns I (PPC No) to column AB (Nil Date) again using the Paste Special - Formulas function. The formula in column AB should read:

=INDEX('Update Sheet 1'!AB:AB,MATCH(\$H2,'Update Sheet 1'!\$H:\$H,0))

Once the formulae for the first row that requires updating has been filled out, the formulae contained in columns A to F and in columns I to AB can be pulled down into the remaining rows that require updating (ensure the contents of columns G and H are not pulled down). Highlight the cells containing the formulae in column A to F and hover the mouse over the bottom right of the cell until + appears. Then hold down the left hand mouse button on the + and drag the formula downwards to every row that requires updating. Repeat with the formulae in I to AB. The formulae for the remaining rows will be correct as long as the row number from the initial row that required updating is correct.

Once this has been completed, the duplicate entry information in 'Update Sheet 2' can be added to the WCD individually, ensuring that the correct A code for the WML number is updated.

When both the new and existing facilities have been added the following actions should be completed:

- cut and paste columns A to AB of the WCD as values to remove the INDEX MATCH formula contained in columns A to F and I to AB (i.e. paste as values in the same place);
- delete the RATS data contained in 'Update Sheet 1' and 'Update Sheet 2'; and
- formulae contained in columns AN, AO, AP and EA will need to be pulled down to cover any new facilities which have been added.

2.3.3 WPA Officer Review

a) Preparation of WPA of Database list

Using the AutoFilter function, prepare a cut of the database for each WPA.

- Filter on the basis of a specific WPA;
- Copy and paste the returned facilities into a new spreadsheet (with the fields headings included); and
- Repeat for all WPAs – creating a separate spreadsheet for each WPA.

The database cut for each WPA can then be sent by email to each WPA officer for review (process explained below).

b) WPA Review Process

Each WPA officer will report on changes by:

- Updating any incorrect or out of date information for facilities in their authority area;
- Incorporating any known or new facilities which are missing from the register, as a new row at the bottom of the spreadsheet;

Comments and amendments will be completed and returned within the cut of the database itself, under the existing field headings sent by Gatekeeper (no new fields can be added by WPA officers) – new facilities added as a new row at the bottom of the spreadsheet and any additions and amendments made in **red text**, for easy identification of changes.

Each WPA officer will return a copy of the updated cut of the database by email to the Gatekeeper to collate to create an up to date, comprehensive waste capacity database for

the region. Amendments received by the gatekeeper within 2 weeks (or other agreed timescale) will be incorporated into the updated database.

Each WPA officer has been informed not to amend the format of the WCD or add any additional fields, therefore the database field headings will be maintained in exactly the same format in each WPA cut of the database; this will allow easy updating when each WPA officer response is obtained. Information provided in alternative formats should be returned to the WPA officer for amending.

c) Collating WPA Review Information

Once all of the reviewed database cuts have been received, these can be cut and pasted together to create the new updated version of Waste Capacity Database.

Any errors that have been highlighted from columns A to AB of the database during the WPA review process should be fed back to the Environment Agency, so that the RATS database can be amended and updated accordingly.

2.3.4 Access to the database

WPA Officers and RTAB should be provided with full access to a copy of the current WCD, which can be provided either periodically or on request. Other requests should be considered on a case by case basis to prevent distributing commercially sensitive information. Cases for WCD distribution should be reviewed by the Gatekeeper in conjunction with the Chair of the RTAB and/or other designated individuals.

2.4 Additional Points

2.4.1 Timetable for database updates

- Amendments to Field Headings
 - Complete annually, prior to incorporation of updated EA data into the database.
- Environment Agency data
 - Annual updates provided by the Environment Agency;
 - September / October official release; and
 - Work with EA to obtain information, draft data maybe available in July if annual reporting requirements are restrictive.
- WPA Officer review
 - Annual review by WPA Officers;
 - Officers can maintain their own records throughout the year to make the update process less onerous; and
 - Allow 2-4 weeks for WPA officers to return reviewed database.

Indicative timetables for review are illustrated below in Figure 2-2

**Figure 2-2
Update Progression Diagram**

SUMMARY ANNUAL MONITORING PROGRAMME MILESTONES

	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec
Gatekeeper	Disseminate database on request						EA Draft RATS update data available - incorporate data into database - prepare authority cuts of database - send to WPA Officers	Database being updated for new year	Incorporate WPA officer updates into database	Disseminate database on request		
WPA Officers	Maintain authority records of facility amendments							Receive and update cut of database (using authority records) - return copy to Gatekeeper	Maintain authority records of facility amendments			

2.4.2 Definitions and Acronyms used within the database

WCD - Waste Capacity Database

WPA - Waste Planning Authority

Throughput - the actual amount of waste accepted through the facility in a given year (in tonnes per annum)

Capacity - the maximum **permitted** amount of waste that can be taken by a facility or landfill in a given year (in tonnes per annum)

Void (landfill only) – the total airspace remaining in the landfill (measured in cubic metres)

Field - a column of data within the database