References & Publications Dashboard - User Guide

https://www.matienzocaves.org.uk/references-dashboard.php

For a simple logbook search, use the Logbook Search facility.

Overview

The **References Dashboard** provides an interactive overview of the Matienzo Caves Project documentation database, showing statistics, trends, and data quality metrics across all documented cave sites. The data tables used are *MatData* (general primary site data), *references* (card index entries – trips, published material, etc), *logbook* (logbook entries) and *articles* (published hard copy and online resources)

Page Sections

Filter by Cave

Located at: Top of page
What it does: Narrows dashboard data to a specific cave site

How to use:

- **By number:** Type a cave code (e.g., `58` or `0058`) and click Filter
- **By name:** Start typing a cave name - a dropdown list appears with matching caves. Click one to select it.
- **Clear filter:** Click "Clear Filter" to return to viewing all sites
- **View details:** When a single cave is filtered, click "View Full Details" to see the complete cave information page – card index text, logbook pages, published material etc

Quick Stats (Gray boxes)

What it shows: Overall database records - deepest cave, longest cave, highest altitude, most documented site
Interaction: Click any card to jump to that cave's detail page
Note: This data never changes with filters (marked "STATIC DATA")

Data Completeness (Gray boxes)

What it shows: Caves missing key data - coordinates, measurements, references, logbook entries
Purpose: Identify gaps in the database that need attention
Note: This data never changes with filters (marked "STATIC DATA")

Overview (Mixed gray/white boxes)

What it shows:

- Total Sites (static)
- Total References (changes with filter)
- Sites with References (changes with filter) - click to jump to full list at bottom
- Total Articles (static)

Exploration Activity Heatmap

What it shows: Logbook activity by month and year - darker colors = more visits
When visible: Appears when a cave is filtered or with all sites

Data Quality Indicators

What it shows: Percentages of (card index) references with notes, dates, and data issues
Color coding:

- **Green:** Good data quality
- **Yellow:** Could be improved
- **Red:** Issues that need attention (click to see details)

Reference Type Distribution (Donut chart)

What it shows: Breakdown of reference types (publications, logbook entries, notes) in the database
How to use:

- Hover over segments to see full publication titles
- Click legend items to show/hide that reference type
- Top 20 types shown

Publication Timeline (Bar chart)

What it shows: Number of publications by year
How to use:

- Click any bar to see detailed publication list for that year
- When filtered by cave, shows only publications relevant to that cave
- The drill-down panel appears below with clickable links to publications

Most Documented Sites (Horizontal bar chart)

What it shows: Top 15 caves by number of references if no site is chosen.
How to use: Click any bar to jump to that cave's detail page
Changes with filter: Shows top 15 within filtered results, but only 1 if one cave is chosen.

All Sites with References

What it shows: Complete alphabetical list of all caves with card index entries
Format: #0001 Cave Name (number of refs)
How to use: Click any cave to view its detail page
Changes with filter: Shows only filtered results

Orphaned Logbook References (if present)

What it shows: Card index entries that reference logbook dates that don't exist in the logbook table
Purpose: Identifies data inconsistencies that may need investigation
How to use: Click cave name to view its detail page

Performance Notes

- Initial page load: ~0.5 seconds (remote) / ~0.1 seconds (local)
- Filtering by cave: ~5 seconds (processes and refreshes all charts)
- Most interactions are instant (clicking charts, toggling legend items)

Tips

- Use the autocomplete search for quick cave lookup - start typing any part of the cave name
- Click "STATIC DATA" badges to understand which metrics change with filtering
- The publication timeline drill-down is useful for seeing all documentation from a specific year
- Data quality indicators help prioritize data entry and cleanup work

Technical Details

- **Data sources:** MatData (general site data), references (card index entries), logbook (logbook entires), articles (published hard copy and online resources)
- **Updates:** Dashboard reflects current database state on each page load
- **Browser requirements:** Modern browser with JavaScript enabled
- **Chart library:** Chart.js 3.7.0