**Find facilities fast (text search + SA2 filter + location radius)**

Quickly locate residential aged care facilities by typing a name, address, locality, provider (or even a postcode), and optionally filtering by a saved SA2 region. When no text match is found, the page resolves a location and shows nearby facilities within ~20 km, with live result counts and distance badges.

**What you can do**

* **Search by text** across service name, formatted address, locality, provider name, and postcode.
* **Filter by a saved SA2 region** from your Insights analysis; the button shows the count of regions and is disabled when none are saved.
* **See live context and counts** (e.g., “Resolving location.”, “Showing N facilities…”), including mixed counts for radius vs text matches.
* **Get nearby results** when a location is resolved (either from the first text match’s coordinates or a fallback geocode), sorted by distance and labelled “📍 X away”.

**Steps**

**1) Search by name, address, locality, provider, or postcode**

1. Click the search bar and type a **service name**, **formatted address**, **locality**, **provider name**, or **postcode**. The filter checks all of these fields.
2. Watch the status just below the header:
   * If text matches exist, counts update (e.g., “Showing N of M facilities matching ‘…’”).
   * If no text match exists, the page resolves a location (you’ll see **“Resolving location.”**) and then shows nearby facilities within ~20 km.
3. On each result card, look for a blue distance pill (e.g., **“📍 4.2 km away”**) when a radius search is active.

Tip: The page uses a **text-first** approach. It prioritises text matches; if available, it enhances them with a radius around the first text result’s coordinates. If there are no matches, it falls back to geocoding your term.

**2) Filter by a saved SA2 region**

1. Open **SA2 Regions**. The button shows how many saved SA2s you have and is disabled if none are available.
2. Pick a region from **Saved SA2 Regions** (the dropdown lists region name and the count of included postcodes/localities).
3. The search bar is cleared, and the list filters to facilities whose postcode or locality is inside the SA2.
4. Use **Clear filter** to remove the SA2 and restore the default view. This also cleans the ?sa2= param in the URL.

Note: If you arrive here from Insights with a ?sa2= URL parameter, the search bar is auto-populated and the matching saved SA2 may be auto-applied.

**3) Understand the location radius**

* Location-based results use a default radius of **~20 km** (searchRadius = 0.18°). Results are **sorted by distance** and distances are shown on cards.
* A context banner clarifies whether you’re seeing radius results (e.g., “Showing facilities within ~20 km of …”).

Warning: The UI in these files does not expose a user control to change the radius. (See **Open questions**.)

**Behaviour notes (defaults, loading, disabled states)**

* **Defaults:** radius is ~20 km; search is text-first with location enhancement/fallback; SA2 filter clears the search bar when applied.
* **Loading:** shows **“Resolving location.”** while a location is being found.
* **Disabled:** the **SA2 Regions** button is disabled when you have zero saved regions.
* **Dynamic counts:** summary text reflects your state (no search, SA2 only, SA2+search, location radius, or plain search) with live numbers.
* **Empty states:** clear messaging appears for “No search”, “No results”, and includes a **Clear SA2 Filter** action when relevant.

**FAQ**

1. **What fields does the search look at?**  
   Service name, formatted address, locality, provider name, and postcode.
2. **Can I search by postcode only?**  
   Yes—postcode strings are included in the text search.
3. **What if there are no text matches?**  
   The app tries to **resolve a location** from your term and then shows nearby facilities; you’ll see **“Resolving location.”** followed by a context banner.
4. **How near is “nearby”?**  
   About **20 km** by default (searchRadius = 0.18°).
5. **How are radius results ordered?**  
   They’re **sorted by distance** after filtering within the radius.
6. **What do the blue “📍 … away” badges mean?**  
   They show the computed distance from the resolved location to the facility.
7. **How do I use SA2 filtering?**  
   Open **SA2 Regions** → select a saved region. The button is disabled if you don’t have saved SA2s.
8. **What does applying an SA2 filter do to the search bar?**  
   It **clears** the search bar to avoid confusion and focuses the list on the region.
9. **How do I clear the SA2 filter?**  
   Click **Clear filter**; the app also removes the ?sa2= URL param.
10. **Can I deep-link from Insights with an SA2?**  
    Yes; the search bar auto-populates from the ?sa2= param and may auto-select your saved SA2.
11. **How do I see only my saved facilities?**  
    When saved facilities are shown, you’ll see **“Viewing X saved facilities”** (or an empty-state message if none). (UI control name not shown in the files.)
12. **What messages appear with no search vs. no results?**  
    “No search” shows counts and guidance; “No results” explains whether the SA2 or search terms caused the empty state and offers to **Clear SA2 Filter**.

**Troubleshooting**

* **I typed a term and nothing happened.**  
  Check for the **“Resolving location.”** indicator—location fallback may be in progress.
* **No results with an SA2 applied.**  
  Use **Clear SA2 Filter** to widen the scope.
* **SA2 button is greyed out.**  
  You don’t have saved SA2 regions yet; the control is disabled when the count is zero.
* **Saved SA2s didn’t load.**  
  The code handles and surfaces an SA2 load error (“Failed to load saved SA2 regions”). Try refreshing or re-saving in Insights.
* **Distances not visible.**  
  Distance chips appear only when a radius search is active (after location is resolved or text is location-enhanced).
* **Counts look odd (e.g., “within radius + text matches”).**  
  That’s expected when both radius and plain text results are present; the summary shows a split count.

**Screenshot**

**Quick reference checklist**

* Type a name/address/locality/provider/postcode in the search bar.
* If no text matches, wait for **“Resolving location.”** and nearby results.
* (Optional) Open **SA2 Regions** and select a saved region.
* Use **Clear filter** to remove an SA2.
* Read the summary line for live counts/context.
* Use the distance pill to judge proximity when radius is active.

**Open questions for PM/Eng**

1. **Radius control:** the code sets searchRadius = 0.18 (~20 km), but no user-facing control is visible. Should users be able to change the radius, and where?
2. **Saved vs Search view toggle:** messaging exists for “Viewing X saved facilities”, but the control to switch views isn’t shown in these snippets. Confirm the control label/placement.
3. **Search history trigger:** History tips say “Click ‘View Details’ to save searches,” but page code saves search terms when saving a facility. Confirm intended trigger(s).
4. **Mixed counts copy:** The summary line for mixed radius+text results uses “within radius + text matches”; confirm final phrasing.

Note: This guide is based solely on the uploaded code files. If a label, control, or workflow isn’t shown above, it hasn’t appeared in the files provided.

**Browse Saved Facilities & Switch Between Search vs Saved Views**

Business users and analysts can quickly flip between the default **Search** view and a dedicated **Saved** list to review, open, or clear previously saved residential facilities.

**Note:** Saved items load after sign-in. The app fetches your saved facilities from Supabase once a user is detected.

**What you’ll use**

* **Search Facilities** button (header) — selects the Search view.
* **Saved (N)** button (header) — opens the Saved menu (N = number of saved items). Disabled when N=0.
* **Saved menu** actions: **View Saved Facilities**, **Clear All**, per-item **Remove** (✕).

**Steps**

**A) Switch to your Saved list**

1. In the header, select **Saved (N)** to open the Saved menu.  
   If you have no saved items (N=0), the button is greyed and does nothing.
2. Choose **View Saved Facilities**. The page switches to the **Saved** view.

**Tip:** You can also click any facility **name** inside the Saved menu to jump straight to its details.

**B) Browse, open, or tidy Saved items**

1. In **Saved** view, each facility shows name, address, and when it was saved. Use **View Details** on a card to open it.
2. Remove a single item with the **Delete saved facility** button on the card (trash icon).
3. To bulk clear, open **Saved (N)** → **Clear All**. A confirmation appears before clearing.

**Warning:** Deleting the last item auto-closes the Saved menu.

**C) Return to Search view**

1. In the header, select **Search Facilities**; or, if your Saved list is empty, use **Start Searching** in the empty state.

**What you’ll see (states & counts)**

* **Default view:** Search (i.e., **showSavedFacilities** starts as false).
* **Saved count:** Header shows **Saved (N)** and updates as items are saved/removed.
* **Empty Saved view:** A panel with **No Saved Facilities** + **Start Searching**.
* **Saved view info line:** “Viewing N saved facilities” (or message when none).
* **Search view guidance & counts:** Dynamic text like “Search through X residential facilities…” and facility/SA2 counts.
* **Loading indicator (search):** “Resolving location.” while resolving coordinates.

**Screenshot (placeholder)**

![SCREENSHOT PLACEHOLDER — Header showing “Search Facilities” selected, “Saved (3)” menu open with list items, Clear All, and “View Saved Facilities” button.]

**FAQ**

1. **Why is the Saved button greyed out?**  
   It’s inactive when you have **0** saved items; clicking does nothing.
2. **How do I switch to Saved view?**  
   Open **Saved (N)** → **View Saved Facilities**.
3. **How do I go back to Search?**  
   Use the header **Search Facilities** button, or **Start Searching** in the Saved empty state.
4. **Where does the Saved count (N) come from?**  
   It’s the length of your saved list and updates after save/delete actions.
5. **Can I clear everything at once?**  
   Yes—**Saved (N)** → **Clear All**. You’ll be asked to confirm first.
6. **How do I remove a single saved facility?**  
   Use the ✕ in the Saved menu, or the trash icon on a Saved card.
7. **What happens after I delete the last saved item?**  
   The Saved menu closes automatically.
8. **Why don’t I see my Saved items after signing in?**  
   Saved items load only after a user is detected; then the app fetches your list from Supabase.
9. **Is there a limit on saved items?**  
   Yes—saving stops at **100** items.
10. **Can I open a facility directly from the Saved menu?**  
    Yes—click its **name** in the menu to open details.
11. **What does the Search view count message mean?**  
    It reports how many facilities match your current filters/term (and shows SA2 and radius context when applicable).
12. **Do I need to be signed in to save?**  
    Yes—attempting to save prompts sign-in.

**Troubleshooting**

* **“Saved (N)” shows 0 even after I saved something**  
  Make sure you’re signed in; on successful save the app reloads the list from Supabase.
* **“Clear All” didn’t work**  
  The feature asks for confirmation and then clears via Supabase. If your database table is missing, you may see an error—contact support to set up the table.
* **Saved menu closes unexpectedly**  
  This is by design when the last item is deleted.
* **I can’t open the Saved menu**  
  You have no saved items yet (N=0); save something first.
* **Location spinner appears in Search view**  
  You’ll see “Resolving location.” while the app resolves coordinates for your query.

**Quick reference checklist**

* Switch to Saved: **Saved (N)** → **View Saved Facilities**.
* Back to Search: **Search Facilities** (header).
* Empty Saved: **No Saved Facilities** + **Start Searching**.
* Remove one: Card **Delete saved facility** or menu ✕.
* Clear all: **Saved (N)** → **Clear All** (with confirmation).
* Watch counts: **Saved (N)** in header; “Viewing N saved facilities” line in Saved view.

**Open questions for PM/Eng**

1. Should the **Saved (N)** button directly toggle to Saved view on click (when N>0), or remain menu-only? Current behavior is menu-only.
2. Do we need an explicit **Saved Facilities** tab/trigger alongside **Search Facilities** for symmetry? (Now it’s **Search Facilities** + **Saved menu**.)
3. Confirm copy for the **Clear All** confirmation dialog (currently implemented via confirm(...)).
4. Should Saved view support sorting or filtering of saved items (e.g., by date saved)? (Not present.)
5. Any UX limits or warnings before reaching the 100-item cap? (Back-end enforces the cap.)

# **Save a facility (and remove it later)**

Business users and analysts can **save** residential facilities for quick access, then **view, unsave, or clear** them. Saved items are stored per signed-in user in Supabase.

**What you can do**

* Save/unsave from **cards** and from the **Facility Details** header.
* Open the **Saved (N)** menu, jump to the **Saved Facilities** view, remove single items, or **Clear All**.
* Supabase enforces limits and duplicate checks (e.g., **100 max**, “already saved”).

**Steps**

**A) Save a facility**

1. **From a facility card** (search results): click the **Save** icon button (tooltip switches between **“Save facility”** and **“Remove from saved”** when toggled).
   * If you’re not signed in, you’ll see **“Please sign in to save facilities”** and be redirected to **/auth/signin**.
2. **From Facility Details**: use the header button.
   * When **not saved**: **Save Facility** (blue style). When **saved**: **Unsave** (green style). The tooltip reads **“Save this facility”** vs **“Remove from saved”**.
3. On success, the item appears in your saved list (fetched for the signed-in user).

**Note**: Supabase prevents duplicates and caps to **100** saved facilities. You’ll see messages like **“Facility is already saved”** or **“Cannot save more than 100 facilities.”**

**B) View your saved facilities**

1. Click the **Saved (N)** button in the page header.
   * When **N > 0**, it opens a dropdown listing your saved items and actions; when **N = 0**, the button is grey and does not open the dropdown.
2. In the dropdown:
   * Click a row to open its details.
   * Click **View Saved Facilities** to navigate to the dedicated saved view.
3. In the **Saved Facilities** view, you’ll see the same card layout, plus an **Unsave** icon per card. Empty states show **“No Saved Facilities”** with a **Start Searching** button.

**C) Remove a saved facility**

1. **From a card** (search or saved view): click the **Save** icon again (tooltip shows **“Remove from saved”** when currently saved).
2. **From Facility Details**: click **Unsave** in the header.
3. **From the Saved (N) dropdown**: click the **X** on a row to remove it immediately (no confirmation).

**D) Clear all saved facilities**

1. Open **Saved (N)** → click **Clear All**.
2. Confirm **“Are you sure you want to clear all saved facilities? This action cannot be undone.”**
   * On success, you’ll see **“All saved facilities have been cleared successfully.”**

**Where your saves live (Supabase)**

* Each saved row includes user\_id, facility\_id, facility\_name, and facility\_data.
* Deletes: row-level delete by id. **Clear All** deletes all rows for the user\_id.
* Guardrails & errors: duplicate check, **100** max, and a **table-missing** message if the database isn’t set up.

**Tip**: Because saves are keyed to user\_id and loaded after sign-in, your saved list follows you when you sign into the same account.

**Behavioral notes (UX details)**

* **Saved button states**
  + **Saved (N)** styles blue when N>0 and grey when N=0; the dropdown opens **only when N>0**.
* **Empty states**
  + Header message: **“No saved facilities yet…”** vs **“Viewing N saved facilities.”**
  + Dedicated view shows **“No Saved Facilities”** + **Start Searching** CTA.
* **Auth requirement**
  + Saving requires sign-in; otherwise you’ll see an alert and be routed to **/auth/signin**.
* **Instant feedback**
  + Single-row delete from dropdown has **no confirm**, updates the list immediately and closes the dropdown when the last item is removed.
* **System messages**
  + Clear All: confirm + success/error alerts.
  + Save errors are surfaced (e.g., limit, duplicate, table missing).

**FAQ**

1. **Do I need to sign in to save?**  
   Yes. Otherwise you’ll get **“Please sign in to save facilities”** and be sent to **/auth/signin**.
2. **Where are my saved items stored?**  
   In Supabase table residential\_saved\_facilities keyed by user\_id.
3. **What’s the save limit?**  
   Up to **100** per user. Attempts beyond that return **“Cannot save more than 100 facilities.”**
4. **What if I try to save the same place twice?**  
   You’ll see **“Facility is already saved.”**
5. **Can I remove one saved item without a prompt?**  
   Yes—use the **X** in the **Saved (N)** dropdown; it removes immediately.
6. **How do I remove everything?**  
   Use **Saved (N)** → **Clear All**, confirm the message, and all rows for your user\_id are deleted.
7. **How do I get to the Saved view?**  
   Open **Saved (N)** → **View Saved Facilities**.
8. **Can I save/unsave from the details page?**  
   Yes—use the header button (**Save Facility** / **Unsave**).
9. **Why does the Saved button look grey and not open?**  
   It opens only when N>0 (no dropdown when you have none saved).
10. **What if the database isn’t set up?**  
    You’ll receive a message like **“Database table not found. Please contact support…”** during save attempts.
11. **Does the saved list persist across browsers/devices?**  
    Yes—once you sign in, your list loads from Supabase by user\_id.
12. **Is there a confirmation for single-item delete?**  
    No confirmation in the dropdown; **Clear All** has a confirmation dialog.

**Troubleshooting**

* **I click Save but nothing happens**
  + Make sure you’re signed in; otherwise saving is blocked and you’re redirected to sign-in.
* **“Cannot save more than 100 facilities”**
  + You’ve reached the limit. Unsave some items or use **Clear All**.
* **“Facility is already saved”**
  + The facility exists in your list already; no duplicate rows are added.
* **“Failed to save/delete/clear”**
  + Supabase returned an error; try again. If you see **“Database table not found…”**, contact support to run the setup.
* **Saved button shows (0) and won’t open**
  + This is by design—the dropdown appears only if you have saved items.
* **After deleting the last saved item, the dropdown is still open**
  + The UI closes the dropdown automatically when the last item is removed.

**Warning**: The app computes a facility\_id from the service name and (when available) the provider ABN; this ID is used for duplicate checks and unsave. If a facility lacks provider\_abn, a timestamp is used, which may affect duplicate detection across sessions. (Implementation detail: template ${"Service Name"}\_${provider\_abn || Date.now()}.)

**Screenshot (placeholder)**

![Saved Facilities dropdown with three items: shows “Saved (3)” button, “Saved Facilities” title, each row with facility name + address, an “X” remove icon, and a “View Saved Facilities” button at the bottom.]

**Quick reference (checklist)**

* Signed in (required to save).
* Click **Save** on a card or **Save Facility** in details.
* Open **Saved (N)** (N>0) → **View Saved Facilities**.
* Remove one via **X** (no confirm) or **Unsave** in details.
* **Clear All** only if you’re sure (confirmation required).
* Remember: **100** max; duplicates blocked.

**Open questions for PM/Eng**

1. **Stability of facility\_id**: Should the ID be deterministic when provider\_abn is missing (avoid Date.now()), to ensure consistent duplicate detection across sessions?
2. **Single-item delete confirmation**: Do we want an optional confirm for the **X** action in the dropdown? Current behavior is silent removal.
3. **Saved (0) UX**: Should clicking **Saved (0)** open guidance? Today it does nothing.
4. **Error surfacing**: For save/delete failures, should we standardize to toasts instead of alert boxes? Current code uses alert(...).
5. **Visible limit indicator**: Should we show “X/100 saved” somewhere to pre-empt the limit error? (Supabase enforces 100, but UI doesn’t display a quota meter.)

# Clear all saved facilities (bulk action)

Quickly remove every facility from your saved list in one go—handy when you’re starting a new shortlist or cleaning up old picks.

**Tip**: You must be signed in, and the Saved menu needs at least one item before you can open it.

## Steps

1. **Open the Saved menu.**  
   Click **Saved (N)** in the top bar. This opens the **Saved Facilities** dropdown when your count is greater than 0.
2. **Choose “Clear All”.**  
   In the dropdown header, select **Clear All** (trash icon).
3. **Confirm the bulk action.**  
   A browser confirmation asks: “Are you sure you want to clear all saved facilities? This action cannot be undone.” Click **OK** to proceed.
4. **Review the result.**  
   On success, the list is emptied, the dropdown closes, and you’ll see a success alert. On failure, you’ll see an error alert.

## What happens under the hood

* The **Clear All** button calls a handler that requires a signed-in user and shows a confirmation dialog before proceeding.
* If confirmed, the app deletes **all** your saved facilities from the residential\_saved\_facilities table (Supabase) and returns a success/failure message.
* The UI immediately clears local state and hides the dropdown, then surfaces a browser alert with the outcome.

**Note**: The **Saved (N)** button becomes a grey, non-interactive pill when you have 0 saved items; the dropdown (and Clear All) won’t open.

**Warning**: This bulk delete cannot be undone. The confirmation copy explicitly states that.

## Behavioural details

* **Visibility & enablement**
  + **Saved (N)** is clickable only when N > 0. Otherwise the click handler is disabled.
  + The dropdown renders only when it’s open **and** there are saved facilities.
* **Confirmation & alerts**
  + A browser **confirm** is shown before deletion; success/failure uses alert(...).
* **Post-action state**
  + On success: in-memory list cleared, dropdown closed, success alert displayed.
* **Auth requirement**
  + The handler exits immediately if you’re **not signed in** (no prompt).

## Screenshot placeholder

[**Screenshot placeholder**: Saved Facilities dropdown open with the **Clear All** button highlighted and the confirmation dialog visible. The counter shows a non-zero value; after confirming, the empty state is visible.]

## FAQ

1. **Where is “Clear All”?**  
   In **Saved (N) → Saved Facilities** dropdown header.
2. **Will I be asked to confirm?**  
   Yes—browser confirmation appears with irreversible warning copy.
3. **What exactly gets deleted?**  
   Every record in your residential\_saved\_facilities for your user id.
4. **How do I know it worked?**  
   You’ll see a success alert; the dropdown closes and your saved count becomes 0.
5. **What if it fails?**  
   You’ll see an error alert—either a specific message from the service or a generic one.
6. **Do I need to be signed in?**  
   Yes. If you’re not signed in, the handler does nothing.
7. **Why is the Saved button grey / won’t open?**  
   There are no saved facilities, so the button is non-interactive.
8. **Is there a limit to how many I can save?**  
   The service flags hasReachedLimit when count ≥ 100—useful context for bulk management.
9. **Can I remove a single item instead of everything?**  
   Yes—use the item’s delete action in the list (no confirmation).
10. **Does this affect comparison selections?**  
    No. Clearing saved facilities is separate from clearing comparison selections (which has its own “Clear All”).
11. **What if the database table doesn’t exist yet?**  
    The service warns and returns an empty result; contact your admin to run the setup.
12. **Is there a loading spinner during Clear All?**  
    No dedicated loading UI is implemented for this action (alerts indicate completion).

## Troubleshooting

* **“Failed to clear saved facilities.” alert**  
  Likely a Supabase error; retry and check connectivity. The service returns this message on error.
* **Nothing happens when clicking Clear All**  
  Ensure you’re signed in; the function exits early if not.
* **Saved button won’t open dropdown**  
  You probably have 0 saved items; the button is intentionally non-interactive until you save something.
* **“Residential saved facilities table not found” warning in logs**  
  The service logs this if the table is missing; run the database setup script.
* **Items still appear after clearing**  
  The UI clears in-memory state and closes the dropdown immediately; refresh if you suspect old data.

## Quick reference (checklist)

* Open **Saved (N)**.
* Click **Clear All**.
* Confirm the irreversible action.
* Look for the success alert and empty state.

## Open questions for PM/Eng

1. Should we display a **sign-in prompt** if unauthenticated users try to open **Saved (N)** or click **Clear All**, instead of silently returning? (Today: silent return.)
2. Do we prefer **toast notifications** over alert(...) for success/failure? (Today: alert.)
3. Should we add a **loading/disabled state** during the deletion request to prevent double clicks? (Today: none.)
4. When the saved count reaches the **100-item limit** hint, should the UI surface this proactively? (Service exposes hasReachedLimit.)
5. Confirm that **bulk clear** should **not** trigger a background re-fetch, relying solely on state reset. (Today: setSavedFacilities([]) + close dropdown.)

# Build a comparison set (2–5 facilities)

Pick facilities, watch the **Compare (n)** counter, and open the selection to launch side-by-side comparison.

![Screenshot placeholder — show the header with “Compare (2)” open, listing “Selected for Comparison”, each item with an “X” remove button, and the “View Comparison” button.]

## Steps

1. **Select facilities for comparison**
   * In **Search Results**, use the top-right **Scale** button on each facility card (title: “Select for comparison”). Selected cards show a small numbered badge indicating selection order and a highlight.
   * In **Saved Facilities**, use the top-right **checkbox** to select.
2. **Track the counter**
   * The header shows **Compare (n)**. It’s grey when empty and turns orange with a count when you’ve selected ≥1. Clicking it only opens the list if at least one facility is selected.
3. **Review and edit your set**
   * Open **Compare (n)** to see **Selected for Comparison**, each with **address** and an **X** to remove. Use **Clear All** to remove everything.
4. **Respect the max of 5**
   * If you try to add a 6th facility you’ll see: **“Maximum 5 facilities can be selected for comparison.”**
5. **Start the comparison**
   * When you have **≥2** selected, a **View Comparison** button appears in the dropdown. Click it to navigate to /residential/compare?facilities=…. If signed in, the run is saved to **Recent Comparisons**.
6. **Know what persists**
   * If you’re signed in, your current comparison selections load automatically on page open, so the counter may already show a number.

## Behavioral notes

* **Sign-in required for selection.** If you’re not signed in and try to select, you’ll get: **“Please sign in to use comparison features.”**
* **Dropdown visibility.** **Compare (n)** only opens when n>0; the **View Comparison** button appears only when n≥2.
* **Visual cue for selected cards.** Selected results are visibly highlighted.
* **Click-away close.** Clicking outside the selection list closes it.
* **History hints.** The history panel reminds: “Select facilities with checkboxes for comparison” and “Click ‘View Comparison’ to save to recent comparisons.”

## FAQ

**1) Where exactly is the selection control?**  
On each result card’s **top-right** as a **Scale** button (Search Results) or a **checkbox** (Saved Facilities).

**2) What does the small number badge mean?**  
It shows the **selection order** of the facility in your set.

**3) Why won’t the Compare menu open?**  
You need at least **one** selected; otherwise the button is grey and doesn’t open.

**4) Why don’t I see “View Comparison”?**  
It appears only when **≥2** facilities are selected.

**5) How do I remove a single facility from the set?**  
Open **Compare (n)** and click the **X** next to the facility.

**6) How do I clear everything?**  
Use **Clear All** in **Selected for Comparison** (you’ll be asked to confirm).

**7) What’s the selection limit?**  
**5 facilities.** Attempts beyond 5 trigger an alert.

**8) Do I need to sign in?**  
Yes—to **use comparison features** like selecting facilities. Otherwise you’ll see a sign-in alert.

**9) Will my selections persist across sessions/devices?**  
If you’re signed in, selections load from your account on page open.

**10) Does launching a comparison get saved anywhere?**  
Yes—if signed in, it’s saved to **Recent Comparisons**.

**11) Can I select from Saved Facilities?**  
Yes—use the checkbox on each saved facility card.

**12) Why does the counter already show a number when I arrive?**  
You had **previous selections** saved; they were loaded automatically.

**13) I clicked outside and the list vanished—is that expected?**  
Yes—the selection list **closes on outside click**.

**14) What URL is used for the comparison page?**  
/residential/compare?facilities=<comma-separated facility names> (URL-encoded).

**15) How are duplicates handled?**  
Selection checks use **Service Name** equality; behavior with **identical names** isn’t otherwise specified in these files.

## Troubleshooting

* **“Please sign in to use comparison features.”**  
  Sign in, then select facilities again.
* **“Maximum 5 facilities…”**  
  Remove one (open **Compare (n)** → **X**) before adding another.
* **I selected items but counter is 0.**  
  Ensure you’re **signed in**; selections persist and sync only when authenticated.
* **“View Comparison” doesn’t show.**  
  You need **≥2** selected; check the count on **Compare (n)**.
* **The list keeps closing.**  
  It closes on outside clicks by design; reopen **Compare (n)**.

## Quick reference (checklist)

* Click **Scale** button (or **checkbox** in Saved) on 2–5 facilities.
* Open **Compare (n)** to review; remove with **X** or **Clear All**.
* When n≥2, click **View Comparison** to go to the compare page.
* (Optional) Sign in to sync selections and save comparison history.

## Open questions for PM/Eng

1. **Duplicate names.** Selection and URL building rely on **Service Name**; what’s the expected behavior if two facilities share the same name? (Selection checks use name equality.)
2. **Loading state for selection sync.** selectionSyncLoading is set during add/remove, but no visible spinner is defined—should a UI indicator be added?
3. **Consistency of selection controls.** Search Results use a **Scale** button; Saved Facilities use a **checkbox**. Is that intentional or should the control be consistent?
4. **Unauthenticated experience.** Currently blocks selection with an alert. Should guest users be allowed to build a temporary (local) set?

# Launch a side-by-side comparison

Quickly compare residential aged-care facilities side-by-side in a dedicated page that reads your selection from the URL and lays out key metrics across tabs.

## What you’ll do

1. **Select facilities from the Residential results list.** Use the facility selection checkboxes for comparison. (Exact control placement is not shown in these files.)

Tip: The History panel copy confirms “Select facilities with checkboxes for comparison.” and that clicking **View Comparison** saves to recent comparisons.

1. **Click View Comparison.** This opens the comparison using your current selection. (The label **View Comparison** is referenced in History panel tips.)
2. **Land on the compare page:**  
   The app navigates to
3. /residential/compare?facilities=<comma-separated Service Name values>

The page reads the facilities query, loads the dataset, and filters rows by exact **Service Name** matches.

1. **Explore tabs across metrics.** Use the tabs along the top—**Main**, **Rooms & Costs**, **Compliance**, **Quality Measures**, **Residents’ Experience**, **Staffing**, **Finance & Operations**—to jump between sections.
2. **Share or revisit the comparison.** The same URL reproduces the selection because the page derives state from the facilities parameter.
3. **Return to browsing.** Use **Back to Residential** in the header to go back to the Residential page.

Note: The minimum or maximum number of facilities required to open **View Comparison** isn’t specified in these files.

## What you’ll see on the compare page

* **Header** with title **Facility Comparison**, a count of facilities compared, and a **Back to Residential** button.
* **Tabbed content** (7 tabs listed above). Each tab renders a wide table with a sticky left “Metric” column and one column per facility. Rows are only shown when at least one selected facility has data for that metric.
* **Ratings** are rendered as 1–5 stars with yellow fill; if missing, “No rating” appears.
* **Formatting:** currencies show in **AUD** (Australian locale), percentages display with one decimal and a %.
* **Finance & Operations** supports rich nested financial paths (e.g., financials.expenditure.total\_per\_day.value), including sector averages and variance %, when present.

Tip: From the Residential page, opening **View Comparison** also creates an entry under **Recent Comparisons** in the History panel; you can clear or delete items there.

## Behavioural notes (states & defaults)

* **URL-driven:** If facilities is missing, the page redirects to /residential.
* **Loading:** Spinner with “Loading facility comparison…” while data is fetched.
* **Empty result:** Shows “No facilities found for comparison.” with a button to return to Residential.
* **Row visibility:** A metric row is omitted if every selected facility lacks a valid value; “Residents’ Experience” rows use a specialized numeric check.

## Screenshot

**[Screenshot placeholder]**  
Alt text: “Facility Comparison page showing seven metric tabs and multi-column table with sticky Metric column and star-rating cells.”

## FAQ

1. **What URL opens a comparison?**  
   /residential/compare?facilities=<name1>,<name2>,... (comma-separated **Service Name** values).
2. **Where does the data come from?**  
   From /maps/abs\_csv/Residential\_May2025\_ExcludeMPS\_updated\_with\_finance.json, loaded on page open.
3. **How are selected facilities matched?**  
   The page splits the facilities parameter by commas and includes facilities whose **Service Name** exactly matches any listed name.
4. **What if I visit the page without facilities?**  
   You’ll be redirected to /residential.
5. **Why is a metric row missing?**  
   Rows are hidden when none of the compared facilities has a valid value for that field.
6. **How are ratings displayed?**  
   As star icons (1–5). If no rating, it shows “No rating.”
7. **How are dollar and percent values formatted?**  
   AUD with en-AU locale; percentages to one decimal place with %.
8. **What’s in the “Finance & Operations” tab?**  
   Nested financial metrics such as totals, sector averages, and variance %, rendered when available.
9. **Can I get back to the Residential page?**  
   Yes—use **Back to Residential** in the header.
10. **Will my comparison be saved anywhere?**  
    Yes. Opening **View Comparison** adds an entry under **Recent Comparisons** in the History panel. You can also clear or delete entries.
11. **Is there a separate, quick comparison modal?**  
    A modal component (ComparisonTable) exists with star-based highlights and a colour legend; however, these files don’t show where it’s invoked from.

## Troubleshooting

* **Stuck on “Loading facility comparison…”**  
  Check network access to the JSON path above. Errors are caught in code and loading is cleared after the attempt.
* **“No facilities found for comparison.”**  
  Confirm that the names in the URL exactly match **Service Name** values from the dataset; mismatches won’t render columns.
* **A row I expect is missing.**  
  Rows render only if at least one facility has data; zero values are treated as “no data” by the validity check and may hide the row.
* **A facility with a comma in its name doesn’t parse correctly.**  
  The selection uses comma-separated names; names containing commas can be ambiguous in the URL. (No explicit handling is shown in these files.)
* **Finance fields not showing.**  
  Nested financials render only when present in the source object paths (e.g., financials.expenditure.total\_per\_day.value).
* **History not updating.**  
  The History panel’s UI supports **Recent Comparisons** with Clear/Delete actions; ensure you opened **View Comparison** from Residential first.

## Quick reference checklist

* Select facilities via checkboxes.
* Click **View Comparison**.
* Confirm you’re at /residential/compare?facilities=....
* Use tabs to scan **Main**, **Rooms & Costs**, **Compliance**, **Quality Measures**, **Residents’ Experience**, **Staffing**, **Finance & Operations**.
* Share the URL to reproduce the same selection.
* Find past runs in **Recent Comparisons** (History panel).

## Open questions for PM/Eng

1. **Minimum/maximum selection:** Is **View Comparison** enabled only when ≥2 are selected? What’s the upper cap? (Not specified here.)
2. **Invocation of the modal compare:** Where and when is ComparisonTable shown vs. the full compare page?
3. **Identifier stability:** Should we switch from **Service Name** to a unique facility ID in the URL to avoid typos/duplicates and handle commas safely?
4. **History persistence details:** Is history stored server-side (as copy suggests “synced to your account”), and are there retention limits?
5. **Accessibility of tab labels/controls:** Any ARIA roles or keyboard-nav requirements not visible in these files?

# Interpret comparison colours and metrics

This section explains how to read the colours (“Best / Good / Needs Attention”) and the key metric rows in the **Facility Comparison** view, including **Total Expenditure/Day**, **Budget Surplus/Day**, **Room Types**, **Residential Places**, and **Avg. Room Cost/Day**.

## What the colours mean

* **Best (green)** — the best-performing value in the row. For “higher-is-better” metrics (e.g., ratings, Budget Surplus/Day), this is the highest value; for “lower-is-better” metrics (e.g., Avg. Room Cost/Day), this is the lowest value.
* **Good (yellow)** — within **10%** of the best value (≥90% of best when higher is better; ≤110% of best when lower is better).
* **Needs Attention (red)** — more than 10% off the best by the same rule.

You’ll also see a **Color Legend** at the bottom of the table showing the three keys: **Best Performance**, **Good Performance**, **Needs Attention**.

**Note:** Stars (ratings) also use the colour scale, with “No rating” shown when data is missing.

## Step-by-step: Read colours on key rows

1. **Open Facility Comparison**  
   Open the **Facility Comparison** table (modal). The header shows the title and count of facilities; each column has a remove (**X**) button.
2. **Scan the legend**  
   Scroll to the **Color Legend** to confirm how green/yellow/red are used in this view.
3. **Read coloured metrics first**  
   These rows are colour-graded using the 10% rule above:
   * **Overall Rating**, **Compliance Rating**, **Quality Measures**, **Residents' Experience**, **Staffing** (stars).
   * **Avg. Room Cost/Day** — **lower is better** (cost-minimising row).
   * **Budget Surplus/Day** — **higher is better** (surplus-maximising row).
4. **Read non-coloured context rows**  
   Some rows are shown in currency or plain text without colour grading:
   * **Total Expenditure/Day** — currency, no colour weighting.
   * **Residential Places** — plain numeric.
   * **Room Types** — count of room types available (e.g., “3 types”).
5. **Check formatting & missing values**  
   Currency is formatted in **AUD (en-AU)**; missing numbers show **“N/A”**, and ratings show **“No rating.”**

**Tip:** On the dedicated comparison page, additional tabs (e.g., **Rooms & Costs**, **Finance & Operations**) present detailed tables per topic; the page shows a spinner while loading, and a fallback when nothing is found. Use **Back to Residential** to exit.

## How “Best / Good / Needs Attention” is calculated (exact rule)

Let B = best value in the row (max for higher-is-better; min for lower-is-better).

Good (higher-is-better): value ≥ 0.9 × B

Good (lower-is-better): value ≤ 1.1 × B

Else: Needs Attention

Best: exactly the best value (ties possible)

Derived from getBestValue (direction-aware) and getValueColor (10% threshold) in the comparison table.

## Behaviour notes

* **Legend location:** The **Color Legend** appears **under the table** inside the comparison modal.
* **Remove a facility:** Use the **X** in a column header to remove that facility from comparison.
* **Loading & empty states (dedicated page):** Shows **“Loading facility comparison…”** while fetching; if no facilities are found, you’ll see **“No facilities found for comparison”** with a **Back to Residential** button.
* **Defaults:** Currency fields render as AUD; missing numeric data displays **“N/A”**; missing ratings display **“No rating.”**

## FAQ

1. **Where do I find the colour legend?**  
   At the bottom of the **Facility Comparison** table inside the modal, titled **Color Legend**.
2. **What qualifies as “Best”?**  
   The exact best value in that row (highest for ratings/surplus, lowest for cost). Ties can occur.
3. **How close is “Good”?**  
   Within **10%** of the best (direction-aware: ≥90% of best when higher is better; ≤110% when lower is better).
4. **Which rows are colour-graded?**  
   **Overall Rating**, **Compliance Rating**, **Quality Measures**, **Residents’ Experience**, **Staffing**, **Avg. Room Cost/Day**, and **Budget Surplus/Day**.
5. **Is Total Expenditure/Day colour-graded?**  
   No. It’s shown as currency with no colour weighting.
6. **How is Avg. Room Cost/Day calculated?**  
   It’s the average of each facility’s rooms\_data[\*].cost\_per\_day. Lower is better for colour scoring.
7. **What does Room Types show?**  
   The count of distinct room entries (rooms\_data?.length) for each facility (e.g., “2 types”).
8. **What does Residential Places show?**  
   The facility’s residential\_places value (no colour scoring).
9. **What if a value is missing?**  
   Currency fields display **“N/A”**; ratings display **“No rating.”**
10. **How do I remove a facility from the comparison?**  
    Click the **X** button in that facility’s column header.
11. **What happens while data loads / if nothing matches?**  
    The dedicated compare page shows a spinner during load and a “No facilities found for comparison” notice with a **Back to Residential** button if empty.

## Troubleshooting

* **I see “N/A” everywhere on a row.**  
  That row has missing data for your selected facilities (e.g., no rooms\_data → no average room cost).
* **Avg. Room Cost/Day looks too high/low.**  
  It’s the arithmetic mean across all listed room types for that facility. Verify each room’s cost\_per\_day.
* **A rating shows “No rating.”**  
  That facility is missing that rating field in the source data.
* **Legend not visible.**  
  Scroll to the bottom of the comparison table inside the modal; the legend renders below the rows.
* **The page shows Loading indefinitely.**  
  The dedicated comparison page shows a spinner while fetching; if a network issue or no matches occur, you may see the empty-state with **Back to Residential**.

## 📷 Screenshot (placeholder)

**[ Screenshot here ]**  
Alt text: “Facility Comparison modal showing green/yellow/red colours on ‘Budget Surplus/Day’ and ‘Avg. Room Cost/Day’, with the Color Legend (Best / Good / Needs Attention) visible below the table.”

## Quick reference checklist

* Check the **Color Legend** to confirm meanings.
* Read colour-graded rows first: Ratings, **Avg. Room Cost/Day** (lower is better), **Budget Surplus/Day** (higher is better).
* Use **Total Expenditure/Day**, **Residential Places**, **Room Types** as context (no colour grading).
* Look for **“N/A”** or **“No rating”** to spot missing data.
* Remove any column via its **X** button if it’s cluttering the view.

## Open questions for PM/Eng

* Is the **10% threshold** for “Good” configurable per metric or globally fixed? (Currently hard-coded in getValueColor.)
* Should **Total Expenditure/Day** also receive colour grading (e.g., lower-is-better), or remain uncoloured?
* Should the **Color Legend** be **sticky** or duplicated at the top for long comparisons?
* Confirm whether the dedicated compare page and modal comparison are intended to be consistent in row sets and colouring.

# Open a recent comparison or search from History

Use the fixed **History** panel to quickly restore a past search or reopen a comparison you viewed earlier. The panel shows **Recent Searches** and **Recent Comparisons**, each with timestamps, single-item delete, and bulk clear actions. The History panel is visible by default and can be hidden or shown from the left edge of the page.

**Note**  
The History panel is rendered with isOpen={true} in this page and supports an onHide handler to collapse it.

## Steps

1. **Show the History panel (if hidden)**  
   Click the **Show History Panel** tab on the far left to reopen it.
2. **Open a recent search**  
   Under **Recent Searches**, click a search item to restore it. The app sets the search bar and, if the term included a saved location context, it strips the context and triggers location resolution automatically.

**Tip**  
Each search shows either the saved date or **Recently searched** if no timestamp is present.

1. **Open a recent comparison**  
   Under **Recent Comparisons**, click a comparison to navigate to the comparison page. The app builds the URL /residential/compare?facilities=... from the stored facility names.

**Note**  
Each comparison shows a date or **Recently viewed** if no timestamp is present.

1. **Clear a list (bulk)**  
   Click **Clear** in either section. You’ll be asked to confirm before all items in that list are removed.
2. **Delete a single item**  
   Click the **X** button on an item to remove just that entry. Single-item deletes do **not** show a confirmation dialog.
3. **Hide the panel (optional)**  
   Click the **Hide History Panel** button in the History header to collapse it.

## What you’ll see

* **Recent Searches** section and **Clear** button (only visible when there are items). Empty state reads “No recent searches…”.
* **Recent Comparisons** section and **Clear** button (only visible when there are items). Empty state reads “No recent comparisons…”.
* **Tips** panel explaining how items get into History (View Details, select with checkboxes, View Comparison, and that history is synced to your account across devices).

**Warning**  
History content loads from your account; if you aren’t signed in, lists may be empty because the page only fetches history when a user is present.

## Screenshot (placeholder)

**[Screenshot placeholder]**: History panel open on the left, showing Recent Searches with timestamps and an item selected, and Recent Comparisons with the **Clear** button visible.

## Behavioral notes

* **Visibility & lifecycle**: HistoryPanel returns nothing when isOpen is false, but this page always renders it open and uses a separate hide/show container for the left panel.
* **Click actions**:
  + Search clicks call onSearchSelect, which restores the term and, if applicable, triggers location resolution downstream.
  + Comparison clicks call onComparisonSelect, which pushes to /residential/compare?facilities=....
* **Timestamps**: Items show updated\_at as a local date; otherwise they fall back to “Recently searched/viewed.”
* **Populating History**:
  + Viewing facility details saves the current term to **Recent Searches** (when signed in).
  + Starting a comparison saves to **Recent Comparisons** and navigates.

## FAQ

1. **How do I open the History panel?**  
   Use the left-edge **Show History Panel** tab when it’s hidden; by default it’s visible.
2. **What happens when I click a recent search?**  
   The search term is restored; if it contained a location context, the app strips the context and triggers location resolution automatically.
3. **What happens when I click a recent comparison?**  
   You’re sent to /residential/compare?facilities=... using the saved facility names.
4. **Why don’t I see the Clear button?**  
   Clear only appears when there are items in that section.
5. **Is there a confirmation when clearing everything?**  
   Yes—bulk clear prompts a confirmation for searches and comparisons.
6. **Is there a confirmation when deleting a single item?**  
   No—single item deletions happen immediately and don’t trigger a confirmation.
7. **How many items are kept?**  
   This page loads up to 10 items from Supabase for both searches and comparisons.
8. **Are timestamps shown?**  
   Yes. Items show updated\_at as a date or fallback labels (“Recently searched/viewed”).
9. **Is History synced across devices?**  
   The panel’s Tips state that history is synced, and the page fetches history from your account on load. (Actual backend/persistence is outside this file.)
10. **How do searches get into History?**  
    Viewing facility details or saving a facility will add the current term to search history (when signed in).
11. **How do comparisons get into History?**  
    When you start a comparison (≥2 selected), it saves to history and opens the compare page.
12. **What do empty states look like?**  
    You’ll see explicit messages for empty Searches or Comparisons lists.

## Troubleshooting

* **Clicking a history item does nothing**  
  Ensure the parent page passes onSearchSelect / onComparisonSelect; this page wires them to restore the term or navigate.
* **History panel not visible**  
  It may be hidden. Use the left **Show History Panel** tab to reopen.
* **Clear button missing**  
  Appears only when the list has items.
* **No searches/comparisons are listed**  
  You might not be signed in or haven’t taken actions that add history. The page fetches history only for a signed-in user.
* **Restored search shows different location context**  
  That’s expected: the app stores an enhanced term with context but restores the clean term and re-resolves location if needed.

## Quick reference checklist

* Open/close the History panel (left edge hide/show).
* Click a **Recent Search** to restore the term.
* Click a **Recent Comparison** to open the compare page.
* Use **Clear** to bulk remove (with confirmation).
* Use **X** to delete a single item (no confirmation).
* Check timestamps / fallback labels for recency.

## Open questions for PM/Eng

1. The **History** panel shows a “synced across devices” tip—confirm persistence scope (per-user profile) and retention policy.
2. Exact UI entry points that add items to history (“View Details”, “View Comparison”, checkbox selection) are referenced in Tips—confirm labels match the latest UI outside this file.
3. Should HistoryPanel.isOpen ever be false on this page, given we already control visibility via the left container? (Currently always true here.)
4. Confirm maximum number of history entries returned and whether pagination or “Show more” is desired beyond 10.

# Clear or prune your History

This guide shows how to tidy up your **Recent Searches** and **Recent Comparisons** from the History panel—either **clear everything with confirmation** or **delete single items inline**. All behaviors below are taken directly from the product code.

**Note:** The History panel renders **only when it’s open**; otherwise it returns nothing (no UI). If you don’t see it, it’s likely closed.

## What you can clean up

* **Recent Searches** list, with a **Clear** button (only shown when there’s at least one item). Each item may have an **X** (delete) icon.
* **Recent Comparisons** list, also with a **Clear** button (shown only when the list isn’t empty) and per-item **X** delete.

Empty states and tips you may see:

* “**No recent searches**” / “**No recent comparisons**” when a list is empty.
* Help text: click **“View Details”** on search results to add to searches; select facilities and click **“View Comparison”** to add comparisons.
* Tip: “**History is synced to your account across devices**.”

## Clear all searches (with confirmation)

1. **Open the History panel.** (The component only renders when isOpen is true.)
2. In **Recent Searches**, click **Clear** (only visible when there are items).
3. When asked, confirm: “**Are you sure you want to clear all search history? This action cannot be undone.**” (native browser confirm).

**Warning:** Clearing all searches **cannot be undone** (as per the confirmation text).

## Clear all comparisons (with confirmation)

1. In **Recent Comparisons**, click **Clear** (visible only when items exist).
2. Confirm when prompted: “**Are you sure you want to clear all comparison history? This action cannot be undone.**”

## Delete a single item inline (no confirmation)

1. Hover any item in **Recent Searches** or **Recent Comparisons**.
2. Click the **X** icon (tooltip/title: “**Delete this search**” or “**Delete this comparison**”).
3. The item is removed **without a confirmation**. The delete click **won’t open the item** because the handler prevents the parent click (stopPropagation).

**Tip:** If an item **doesn’t show an X**, it likely has **no id**—inline delete isn’t rendered in that case. Use **Clear** to remove the whole list.

## Behavioral notes

* **Visibility & defaults**
  + The panel **returns null when isOpen is false**, so no controls appear.
  + **Clear** buttons render **only if** the respective list length > 0.
* **Per-item delete availability**
  + The **X delete** button renders **only when an item has an id**. Items without id cannot be deleted inline.
* **No loading indicators**
  + Clear handlers can be **sync or async** (() => void | Promise<void>), but the component **does not show progress or toasts**.
* **Click behavior**
  + Clicking an item invokes **onSearchSelect** or **onComparisonSelect** to re-open that search or comparison. The **X** delete uses stopPropagation so it won’t trigger selection.
* **Guidance & tips in-UI**
  + Empty states and the Tips card explain how items get into history (**“View Details”**, **“View Comparison”**, **checkboxes to select facilities**, account sync).

## Screenshot (placeholder)

**[Screenshot placeholder]**  
**Alt text:** History panel open with **Recent Searches** and **Recent Comparisons**, showing **Clear** buttons (enabled), multiple items with visible **X** delete icons, and a native browser confirmation dialog for **“Clear all search history”**.

## FAQ

1. **How do I open the History panel?**  
   The code expects an external control to set isOpen; this file doesn’t define the opener UI. **Not specified in provided files.**
2. **Why don’t I see the Clear button?**  
   It appears **only when a list has items**; empty lists won’t show Clear.
3. **Why is there no confirmation when deleting one item?**  
   Single-item delete is intentionally **no-confirm**; only “Clear all” is confirmed.
4. **Clicking the X sometimes opens the item—should it?**  
   No. The delete handler calls **e.stopPropagation()** to prevent selection.
5. **Why does an item have no X delete?**  
   The **X** shows **only when the item has an id**. Items without id aren’t deletable inline.
6. **What happens when I click an item (not the X)?**  
   It triggers **onSearchSelect** or **onComparisonSelect**—typically to restore that search/comparison.
7. **Is there a progress spinner or success toast when clearing?**  
   No. The component accepts sync/async handlers but **doesn’t render loading or toasts**.
8. **How do items get into History?**  
   UI hints say: use **“View Details”** to record searches; select facilities and click **“View Comparison”** for comparisons.
9. **Is my history available across devices?**  
   The Tips card states **history is synced to your account across devices**. Implementation details are outside this file.
10. **Can I undo a Clear all?**  
    No—**“This action cannot be undone.”** (confirmation text).
11. **Can I bulk-select multiple items to delete (without clearing all)?**  
    No bulk select in this component. Only **per-item X** or **Clear all**.
12. **Where’s the close button for the panel?**  
    The component receives an onClose prop but **does not render a close button** itself in this file. Closing is controlled externally.

## Troubleshooting

* **I clicked Clear but nothing happened.**  
  Ensure the parent provided a working **onClearSearchHistory/onClearComparisonHistory** handler. The component just calls your handler; it doesn’t manage state itself.
* **The Clear button is missing.**  
  The list is likely empty; **Clear** shows only when there are items.
* **I can’t delete a specific item.**  
  That item probably lacks an id; the **X** isn’t rendered. Use **Clear** to remove all, or ensure your data includes id.
* **Tapping X on mobile still opens the item.**  
  The code prevents this via stopPropagation; if it happens, check for overlay/gesture conflicts in parent containers.
* **No feedback after clearing.**  
  There’s **no built-in loading/success UI**. Consider adding feedback in your parent (e.g., toast).
* **I don’t see History at all.**  
  The panel returns **null** when isOpen is false. Make sure the parent toggles it on.

## Quick reference checklist

* Open the **History** panel (isOpen = true).
* In **Recent Searches**, click **Clear** → confirm.
* Or delete a single search via the **X** (no confirm).
* In **Recent Comparisons**, click **Clear** → confirm.
* Or delete a single comparison via the **X** (no confirm).
* Verify empty states or reduced counts appear as expected.

## Open questions for PM/Eng

1. **How is the History panel opened/closed in the UI?** (isOpen, onClose exist, but no trigger/close button in this file.)
2. **Should we add loading and success/error toasts** for clear/delete operations? (Handlers can be async.)
3. **Should single-item delete have an optional confirmation** for safety?
4. **What’s the retention / max item count** for each history list? (Not specified here.)
5. **Is “synced across devices” guaranteed**, and what’s the expected propagation time? (Tip text indicates sync; implementation not shown.)
6. **Should items without id render an X** (and if clicked, call delete by index), or is the current behavior intentional?
7. **Can we expose an in-panel Close button** wired to onClose for discoverability?
8. **Any analytics events** required for clear/delete actions? (Not present here.)
9. **Accessibility:** Should we add ARIA labels for the X buttons beyond the title attribute?
10. **Empty-state copy ownership:** Are the strings referencing **“View Details”** and **“View Comparison”** final and consistent with upstream screens?

# Restore a “location-enhanced” search

This guide shows how to reopen a past search that included location context so the radius logic is automatically re-applied.

**What “location-enhanced” means:** when you ran a search previously, the app saved your term plus a short context in brackets (e.g., Smith Aged Care (Found 7 matches…, showing facilities within ~20km…)). Clicking that history item restores the text and re-enables the radius workflow.

## Steps

1. **Open History (if hidden).**  
   If the fixed History panel is hidden, click the slim left tab (tooltip **“Show History Panel”**) to reveal it.
2. **Go to “Recent Searches”.**  
   The panel includes a **Recent Searches** section.
3. **Click the past search you want to restore.**  
   Clicking a search row triggers restore (the row calls onSearchSelect).
4. **Automatic location re-enable happens for “enhanced” terms.**  
   When a saved term includes text in parentheses, the app detects it, strips the clean term, and sets the search box. This kicks off the location-resolution effect which sets coordinates, re-activates the location search flag, restores the context banner, and filters results.
5. **Watch the status and context banner.**  
   You’ll see **“Resolving location.”** while coordinates are resolving, then a blue context pill (with a map pin) describing the radius scope.
6. **Review the combined results.**  
   When location is active, the list shows a mix of text matches plus unique nearby facilities. A summary line shows counts, e.g., **“Found N facilities (Y within radius + Z text matches)”**.

## What you’ll see (behaviour & defaults)

* **Default radius ~20 km.** Internally stored as 0.18 degrees.
* **Text-first, then radius enhancement.** The search first matches by text; if coordinates are available, nearby facilities are added without duplicating text hits.
* **Where coordinates come from.** If there are text matches, the first match’s coordinates are used; if there are no text matches, the app falls back to resolving the term as a place name.
* **On success:** isLocationSearchActive turns on and the context text describes the ~20 km area.
* **On failure:** if no coordinates are available or geocoding fails, location enhancement is disabled.
* **Only show results when relevant.** If no text and no SA2 filter, the list stays empty; otherwise results render.

**Tip:** History syncs with your account across devices, so you can restore location-enhanced searches anywhere you sign in.

**Warning:** The app detects “enhanced” items by **any** parentheses at the end of the saved term. If you manually saved a term that already contains trailing parentheses, it may be interpreted as location-enhanced on restore.

**Note:** You’ll also see the History panel’s **Clear** button (with confirmation) and per-row **Delete** (no confirmation) should you want to tidy your list; these do not affect current search behaviour.

## Screenshot (placeholder)

## FAQ

1. **How does a search become “location-enhanced” in history?**  
   If a location search is active, the app saves your term plus a context string in parentheses (e.g., “within ~20 km”).
2. **Do I need to re-set the radius when restoring?**  
   No. Clicking an enhanced history item re-activates location mode via the search-resolution effect.
3. **What radius is used?**  
   ~20 km (0.18 degrees).
4. **What if my search had no parentheses?**  
   It restores as a plain text search without radius logic.
5. **Where does the blue context pill come from?**  
   It shows when location is active and context text is set.
6. **What does “Resolving location.” mean?**  
   Coordinates are being determined for the radius logic.
7. **How are results ordered when location is active?**  
   Text matches come first; unique nearby facilities are appended.
8. **How are coordinates chosen?**  
   From the first text match; otherwise the term is geocoded as a place (fallback).
9. **What happens if the first text match lacks coordinates?**  
   Location enhancement is disabled for that term (unless the fallback path was taken due to zero text matches).
10. **How do I delete one search from history?**  
    Use the row’s delete button (no confirmation).
11. **How do I clear all search history?**  
    Click **Clear** (confirmation required).
12. **Is History available across devices?**  
    Yes—history loads for your signed-in account.
13. **Can I restore from “Recent Comparisons” too?**  
    Yes—clicking a comparison navigates directly to the comparison page with facility names in the URL.

## Troubleshooting

* **I clicked a history item but don’t see location context.**  
  The saved term likely wasn’t “enhanced” (no parentheses), or the first text match had no coordinates. Try restoring a history item that shows parentheses, or refine the term.
* **The spinner keeps showing “Resolving location.”**  
  This appears while coordinates are resolving; the process is debounced to reduce churn. Try pausing input and let the effect run.
* **No results after restore.**  
  When there’s no text and no SA2 filter, nothing is shown. Add a term or an SA2 filter.
* **Counts look odd (e.g., lots of text matches but few radius hits).**  
  That can happen if location couldn’t be set from the first text match, or the area truly has few nearby facilities.
* **I want to redo the exact same search later.**  
  Leave the History panel items as-is; they store the context string so the app can re-apply radius logic next time.

## Quick reference (checklist)

* Find it in **Recent Searches** and click.
* Look for **“Resolving location.”** then the blue **within ~20 km** context pill.
* Confirm the summary line shows **radius + text matches**.

## Open questions for PM/Eng

1. Can users adjust the **search radius** (state exists, but no UI control is visible here)?
2. Should we protect against **false-positive** parentheses in saved terms (current detection is “any trailing ()”)?
3. Besides “View Details” and saving facilities, are there **other triggers** that add searches to history we should document in UI copy? (Code shows both, but no explicit on-search-submit save.)
4. Should the **distance** for nearby items be visibly surfaced in the list (data are computed), or kept implicit via the summary line?

— end —

# Drill into a facility’s detail (with inline stats)

Business users & data analysts can open **View Details** to see a facility’s profile with **star ratings** and **inline box plots** where stats exist. Inline plots compare the facility to peers at different geographic scopes and show a tooltip with percentiles and sample size.

## Steps

1. **Open View Details**
   * In the results list (or Saved), click **View Details**. This triggers handleViewDetails, which selects the facility and (if you have a search term and are signed in) saves that term to your history.
   * The History panel tip also calls this out: “Click View Details on search results to save to recent searches.”
2. **Review the header & actions**
   * Use **← Back to facilities list** to return.
   * Save/Unsave the facility from the header button (stateful styles & title indicate the action).
3. **Choose your comparison scope**
   * In the **Statistical Comparison** controls, pick **Nationwide**, **State**, **Postcode**, or **Locality**.
   * Scope lookups use the selected facility’s address\_state, address\_postcode, and address\_locality.
4. **Show (or hide) inline box plots**
   * Toggle **Show Box Plots**. When on, numeric fields render an inline plot **only** if statistics are loaded and available for that field.
5. **Browse tabs for fields & ratings**
   * Tabs include **Main**, **Rooms & Costs**, **Compliance**, **Quality Measures**, **Residents’ Experience**, **Staffing**, **Finance & Operations**.
   * **Star ratings** render with star icons and a numeric value (e.g., Overall Rating).
6. **Interpret inline box plots**
   * Hover the mini chart to see: **your facility value**, **Min**, **25th**, **Median**, **75th**, **Max**, **Average**, and **Sample size**, with scope labeling (e.g., Australia-wide).
7. **Return or continue workflow**
   * Click **← Back to facilities list** to compare others or start a side-by-side later.

**Tip**  
Viewing Details also records your current search in history (when signed in), so you can reopen it from the History panel.

**Note**  
**Default** scope is **Nationwide** and **Show Box Plots** is **on** when you load the page.

**Warning**  
If a facility lacks state/postcode/locality fields, scope-specific stats may be unavailable—stay on **Nationwide** for comparisons.

## What you’ll see on the detail page

* **Header** with Service Name, Address, Save/Unsave button.
* **Statistical Comparison** scope buttons + **Show Box Plots** toggle.
* **Tabs** grouping fields; star ratings (e.g., Overall, Compliance, Quality Measures, Residents’ Experience, Staffing) are also modeled as rating fields.
* **Inline box plots** shown beside numeric fields when available.

## Behaviour & defaults

* **Scope logic**: Pulls stats from nationwide/state/postcode/locality groups keyed by the facility’s address fields.
* **Inline eligibility**: Only numeric fields with statistics get plots; gated by **Show Box Plots** and statsLoading false.
* **Tooltips**: Display facility value + percentiles + mean + count, labeled by scope (e.g., Australia-wide).
* **Value formatting**: Ratings to 1 decimal; cost/income/expenditure in AUD; percents as %.
* **Star rendering**: Five stars with filled state up to the rating, plus numeric label.
* **Stats source (background)**: Statistics load from /maps/abs\_csv/Residential\_Statistics\_Analysis.json (used by the charts).

## Screenshot (placeholder)

## FAQ

1. **Where is “View Details”?**  
   In each facility card and in Saved items; clicking it opens the detail view.
2. **Does opening “View Details” save anything?**  
   Yes—your current search term is saved to history (when signed in).
3. **How do I switch comparison scope?**  
   Use **Nationwide / State / Postcode / Locality** buttons in the header controls.
4. **Why don’t I see box plots?**  
   They show only if **Show Box Plots** is on **and** statistics are loaded for that field.
5. **What do the tooltips show?**  
   Your facility’s value vs Min, 25th, Median, 75th, Max, Average, and sample size—labeled by scope.
6. **Which fields have star ratings?**  
   Overall, Compliance, Quality Measures, Residents’ Experience, Staffing—modeled as rating fields.
7. **How are stars rendered?**  
   Five stars fill up to the rating, plus a numeric display (e.g., (4/5)).
8. **Can I save a facility from the detail page?**  
   Yes. Use the Save/Unsave button. If not signed in, you’ll be prompted to sign in.
9. **What happens if the facility lacks an address field?**  
   Scope-specific stats (state/postcode/locality) may be unavailable; use **Nationwide**.
10. **Do zero values appear for Residents’ Experience?**  
    Yes—experience questions treat 0 as numeric and valid. Other helpers filter out non-positive values.
11. **Where do comparison stats come from?**  
    From a JSON analysis file loaded by the charts logic.
12. **Is the box-plot tooltip accessible on hover only?**  
    The mini chart shows tooltip on hover (mouseenter/leave handlers).
13. **Do Saved items show ratings and a quick View Details?**  
    Saved cards display Overall Rating stars and provide a **View Details** button.

## Troubleshooting

* **No inline plots appear anywhere**
  + Ensure **Show Box Plots** is enabled.
  + Statistics might still be loading (statsLoading); plots render only when stats are present.
  + Some fields may not have stats in the dataset; plots won’t render for those fields.
* **Scope buttons show, but comparisons look empty**
  + The facility may lack the matching address attribute (state/postcode/locality). Stay on **Nationwide**.
* **Stats data failed to load**
  + The charts logic reports "Failed to load statistical data" on fetch errors. Reload or try again later.
* **Cannot save a facility**
  + Sign-in is required to save; unauthenticated users get an alert and are redirected to sign-in.
* **Performance: many plots on screen**
  + Inline charts initialize/dispose ECharts instances cleanly; if scrolling large lists, this helps avoid leaks.

## Quick reference checklist

* Open **View Details** from a card.
* Check header & **Save/Unsave**.
* Pick scope (**Nationwide/State/Postcode/Locality**).
* Toggle **Show Box Plots** if needed.
* Hover mini plots for percentiles & sample size.
* Read star ratings in the **Ratings** card.
* Use **← Back to facilities list** to continue.

## Open questions for PM/Eng

1. **Inline stats source in the detail page**: We see statisticsData/statsLoading and inline usage, but where is the fetch wired up in page.tsx? (ResidentialBoxPlots fetches a known JSON; confirm the same source & lifecycle for the inline stats.)
2. **Scope button disablement**: Should **State/Postcode/Locality** be disabled when the facility lacks the corresponding address field? Currently, logic returns null; UX might need disabled states.
3. **Which rating fields appear in the “Ratings” card by default?** The file shows rendering helpers and categories, but the exact subset/ordering in the UI could be clarified.
4. **Mobile tooltip behavior**: Inline tooltips are hover-based; do we need tap support on touch devices?
5. **History sync message vs. actual behavior**: The tip states history is synced “across devices”—confirm this is strictly via Supabase user account.

# Benchmark a facility with inline box plots

Inline box plots let you see where a facility’s current value sits against the wider distribution — minimum, quartiles (Q1/Q3), median, and maximum — at different geographic scopes.

## What you can do

* Compare a facility against **Nationwide / State / Postcode / Locality** distributions.
* Read a compact **inline** box plot (red dot = your facility) or explore **full-size** charts in the Statistical Analysis panel.
* Hover to see tooltips with **Min, Q1, Median, Q3, Max, Mean, Count**, formatted as **AUD** or **%** when applicable.

## Steps

1. **Open the Statistical Analysis panel** for your facility  
   In the facility view, find the card titled **“Statistical Analysis – [Service Name]”**.
2. **Choose a comparison scope**  
   Click **Compare against:** and pick **Nationwide**, **State**, **Postcode**, or **Locality**. Buttons are disabled if the facility lacks the required address metadata.
3. **Pick a metric group**  
   Use the tabs to switch between **Financial**, **Ratings**, **Capacity & Food Service**, **Staffing & Care Minutes**, **Quality Measures**, and (if available) **Rooms**.
4. **Read the box plot**
   * **Box & whiskers** = distribution (Min, Q1, Median, Q3, Max).
   * **Red marker** = your facility’s current value.
5. **Hover for details**  
   Tooltips show Min/Q1/Median/Q3/Max/Mean/Count. Values auto-format as **AUD** for cost/income/expenditure, **%** for percent fields, and **1-decimal** for star/“rating” fields.
6. **Use inline mini box plots where shown**  
   When a metric includes a compact sparkline-style plot (≈120×32 px), hover to read the same distribution details for the selected scope. If comparison stats aren’t available, the mini plot won’t render.

**Tip**  
At the top of the panel you’ll see “Comparing against N facilities” for the chosen scope — a quick sanity check on sample size.

## Behavioral notes (defaults, states, and feedback)

* **Default scope**: **Nationwide**; **Default tab**: **Financial**.
* **Loading**: Shows **“Loading statistical analysis…”** with a spinner while fetching statistics.
* **Error**: Panel displays **“Failed to load statistical data.”** if the statistics file can’t be fetched.
* **Scope availability**: State/Postcode/Locality buttons are **disabled** if the facility is missing those address fields.
* **No stats for a scope**: You’ll see a notice like **“No comparison data available for [scope]. Showing facility values only.”**
* **Inline plot rendering**: Mini box plot **won’t render** if no statistics are provided; animation is off for snappy UI.
* **Formatting**: Tooltips auto-format **AUD** for expenditure/income/cost fields, **%** when the field name includes “%” or “percent”, and **1-decimal** for ratings.

## Screenshot (placeholder)

![Screenshot placeholder: “Statistical Analysis – [Service Name]” showing Financial tab, Nationwide scope selected, with one box plot tooltip displaying AUD values and sample size.]

## FAQ

**1) What do the shapes mean?**  
Box = interquartile range (Q1–Q3); line inside = median; whiskers = min/max; **red marker** = the facility’s value.

**2) Which scopes are supported?**  
**Nationwide, State, Postcode, Locality.** Scope buttons appear with context labels and may be disabled if address data is missing.

**3) How is the sample size shown?**  
The header shows **“Comparing against N facilities in [scope]”.**

**4) Where do statistics come from?**  
They’re loaded from /maps/abs\_csv/Residential\_Statistics\_Analysis.json.

**5) How are values formatted in tooltips?**

* **AUD** for cost/income/expenditure;
* **%** when the field name includes “%”/“percent”;
* **1 decimal** for stars/“rating”.

**6) Why don’t I see a box for some metrics?**  
If a scope has **no comparison data**, the panel tells you and shows the facility value alone; inline minis won’t render without statistics.

**7) Are inline minis interactive?**  
Yes—hover to see a tooltip (same distribution fields) with formatted values.

**8) Are charts animated?**  
Inline minis set animation: false for responsiveness.

**9) Why are some scope buttons disabled?**  
The facility must have the corresponding **state/postcode/locality** fields; otherwise, those scopes are disabled.

**10) What metric groups are available?**  
Tabs cover **Financial**, **Ratings**, **Capacity & Food Service**, **Staffing & Care Minutes**, **Quality Measures**, and **Rooms** (when room data exists).

**11) What does the tooltip show in full-size charts?**  
For distributions: **Min, Q1, Median, Q3, Max, Mean, IQR, Count**, plus your facility value.

**12) Do inline minis always display?**  
No—if statistics aren’t passed in, the inline component returns null (renders nothing).

## Troubleshooting

* **“Loading statistical analysis…” never finishes**  
  Check network access to /maps/abs\_csv/Residential\_Statistics\_Analysis.json. The panel shows an explicit error if the fetch fails.
* **Scope button is greyed out**  
  The facility is missing required address metadata for that scope (e.g., no postcode); use another scope.
* **I see only a red dot and no box**  
  There’s no comparison distribution for the selected scope; the panel warns you and shows facility-only.
* **Inline mini isn’t visible**  
  The mini plot renders only when statistics exist; otherwise it returns nothing.
* **Numbers look unformatted**  
  Formatting is based on **field name heuristics** (“cost/income/expenditure” → AUD; contains “%/percent” → percentage; “rating/star” → 1 decimal). Ensure metric names follow this scheme.
* **Charts flicker when switching tabs**  
  Charts are disposed and rebuilt per tab to keep things responsive and correct on resize.

## Quick reference (checklist)

* Open **Statistical Analysis – [Service Name]**.
* Pick **Nationwide/State/Postcode/Locality** scope.
* Choose a **metric tab** (Financial / Ratings / Capacity / Staffing / Quality / Rooms).
* Read **red marker vs box/whiskers** to benchmark.
* **Hover** for tooltip with stats + formatted values.
* If a mini plot appears inline, hover it for the same details.

## Open questions for PM/Eng

1. **Where will inline minis be shown by default?** The files define the component and panel, but not the exact placement in detail views/tables.
2. **Field naming contract for formatting**: Inline minis infer AUD/%/rating from **field name substrings**. Can we formalize a schema to avoid mis-formatting?
3. **Scope fallbacks**: When a scope has no stats, should we automatically fall back to a broader scope (e.g., postcode → state) rather than showing a notice?
4. **Room cost distributions**: Are stats for room-level cost\_per\_day always present, or do we need guards for partial room sets per facility?
5. **Performance limits**: Any max count of rendered charts per tab to avoid heavy re-inits on slower devices?

**Notes on sources:** Inline mini box plot behavior and formatting are from InlineBoxPlot.tsx; the panel, tabs, scope toggles, loading/error states, and chart tooltips are from ResidentialBoxPlots.tsx.

# Switch the benchmarking scope

Change which statistics your inline comparisons use (Australia-wide vs State vs Postcode vs Locality). This affects the **mini inline box plots** embedded in facility details, and the **Statistical Analysis** charts. Defaults are **Nationwide**.

**Screenshot placeholder — Alt text:** “Residential facility details showing ‘Statistical Comparison’ buttons (Nationwide/State/Postcode/Locality) set to ‘State’, with an inline box-plot tooltip labeled ‘State-wide Comparison’ showing min/Q1/median/Q3/max and sample size.”

## How to switch scope (inline mini comparisons)

1. **Open a facility’s detail view.**  
   Inline box plots appear next to values when **Show Box Plots** is on and the stats have loaded.
2. **Use “Statistical Comparison” buttons.**  
   In the controls row, pick **Nationwide**, **State**, **Postcode**, or **Locality**. Your selection updates all inline box plots on the page (the scope is passed to each <InlineBoxPlot>).
3. **Hover a mini box plot to confirm.**  
   The tooltip header shows the scope (e.g., **Australia-wide**, **State-wide**, **Postcode area**, **Local area**) and displays min, quartiles, median, mean, and **Sample size: N facilities**.

**Tip:** If you don’t see the mini plots, toggle **Show Box Plots** on.

## How to switch scope (Statistical Analysis charts)

1. **Open the “Statistical Analysis” card.**  
   It loads distributions from /maps/abs\_csv/Residential\_Statistics\_Analysis.json; while loading you’ll see “Loading statistical analysis…”.
2. **Use “Compare against:” buttons in the card header.**  
   Select **Nationwide**, **State**, **Postcode**, or **Locality**. Buttons disable automatically if the facility lacks the corresponding address field.
3. **Check the sample size note under the buttons.**  
   You’ll see **“Comparing against N facilities in {scope}”**; if no stats exist for that scope you’ll see **“No comparison data available… showing facility values only.”**

**Note:** The **page-level** “Statistical Comparison” (for inline plots) and the **card-level** “Compare against” (for the charts) are **separate controls**—change each where needed.

## Behaviour & defaults

* **Default scope:** Nationwide (for both inline plots and the card).
* **Disabled buttons:** State/Postcode/Locality buttons are disabled if the facility has no address\_state/address\_postcode/address\_locality.
* **No stats for a scope:** The card shows an orange notice and still renders your facility’s values.
* **Loading & errors:** The card shows a spinner while loading and a “Failed to load statistical data” error if the fetch fails.
* **Inline box-plot formatting:** Tooltips format currency, percentages, and ratings appropriately.

## FAQ

**1) Where do the benchmarking statistics come from?**  
From Residential\_Statistics\_Analysis.json, fetched by the Statistical Analysis component.

**2) What’s the default scope when I open a facility?**  
Nationwide.

**3) Why are some scope buttons greyed-out?**  
The facility is missing the required address field for that scope (state/postcode/locality).

**4) Does changing scope update all inline mini plots at once?**  
Yes—Inline plots receive the selected scope and matching stats when rendering.

**5) Do the big Statistical Analysis charts use the same scope as inline plots?**  
Not automatically. The card has its own “Compare against” scope toggle.

**6) How can I confirm the scope the inline plots are using?**  
Hover a plot—its tooltip header shows “Australia-wide / State-wide / Postcode area / Local area”.

**7) How can I see how many facilities are in the comparison?**  
In the Statistical Analysis card, look for “Comparing against N facilities in {scope}”.

**8) Why do some cards or categories show no charts?**  
Charts aren’t created for fields with no facility value, and a “No data available for {category}” message appears.

**9) I switched scope but nothing changed—what should I check?**  
Make sure **Show Box Plots** is on (for inline plots) and stats have finished loading.

**10) What happens if a scope has no stats for this facility’s group?**  
You’ll see “No comparison data available…” and only the facility value is shown.

**11) What exactly is shown in a mini plot tooltip?**  
Your facility’s value, min/Q1/median/Q3/max, average, and **sample size (facilities)** for the chosen scope.

**12) Do rooms use scope too?**  
Yes—room “Cost per Day” inline plots pull scoped stats (e.g., room\_cost\_median) and pass the current scope.

## Troubleshooting

* **Buttons disabled for State/Postcode/Locality** → Facility lacks that address field; use Nationwide or pick a facility with the field populated.
* **“No comparison data available…”** → Stats file has no group for the selected scope; switch scope or proceed with facility values only.
* **Mini box plots missing** → Toggle **Show Box Plots** on and wait for stats to load.
* **Charts flicker or reflow when changing scope/tab** → The component intentionally disposes/rebuilds charts on scope/tab change to keep things stable.
* **Loading never completes** → The Statistical Analysis card fetches the stats JSON; if it fails you’ll see an error message.

## Quick reference checklist

* Pick scope via **Statistical Comparison** (inline plots).
* Toggle **Show Box Plots** if you need inline visuals.
* In **Statistical Analysis**, set **Compare against** scope.
* Confirm scope via inline tooltip header (Australia-wide / State-wide / Postcode / Local area).
* Check sample size (“Comparing against N facilities”) in the card.

## Open questions for PM/Eng

1. Should the page-level **Statistical Comparison** and the card-level **Compare against** be linked so one selection drives both, or are they intentionally independent? (Currently independent states.)
2. Should the chosen scope persist across sessions (e.g., user preference), or reset to **Nationwide** on each load? (Currently defaults each render.)
3. For scopes without data, do we want a link or hint to switch to the nearest broader scope automatically? (Current behavior is notice only.)
4. Confirm the intended address fields that gate scope availability (address\_state, address\_postcode, address\_locality) and whether fallbacks are desired.

**Sources:** UI controls, defaults, loading/error states, tooltip content, and scope logic are taken directly from the Residential page and components.

# Explore full statistical box-plots for a selected facility

Use the **Statistical Analysis** panel to compare a facility’s values against distributions (min, Q1, median, Q3, max) across different geographic scopes. The component loads a precomputed analysis JSON, offers scope toggles, tabbed metric groups, and handles loading/error states.

## How to explore box-plots

1. **Open the Statistical Analysis panel**  
   In a facility view, look for the header: **“Statistical Analysis – {Service Name}”**.
2. **Choose your comparison scope**  
   Click **Compare against:** and pick **Nationwide, State, Postcode,** or **Locality**. Buttons are **disabled** if the facility lacks that location detail (e.g., no postcode). The default scope is **Nationwide**.
   * When data exists for the chosen scope, you’ll see: **“Comparing against {recordCount} facilities in …”**. If not, you’ll see: **“No comparison data available… Showing facility values only.”**
3. **Pick a metric group**  
   Use the tab strip to switch between **Financial, Rating, Capacity, Staffing,** and **Quality**. Tabs render from the component’s **field categories**, and the trigger shows the **first word** of each category title (e.g., “Financial”).
   * A **Rooms** tab also appears **only if** the facility has rooms\_data.
4. **Read a chart**  
   Each card shows a box-plot and overlays the facility’s value as a **red diamond**. Hover to see a tooltip with **Min, Q1, Median, Q3, Max, Mean, IQR, Count**, plus the **Facility Value**. If statistics are missing for the scope, you still see the facility value with **“(No comparison data available)”**.
5. **Rooms cost analysis (if present)**  
   Under **Rooms**, the component compares each room’s **cost per day** against the scope’s distribution for cost\_per\_day.

**Note**  
Charts only render for fields where the **facility has a value**; if a category has no such fields, you’ll see **“No data available for …”**.

**Tip**  
If you get **“No comparison data available…”**, switch back to **Nationwide** to view distributions.

**Warning**  
The analysis loads from a fixed path:  
/maps/abs\_csv/Residential\_Statistics\_Analysis.json. If it’s missing or fails to load, you’ll get **“Failed to load statistical data.”**

## What’s included (metric groups)

* **Financial**: expenditure & income lines, budget surplus/day, care staff spend (last quarter).
* **Rating**: overall stars and sub-ratings (compliance, quality measures, residents’ experience, staffing).
* **Capacity & Food**: places, food cost/day, sector average, resident satisfaction.
* **Staffing & Care Minutes**: RN & total care minutes (target/actual).
* **Quality Measures**: pressure injuries, restrictive practices, unplanned weight loss, falls, medication (polypharmacy, antipsychotic).

## Behaviour & states

* **Defaults**: scope = **Nationwide**; active tab = **Financial**.
* **Loading**: shows spinner and **“Loading statistical analysis…”**.
* **Error**: shows **“Failed to load statistical data”** in a red message.
* **Scope label text**: uses facility’s state/postcode/locality if available; otherwise generic labels.
* **Scope buttons**: disabled (greyed, not clickable) if data not available for that scope.
* **Count note**: **“Comparing against {recordCount} facilities…”** when stats exist.
* **Responsive charts**: charts **resize** on window resize.
* **Performance**: charts are **disposed** and recreated as you switch tabs or scopes to keep memory tidy.

## Screenshot (placeholder)

[[ SCREENSHOT HERE — “Box-plot card for ‘budget\_surplus\_per\_day’ at State scope; facility red diamond near Q3; tooltip open showing Min/Q1/Median/Q3/Max/Mean/IQR/Count.” ]]

## FAQ

1. **Which dataset powers these charts?**  
   /maps/abs\_csv/Residential\_Statistics\_Analysis.json.
2. **What if the dataset can’t be fetched?**  
   You’ll see **“Failed to load statistical data”** and no charts.
3. **What’s the default scope and tab?**  
   **Nationwide** and **Financial**.
4. **Why are some scope buttons disabled?**  
   The facility lacks that location detail (state/postcode/locality).
5. **How do I know the comparison sample size?**  
   Look for **“Comparing against {recordCount} facilities…”** under the scope toggles.
6. **What if there’s no data for my scope?**  
   You’ll see **“No comparison data available…”**; the facility value still plots.
7. **How are the charts constructed?**  
   An **ECharts box-plot** plus a **red diamond** for the facility value with a label.
8. **What do tooltips include?**  
   **Min, Q1, Median, Q3, Max, Mean, IQR, Count** and the **Facility Value**.
9. **Why don’t I see some metrics?**  
   Charts render only if the facility has a numeric value for that field.
10. **When does the Rooms tab appear?**  
    Only if rooms\_data exists and has items.
11. **What does the Rooms tab compare?**  
    Each room’s **cost per day** vs the scope’s cost\_per\_day distribution.
12. **Are values formatted as $ or %?**  
    Tooltips interpolate raw numbers; currency/percent formatting isn’t applied in this component.

## Troubleshooting

* **I only see “Loading statistical analysis…”**  
  The fetch may be slow or blocked. The component shows a spinner until the JSON loads.
* **I see “Failed to load statistical data.”**  
  The JSON couldn’t be retrieved. Check that the analysis file exists at /maps/abs\_csv/Residential\_Statistics\_Analysis.json.
* **Some scope buttons are greyed out**  
  The facility is missing that location field; choose another scope (e.g., Nationwide).
* **No charts in a tab**  
  Either the facility has no values for that category, or none of the fields are numeric. You’ll see **“No data available for …”**.
* **Rooms tab not visible**  
  It appears only when rooms\_data is present.
* **Charts look cramped or don’t resize**  
  The component listens for window resize and resizes charts automatically; try resizing the window.
* **Values look unformatted (no $/% signs)**  
  Tooltips use raw numbers; interpretation of units depends on the field.
* **Switching tabs/scopes causes flicker**  
  The component disposes & recreates charts for the active tab/scope to keep things responsive.

## Quick reference checklist

* Open **Statistical Analysis – {Service Name}**.
* Pick a **comparison scope** (defaults to Nationwide).
* Check the **sample size** note under the toggles.
* Choose a **metric tab** (Financial/Rating/Capacity/Staffing/Quality).
* Hover charts to read **Min/Q1/Median/Q3/Max/Mean/IQR/Count**.
* If present, review **Rooms** cost distributions.

## Open questions for PM/Eng

1. **Mount point & navigation**: Where is ResidentialBoxPlots rendered in the product flow (route/section)? Not explicit in code.
2. **Value formatting**: Should currency/percentage units be formatted in tooltips by field (e.g., $ for costs, % for rates)? Currently raw numbers are shown.
3. **Axis labelling/units**: Should yAxis.name vary per metric (now it’s just “Value”)?
4. **Low-N handling**: Any UI notice when count is very small (e.g., <5) in a scope? Tooltip exposes Count but no policy on display.
5. **Data freshness**: The **metadata.generatedAt** exists—should it be surfaced in UI?

This guide cites source files for key UI behaviours to ensure accuracy.

# Use SA2-driven navigation from Insights

Arrive on the Residential page with a URL like …/residential?sa2=<Your SA2 Name> to auto-populate the search bar and—if you’ve previously saved that SA2 in Insights—auto-apply the SA2 filter.

![SCREENSHOT PLACEHOLDER — Residential page loaded with ?sa2=, search bar auto-filled with the SA2 name, and the “Saved SA2 Regions” dropdown open showing items and the “Go to Insights” icon.]

## What this does

* On first load, the page reads the sa2 query parameter and **always** puts that text into the search bar.
* If you have **Saved SA2 Regions** and one exactly matches that name (case-insensitive), the app **auto-selects** that SA2 as a filter.
* If no saved match is found, only the search bar is prefilled; **no filter** is applied.

## Steps

1. **From Insights, craft your link**  
   Use ?sa2=<SA2 name> in the Residential URL. Example: …/residential?sa2=Ryde (NSW).  
   Tip: SA2 matching is **case-insensitive** against your saved SA2 names.
2. **Open the link**  
   The search bar auto-populates with the SA2 value from the URL.
3. **(If you’ve saved that SA2) Filter auto-applies**  
   The page auto-selects the matching saved SA2 and clears any free-text search to avoid conflicts.
4. **Confirm the filter**  
   You’ll see a **“Filtered by: …”** chip with a **Clear filter** link above results.   
   The summary sentence also reflects the SA2 context (e.g., “Showing N facilities in SA2 region”).
5. **Manage or add SA2s (optional)**  
   Click the **SA2 Regions (n)** button to open your saved SA2 list; use the **external-link icon** there to jump to Insights to manage them.

## Behavioral notes

* **Processed once on initial load.** The ?sa2= parameter is handled only on the first render (guarded by an internal “processed” ref).
* **Clear filter = reset URL & input.** Clearing the SA2 filter removes sa2 from the URL, resets the search bar, and resets the “processed” ref so a future param can be processed again.
* **SA2 dropdown availability.** If you have no saved SA2s, the **SA2 Regions** button is disabled, shows a count of 0, and a helpful tooltip.
* **Saved SA2 list details.** The dropdown lists each saved SA2 with a count of postcodes/localities and the saved date, plus a quick link to Insights.
* **Results messaging.** The banner above results adapts if you’re filtering by SA2 and/or also typing in the search bar.

**Note:** Your saved SA2s load only when a user is present (signed in). If you aren’t signed in, the ?sa2= still fills the search bar, but auto-filtering won’t occur.

## FAQ

1. **Do I need to be signed in for auto-filtering to work?**  
   Yes. Saved SA2s are fetched for the current user; without them, only the search bar is auto-filled.
2. **Is the SA2 name match case-sensitive?**  
   No—matching to your saved SA2 list is case-insensitive.
3. **What happens if the ?sa2= isn’t saved in my list?**  
   The search bar is filled, but no SA2 filter is applied.
4. **How do I clear the SA2 filter and the URL param?**  
   Use **Clear filter**; it removes sa2 from the URL and clears the search bar.
5. **Can I process a new ?sa2= after clearing?**  
   Yes. Clearing resets the “processed” flag so a new param can apply in a subsequent load.
6. **Where do I manage my saved SA2s?**  
   Open the **SA2 Regions** dropdown and click the **external-link icon** to go to Insights.
7. **Why is the SA2 button disabled?**  
   You have no saved SA2s; the button shows SA2 Regions (0) and is disabled with a tooltip.
8. **What text appears in the search bar by default?**  
   The placeholder guides you to search by location or facility/provider; when ?sa2= is present, that value replaces the input immediately.
9. **What status messaging should I expect above results?**  
   It adapts based on SA2 filter and/or typed search, including counts for the selected region.
10. **Does selecting an SA2 keep my typed query?**  
    No. Selecting an SA2 clears the search bar to avoid mixed filters.
11. **How do I quickly get to Insights from here?**  
    Use the **external-link icon** in the Saved SA2 dropdown header.

## Troubleshooting

* **I opened a link with ?sa2=, but nothing filtered.**  
  You’re likely not signed in or that SA2 isn’t in your saved list. Sign in and save the SA2 in Insights; then reopen the link.
* **The SA2 filter keeps re-applying when I refresh.**  
  Use **Clear filter** first—this removes sa2 from the URL so it won’t auto-apply.
* **The SA2 dropdown won’t open.**  
  It’s disabled when there are no saved SA2s (shows “SA2 Regions (0)”). Add a saved region in Insights, then try again.
* **The SA2 list is open and won’t close.**  
  Clicking outside the dropdown closes it automatically.

## Quick reference checklist

* Create/open link with ?sa2=<SA2 name>. (Auto-fill search bar)
* Ensure you’re signed in and that SA2 is saved to auto-apply filter.
* Use **SA2 Regions (n)** to review saved filters or jump to Insights.
* Use **Clear filter** to remove the filter **and** the sa2 URL param.

## Open questions for PM/Eng

1. **Accepted values:** Should ?sa2= also support SA2 **codes** (e.g., 117011338) or strictly names? Current code matches **names only**.
2. **Multiple SA2s:** Should we support multiple values (e.g., ?sa2=A;B)? Not implemented.
3. **Partial matches:** Should near-matches suggest or select the closest saved SA2? Now it requires an exact (case-insensitive) match.
4. **Unauthenticated behavior:** Do we want a banner prompting sign-in when ?sa2= can’t auto-filter due to no user? Currently, silent fallback.

Sources: Residential page logic and UI states are defined in page.tsx (see inline citations).

# Understand data loading indicators and empty states

This section shows you how the Residential page communicates **loading**, **progress**, and **empty/no-results** situations—so you can tell at a glance what’s happening and what to do next.

## What you’ll see during initial data fetches

1. **User & account-linked data loads first**  
   On first load, the app gets your user, Saved facilities, and History from Supabase. Once this completes, the UI proceeds with the main page render.
2. **Facilities dataset loads in the background**  
   The page fetches the main facilities JSON and sets an empty list as the starting point for results before turning off the loading flag. You’ll typically see the **“Search Residential Facilities”** empty state until you start searching.
3. **Statistics for comparisons load separately**  
   Inline comparisons and charts rely on a separate statistics JSON. The page-level inline stats start a statistics fetch on mount; the detailed box-plot component loads its own analysis JSON with clear loading and error states (see next sections).

**Note**  
Data sources used:

* Facilities: /maps/abs\_csv/Residential\_May2025\_ExcludeMPS\_updated\_with\_finance.json (page & compare).
* Statistics: /maps/abs\_csv/Residential\_Statistics\_Analysis.json (page & box plots).

## Location-resolution spinner (text-first search)

When you type a search term, the app may enhance it with a location radius. While it’s resolving that context you’ll see a small blue spinner and the label **“Resolving location.”** under the header area.

* Once active, the header also shows a **context pill** describing the location being used.
* The dynamic line below the controls tells you what’s being shown (e.g., “Showing 8 facilities in [SA2] region”, or “Found 12 facilities (7 within radius + 5 text matches)”).

**Tip**  
Restoring a **Recent search** with embedded location context auto-retriggers location resolution (no manual steps needed).

## Empty and “no results” messaging

### A) Initial empty state (no search yet)

* You’ll see **“Search Residential Facilities”** with guidance text and dataset counts until you type or set a filter.

### B) No results (after searching/filtering)

* If nothing matches, you’ll see **“No facilities found”** and tailored guidance (including a one-click **Clear SA2 Filter** button when an SA2 filter is active).

### C) Saved view empty state

* Switching to **Saved** shows **“No saved facilities yet…”** until you add some.

### D) History panel empty states

* **Recent Searches:** “No recent searches.”
* **Recent Comparisons:** “No recent comparisons.”

## Statistical box-plots: loading, errors, and data gaps

1. **Loading**  
   While analysis loads in the Box Plots component, a spinner shows **“Loading statistical analysis…”**.
2. **Error**  
   If loading fails, the component shows **“Failed to load statistical data.”**
3. **Scope defaults & disabled states**
   * Default **scope** is **Nationwide**; default **tab** is **Financial**.
   * Scope buttons are **disabled** when the facility lacks the needed attributes (state/postcode/locality). Disabled buttons show a muted style and cursor-not-allowed.
4. **No comparison data for a scope**  
   If a chosen scope has no stats, you’ll see: **“No comparison data available for … Showing facility values only.”**
5. **Per-category data absence**  
   If a category has no facility values, the tab shows **“No data available for …”**.

**Note**  
Charts render **only for the active tab** and are disposed/recreated on tab changes (helps performance on large datasets).

## Dedicated comparison page: loading & empty states

* When you open a side-by-side comparison, the compare page fetches facilities by name and shows a spinner: **“Loading facility comparison…”**.
* If none are found (e.g., names not present), you’ll see **“No facilities found for comparison”** with a **“Back to Residential Page”** button.

## How to act on each state (quick tasks)

1. **See “Resolving location.”** → Wait for the message line to update; if filtering by SA2, check the line beneath the header to confirm counts/context.
2. **See initial empty state** → Start typing in the search bar or apply an SA2 filter.
3. **See “No facilities found”** → Use the **Clear SA2 Filter** button (if present) or change your search.
4. **Box-plots show “Failed to load statistical data”** → Retry later or proceed with facility values only (scope message will guide you).
5. **Saved is empty** → Save facilities from search cards; the Saved count and dropdown will then populate.
6. **History is empty** → View a facility’s **Details** or run a **Comparison** to populate recent items.

## FAQ

1. **What triggers the “Resolving location.” spinner?**  
   Starting a text-first search with location enhancement active. It appears under the header while locationSearchLoading is true.
2. **Where do the “Showing/Found …” counts come from?**  
   They’re derived from search term, SA2 filters, and (if active) location-enhanced results; the header line adapts to each case.
3. **Why are some scope buttons disabled in Box Plots?**  
   The facility lacks the needed attribute for that scope (state/postcode/locality). Disabled buttons are greyed out.
4. **What’s the default scope and tab in Box Plots?**  
   **Nationwide** scope, **Financial** tab.
5. **What if statistics can’t be loaded?**  
   You’ll see **“Failed to load statistical data.”** The component still renders facility values where possible.
6. **Why does a Box Plots tab say “No data available for …”?**  
   That category has no values for the selected facility.
7. **How do I clear a “no results” situation quickly?**  
   If an SA2 filter is active, use **Clear SA2 Filter** from the no-results panel. Otherwise, adjust your search.
8. **Saved shows nothing—how do I populate it?**  
   Use **Save facility** on any card (the Saved count updates; a dropdown lists saved items).
9. **What appears while the compare page loads?**  
   A spinner: **“Loading facility comparison…”** until the named facilities are fetched.
10. **What if a comparison opens but has no facilities?**  
    The page shows **“No facilities found for comparison”** with a **Back to Residential Page** button.
11. **What do I see if I have no History yet?**  
    The History panel shows **“No recent searches”** and **“No recent comparisons.”**
12. **Which JSON files power the page?**  
    Facilities: May-2025 dataset; Statistics: analysis JSON. Both paths are hard-coded in the components.

## Troubleshooting

* **Box Plots keep saying “Failed to load statistical data.”**  
  Network or file access issue. The component catches this and surfaces the error; reload later or proceed with facility-only values.
* **I see “No comparison data available for …” after switching scope.**  
  That scope has no statistics for the facility’s group; switch to another scope or use Nationwide.
* **No results with SA2 filter.**  
  Use the **Clear SA2 Filter** button in the panel, then retry your search.
* **Saved dropdown is empty.**  
  If the Supabase table is missing or you haven’t saved any items yet, UI will read empty. (The service returns an empty list when the table isn’t present.)
* **Heavy charts feel slow.**  
  Only the **active** Box Plots tab renders charts; switching tabs disposes non-active charts to reduce load.

## Quick reference checklist

* See **“Resolving location.”**? → Let it resolve, then check the line showing counts/context.
* Initial page shows **Search Residential Facilities**? → Start typing or pick an SA2.
* **No facilities found**? → Clear SA2 (if set) or refine terms.
* Box Plots loading? → Spinner says **Loading statistical analysis…**
* Box Plots error? → **Failed to load statistical data**; proceed with facility values.
* Scope buttons greyed out? → Facility lacks data for that scope.
* Compare page? → Spinner while loading; **Back to Residential Page** if nothing found.

## Screenshot

![Residential loading and empty states: shows “Resolving location.” spinner below the header, the initial “Search Residential Facilities” empty state, and the “No facilities found” panel with Clear SA2 Filter button.]

## Open questions for PM/Eng

1. **Initial facilities “loading” UI:** Is there a user-visible loading indicator for the main facilities fetch, or do we rely solely on the initial empty state? (Code sets loading false after fetch, but no explicit spinner block is visible in the main list area.)
2. **Location resolution timing:** Any guaranteed timeout or fallback messaging if **“Resolving location.”** takes unusually long, beyond the standard effect flow?
3. **Inline stats errors on the main page:** Besides Box Plots, should page-level inline stats surface their own error/empty messages, or remain silent?
4. **Compare-page empty state details:** Confirm the exact copy and presence of the **Back to Residential Page** button for the current build (text seen in source).
5. **Saved facilities limits:** The service reports a hasReachedLimit boolean (>=100). Should the UI surface a limit-reached message in Saved/Saved dropdown states?
6. **History clearing confirmations in-panel:** We confirm clears for both searches and comparisons in the History panel; confirm if additional toasts are desired post-success.

# Manage comparison selections from the header dropdown

Use the header’s **Compare (n)** control to review what you’ve selected, remove items, clear the list, and launch a side-by-side comparison.

**Note:** Comparison selections are loaded from your account at sign-in and synced with Supabase (they persist across sessions).

## What you can do from the dropdown

* Open the **Compare (n)** dropdown (enabled when you’ve selected ≥1 facility).
* **View** each selected facility’s name and address.
* **Remove** a single facility (the **X** button beside each item).
* **Clear All** selections (with confirmation).
* **View Comparison** when you have ≥2 selections (opens the compare page and logs to history if signed in).

## Steps

1. **Open the dropdown**
   * Click **Compare (n)** in the header.
     + The button is interactive only when **n > 0**; otherwise it’s greyed and does nothing.
2. **Review your list**
   * You’ll see **Selected for Comparison** with each facility’s name and address.
3. **Remove an item**
   * Click the **X** next to a facility to remove it from the list. (This calls the same selection toggle used elsewhere.)
4. **Clear the entire list**
   * Click **Clear All** → confirm in the prompt. The app clears your selections, closes the dropdown, and shows a success alert.
5. **Launch the comparison**
   * When **n ≥ 2**, click **View Comparison**. The app records the comparison to your history (if signed in) and navigates to /residential/compare?....

**Tip:** Clicking anywhere outside the dropdown will close it.

**Warning:** You can select **up to 5** facilities. You’ll see an alert if you try to add more.

## Behaviour & defaults

* **Enable/disable state:**
  + **Compare (n)** is styled orange and clickable when **n > 0**; grey/inactive when **n = 0**.
* **“View Comparison” visibility:**
  + The button appears **only** when there are at least **2** selected facilities.
* **Clear All flow:**
  + Shows a browser confirm dialog; on success, empties the list, closes the dropdown, and alerts success.
* **Persistence:**
  + Selections are fetched at load and restored to the header counter.
* **Auth requirement:**
  + You must be signed in to add/remove comparison selections; otherwise an alert prompts you to sign in.

## FAQ

1. **Why is the Compare (n) button grey and unclickable?**  
   Because you haven’t selected any facilities yet (**n = 0**). The button only toggles the dropdown when there’s at least one selection.
2. **Where do the items in the dropdown come from?**  
   From your current comparison selections, which are restored from Supabase on load.
3. **How do I remove a single item from the list?**  
   Click the **X** beside the facility row in the dropdown.
4. **What does Clear All do?**  
   It asks for confirmation, then clears all selected facilities, closes the dropdown, and shows a success message.
5. **Why don’t I see “View Comparison”?**  
   You need at least **2** selected facilities for the button to appear.
6. **What happens when I click “View Comparison”?**  
   The app (a) saves the comparison to your history (if signed in) and (b) navigates to /residential/compare?facilities=….
7. **Is there a maximum number of selections?**  
   Yes, a maximum of **5**; attempts beyond that show an alert.
8. **Do selections persist across sessions/devices?**  
   Yes, selections are loaded from your account on sign-in.
9. **Can I manage recent comparisons somewhere else?**  
   Yes—the **History** panel includes **Recent Comparisons** and notes that clicking **View Comparison** saves them there.
10. **How do I close the dropdown quickly?**  
    Click anywhere outside the dropdown.
11. **Why am I being asked to sign in to use comparisons?**  
    Adding/removing comparison selections requires authentication; otherwise you’ll see a sign-in alert.

## Troubleshooting

* **“Please sign in to use comparison features”**  
  Sign in, then try again.
* **“Maximum 5 facilities can be selected for comparison”**  
  Remove one or more items from the dropdown, then add another.
* **“Failed to clear comparison selections” or generic error after Clear All**  
  The clear action returns an error path; try again later. If it succeeded, the list will be emptied and the dropdown closed.
* **Dropdown closes unexpectedly**  
  Clicking outside intentionally closes it; re-open via **Compare (n)**.

## 📸 Screenshot (placeholder)

**Alt text:** Header showing **Compare (3)** dropdown open with “Selected for Comparison”, three facilities listed (name + address), **Clear All** link top-right, and **View Comparison** button at the bottom.

## Quick reference checklist

* Click **Compare (n)** (n > 0) to open.
* Review facility names/addresses.
* Remove an item with **X**.
* Use **Clear All** → confirm.
* Ensure **≥2** items, then **View Comparison**.
* Know limits: max **5** selections.

## Open questions for PM/Eng

1. Should the **Compare (n)** button display a tooltip explaining why it’s disabled when **n = 0**? (Currently it’s just grey/inactive.)
2. Do we want a visible **loading/“syncing”** indicator when selectionSyncLoading is true? (No explicit UI found.)
3. Should **Clear All** also clear the Supabase-backed persistent selections immediately, or just local state? (Handler shows local empty + alert; server result handled but UX copy is fixed.)
4. After **View Comparison**, do we need an inline toast confirming the comparison was saved to history, or is silent OK?

**Related components:** Header dropdown and handlers are implemented in page.tsx; comparison UI is in ComparisonTable.tsx; history guidance appears in HistoryPanel.tsx.

# Sign-in dependent features & sync

Saved Facilities, History, and persistent Comparison Selections only load and sync when you’re signed in. The History panel also makes this clear with a tip about cross-device sync.

**What’s covered here**

* What requires sign-in
* How saved items/history/selections load & sync
* Controls you can use (save, clear, delete)
* Defaults, disabled states, and limits

## What requires sign-in (and what loads when you are signed in)

* On page load, the app fetches the current user and **only then** loads: Saved Facilities, Search History, Comparison History, and **persistent** Comparison Selections (plus Saved SA2 regions). If no user is present, none of these user-specific datasets are loaded.
* The **History panel** explicitly calls out: “History is synced to your account across devices.”

## Step-by-step: Use the sign-in dependent features

### 1) Save a facility (or remove it later)

1. In search results, click **View Details** to view a facility (this interaction is mentioned in the History tips).
2. Use the **Save** button on a result card. If you’re signed out, you’ll be prompted: “Please sign in to save facilities,” and the app routes to /auth/signin.
3. On success, the saved list is reloaded from Supabase.
4. To **unsave**, click the same control; the item is deleted from your saved list.

**Tip**: The “Saved Facilities” view shows **“No saved facilities yet”** when empty.

### 2) Build & sync a persistent comparison set

1. Select facilities for comparison. If you’re not signed in, you’ll see: “Please sign in to use comparison features.”
2. When signed in, each add/remove updates both the local list **and** Supabase. The app then **reloads** selections so IDs/data stay consistent. (Max 5 selections.)
3. Click **View Comparison** to open the comparison page; if signed in, that action is also saved to Comparison History.

**Note**: On initial page load (when signed in), your **persistent selections** are fetched and the on-screen selection list is **synced** to them automatically.

### 3) Use the History panel

1. The History panel is **visible by default**; you can hide it with the **Hide History Panel** control, then re-open using the fixed tab.
2. **Recent Searches**
   * The empty state explains how to add entries (“Search… and click ‘View Details’”).
   * When there are entries, a **Clear** control appears.
3. **Recent Comparisons**
   * The empty state appears until you **View Comparison**.
   * Entries include a delete (✕) control per item.
4. **Cross-device sync** is highlighted in the panel tips.

## Behavioral notes (loading, disabled states, defaults)

* **Default**: History panel is open on first load.
* **User-gated loading**: When a user is present, the page loads Saved Facilities, Search & Comparison History, and **persistent Comparison Selections** from Supabase; otherwise these remain empty.
* **Disabled by sign-out**:
  + Save button: prompts sign-in and navigates to /auth/signin.
  + Comparison selection: shows a sign-in alert and does **not** change selection.
* **History clear/delete** actions only run when a user is present (handlers guard on currentUser).
* **Saved Facilities view** displays an empty state until you add items.

## Limits, errors & messages (grounded)

* You **cannot save more than 100 facilities**.
* If the saved-facilities table isn’t set up, you’ll see **“Database table not found…”** guidance.
* Attempting to save the **same facility** again returns **“Facility is already saved.”**

## Screenshot

![History panel open, showing Recent Searches/Comparisons and the Tips box with “History is synced to your account across devices”.]

## FAQ

1. **Do I need to sign in to see my Saved Facilities?**  
   Yes. Saved Facilities load only when a user is present.
2. **Do Search/Comparison History load without signing in?**  
   No. They load only after the current user is resolved.
3. **Are my selections for comparison persistent?**  
   Yes—when signed in. Selections are fetched from Supabase and synced into the on-screen list.
4. **What happens if I try to save while signed out?**  
   You’ll see “Please sign in to save facilities” and be routed to /auth/signin.
5. **What happens if I try to select for comparison while signed out?**  
   You’ll see “Please sign in to use comparison features,” and the selection won’t change.
6. **How do I add to Recent Searches?**  
   Search and click **View Details**; the History tip explains this behavior.
7. **How do I add to Recent Comparisons?**  
   Select facilities and click **View Comparison**; the tip explains this, too.
8. **Is history synced across devices?**  
   Yes—explicitly noted in the panel tips.
9. **How many facilities can I save?**  
   Up to 100 per user.
10. **How many facilities can I select for comparison?**  
    Up to 5; attempts beyond that show an alert.
11. **Can I clear everything at once?**

* **Saved Facilities**: there’s a confirm-to-clear flow; on success, the list empties.
* **Search/Comparison History**: both support **Clear** (with confirmation) and per-item delete.

1. **Where do I find Saved vs Search results?**  
   There’s a toggle between **Search** and **Saved** modes; the Saved view shows counts/empty states.

## Troubleshooting

* **I clicked Save and nothing happened.**
  + Make sure you’re signed in; otherwise the app prompts sign-in and won’t save.
  + If signed in but still failing, the backend may not be provisioned: look for **“Database table not found…”**.
  + Also check the **100-facility** limit.
* **My comparison selections didn’t persist.**
  + You must be signed in; otherwise selections are blocked.
  + When signed in, additions/ removals sync to Supabase and then reload locally.
* **History stays empty.**
  + For **Searches**, use **View Details** after searching.
  + For **Comparisons**, click **View Comparison**.
* **I don’t see the History panel anymore.**
  + Re-open it from the fixed left tab (**Show History Panel**).

## Quick reference checklist

* Signed in (to load Saved Facilities, History, persistent Selections).
* Save/Unsave via the card control (signed-in only).
* Select up to **5** facilities; signed-in required; selections persist.
* Use **View Details** / **View Comparison** to populate History.
* Clear or delete history items as needed.

## Open questions for PM/Eng

1. Where is the primary **entry point to sign in** on this page (besides redirects on blocked actions)? Not clearly specified in the code shown.
2. Should the **Save** control display any inline error state (beyond alert) for quota or backend errors? Current behavior is alerts only.
3. Does the History panel need an explicit **“Syncing…” indicator** when user/session changes? Not observed.
4. Should users see a **signed-out empty-state message** explaining that Saved/History/Selections are unavailable until sign-in? Not observed.
5. Is there a top-level **“Clear all saved facilities”** button in the header, or only via a dropdown? Code shows the handler/confirm flow but not the visible label location.

# Data sources referenced by the Residential page

This section clarifies **which datasets the Residential page loads, where they appear on-screen, and what you can expect in loading/error states.** It’s grounded only in the uploaded code and the filenames you provided.

**Datasets**

* **Facilities:** Residential\_May2025\_ExcludeMPS\_updated\_with\_finance.json — fetched on initial page load and by the compare page.
* **Statistics:** Residential\_Statistics\_Analysis.json — fetched for statistical comparisons (box plots and inline mini plots).

## Where each dataset shows up

* **Facilities dataset → all tabs & detail fields.** The page binds facility fields across tabs “Main”, “Rooms & Costs”, “Compliance”, “Quality Measures”, “Residents’ Experience”, “Staffing”, and “Finance & Operations”.   
  Example bindings: star ratings, address & contacts, rooms data, and the new structured **financials** object (with legacy fallbacks).
* **Statistics dataset → box plots & inline comparisons.**  
  The **Statistical Analysis** card and **InlineBoxPlot** widgets use the stats JSON to show min/Q1/median/Q3/max and count for the chosen scope. Default scope is **nationwide**.

## Step-by-step: see the data sources in action

1. **Load the Residential page**  
   The app fetches **facilities** data; you’ll see “Loading residential facilities…” during this stage.
2. **Open a facility and scan the tabs**  
   All detail panels (e.g., **Ratings**, **Contact Information**, **Finance & Operations**) read straight from the facilities JSON fields, including the structured financials sections and “legacy” per-day fields when needed.
3. **Use the Statistical Analysis comparisons**  
   The page fetches **statistics** data and shows scope toggles **Nationwide / State / Postcode / Locality** (disabled if your facility lacks that address field).   
   Tooltips and labels display min/Q1/median/Q3/max, mean and sample size; inline mini plots hide if stats are unavailable.

**Tip**  
Currency formatting is **AUD**; percentages append %; star/ratings round to 1 decimal in inline plots.

## Behavioral notes (loading, disabled, defaults)

* **Defaults**
  + Stats scope defaults to **nationwide**.
* **Loading**
  + Page: “**Loading residential facilities…**” while facilities JSON loads.
  + Stats card: “**Loading statistical analysis…**” while stats JSON loads.
* **Disabled / availability**
  + Scope buttons for **State / Postcode / Locality** disable if the facility lacks that address field.
* **Error / empty**
  + Stats load error shows “**Failed to load statistical data**”.
  + If a field lacks comparison stats, the UI states “**No comparison data available** (showing facility value only)” and still plots the red facility dot.

## FAQ

1. **Which files power the page?**  
   Facilities: Residential\_May2025\_ExcludeMPS\_updated\_with\_finance.json. Statistics: Residential\_Statistics\_Analysis.json.
2. **When are they fetched?**  
   Facilities on initial page load (and again in the compare page); statistics on mount of the analysis/inline modules.
3. **What shows if the stats file fails to load?**  
   An error message “Failed to load statistical data.”
4. **How is the comparison scope chosen?**  
   Default is nationwide; other scopes find a matching **state/postcode/locality** record by the facility’s address fields.
5. **Why is a scope button disabled?**  
   The facility may not have the required address field (e.g., no postcode).
6. **Do inline mini box plots appear for every field?**  
   Only when statistics exist for that field; otherwise the mini plot is hidden.
7. **What numbers appear in tooltips?**  
   Facility value plus min, Q1, median, Q3, max, mean, and sample size for the selected scope.
8. **How are currencies/percentages formatted?**  
   AUD for cost/income/expenditure; % for percentage fields; star/ratings to 1 decimal.
9. **Where do the structured finance sections come from?**  
   From the **financials** object in the facilities JSON (Expenditure/Income/Budget/Care Staff). Legacy flat fields are used as a fallback.
10. **What if there’s no comparison data for a field?**  
    The red **facility dot** still renders; tooltip notes “No comparison data available”.
11. **Does the compare page use the same facilities dataset?**  
    Yes— it fetches the same file and filters by the facility names in the URL.
12. **Where do room costs come from?**  
    From rooms\_data[].cost\_per\_day in the facilities JSON, also used in stats charts when available.

## Troubleshooting

* **“Loading residential facilities…” persists**  
  Network issues can delay the facilities fetch; check that /maps/abs\_csv/Residential\_May2025\_ExcludeMPS\_updated\_with\_finance.json is reachable. (The code awaits this fetch before clearing the loading state.)
* **Stats controls show but comparisons don’t**  
  If the stats fetch failed, you’ll see the error; if the scope has no matching group (e.g., non-standard locality), the UI will still place the red facility dot without a distribution.
* **Scope buttons are disabled**  
  The facility card is missing the specific address field (state/postcode/locality) required for that scope.
* **Legacy finance values showing instead of structured finance**  
  That’s expected when the financials object is absent; the UI falls back to legacy per-day fields.

## Screenshot (placeholder)

![Screenshot placeholder: Statistical Analysis card showing “Compare against: Nationwide / State / Postcode / Locality”, with a box plot for “Total Expenditure per Day” and the red facility dot.]

## Quick reference checklist

* Facilities JSON loads on page (and compare page) start.
* Stats JSON loads for comparisons; default scope = **nationwide**.
* Disabled scope button? Missing address field.
* Inline mini plots appear only when stats exist.
* Currency shows as **AUD**; percents with %.
* Loaders: “Loading residential facilities…” / “Loading statistical analysis…”.

## Open questions for PM/Eng

1. **Refresh cadence** — How often are Residential\_May2025\_ExcludeMPS\_updated\_with\_finance.json and Residential\_Statistics\_Analysis.json rebuilt and deployed? (Not stated in code.)
2. **Provenance & definitions** — Source systems and definitions for fields like sector\_average, variance\_percentage, and scope groupings? (Interfaces imply their presence but no data dictionary is bundled.)
3. **Units confirmation** — All per-day amounts appear to be in AUD/day—please confirm if any fields are weekly/monthly. (Formatting en-AU suggests AUD, but units per field aren’t declared in the code.)
4. **Stats coverage** — For which facility fields does the stats file guarantee coverage (e.g., all star\_[] fields, finance fields)? (Conditional checks imply gaps.)
5. **Scope matching rules** — Are postcode/locality matches strict string matches or should we normalize case/spacing? (Current code uses direct equality.)

**Note**  
If you have additional canonical filenames or endpoints, share them and we’ll add them to this section.

# Keyboard/UX cues and visibility controls

This section explains how to: (1) show/hide the fixed **History** panel, (2) use header actions with tooltips, and (3) clear an applied **SA2** filter. All behaviors and labels below are taken directly from the Residential page code.

**Note**  
Saved lists, history, and comparison selections load when a user is signed in; some actions will prompt for sign-in if no user is detected.

## Show or hide the fixed History panel

1. **Show** the panel  
   Hover the narrow left strip and click the button with the clock icon (tooltip: **“Show History Panel”**). The main content shifts right to make room.
2. **Hide** the panel  
   Click the **X** in the panel header (tooltip: **“Hide History Panel”**) or use the panel’s **Hide** action.
3. **What changes on screen**  
   When visible, the layout uses a wider left margin; when hidden, it snaps to a compact margin. (Classes switch between ml-80 and ml-12.)

**Tip**  
The History panel lists **Recent Searches** and **Recent Comparisons** and includes **Clear** actions with confirmation dialogs. You can also delete individual items.

## Header actions & tooltips (what you can do from the top bar)

1. **Back to Main Menu**  
   Click **Main Menu** (tooltip: **“Back to Main Menu”**).
2. **Search vs Saved view**  
   Use **Search Facilities** (left toggle) or open the **Saved (n)** dropdown (right). The Saved dropdown has **Clear All** (tooltip: **“Clear all saved facilities”**), per-item **Remove** buttons (tooltip: **“Remove from saved”**), and **View Saved Facilities**.
3. **Compare (n)**  
   Opens a dropdown only when at least one facility is selected; includes **Clear All** (tooltip: **“Clear all selected facilities”**), per-item **Remove from comparison**, and **View Comparison** (enabled from 2+ selections).
4. **Tooltips appear on hover**  
   Most header and card actions include title attributes, e.g., **Save facility / Remove from saved**, **Select for comparison**, **Back to Main Menu**.

**Note**  
Clicking outside any of the header dropdowns closes them (Saved / Compare / SA2).

## “Clear filter” when SA2 is applied

1. **Apply SA2**  
   Open **SA2 Regions (n)**. If you have saved SA2s, the button is enabled (tooltip: **“Filter by saved SA2 region”**). If you have none, it’s disabled (tooltip: **“No saved SA2 regions available”**).
2. **See the active filter**  
   When an SA2 is active, the control shows the SA2 name and a small **X** to clear (tooltip: **“Clear SA2 filter”**). A contextual banner also shows the SA2 name with a **Clear filter** link.
3. **Clear it**

* Click the **X** inside the SA2 button,
* Or click the inline **Clear filter** link,
* Or click **Clear SA2 Filter** in the “No results” state.

**Tip**  
While resolving a location-enhanced search, a spinner and **“Resolving location.”** label appear under the header.

## Behavioral notes (loading, disabled, defaults)

* **History panel default:** panel is **visible** on first load (isHistoryPanelVisible set true).
* **Layout shift:** content margin switches between ml-80 (panel visible) and ml-12 (hidden).
* **Dropdown dismissal:** clicking outside Saved/Compare/SA2 dropdowns closes them.
* **SA2 control disabled state:** disabled when you have 0 saved SA2s (tooltip explains why).
* **Location resolving:** shows spinner text **“Resolving location.”** only when a non-empty search term is being resolved.
* **Sign-in gating:** saving facilities and using comparison selections prompt sign-in if no user is present.
* **Search input focus:** the search field shows a visible focus ring when active.

## FAQ

1. **How do I open the History panel if it’s hidden?**  
   Use the left-edge tab (tooltip **“Show History Panel”**).
2. **How do I close the History panel?**  
   Click the **X** (tooltip **“Hide History Panel”**).
3. **Does the layout change when I toggle the History panel?**  
   Yes—content margin toggles between ml-80 and ml-12.
4. **Where are tooltips available?**  
   Common actions expose title tooltips, e.g., **Back to Main Menu**, **Save facility / Remove from saved**, **Select for comparison**.
5. **Why doesn’t the SA2 button open?**  
   It’s disabled when you have no saved SA2 regions; hover to read the tooltip.
6. **How can I clear an SA2 filter quickly?**  
   Use the small **X** on the SA2 button, the inline **Clear filter** link, or the **Clear SA2 Filter** button in the “No results” state.
7. **Why did my dropdown close unexpectedly?**  
   Clicking outside Saved/Compare/SA2 dropdowns closes them by design.
8. **What does “Resolving location.” mean?**  
   A spinner and label display while the app enhances your text search with location context.
9. **Why can’t I save or compare—am I seeing a sign-in prompt?**  
   Saving facilities and using comparison selections require a signed-in user; the app alerts and routes to sign-in if needed.
10. **Where do I clear all saved facilities?**  
    Open **Saved (n)** > **Clear All** (tooltip: **“Clear all saved facilities”**).
11. **How do I clear all selected items in Compare?**  
    Open **Compare (n)** > **Clear All** (tooltip: **“Clear all selected facilities”**).
12. **Are there keyboard shortcuts for toggling the History panel or dropdowns?**  
    Not specified in the provided files.

## Troubleshooting

* **History panel won’t open**  
  Use the left-edge tab (look for the **History** icon and tooltip **“Show History Panel”**).
* **Saved/Compare/SA2 menus close immediately**  
  That’s expected when you click outside the dropdown area.
* **SA2 menu is disabled**  
  You likely have no saved SA2 regions yet; the button shows a disabled style and explanatory tooltip.
* **Applied SA2 but still seeing no results**  
  Use **Clear filter** (inline) or **Clear SA2 Filter** to reset.
* **Tooltips aren’t showing**  
  Hover over the control; tooltips are provided via title attributes on buttons (e.g., **Back to Main Menu**, **Clear all saved facilities**).
* **Location spinner persists**  
  The spinner appears only while resolving a non-empty term; verify the search field isn’t blank if you’re expecting location results.
* **Save/Compare actions blocked**  
  Sign in first; otherwise the app alerts and navigates to sign-in.

## Quick reference checklist

* Open/close **History panel** from the left tab / panel **X**.
* Expect **layout shift** when toggling the panel.
* Use header **Main Menu**, **Search Facilities**, **Saved (n)**, **Compare (n)**.
* Hover for **tooltips** (Back, Save/Remove, Select, Clear All).
* Apply/clear **SA2** via the SA2 button **X**, inline **Clear filter**, or **Clear SA2 Filter** in no-results.
* Expect **spinner** during location resolution: **“Resolving location.”**

## Open questions for PM/Eng

1. **Keyboard shortcuts:** None are defined in the code for toggling History or opening menus—should we add shortcuts (e.g., H to toggle History, Esc to close dropdowns), and document them? (Not present in files.)
2. **HistoryPanel close behavior:** onClose is wired but unused (onClose={() => {}}). Should the panel support a true close vs. hide distinction?
3. **History panel default visibility:** It’s currently default-on (isHistoryPanelVisible = true). Is that the intended default for all users/sessions?
4. **Accessibility/ARIA:** Buttons rely on title attributes; do we plan ARIA labels/roles for improved screen reader support? (Not specified in files.)
5. **SA2 saved-state empty UX:** When the SA2 button is disabled, should we offer a direct CTA to the Insights page (vs. only in the open dropdown)?