The Daily Dose Diary Challenge

ANZ REDCap Conference 2026 - User Day 16 November 2026

Vanilla REDCap only. No External Modules, no Twilio, no MyCap, no custom code.

WARNING: This one is not for beginners. If you finish this, you have done something most REDCap users have never attempted. Finalists present to the conference and are recognised accordingly.

At a glance

Task	Design and build a REDCap project that captures and manages a 12-week daily medication diary, and hand it over to a colleague who is new to REDCap.
Who can enter	Solo or a team of up to 3. Students, coordinators, data managers, REDCap admins, and clinicians all welcome. At least one team member must be registered and attending the conference on site
Submission opens	9 September 2026
Submission deadline	15 October 2026, 23:59 ACST
Finalists notified	30 October 2026
Prize	Top 3 present a 10-minute lightning talk. Onsite attendees vote for the winner, who receives a prize pack including South Australian wine. All finalists will receive a certificate of recognition as 'ANZ REDCap Con 2026 Project Designer Finalist' or 'ANZ REDCap Con 2026 Project Designer Winner'
Questions	anz_redcap_con_2026@sahmri.com

Acknowledgement

This challenge was designed and developed in collaboration with Dr Cameron Fong (University of Sydney) and John Liman (Monash University).

The scenario

You have been asked to set up a project for a colleague who is a new REDCap user. They are monitoring an undisclosed participant group.

Eligible participants are invited by their specialist during a clinic session, so no further screening is required. The specialist needs something they can hand over or email at the end of the appointment, and every instruction a participant needs must live inside the REDCap project.

Participants are taking **Drug X**, a new micro-dosed pill taken as required to manage symptoms. The research team wants to know how many pills are taken in each 24-hour period, broken into four windows. For simplicity, the reporting day runs 09:00 to 09:00.

Drug X is safe, but if consumption exceeds **12 pills in a single reporting period**, the research team must contact the participant and their clinical team, because the participant's condition needs reassessment. The team also needs to know when a participant stops reporting, quickly enough to do something about it.

Only the project team will have access to the REDCap project. Some of the team need monitoring (read-only) access; a smaller group need full access.

You are handing this project over. Assume the person receiving it can navigate REDCap but has never built anything in it.

The requirements

A complete submission must do all of the following, using only features that ship with REDCap — see *Ground rules* below. Judges score against this list, so use the R-numbers in your handover document.

Enrolment

- **R1.** Survey-based enrolment, initiated by the participant
- **R2.** PIS and consent (a placeholder instrument is fine — we are not judging your consent wording)
- **R3.** Participant details: name, gender, age, postcode
- **R4.** Participant contact email
- **R5.** Clinical team reference (placeholder)
- **R6.** Enrolment date
- **R7.** Basic demographics and baseline information (placeholder instruments)

Daily diary

- **R8.** A 12-week (84-day) daily diary, one entry per participant per day
- **R9.** Pill counts recorded separately for 09:00–15:00, 15:00–21:00, 21:00–03:00, and 03:00–09:00
- **R10.** An invitation or reminder sent at 09:00 each day
- **R11.** A follow-up reminder at 15:00 if that day's entry is not yet complete
- **R12.** A participant who misses a day can continue the diary the next day without any research team intervention
- **R13.** A participant cannot alter a previous day's entry. To correct something, they must contact the research team
- **R14.** The diary starts and ends on its own — day 1 is the day after enrolment, and the diary stops after day 84 with no staff action required

Escalation and lifecycle

- **R15.** Automated escalation to the study team if a participant's entry is not recorded by 16:00
- **R16.** Automated escalation to the study team if reported intake exceeds 12 pills in a reporting period
- **R17.** A manual withdrawal mechanism that stops the daily diary and marks the participant withdrawn. A withdrawn participant receives no further invitations, reminders, or escalations
- **R18.** A recruitment flyer or email the specialist can hand out or send in clinic, containing whatever the participant needs to get started
- **R19.** All participant-facing instructions built into the project — surveys, invitation text, and completion messages

Access control

- **R20.** Two user roles configured in the project: a **monitoring role** with read-only access to the data, and a **full-access role** for the small group who manage escalations, amendments, and withdrawals. Both must be present in your exported XML, with rights set deliberately rather than left at defaults

Handover

- **R21.** A handover document (PDF) that explains how the diary, the reminders, the escalations, withdrawal, and the two user roles work

Stretch goals

Not required, but they carry weight in judging. Pick the ones that fit your design — quantity is not the point

- An adherence or completeness report
- A dashboard letting the project team track diary completion at a glance
- A report or dashboard highlighting live escalations, separating "missing data" from "clinical reassessment required"
- A **single daily digest** to the study team listing everyone outstanding, rather than one email per participant
- A weekly summary sent back to the participant
- Sensible use of Identifier field flagging and de-identified export options, given the project holds name, email, and postcode

Ground rules

- **Onsite attendance is required.** Every entry must have at least one team member registered for ANZ REDCap Con 2026 and present on site on 16 November 2026 if selected as finalist. Winning teams present their own work; we do not accept pre-recorded or remote presentations. Give us the registration email on the submission form.
- **Synthetic data only.** No patient identifiers, no real participants, no real site names. Submissions containing real data will be disqualified without review.
- **It must import.** Judges will import your Project XML into a clean sandbox running REDCap 16.0+. If it doesn't import, we can't score it.
- **Vanilla REDCap only.** No External Modules — not consortium modules, not ones you wrote. No Twilio or any SMS/voice channel. No MyCap. No API scripts, cron jobs, or external services doing work your project can't do on its own. Judges will import into an instance with no modules enabled and no integrations configured; anything that depends on them simply won't run.
- **Email is the only communication channel.** This is a constraint, not an oversight. Solving a real adherence problem inside stock REDCap is the entire challenge.
- **Everything native is fair game:** longitudinal events and arms, repeating instruments and events, Automated Survey Invitations, the Survey Queue, Alerts & Notifications, action tags, smart variables, piping and field embedding, branching and calculated fields, Data Quality rules, the Scheduling and Randomization modules, e-Consent, survey login, reports, and Custom Record Status Dashboards. Use them well and there is more here than most people think.
- **Assume a single timezone** for participants, staff, and the server. Do not build for travellers.
- **Original work,** built for this challenge. Adapting your own prior project is fine; say so.
- **Disclose AI assistance** if you used it, and where. It is permitted, not penalised.

What to submit

Item	Format	Limit
REDCap Project XML, including synthetic data for at least 5 fictional participants covering a range of adherence patterns	`.xml`	—
Data Dictionary	`.csv`	—
Handover document (see R21), stating the REDCap version you built and tested on	PDF	2,500 words
Signed declaration (no identifiers, original work, AI disclosure)	https://redcap.sahmri.com/surveys/?s=WAMEWKEJ7JE9DWKN	—

Submit to: https://redcap.sahmri.com/surveys/?s=WAMEWKEJ7JE9DWKN. Name your files `[TeamName]_DailyDoseDiary_[item]`.

Rubric

Judges reward restraint. A tidy build that meets every requirement will beat a sprawling one that half-implements every stretch goal.

Criterion	Weight
Functional completeness against the requirements	25
REDCap craftsmanship — native features pushed to their limits, clean instrument design, sound structural choices	15
Participant ease of use	15
Data quality and integrity - validations, missingness, timestamps, identifiers handling	15
Handover documentation - could a new REDCap user run this project?	10
Usefulness to Coordinator and PIs	10
Reusability - can other sites adapt and import this?	5
Innovation	5

Recognition/Award

Judges score every submission against the rubric and select the **top 3**.

Those three teams each present a **10-minute lightning talk** in the closing session on 16 November 2026. Onsite attendees then vote for the best solution.

The winner receives a prize pack including South Australian wine.

Everyone in the top 3 receives a certificate — *ANZ REDCap Con 2026 Project Designer Competition Finalist*, or *Winner* for the team that takes the vote. One certificate each, suitable for attaching to a résumé, hanging above a desk, or waving at a supervisor.

All finalists' project XMLs will be shared with credit, so the community can build on them.

FAQ

Can I submit without registering for the conference? At least one team member must be registered by the submission deadline, and we ask for that person's registration email on the submission form. Entries without a confirmed registered attendee are not reviewed. If you are waiting on approval or funding for your registration, tell us before the deadline rather than after — we would rather hold your entry than lose it.

Do I have to attend in person? Yes. At least one person from each entry must be registered for the conference and on site on 16 November. Remote and virtual attendance do not satisfy this.

My teammate is attending but I'm not. Can we still enter? Yes. One registered, present team member covers the whole team, and that person presents if you make the top 3.

Can I enter alone? Yes. Three is a ceiling, not a target.

Do I need my own REDCap instance to enter? Yes

Does my REDCap need anything switched on? Yes — surveys and outbound email must both be enabled, and you need permission to create Alerts & Notifications and Automated Survey Invitations. Some sites restrict these. Check early, not the week before the deadline.

My institution's REDCap has External Modules enabled by default. What do I do? Build in a project where they are switched off. If a module is silently doing work for you, your submission will break on import and score badly.

Can I use the API just for one thing? No. If it doesn't run inside REDCap unattended, it doesn't count.

Repeating instrument or longitudinal events? Your call, and it is the central design decision. Both are defensible and both cost you something. Tell us in the handover document why you chose yours.

Can a participant backfill a day they missed? No. A missed day stays missed and is recorded as missing, not as zero pills. R12 means the diary keeps running after a miss; it does not mean the participant gets to go back.

When does day 1 start? The day after enrolment. A participant enrolled on a Tuesday gets their first 09:00 invitation on Wednesday.

Does the diary stop by itself? Yes — see R14. It must end after day 84 without anyone doing anything, and it must stop immediately on withdrawal.

The 16:00 escalation will send a lot of email. Is that expected? One notification per outstanding participant per day meets R15 and will not be marked down. A single daily digest listing everyone outstanding is more realistic and much harder to build in vanilla REDCap — it is a stretch goal, and judges will notice it.

The 12-pill escalation is retrospective — the team only finds out the next morning. Is that acceptable? Yes. Participants report the previous 09:00–09:00 window, so same-day detection is not possible from diary data alone. Don't burn time trying to work around it.

What REDCap version will judges use? REDCap v16.0+. If your solution depends on a feature only in a newer release, say so in the handover document.

How is the winner actually chosen — judges or the audience? Both, in sequence. Judges pick the top 3 on the rubric. The audience picks the winner from those 3 by live vote. Presentation quality matters; build quality matters for getting on stage.

What if I can't meet every requirement? Submit anyway. A partial build with an honest handover document that names what is missing and why will score better than you expect, and considerably better than one that quietly pretends the gap isn't there.

Can I use AI to help build this? Yes. Say where you used it in the handover document. It is permitted, not penalised.

Questions not answered here: anz_redcap_con_2026@sahmri.com by **15 October 2026**.