

Data agent build worksheet

Companion to the tutorial "Build the Data Agent Your Dashboard Chats With" (<https://associational.ai/posts/build-a-bigquery-data-agent/>). Fill this in before you open the Agent catalog. The writing on these pages is the build; the clicking takes minutes.

1. Table inventory

List every table, view, and UDF the agent should know about. One row each. If a table is not listed here, the agent cannot answer from it.

Source name	Type (table/view/UDF)	What it holds	Owner who explains it

2. Table and column descriptions

For every source above, describe the table in one sentence, then every column a question might touch. The agent cannot read your mind about column names: `member_status_cd` means nothing; "membership status: A active, L lapsed, D deceased" means everything.

Table: _____ — one-sentence description:

Column	Description (values, codes, units)

(Copy this block for each source.)

3. Agent instructions

Write the standing rules your best analyst follows without thinking. Rules, not essays. Start with these three and add your own.

1. "Always filter to the current fiscal year unless asked otherwise."
2. "Renewal rate means renewed members divided by members up for renewal."
3. "Never show individual member rows, only aggregates."

4. Verified queries

Add the five questions your ED asks every quarter, each with its correct query attached. The agent learns the pattern you give it, including your mistakes, so run each query's SQL by hand before writing it here. Include at least one parameterized query with `@param`.

Question 1: _____ SQL:

Question 2: _____ SQL:

Parameterized example (adapt it): "Show me renewal rate for chapter @chapter_name"

```
SELECT SUM(CASE WHEN renewed THEN 1 ELSE 0 END) / COUNT(*) AS renewal_rate
FROM members
WHERE chapter_name = @chapter_name;
```

Question 3: _____ SQL:

Question 4: _____ SQL:

Question 5: _____ SQL:

5. Glossary

Every term a new staffer would have to ask about.

Term	Meaning
chapter	a regional unit
lapsed	not renewed within 90 days of expiry

6. Settings

- Model: _____
- Max bytes billed: _____ (minimum 10485760 bytes / 10 MB; start low while testing, raise it when real questions need wider scans)
- Region: US / EU / Global (circle one; it cannot change after saving)

7. Publish checklist

- ☐ Billing enabled on the project (agents cannot be built in the sandbox).
- ☐ Four APIs enabled: BigQuery, Gemini Data Analytics, Gemini for Google Cloud, Knowledge Catalog.
- ☐ Roles granted: builder holds Creator; staff hold User.
- ☐ Sources added; descriptions, instructions, verified queries, and glossary written.
- ☐ Preview asked the ED's five questions: each answer right, each SQL sane, standing rules followed.

- ☐ Draft saved (drafts cannot be shared).
- ☐ Published; shared with principals or by copy-link and email.
- ☐ Data Studio selected as a publishing option; the agent appears on the "Chat with your data" page.

The agent is built. Your staff asks, the warehouse answers, and the data never left your project.

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