

## 1. RFI Metadata and Content

Available Fields via GET /rfis and GET /rfis/{id}:

Field	Description	Availability
id	Unique identifier for the RFI.	Available
Initiated_at	Timestamp when the RFI was initiated.	Available
subject	Title or subject of the RFI.	Available
status	Current status of the RFI (e.g., Open, Closed, draft, recycled).	Available
priority	Priority level of the RFI.	Available
created_at	Timestamp when the RFI was created.	Available
Updated_at	Timestamp when the RFI was updated.	Available
due_date	Due date for the RFI response.	Available
questions	Detailed question or description in the RFI. (list)	Available
assignees	List of dictionary of the person assigned to the RFI. (name, id, locale, login – mail, response_required)	Available
attachments	List of attachments associated with the RFI.	Not Available
responses	List of responses to the RFI, including responder details and timestamps. (time_resolved)	Not Available

**Note:** The GET /rfis endpoint provides a list of RFIs with basic details, while GET /rfis/{id} offers comprehensive information about a specific RFI, including attachments and responses.

Apart from textual analysis, we can add attachments

Excluding image data

I've to collect all historical data for the managers at once through RFIs to make which profile is suitable.

### Derive Priority Using Related Fields

Logic	Source Fields	Example Implementation
High Priority Based on Due Date	due_date, created_at	If due_date is soon (e.g., less than 3 days), set priority to High.
High Priority Based on Status	status	If status is "Open" and no response exists, assign High priority.
Priority Based on Text Content	question, responses	Analyze content for keywords (e.g., "urgent", "critical") using NLP.

## 2. Project Metadata

Available Fields via GET /projects/{id}:

Field	Description	Availability
id	Unique identifier for the project.	Available
name	Name of the project.	Available
start_date	Project start date.	Available
completion_date	Project end date.	Available
address	Physical address of the project.	Available
city	City where the project is located.	Available
state_code	Code of State where the project is located.(eg- California-CA)	Available
Country_code	Code of Country where the project is located. (US)	Available
ZIP_code	ZIP of the location of the project	Available
Active	Current status of the project (e.g., Active-true/false).	Available
created_at	Timestamp when the project was created.(YYYY-MM-DDTHH:MM:SSZ)	Available
updated_at	Timestamp of the most recent update to the project. (YYYY-MM-DDTHH:MM:SSZ)	Available

**Note:** The GET /projects/{id} endpoint retrieves detailed information about a specific project, providing context for associated RFIs.

## 3. Stakeholder Information

Available Fields via GET /users/{id}:

Field	Description	Availability
id	Unique identifier for the user.	Available
name	Full name of the user.	Available
email	Email address of the user.	Available
phone_number	Contact phone number of the user.	Available
job_title	Job title or role of the user within the project.	Available
company	Company the user is associated with.	Available

**Note:** The GET /users/{id} endpoint provides detailed information about a specific user, aiding in identifying and assigning RFIs to appropriate stakeholders.

## 4. Behavioral and Interaction Data

Available Fields via GET /rfis/{id}:

Field	Description	Availability
responses	List of responses to the RFI, including responder details, comments, and timestamps. (time_resolved)	Available
created_at	Timestamp when the RFI was created.	Available
updated_at	Timestamp of the most recent update to the RFI.	Available

**Note:** Interaction data, such as responses and timestamps, are accessible via the GET /rfis/{id} endpoint, facilitating analysis of stakeholder engagement and response patterns.

## 5. Performance Metrics

### Derived from Aggregated Data:

Metric	Description	Availability
average_resolution_time	Calculated average time taken to resolve RFIs.	Derivable
response_times	Individual response times for each RFI.	Derivable
completion_rates	Percentage of RFIs resolved within specified timeframes.	Derivable

**Note:** While not directly available as fields, these performance metrics can be derived by aggregating and analyzing data obtained from the GET /rfis and GET /rfis/{id} endpoints.

#### average\_resolution\_time

**Description:** Average time taken to resolve RFIs across a project or a specific dataset.

#### Required Fields/Endpoints:

- created\_at (Timestamp when the RFI was created) — from /rfis.
- resolved\_at (Timestamp when the RFI was resolved) — from /rfis

#### response\_times

**Description:** The time taken by stakeholders to respond to each RFI after it was created.

#### Required Fields/Endpoints:

- created\_at (RFI creation timestamp) — from /rfis.
- responses (List of responses with timestamps) — derived from /rfis/{id}/comments or /rfis/{id}/history.

#### completion\_rates

**Description:** Percentage of RFIs resolved within a specified timeframe (e.g., within the due date).

#### Required Fields/Endpoints:

- resolved\_at (Timestamp when the RFI was resolved) — from /rfis.
- due\_date (Deadline for the RFI resolution) — from /rfis.

### Summary of Metrics

Metric	Derivation Logic
average_resolution_time	Compute the average of all resolved_at - created_at times for resolved RFIs.
response_times	Calculate the time difference between created_at and each response timestamp, using response data from comments or history logs.
completion_rates	Count RFIs resolved before their due_date, divide by the total number of RFIs, and express as a percentage.

## 6. Real-Time Data

Available Fields via GET /rfis and GET /projects/{id}:

Field	Description	Availability
status	Current status of the RFI or project.	Available
updated_at	Timestamp of the most recent update.	Available

**Note:** Regularly polling the GET /rfis and GET /projects/{id} endpoints can provide real-time updates on RFIs and project statuses.

Based on the available fields in Procore's API, additional derived fields and metrics can be calculated to enrich the data and provide deeper insights. Below is a detailed breakdown of the derived fields and how they can be computed:

## Derived Fields and Metrics

### 1. RFI Metadata

Derived Field	Source Fields	Calculation/Derivation
Days Open	created_at, resolved_at	Calculate the difference between resolved_at and created_at for resolved RFIs.
Overdue RFIs	due_date, status	Identify RFIs with status not resolved and due_date earlier than the current date.
Response Pending	responses, status	RFIs where no responses exist and status is not resolved.

### 2. Project-Level Insights

Derived Field	Source Fields	Calculation/Derivation
Project RFI Count	GET /rfis	Count the number of RFIs associated with a specific project ID.
Average Project RFI Duration	created_at, resolved_at	Compute the average resolution time for all RFIs in a project.

<b>Delayed RFIs by Project</b>	due_date, resolved_at	Identify RFIs resolved after their due date.
--------------------------------	-----------------------	--

### 3. Stakeholder Metrics

Derived Field	Source Fields	Calculation/Derivation
<b>Task Load Per Stakeholder</b>	assigned_to, GET /rfis	Count RFIs assigned to each stakeholder to measure workload.
<b>Stakeholder Efficiency</b>	resolved_at, responses, assigned_to	Calculate the average time a stakeholder takes to resolve assigned RFIs.
<b>Escalated RFIs by Stakeholder</b>	responses, assigned_to	Count RFIs requiring escalation from an initial stakeholder to others.

### 4. Behavioral and Interaction Metrics

Derived Field	Source Fields	Calculation/Derivation
<b>Average Response Time</b>	responses, created_at	Calculate the time difference between RFI creation and the first response.
<b>Interaction Frequency</b>	responses	Count the total number of responses for each RFI.
<b>Escalation Rate</b>	responses, assigned_to	Calculate the percentage of RFIs that required escalation to additional stakeholders.

### 5. Performance Metrics

Derived Field	Source Fields	Calculation/Derivation
<b>Resolution Success Rate</b>	GET /rfis, status	Percentage of RFIs resolved (status = resolved) out of the total RFIs.
<b>Resolution Time Variance</b>	created_at, resolved_at	Variance in resolution times across RFIs to assess consistency.
<b>Response Time Trend</b>	responses, updated_at	Identify patterns in response times over time (e.g., improving or worsening trends).

## 6. Real-Time Insights

Derived Field	Source Fields	Calculation/Derivation
Active RFIs Count	status	Count RFIs with status set to open or in-progress.
Upcoming Deadlines	due_date, status	Identify RFIs with status not resolved and due_date within the next few days.
Stakeholder Availability	assigned_to, GET /users/{id}	Determine stakeholders with minimal workload based on assigned RFIs.

### Fetch Data:

- Use /rfis to retrieve created\_at, resolved\_at, and due\_date.