

Using the Office of Sponsored Programs (OSP) Budget Skill through Claude

A complete guide for principal investigators, department budget managers, and research administrators

The OSP Budget skill through Claude builds a populated Syracuse University OSP Budget Workbook from a plain-language description of your project. It looks up current fringe benefits and indirect cost rates published by the University, applies University and sponsor policy, performs every calculation, and returns an OSP budget template Excel workbook with its formulas intact. This guide covers what to provide, how to ask, what it assumes, and what to check before the workbook leaves your hands. For questions on budget allowability, refer to the [Office of Research website](#), or contact your OSP Research Administrator (RA).

1 Before you begin	2 What to provide	3 Example prompts	4 Assumptions and rates	5 Review before you send	6 Where to get help
-----------------------	----------------------	----------------------	----------------------------	-----------------------------	------------------------

1 BEFORE YOU BEGIN

1.1 What you need

Requirement	What you need
Account	A Syracuse University Claude account. Request one at its.syr.edu/getclaude . Do not use a personal Claude account for University work.
Model	Opus, selected from the model menu. See the note below.
The skill	Downloaded from GitHub and added to your Claude account once, as described in 1.2.
Output	The OSP Budget Workbook as an Excel file, with live formulas, plus a written explanation of every rate and calculation used.

USE OPUS. Opus produces the best output for complex budgets and increases the probability of a compliant budget. The skill performs multi-year escalation, applies different fringe rates to different categories of personnel effort, and interprets sponsor policy. Other smaller or faster models are materially less reliable at all three aspects. Set the model before you send your first message, because the model applies to the whole conversation.

1.2 Install the skill

The skill is published on GitHub. You download it once, add it to Claude, and it stays in your account.

- Go to github.com/duncan-brown/research-skills. Open the **dist** folder, then **su-osp-budget**, then the folder with the highest version number.
- Click the file inside it, then click **Download raw file**, the download icon at the top right.

3. In your University Claude account, go to **Settings**, then **Capabilities**, click **Customize** in the left sidebar, then **Skills**.
4. Click **+**, then **Create skill**, then **Upload a skill**, and choose the file you downloaded.
5. Open a new chat and begin your first message with **“Use the OSP Budget skill”** so Claude knows which one to apply.

1.3 What the skill handles well, and where it stops

The skill has been tested most thoroughly on National Science Foundation, Department of Energy, and National Institutes of Health budgets, and on a number of private foundation budgets. Highly complex budgets may be beyond what it can produce reliably. Projects with many subawards, layered cost sharing, multiple performance sites at different indirect rates, or unusual sponsor formats should be built with your department budget manager and the Office of Sponsored Programs rather than from a single conversation.

The skill does not submit anything. It produces a draft workbook for review. Your department budget manager and the Office of Sponsored Programs remain responsible for rate verification, allowability, compliance, and submission.

2 WHAT TO PROVIDE

You do not need complete information to start. The skill asks for what it is missing, and a budget built from three known numbers and a clear list of unknowns is more useful than one built from guesses.

2.1 Project setup

Item	What to say	Why it matters
Sponsor	The sponsor agency or organization and the program. A link to the solicitation is best.	Federal and non-federal sponsors have different budget requirements. Claude will take into account the sponsor policy.
Start date	Month and year.	Sets the fiscal year used for every rate lookup.
Duration	Number of years, from one to five years.	Determines how many year tabs are built and escalated.
Activity and location	Research, training, or other activities and on or off campus.	Selects the corresponding indirect cost rate.
Ceiling	Any cap on total cost or on indirect costs.	Ensures the budget complies with the cap set by the sponsor.

2.2 Senior personnel

This covers the principal investigator, co-principal investigators, and anyone the sponsor counts as senior personnel. For each person, provide:

- Name and role.
- Appointment type: academic year, which is 8.5 months, or calendar year, which is 12 months.
- Institutional base salary.
- Effort. You can express this as months, as course buyouts, or as a percentage, and the skill converts it.
- Whether summer months are included, and how many.

2.3 Other personnel

This covers postdoctoral scholars, graduate assistants, undergraduates, staff, and temporary employees. Names are optional. A row reading “TBD Graduate Student” is normal and far better than leaving a position out.

Category	What to provide
Graduate assistants	Number of students, which college they come from, whether they work in summer, and the stipend if it is above the union minimum.
Postdoctoral scholars	Salary and effort as a fraction of full time or as calendar months.
Undergraduate or hourly	Hourly rate, hours per week, and number of weeks.
Salaried staff	Annual salary and the fraction of full time devoted to the project.

2.4 Everything that is not salary

Category	What to provide
Equipment	Item, total cost including shipping and installation, and which year it is purchased.
Travel	Destination, number of travelers, trips per year, and nights away. Domestic and foreign are budgeted separately.
Materials and supplies	Annual amount and a short description of what it covers.
Publication costs	Number of articles and the expected charge per article.
Consultants	Name or role, daily rate, and number of days.
Purchased services	Vendor and scope of work.
Subawards	Institution name and their own budget, with direct and indirect costs listed separately.
Tuition	Number of graduate assistants and the college each belongs to.
Participant support	Stipends, travel, subsistence, and other costs, listed separately.
Human subject payments	Amount per subject and the number of subjects.

Allowability by category. Whether a given cost may be charged at all, and under what conditions, is covered on the Prepare a Budget pages at research.syracuse.edu/start-project/prepare-budget. Consult those pages for personnel compensation, costs other than personnel, cost sharing, non-allowable costs, and costs that are unallowable as direct charges except under unusual circumstances.

3 EXAMPLE PROMPTS

Write the way you would describe the project to a colleague. Sentence fragments are fine. The examples below are complete and can be adapted directly.

3.1 A detailed opening prompt

Use the OSP Budget skill. I am preparing an NSF proposal, three years starting September 1, 2027, research on campus. I am the PI on an academic-year appointment with a base salary of \$118,000, and I want one course buyout each year plus one summer month. Add one graduate assistant from Engineering and Computer Science for the full academic year plus two summer months, and one postdoctoral scholar at half time in years two and three. For non-personnel: \$8,000 a year in materials and supplies, one domestic conference trip a year for two people, and a \$60,000 subaward to another university spread across the full period.

3.2 A minimal opening prompt

Use the OSP Budget skill. Help me build a budget for an NIH R01, five years, starting July 2027. I do not know most of the numbers yet. Ask me what you need.

3.3 Working backward from a cap

Use the OSP Budget skill. This is a two-year foundation grant starting January 2028. The total cannot exceed \$150,000 including indirect costs, and the foundation caps indirect costs at 10 percent. I want one graduate assistant and half a summer month for myself. Work backward from the cap and tell me what fits.

3.4 Follow-up prompts

Budgets are built in passes rather than in one attempt. Any of these can follow the first response.

- “Add a second graduate student in years three through five.”
- “Change my effort to two summer months and drop the course buyout.”
- “The subaward is \$85,000 total and the collaborator applies their own indirect rate.”
- “What does the total become if I add \$40,000 of equipment in year one?”
- “Show me the calculation behind the personnel total.”
- “Recalculate this as a non-federal sponsor so I can compare the two.”
- “Draft the personnel section of the budget justification.”
- “Give me a version with no summer salary for me, as a fallback.”

4 ASSUMPTIONS AND RATES

The skill reads rates from University rate files rather than recalling them, and performs arithmetic rather than estimating. Rates change, so this guide states only the assumptions that are stable from year to year. Confirm every figure that will appear in a submitted proposal against the current rate schedules and with the Office of Sponsored Programs.

4.1 Indirect cost rates

The same thing, two names. Indirect cost and facilities and administrative (F&A) cost are the same thing. This guide uses indirect cost throughout. The skill applies the University's federally negotiated rate to a modified total direct cost base, selecting the rate from the activity type and the location you give it. There is a separate

rate for research, for training and instruction, and for other sponsored activities, each for on campus work, and a single lower rate for all off-campus work.

One rate for every year. Varying the indirect rate across years requires approval from the Vice President for Research. Even when the University's negotiated rate changes during a project, the budget carries a single rate throughout.

4.2 Fringe benefit rates

Fringe is applied by payroll account rather than by job title, which is why the skill asks how each person is appointed. Academic-year faculty effort, summer faculty effort, postdoctoral scholars, graduate assistants, staff, and casual or temporary employees each carry a different rate, and graduate assistants carry different rates on federal and non-federal projects.

Two rates, one person. Academic-year effort and summer effort are paid from different accounts and carry different fringe rates. Applying one blended rate to a faculty member who has both a course buyout and summer salary is the most common error in hand-built budgets.

4.3 Thresholds

Assumption	Value
Equipment threshold	Unit cost of \$5,000 or more, including shipping and installation
Subaward amount subject to indirect costs	The first \$25,000 of each subaward
Salary escalation	3% per year
Tuition escalation	8.16% per year; confirm before submission

The \$5,000 equipment threshold comes from the University's capitalization policy and the \$25,000 subaward threshold from its federally negotiated rate agreement (DHHS, June 4, 2024). Both differ from the higher figures in the 2024 revision of 2 CFR 200. The University figures govern.

4.4 Effort conventions

Basis	Convention
Faculty, academic appointment	8.5 months
Faculty, calendar appointment	12 months
Graduate assistants	9 months, paid over 18 semi-monthly periods
Postdoctoral scholars and staff	12 months
One course buyout	15% of the academic year, which is 1.275 academic months
Half time	6 calendar months

4.5 Policy limits the skill applies

- **National Science Foundation.** Senior personnel are limited to two months of salary per year across all NSF awards unless a program officer approves an exception.

- **National Institutes of Health.** A salary cap applies, and it is updated annually. The skill applies the cap in effect for the budget period.
- **Summer effort.** No more than 3.5 summer months from all sources combined.
- **Graduate stipend minimums.** Set by union agreement and increased each year. The skill applies the minimum for the relevant year.
- **Cost sharing.** Requires a separate budget workbook.
- **Alterations and renovations.** Require approval from the Vice President for Research before they are budgeted.

4.6 Tuition remission by college

Remission is set by college, and the principal investigator budgets whatever the college does not remit. Arts and Sciences remits in full, so nothing is budgeted. Engineering and Computer Science remits half, so the balance is budgeted. Education remits none, so the full amount is budgeted. Other schools should assume the Engineering model and confirm with the associate dean for research. This is why the skill asks which college a graduate assistant belongs to, and getting it wrong can change a multi-year budget by tens of thousands of dollars.

4.7 What is excluded from the indirect cost base

- Equipment.
- The portion of each subaward above \$25,000. Each subaward gets its own \$25,000, so three subawards allow up to \$75,000 in the base.
- Tuition, both remitted and scholarship.
- Participant support costs, for the National Science Foundation and the National Institutes of Health. Most other federal sponsors include them.
- Rental or lease of non-University off-site facilities.
- Capital expenditures or alterations.
- Human subject payments are **included** in the base, unlike participant support.

5 REVIEW BEFORE YOU SEND

Work through this list below, then send the workbook to your department budget manager if you have one, and to your Office of Sponsored Programs Research Administrator.

- The sponsor type matches the actual sponsor, and the graduate assistant fringe setting matches the sponsor type.
 - The indirect cost type and rate are identical in every year.
 - The indirect cost base is accurate.
 - Institutional base salaries are current.
 - Effort falls within sponsor limits, including the NSF two-month rule and the NIH salary cap.
 - Every person with salary has a written justification.
 - Subaward direct and indirect amounts appear exactly as the collaborator provided them, not recalculated.
 - Tuition matches the policy of the college each graduate assistant belongs to.
 - Each equipment item genuinely reaches \$5,000 once shipping and installation are included.
 - The total falls within the sponsor's ceiling.
 - You opened the workbook in Excel, let the formulas recalculate, and confirmed the totals.
-

Where budgets usually go wrong

- A single blended fringe rate applied to both academic-year and summer faculty effort.
- The non-federal graduate assistant fringe rate used on a federal award.
- A collaborator's indirect costs recalculated at Syracuse University's rate.
- Indirect costs applied to a full subaward rather than to the first \$25,000.
- Tuition omitted for a college that remits only part of it.
- An instrument below the equipment threshold budgeted as equipment, which removes it from the indirect cost base incorrectly.

6 WHERE TO GET HELP

Question	Contact
The skill, prompting, or research development support	resdev@syr.edu
Allowability of a specific cost	research.syracuse.edu/start-project/prepare-budget
Rates, compliance, sponsor forms, and submission	Your Office of Sponsored Programs contact
Alterations, renovations, or an indirect rate that varies by year	vpr@syr.edu
Claude accounts and access	its.syr.edu/getclaude

A one-page quick start guide covering the same workflow is available for principal investigators who have not used the skill before.