

## Where PhDs Actually Land

EVERY FIGURE CHECKED AUGUST 18, 2026

# 36.8%

**of 2024 PhDs had no definite commitment at graduation**

21,413 of 58,131 recipients. Every salary in this guide is conditional on being in the 63.2% who did have one, so read these as what the placed half earns, not as what a PhD is worth.

NSF Survey of Earned Doctorates 2024, Table 6-1

### HOW THIS WAS BUILT

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- Almost every salary here comes from one instrument, the NSF Survey of Earned Doctorates 2024, so the paths are actually comparable. Aggregators are excluded on purpose: Glassdoor returns \$162,000 for a postdoc, which is obviously conflated.
- Where a number is one employer's posted range rather than survey data, it says so on the row. Those are examples, not medians.
- These are medians. Half of each group earns less. We did not verify a formal gate for every path, and where we could not, the row says that instead of guessing.

## Every path, in one place

Screenshot this. The detail behind each row follows.

| Path                                                 | Year one                      |
|------------------------------------------------------|-------------------------------|
| Academic postdoc, biological and biomedical sciences | \$60,000                      |
| Academic employment, humanities                      | \$60,000                      |
| Academic employment, all fields                      | \$75,000                      |
| Nonprofit or research institute scientist            | \$92,000                      |
| Government scientist, federal                        | \$96,000                      |
| Industry postdoc, one biotech example                | \$100,000 rising to \$106,500 |
| Data scientist                                       | \$112,590                     |
| Industry R and D, biotech and pharma, biology PhD    | \$120,000                     |
| Industry R and D, engineering                        | \$125,000                     |
| Science policy fellow                                | \$101,401 to \$131,826        |
| Patent examiner, USPTO                               | \$67,860 to \$120,699         |
| Industry, mathematics and statistics                 | \$150,000                     |
| Industry R and D, computer and information sciences  | \$180,000                     |
| Management consulting, one firm example              | \$192,000                     |
| Quantitative researcher, hedge fund                  | \$235,000 to \$300,000 base   |

### HOW TO READ THIS

Read the gate before the number. The pay tells you where the money is; the gate tells you which doors are actually open to you, and several of them are closed by citizenship, degree field, or a publication record rather than by ability.

## 01 Academic postdoc, biological and biomedical sciences

**\$60,000**

NATIONAL SURVEY MEDIAN

### WHAT ACTUALLY GATES IT

The PhD, plus a PI with grant money. No exam, no credential. The floor that binds it: NIH sets the year-zero Kirschstein-NRSA stipend at \$63,480 for FY2026, which is why the biology postdoc median sits within a few thousand dollars of it.

#### WATCH OUT

The SED median (\$60,000) is BELOW the NIH floor, because that floor binds only NRSA-supported trainees, not every postdoc. Half of biology postdocs earn less than \$60,000.

Who takes it: 65.3% of biology PhDs with a US commitment take this path. It is the single largest funnel in the dataset.

NSF SED 2024 Table 6-6; NIH NOT-OD-26-044

## 02 Academic employment, humanities

**\$60,000**

NATIONAL SURVEY MEDIAN

### WHAT ACTUALLY GATES IT

No universal credential. See the tenure-track section: the real gate is the publication record.

#### WATCH OUT

53.1% of humanities PhDs with a US commitment take academic employment, the highest academic share of any field, and it pays the least of any field-by-sector cell in the survey.

Who takes it: 53.1% of humanities PhDs with a US commitment.

NSF SED 2024 Table 6-7

### 03 Academic employment, all fields

**\$75,000**

NATIONAL SURVEY MEDIAN

#### WHAT ACTUALLY GATES IT

See the tenure-track section. Median 13 publications, 6 first-author, 4 years of postdoc.

#### WATCH OUT

This is NOT tenure-track pay. The survey pools tenure-track hires with lecturers, instructors, adjuncts, staff scientists and research faculty in one column, and publishes no tenure-track-only figure. Anyone quoting this as a professor salary is misreading it.

Who takes it: 24.0% of all US commitments.

NSF SED 2024 Table 6-7

### 04 Nonprofit or research institute scientist

**\$92,000**

NATIONAL SURVEY MEDIAN

#### WHAT ACTUALLY GATES IT

Not verified. Research institutes are too heterogeneous for one requirement, and we found no primary source stating a common gate.

#### WATCH OUT

The survey folds nonprofit into a bucket with government, K-12 and unknown, so there is no clean headcount for how many PhDs actually land here.

Who takes it: Not separately reported.

NSF SED 2024 Table 6-7

## 05 Government scientist, federal

# \$96,000

NATIONAL SURVEY MEDIAN

### WHAT ACTUALLY GATES IT

Two hard gates, both written down. First, the doctorate itself sets your grade: OPM qualifies a PhD for GS-12 in research positions, where a master's qualifies only for GS-11. Second, US citizenship, under Executive Order 11935, for competitive-service jobs.

#### WATCH OUT

The citizenship gate closes this path entirely for roughly a third of the cohort: 36,062 of 58,131 recipients were US citizens or permanent residents. GS-12 step 1 base is \$76,463 in 2026; locality pay is what carries the median to \$96,000.

Who takes it: Not separately reported (pooled into Other).

NSF SED 2024 Table 6-7; OPM qualification standard; OPM 2026 GS table

## 06 Industry postdoc, one biotech example

# \$100,000 rising to \$106,500

ONE EMPLOYER'S POSTED FIGURE, NOT A MEDIAN

### WHAT ACTUALLY GATES IT

Not verified. The program page states the pay but not the eligibility requirement.

#### WATCH OUT

One employer, one location. Not a median, and not generalizable. It is here because it is the sharpest honest contrast in the guide: the same job title pays \$60,000 in a university biology lab and \$100,000 at this company.

Genentech postdoc program page, read 2026-08-18

## 07 Data scientist

**\$112,590**

DIFFERENT INSTRUMENT, NOT COMPARABLE TO THE SURVEY ROWS

### WHAT ACTUALLY GATES IT

Barely one, and that is the finding. BLS lists typical entry-level education as a bachelor's degree, with some employers preferring a master's or doctorate.

#### WATCH OUT

Different instrument. This is all data scientists at every career stage and every education level, not first-year PhDs, so it is NOT comparable to the survey rows. A PhD here competes against bachelor's holders.

BLS Occupational Outlook Handbook, May 2024 median

## 08 Industry R and D, biotech and pharma, biology PhD

**\$120,000**

NATIONAL SURVEY MEDIAN

### WHAT ACTUALLY GATES IT

No verified credential gate. The strongest evidence is negative and useful: 988 biology PhDs went straight to US industry with no postdoc in between, so the postdoc is demonstrably not required.

#### WATCH OUT

The pay is exactly double the postdoc, but the door is about 3.6 times narrower: 18.1% go to industry against 65.3% into a postdoc.

Who takes it: 18.1% of biology PhDs with a US commitment.

NSF SED 2024 Tables 6-7 and 6-1

## 09 Industry R and D, engineering

**\$125,000**

NATIONAL SURVEY MEDIAN

### WHAT ACTUALLY GATES IT

No verified credential gate.

#### WATCH OUT

47.2% of engineering PhDs go straight to industry, the second-widest industry door. Engineering academe pays \$90,000, so the premium here is smaller than in biology.

Who takes it: 47.2% of engineering PhDs with a US commitment.

NSF SED 2024 Table 6-7

## 10 Science policy fellow

**\$101,401 to \$131,826**

ONE EMPLOYER'S POSTED FIGURE, NOT A MEDIAN

### WHAT ACTUALLY GATES IT

Fully specified and unusually concrete: a doctoral degree (or an engineering MS plus three years), US citizenship with no permanent-resident route, eligibility for federal funds, Selective Service compliance, and you cannot already be a federal employee.

#### WATCH OUT

A stipend range from one program, not survey data, and it is explicitly scaled by years of postdoctoral experience, so a fresh PhD lands at the bottom. It is also a fixed-term fellowship, not a permanent job.

AAAS Science and Technology Policy Fellowships, stipend and eligibility pages

## 11 Patent examiner, USPTO

**\$67,860 to \$120,699**

ONE EMPLOYER'S POSTED FIGURE, NOT A MEDIAN

### WHAT ACTUALLY GATES IT

The posting takes a PhD directly. The bigger gate is the adjacent patent-agent path, where the USPTO's Category A degree list decides who may sit the exam at all. It includes biology, biochemistry, physics, chemistry, materials science and every engineering discipline. It EXCLUDES mathematics, statistics, psychology, geology, astronomy, ecology, environmental science and public health. A computer science degree counts only if it is a BS.

#### WATCH OUT

The range spans three grades and a PhD enters at GS-11, not the top. Our source posting has since closed, so treat the range as indicative. This is examining, not prosecution at a firm.

USAJOBS Patent Examiner posting (archived); USPTO General Requirements Bulletin

## 12 Industry, mathematics and statistics

**\$150,000**

NATIONAL SURVEY MEDIAN

### WHAT ACTUALLY GATES IT

No verified credential gate.

#### WATCH OUT

The same field's academic cell is \$68,000, a 2.2x gap and the widest sector spread of any field. Even so, 43.3% still take a postdoc first.

Who takes it: 27.8% of math and statistics PhDs with a US commitment.

NSF SED 2024 Table 6-7

### 13 Industry R and D, computer and information sciences

**\$180,000**

NATIONAL SURVEY MEDIAN

#### WHAT ACTUALLY GATES IT

No verified credential gate.

#### WATCH OUT

This is computer science, not biology. It is the highest cell in the entire survey and the least transferable number in this guide. Do not read it as what a biologist earns after a data bootcamp.

Who takes it: 48.7% of CS PhDs with a US commitment, the widest industry door; only 25.3% take a postdoc, the lowest of any science field.

NSF SED 2024 Table 6-7

### 14 Management consulting, one firm example

**\$192,000**

ONE EMPLOYER'S POSTED FIGURE, NOT A MEDIAN

#### WHAT ACTUALLY GATES IT

Looser than people assume. The posting asks for an advanced graduate degree, naming an MBA and a PhD as interchangeable, and then adds 'or equivalent work experience', so strictly neither is required.

#### WATCH OUT

One firm, one posted figure, stated as a flat \$192,000 rather than a range. The same posting flags heavy travel and work outside business hours.

McKinsey Associate posting, Job ID 15178, read 2026-08-18

## 15 Quantitative researcher, hedge fund

**\$235,000 to \$300,000 base**

ONE EMPLOYER'S POSTED FIGURE, NOT A MEDIAN

### WHAT ACTUALLY GATES IT

Named and closed: a PhD in mathematics, statistics, physics, computer science 'or another highly quantitative field', plus probability and statistics depth, coding (Python, R or C++), and independent research experience. A biology PhD is not on that list.

#### WATCH OUT

One firm, base salary only, bonus separate and discretionary. It is the most selective employer here, and the field requirement gates out most of the cohort. Showing this number without the field list beside it is misleading.

Citadel Quantitative Researcher, PhD Graduate (US) posting, read 2026-08-18

## What the academic path actually costs

**13 publications, 6 first-author, 4 years of postdoc, 15 applications**

That is the median faculty-job applicant, from a study of 317 applicants who between them sent 7,644 applications in one cycle. No university publishes this number, which is why almost nobody knows what they are actually training toward.

Only 16% of those applicants were first author on a Cell, Nature or Science paper. They did convert offers at a much higher rate. But 74% had no such paper and most of them still received at least one offer, so the glamour journal is an accelerant, not the gate.

This is a self-selected survey, skewed toward the life sciences, from the 2018-19 cycle. It is the best evidence available, not a census.

Fernandes et al., eLife 2020

## THE GAP THAT NO CAREER DECISION CLOSES

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The widest gap here is not academia against industry. It is field against field. Computer science industry pay (\$180,000) against humanities academic pay (\$60,000) is 3x, and no choice you make about sector closes it. Worth knowing before you read your own row as a verdict on your decisions.

One more pattern: the postdoc flattens everyone and industry does not. Postdoc medians run \$58,000 to \$70,000 across every field, a 1.2x spread. Industry medians run \$59,000 to \$180,000, a 3x spread.

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### More of this sort of thing

I write about getting published, mostly the parts nobody explains until after they have cost you a submission.

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