

A Market for Human Expertise: Observations*

Alberto Cavallo

Zoë Cullen

This draft: July 21, 2026

Abstract

AI labs hire human experts on a spot market to train AI models. We examine a leading platform where multiple AI labs purchase expertise, daily, for six months of 2026, to assemble a panel of 89,000 hires, and \$400M in expert pay at posted rates. Some early observations: First, expert hiring subsided to less than 10% of its peak within 4 months for most broad occupations in the first half of 2026. Second, the timing of hires tracks the use of AI, relative to the potential of AI. Early training by experts is associated with raised AI use in Anthropic’s Economic Index. Hiring is currently most active in occupations where the use of AI lags potential, presumably to close the largest gaps, such as business and financial operations.¹

Data Description

We examine the complete public job board of Mercor daily between January 19 and July 13, 2026. Each snapshot records, for every active posting: the job title, the posted hourly pay, a persistent posting identifier, and a counter of the form “ N hired this month.” We count a posting’s hires as its counter level when first observed plus every subsequent day-over-day increment; decreases are hires leaving the window, not corrections. Summing across the panel’s 1,701 postings gives roughly 89,000 hires with estimated compensation of \$405 million (each posting’s hires $\times$ its stated time commitment $\times$ its posted midpoint rate).²

Each job title is classified by the 2018 Standard Occupational Classification: 70 percent of hires are on titles coded to a detailed (6-digit) occupation, 16 percent to a 3-digit minor group, and 14 percent (generalist and annotation work) have no occupational home and are excluded from occupational aggregates. When we aggregate to SOC major groups, 96 percent of postings are assigned.

For AI-use measures we use the occupation-level series of the Anthropic Economic Index, released March 5, 2026: *observed AI use*, constructed by Massenkoff and McCrory (2026) from

*Corresponding, Cullen: zcullen@hbs.edu, Cavallo: acavallo@hbs.edu

¹Massenkoff, Maxim, and Peter McCrory. 2026. “Labor Market Exposure to AI: Theory and Evidence from Anthropic Usage Data.” Working paper. Data released March 5, 2026, Anthropic Economic Index.

²Survey postings state 30–60 minute engagements (6% of hires), which we use directly; a third of postings state a weekly commitment, median 15 hours, assumed to run four weeks (46% of hires); the remainder are assigned 40 hours; under the alternative classification of a flat 40 hours for every hire gives \$306 million.

Anthropic usage logs as the share of each occupation’s task time observably performed with AI, and *theoretical AI use*, the share of tasks frontier models could plausibly perform, from the human-rated full-exposure series of Eloundou et al. (2023). The *AI adoption gap* is their difference. All three are aggregated to SOC major groups with OEWS employment weights; our sample is the fourteen AI-exposed major groups. Four major groups with Mercor postings are omitted, Healthcare Support (SOC 31), Construction and Extraction (SOC 47), Production (SOC 51), and Transportation and Material Moving (SOC 53), which together account for 248 hires and all have theoretical use below 0.20. Because the gap cannot exceed theoretical use, their gaps are mechanically small, and including them strengthens the correlation reported below (to +0.73) while conflating the gap with exposure itself.

Obs. 1: The market for an occupation’s expertise subsides to 10% below peak in the first half of 2026.

Figure 1 plots daily hiring for the fourteen AI-exposed major groups, each series scaled to its own peak and ordered by the hires-weighted mean date of hiring, latest wave at the top. Demand appears to rise and fall on this platform for human expertise for many occupations at the SOC-2 (Figure 1) and SOC-3 level (Appendix Figure 5). Computer and mathematical hiring peaked in early March 2026 (4,573 hires in its peak trailing month) and had largely ended by mid-April. Arts, design, entertainment, and media work ran through the spring and fell by over 90% of peak by mid-June. The sciences continued to be in demand throughout Q1 and Q2 of 2026. The licensed professions arrived last and largest: healthcare practitioners, business and financial operations, legal, and management all crested in June, and several were still elevated when the panel ends on July 13, 2026.

Where a group’s hiring ends, it ends abruptly, consistent with data-acquisition projects that conclude when a target corpus is assembled rather than with gradual demand decay. An important caveat to this interpretation is the potential for hiring to continue off platform and for relationships with experts to continue indefinitely once hired.

Obs 2: The timing tracks observed use of AI, relative to the potential of AI.

Why software first and business last? Expert hiring appears active where AI’s realized capability lags what the technology should already support, namely, where the missing input is likely human context rather than model capability. The AI adoption gap, measured by the Anthropic Economic Index (Massenkoff and McCrory, 2026), captures this shortfall as of March 2026.

Figure 2 plots the timing of each group’s hiring wave (the hires-weighted mean date) against its AI adoption gap. The gradient is visible group by group: the lowest-gap groups (personal

care and sales, gaps of 0.22 and 0.34) and the already-AI-saturated computer/mathematical occupations were hired by March; every group whose wave arrived in May carries a gap above 0.4; the latest waves (management, legal, community/social, healthcare, business/financial) sit high in the gap distribution. Arts/media is the visible exception, an early wave despite a large measured gap.

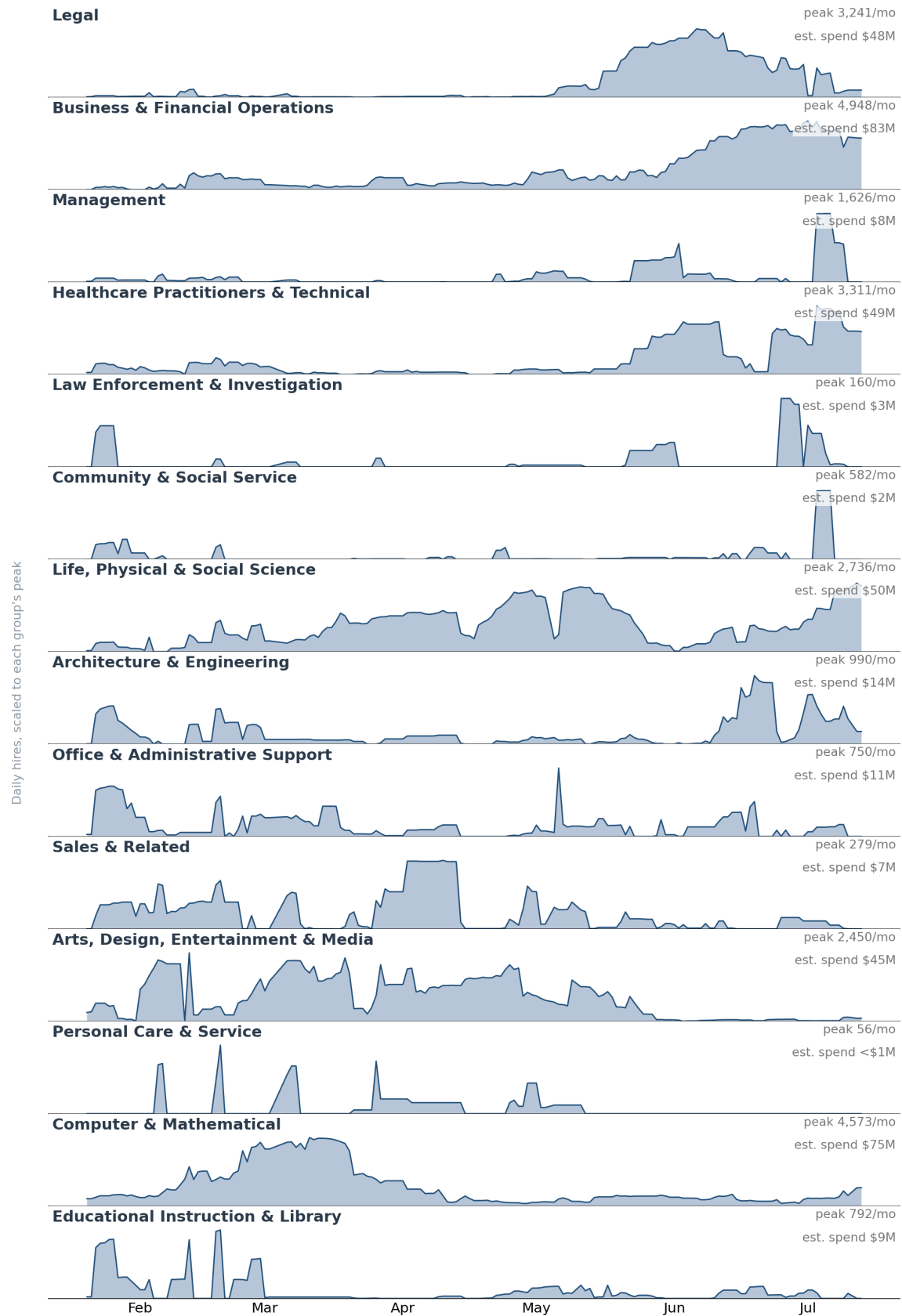
Figure 3 summarizes the timing of each group’s hiring wave as the hires-weighted mean date and correlates timing with the AI adoption gap, theoretical AI use alone, and observed AI use alone; because fourteen groups is a small cross-section, each correlation is shown with its full leave-one-out range. The gap correlates +0.63 with wave timing, positive in every leave-one-out sample (+0.53 to +0.71): no single group drives it. Theoretical use alone is far weaker (+0.30, with leave-one-out estimates as low as +0.07). Observed use is *negatively* correlated with timing (−0.23, negative in every leave-one-out sample): where the market arrived in Q1 2026, AI appeared in heavier use by Q2. The relationship between the timing of the expertise market and the adoption shortfall is as expected: hiring occurs when AI has unrealized potential, and likely helps close the gap. The timing of the four groups whose waves were still elevated at the panel’s end is right-censored, which may downwardly bias the relationship.

Remarks on related relationships: total market quantities correlate with AI exposure rather than with the gap. Across the fourteen groups, total hires (log) correlates +0.77 with theoretical use and +0.65 with the gap, and estimated spend (log) behaves similarly (+0.75 and +0.61), while the median posted price (log) is only weakly related to any AI-use measure (at most +0.27); Appendix Figure 4 reports the leave-one-out ranges. The size of each group’s market might reflect how much the AI models benefit from human expertise; the timing of its wave reflects how much of that potential remains unrealized to date.

References

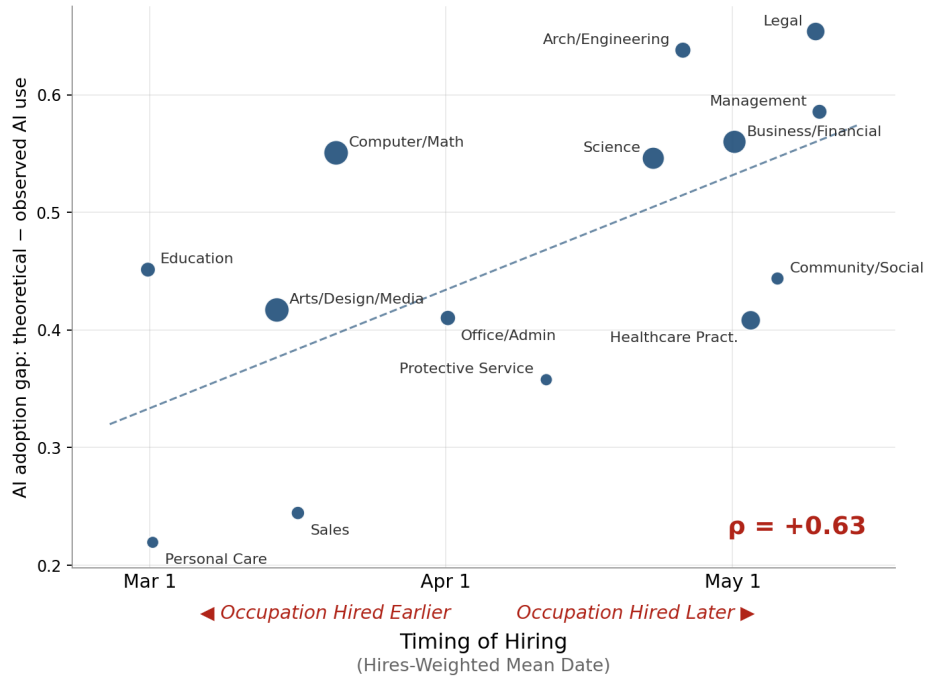
- [1] Eloundou, Tyna, Sam Manning, Pamela Mishkin, and Daniel Rock. 2023. “GPTs are GPTs: An Early Look at the Labor Market Impact Potential of Large Language Models.” Working paper.
- [2] Massenkoff, Maxim, and Peter McCrory. 2026. “Labor Market Exposure to AI: Theory and Evidence from Anthropic Usage Data.” Working paper. Data released March 5, 2026, Anthropic Economic Index.

Figure 1: Hiring waves by SOC major occupation group



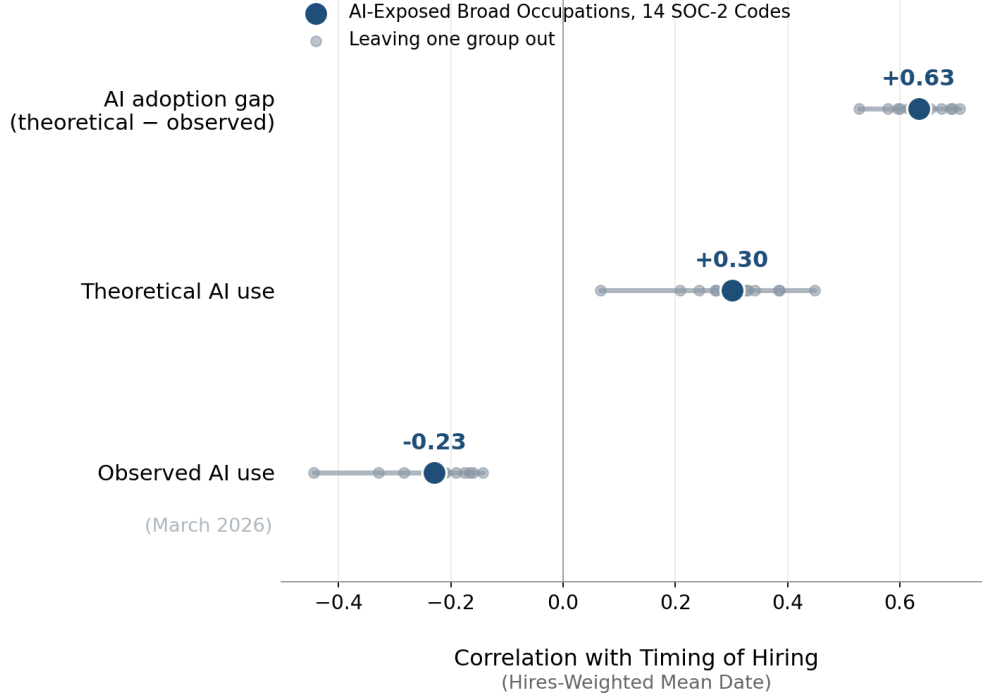
Notes: Mercor's public job board, January 20–July 13, 2026. Each row is one of the fourteen AI-exposed SOC 2-digit major groups (employment-weighted theoretical AI > 0.2; Section). Each curve is the group's daily sum of posting-level “ N hired this month” counters — a trailing-window stock, so each series is the group's hires over roughly the preceding thirty days — scaled to the group's own peak; postings are assigned to detailed SOC occupations from their titles and aggregated to major groups. The right-hand labels report the peak trailing-month hires (maximum of the plotted daily sum) and the group's estimated total spend over the panel (each posting's hires $\times$ its stated time commitment $\times$ its posted midpoint rate; Section). Groups are ordered by the hires-weighted mean date of hiring, latest at the top. Days with missing or partial data are linearly interpolated. Late-peaking rows are right-censored by the July 13 end of the panel.

Figure 2: Timing of expert hiring and the AI adoption gap



Notes: Each point is one of the fourteen AI-exposed SOC 2-digit major groups (Section). The horizontal axis is the timing of the group’s Mercor hiring: the hires-weighted mean date over January 20–July 13, 2026, with hires measured as daily counter increments. The vertical axis is the group’s AI adoption gap: theoretical minus observed AI use, employment-weighted (Anthropic Economic Index, March 2026). Marker area scales with total Mercor hires. The mean dates of the four groups whose waves were still elevated at the July 13 end of the panel (science, healthcare practitioners, management, business/financial) are right-censored, so their true dates are later than shown, which likely biases the plotted correlation downward. The dashed line is the OLS fit; ρ is the correlation.

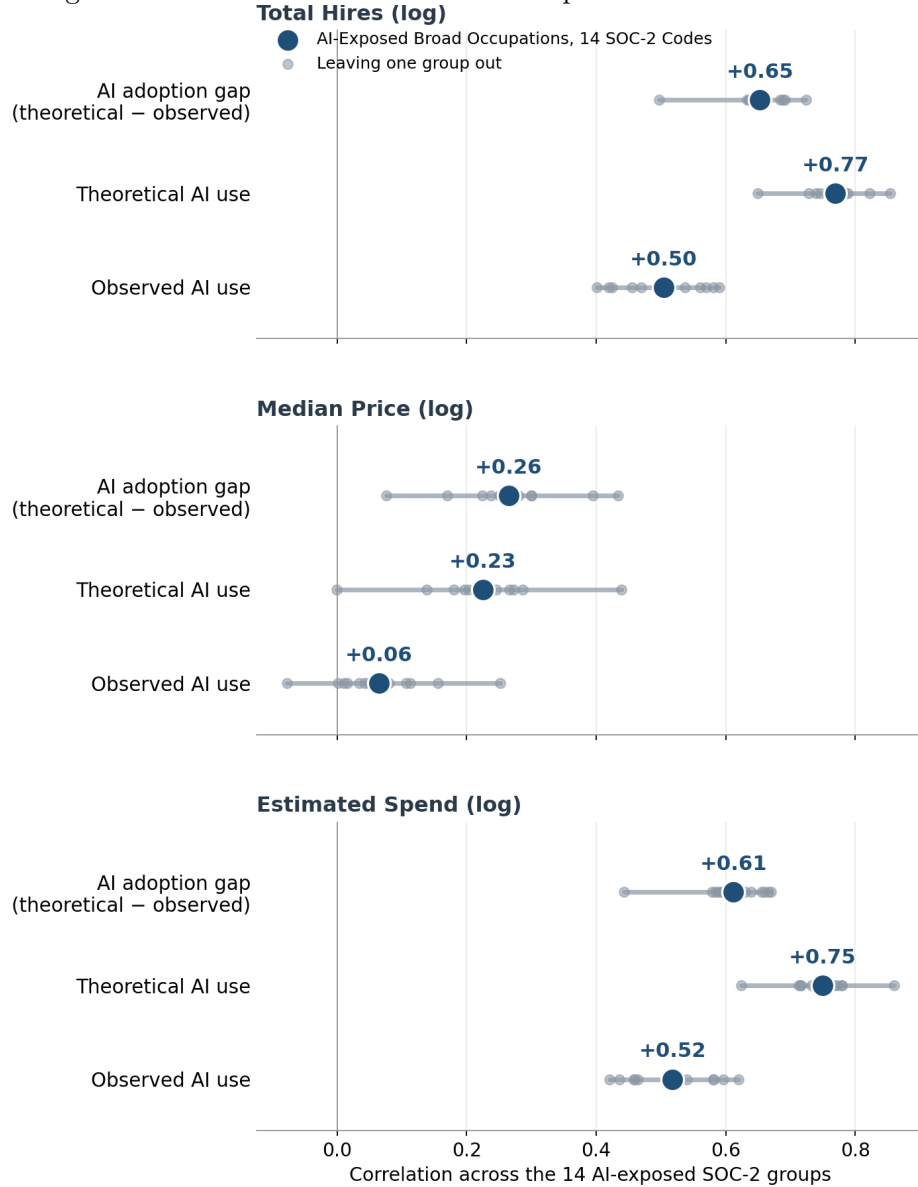
Figure 3: Correlation of hiring-wave timing with AI-use measures



Notes: Correlation between the timing of each group’s hiring wave (the hires-weighted mean date of its Mercor hiring, January 20–July 13, 2026, with hires measured as daily counter increments) and three occupation-group AI-use measures, across the fourteen AI-exposed SOC 2-digit major groups (Section). All three measures are employment-weighted aggregates over each group’s occupations from the Anthropic Economic Index release of March 5, 2026: observed AI use from Anthropic usage logs, theoretical AI use from the human-rated full-exposure series of Eloundou et al. (2023), and the AI adoption gap, their difference. Large dots use all fourteen groups; small dots re-compute each correlation leaving out one group at a time, and the bar spans the resulting min–max range. Timing is positively correlated with the AI adoption gap in every leave-one-out sample, far more weakly correlated with theoretical AI use, and negatively correlated with observed AI use in every leave-one-out sample: expert hiring comes late in occupation groups where AI could perform the work but is not yet used. The timing of the four groups whose waves had not concluded by July 13 is right-censored, which likely biases the plotted correlations toward zero.

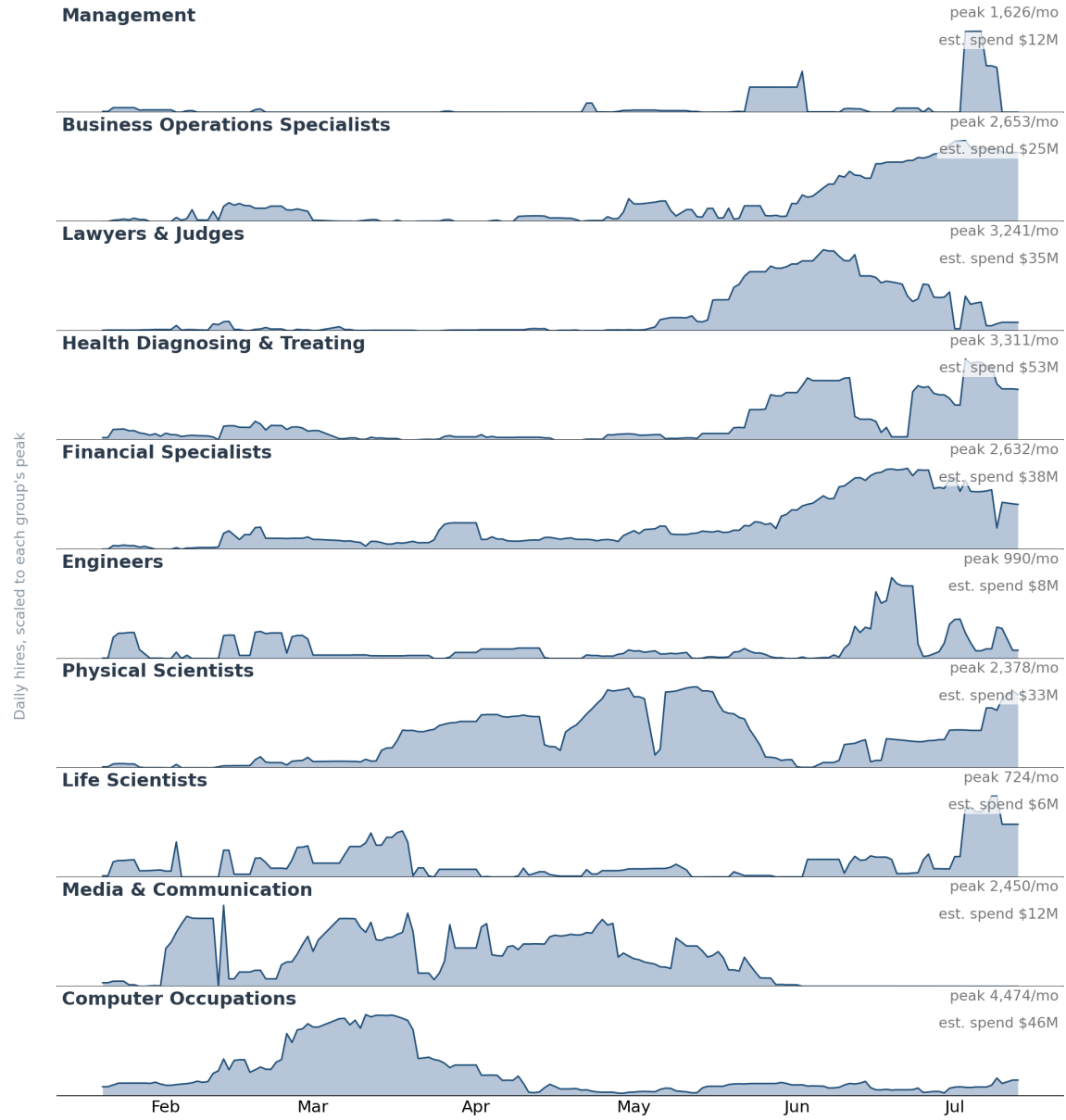
Appendix

Figure 4: Correlation of market size and prices with AI-use measures



Notes: Correlation between three market outcomes and the three AI-use measures of Figure 3, across the same fourteen AI-exposed SOC 2-digit groups, with leave-one-out ranges constructed identically. Total hires and estimated spend are posting-level sums over each group's listings (Section), in logs. The median price is the median posted midpoint across the group's hourly listings, in logs. Market size loads on theoretical exposure: groups where AI could absorb more work bought more expert labor and spent more. Posted prices are only weakly related to any AI-use measure.

Figure 5: Hiring waves by SOC-3 minor group



Notes: Daily hiring by 2018 SOC 3-digit minor group, top ten groups by total hires, in the format of Figure 1, from the same title-level classification aggregated to minor groups. Rows, top to bottom, with SOC-3 codes: Management (11-9), Business Operations Specialists (13-1), Lawyers & Judges (23-1), Health Diagnosing & Treating Practitioners (29-1), Financial Specialists (13-2), Engineers (17-2), Physical Scientists (19-2), Life Scientists (19-1), Media & Communication (27-3), Computer Occupations (15-1). Successive platform campaigns that draw on the same occupation appear as repeated pulses within a row.