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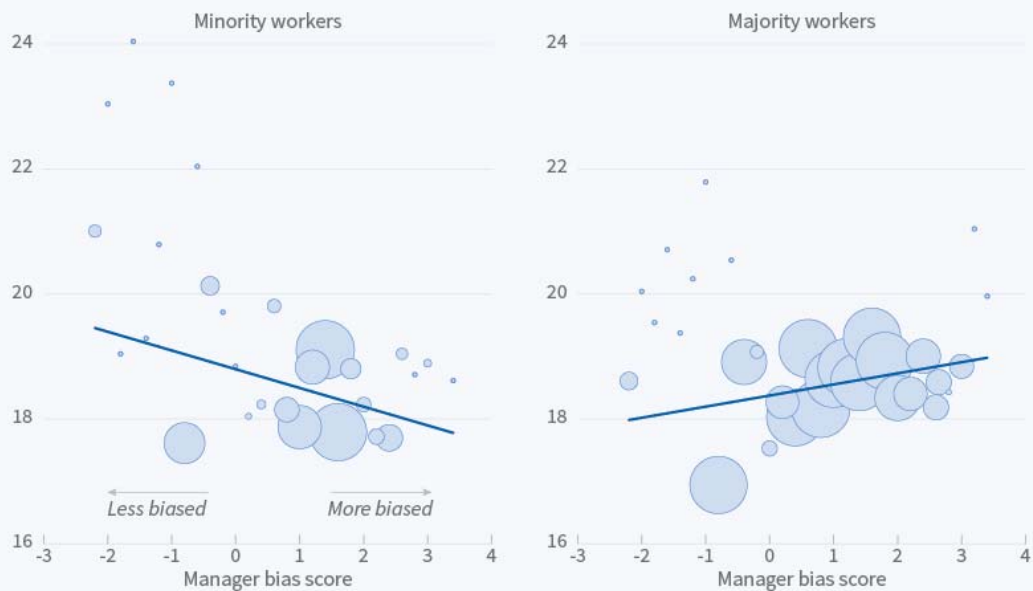
People

About

Managers' Bias and Workers' Job Performance

Worker Performance and Manager Bias

Items scanned per minute



Larger circles denote larger numbers of data points

Source: Researchers' calculations using data from a French grocery store chain

Minority cashiers at a French grocery chain scanned articles slower when working shifts for managers who appear to be biased.

What happens to the job performance of minority workers when they are managed by someone who is biased against their group? In **Discrimination as a Self-Fulfilling Prophecy: Evidence from French Grocery Stores** (NBER Working Paper No. 22786), [Dylan Glover](#), [Amanda Pallais](#), and [William Pariente](#) follow workers at 34 outlets of a French grocery chain, tracking productivity, absences, and time worked to determine job performance. Their sample drew from new cashiers who had been hired for six-month trials on a government-subsidized contracts known as a Contrat de Professionnalisation, or CP—which meant they were quasi-randomly assigned managers and shifts.

Managers' degree of bias against minority groups was determined using an Implicit Association Test (IAT), a widely used method in which the speed of association between two concepts determines the level of bias. The researchers tested the association between what they described as "(1) traditionally French or North African sounding names and (2) words indicating worker competence or incompetence." They then linked the information on each manager's test results with data on the performance of the cashiers whose shifts that manager oversaw.



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March 2017

When Glory Is Something to Die For

Whether it's students receiving academic recognition in school or professionals winning prestigious industry awards for their achievements, human beings crave and welcome praise—and this can sometimes spur extraordinary effort.

In **Killer Incentives: Status Competition and Pilot Performance during World War II** (NBER Working Paper No. 22991), Philipp Ager, Leonardo Boncinelli, and Hans-Joachim Voth examine the victory scores of thousands of German fighter pilots during the Second World War and find that official praise of a pilot led to significantly better performance by his former squadron peers. However, this extra achievement came at a lethal status-competition cost: Non-ace pilots strove to overachieve and sometimes paid the price with their lives.

Positive recognition of individuals can lead to increased effort and output within an institution or company—and such motivational tactics are widely used at all levels of society. Praise also can have negative effects, such as damaging morale among those who are not recognized. And it can spur status competition, a sort of striving to “keep up with the Joneses.” The negative effects of praise can be particularly troublesome in high-risk situations, especially if the status competition involves genuine danger.

This study measures the effects of both positive recognition and status competition, focusing on the spillover effects of praise on the performance and risk-taking of former squad-

mate peers in the German air force during World War II. Using six months compiled by the air force's high-command (Oberkommando der Luftwaffe, or OKL) and now stored in the German Federal Archives (Bundesarchiv) in Tübingen, the researchers review data on more than 5,000 fighter pilots, 53,000 claims of aerial victories, and a total of about 96,000 observation-day prizes. They also identify and track official recognition of pilots by name in the daily bulletin of the German armed forces (Wehrmachtbulletin), ensuring that we considered one of the highest forms of recognition within the German military. They find that positive mentions in the daily bulletin of former peers who had been assigned to other Luftwaffe squadrons led to higher performance by these past squadron-mates and even among “bottle-neck pilots” who grew up near a pilot who had received mentions in the bulletin.

The extent of improved performance varied with the skill sets of the pilots. Aces, those ranked in the top percentile of German pilots, temporarily increased their victory scores by two-thirds. Those in the 90th percentile increased their scores by about one-fifth. At the lower end of the pilot skill distribution, pilots performed better after a former squadron peer was mentioned in the bulletin, but not by nearly so much as higher-ranked pilots.

The researchers study risk-taking by pilots by measuring the probability that they are no longer mentioned in the OKL reports, almost always a sign that they had perished or been injured. They found that the probability of such an exit more than doubled for average pilots, those below the 80th percentile, while it hardly increased at all for the best pilots.

The bottom-line findings? When a former squadron peer is mentioned, the very best pilots tried harder, scored more victories, and

German WWII Pilot Performance

▲ Higher peer recognition leads to higher number of aerial victories per month



▲ Higher peer recognition leads to higher probability of death



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Because France precludes workplace queries regarding race, ethnicity, or religion, the researchers submitted the names of the cashiers to Inter Service Migrants, Centre d'Observation et de Recherche sur l'Urbain et ses Mutations, which specializes in discrimination testing, to determine each CP worker's minority status. That organization divided the names into these categories: European, North African, sub-Saharan African, mixed or undetermined, and other, including names of Turkish and Asian origin.

Using the store-tracked performance metrics, the researchers found that minority cashiers performed worse under biased than under unbiased managers, while the performance of non-minority cashiers was not affected by manager bias. Minority cashiers scanned items slower during shifts under biased managers and they took more time between customers. Minorities were more likely to be absent when scheduled to work with biased managers and, when they did come to work, they spent less time at the store. While on average, minorities performed at the 53rd percentile of average worker performance, they performed at the 79th percentile when working with unbiased managers. Moreover, because cashiers are paid based on time worked, the authors estimate that manager bias leads minorities to earn 2.5 percent less.

—Jen Deaderick

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