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## College Educated Are More Responsive to Saving Incentives

In *Private Saving and Public Policy* (NBER Working Paper No. 4215), **Douglas Bernheim** and **John Scholz** find that tax incentives encourage saving for college-educated Americans but are less effective for those without a college education. That is because college-educated Americans tend to respond more to changes in the rate of return on saving. The typical couple with pension coverage increases their saving in response to higher pretax returns. However, college-educated couples increase their savings relative to income roughly seven times as much as high school-educated couples do, the authors calculate.

The current law on IRA deductions is perverse. It allows all taxpayers to invest up to \$2000 (and up to \$4000 for a couple if each member earns more than \$2000) in Individual Retirement Accounts (IRAs). But it does not allow married couples to deduct their IRA contributions from taxable income if their adjusted gross income exceeds \$50,000. These high-income households are the very ones that would be most responsive to the tax incentives. Thus, the current IRA tax incentives are targeted at the taxpayers who are least responsive to them. Bernheim and Scholz note, however, that extending eligibility for IRAs to high-income taxpayers may not increase saving much more because high-income taxpayers may simply shift existing savings into IRAs to get the tax deduction.

The authors describe an alternative system of Premium Savings Accounts (PSAs). A PSA sys-

tem would require each taxpayer to save a certain minimum—the “floor”—before being eligible to contribute to a tax-favored account. A husband and wife with a combined adjusted gross income of \$80,000, for example, might have a floor of \$8000 and a ceiling of \$12,000. All savings between \$8000 and \$12,000 would be eligible for favorable tax treatment. Setting realistic floors and ceilings would give households at every income level a strong marginal incentive to save.

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By using floors that vary with income rather than giving a tax advantage to all saving, PSAs would limit the loss in revenues to the federal government. This PSA plan, for example, would provide additional saving incentives to 2.4 million couples, 90 percent more than with the current restricted IRA and 30 percent more than with an IRA that is universally deductible. Further, the PSA plan is nearly twice as cost effective as the universal IRA in terms of increased saving relative to lost tax revenues.

This study is based on a sample of 1314 households in which the husband was fully employed and between the ages of 25 and 64 in 1986. Of the sample, 474 husbands had completed college and 840 had not.

DRH

## Japan and U.S. Real Interest Rates Converge

Few subjects in international economics have touched as many political nerves in recent years as the comparison of relative financing costs in different countries. The apparent financing advantage enjoyed by Japanese firms over their U.S. competitors in past decades—short-term real bank loan rates 1 percent to 2.8 percent lower, according to some research—even has been cited as evidence of “unfair trade” that should be redressed by changes in U.S. policy. But a new NBER study by **Richard Marston** shows that bank financing costs in Japan were underestimated systematically, and those in the United States overestimated, in the past. In any event, Marston finds, most of the reported gap in financing costs between the two countries can be traced to features of national markets that have largely disappeared.

In **Determinants of Short-Term Real Interest Differentials Between Japan and the United States** (*NBER Working Paper No. 4167*), Marston focuses on bank loan financing, which continues to be the most important source of external finance for Japanese firms. He finds that interest rates in Japan were governed by market conventions and regulations that often obscured the true cost of funds. Prior to 1989, the most widely reported lending rate was called the “standard rate.” This was defined as the rate on loans of “especially high credit standing” and was tied through informal guidelines to the Bank of Japan’s discount rate. The cost of borrowing at this rate was understated because Japanese banks typically required that borrowers maintain compensating balances on deposit, raising the effective cost of the loan. For most of the 1970s, the only short-term rate free to reflect monetary conditions was the “gensaki” rate, paid on repurchase agreements. Between 1973 and 1991, the standard rate averaged 5.96 percent while the gensaki rate averaged 6.99 percent: more than one percentage point higher.

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Measuring the true cost of bank loans in the United States is also difficult. The meaning of

the widely quoted “prime rate” (the rate at which banks traditionally lent to their most creditworthy customers) has changed fundamentally as borrowers gained greater access to direct financing from the 1970s onward. Marston finds that, from 1973 to 1991, the average gap between the prime rate and the rate at which creditworthy firms could borrow on the commercial paper market was 1.57 percent.

Since reported borrowing costs in the Japanese and U.S. markets were so distorted by custom and regulation, Marston examines the Eurocurrency markets to see how interest rates in different currencies are linked in nonregulated markets. He finds that the average real interest differential between Euroyen and Eurodollar rates is close to zero (0.07 percent or  $-0.12$  percent, depending on which wholesale price index is used to measure inflation). This is in contrast to a real differential of over 2 percent between Japanese and U.S. bank loan rates.

Now that national markets have been deregulated and capital controls removed, real interest differentials between Japanese and U.S. short-term rates should be close to those in the Eurocurrency markets. “Relative financing cost,” Marston predicts, “will no longer depend on the peculiar features of national loan markets shielded from international competition.” RN

## Monetary Policy Affects Inventory Movements

Inventory reductions play an important role in business cycle downturns. However, downturns typically are preceded by a tightening of monetary policy. One possible explanation is that firms reduce inventory as interest rates rise and make financing more costly. But until recently, economists have found little relationship between interest rates and inventories.

Now a new NBER study by **Anil Kashyap**, **Owen Lamont**, and **Jeremy Stein** confirms that companies that rely heavily on bank lending are likely to reduce their inventories during times of tight monetary policy. In **Credit Conditions and the Cyclical Behavior of Inventories: A Case Study of the 1981–82 Recession** (*NBER Working Paper No. 4211*), the authors study the behavior of publicly traded manufacturing compa-

nies during the 1981–2 recession, a recession that apparently was precipitated by tight monetary policy. They then compare that period to 1985–6, a period of relatively loose monetary policy. For each company, they measure liquidity as cash and marketable securities relative to total assets. They also determine whether the firm has a bond rating that would give it access to public credit markets.

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Those firms with low liquidity and no bond rating are presumed to be dependent on banks for financing. Those firms reduced their inventories significantly during the 1981–2 recession, it turns out. Companies not dependent upon bank financing, in contrast, actually increased their inventories slightly during the recession.

“The inventory declines seen in 1982 were partially due to a cutoff in bank lending,” the authors conclude. But they add that their results do not demonstrate clearly whether lending declined because of an inward shift in bank loan supply or because of a reduction in the value of borrowers’ collateral. Further, curbs on bank lending appear to influence inventories only at times of tight monetary policy: in 1985–6, when monetary policy was far easier and interest rates were lower than in 1981–2, there appeared to be no significant relationship between bank-dependent firms and inventory change.

Kashyap, Lamont, and Stein speculate that other studies have failed to confirm a direct link between inventory levels and the state of monetary policy because they used inappropriate proxies for financing costs. Such studies typically use securities market interest rates, such as the commercial paper rate, but those rates are relevant only for companies that have access to the securities markets. The spread between bank loans and other types of financing may widen in periods of tight money, they note. Therefore, businesses that rely on bank loans for working capital face a much greater escalation in financing costs than other companies do, and will cut inventories more aggressively in response.

ML

## **Job Search Programs with Eligibility Checks Reduce UI Costs**

New unemployment insurance (UI) experiments show that the jobless find work more quickly if they are given a cash incentive to do so. But providing the unemployed with more help in their job search while strictly enforcing the requirement that they actively seek work is more effective in cutting unemployment spells and the cost of UI benefits.

In **Policy Lessons from the U.S. Unemployment Insurance Experiments** (*NBER Working Paper No. 4197*), **Bruce Meyer** examines four experiments involving reemployment bonuses and six that used job search programs. These programs were tried when an estimated 5.1 million workers with at least three years of job tenure lost their jobs during 1981–5. This increase in unemployment drained state UI trust funds, and forced many states to borrow from federal trust funds to pay UI benefits. By the start of 1983, 28 states owed \$13.7 billion to the federal government. These high costs pushed many policymakers to look for ways to save money on unemployment insurance.

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In Illinois in 1984, a state-sponsored experiment paid a \$500 bonus to those finding work within 11 weeks of filing for benefits and keeping the job for four months. That bonus was equal to about four times the average weekly UI benefit. The U.S. Department of Labor helped sponsor three similar bonus experiments in New Jersey (1986–7), Pennsylvania (1988–9), and Washington (1988).

On average, the Illinois program reduced the benefit payments of those eligible for a bonus by more than a week. In the other three states, the bonus saved the system about half a week’s benefits. These experiments reduced the benefits that were paid, but not by more than the cost of the bonuses.

Moreover, Meyer notes that a permanent bonus for finding work might encourage people



who expected to be out of work only briefly to apply for UI just to get the bonus when they returned to work. Without the bonus, some of those people would not think it worthwhile even to apply for jobless benefits. Thus any cost reductions in UI from the bonus program likely would be eliminated or reversed by an enlarged UI roll.

On the other hand, Meyer finds that those receiving the bonuses did not suffer with lower earnings for accepting a job quickly. Indeed, in some cases they got a slight increase in earnings, which would mean an increase in tax revenues for the federal and state governments.

The six job-search experiments were conducted in Nevada (1977-8); Charleston, South Carolina (1983); New Jersey (1986-7); again in Nevada (1988-9); Washington (1986-7); and Minnesota (1988-90). These experiments also provided information on job openings and job referrals. In several of the experiments, employment service personnel urged UI claimants to search in areas that they had overlooked or avoided. The Washington and Minnesota experiments emphasized personalized or individually tailored assistance. The two Nevada experiments and the Minnesota project provided more intensive and higher-quality delivery of existing services. The

second Nevada program and the New Jersey experiment also provided training or relocation assistance. In Charleston and Washington, some claimants were required to attend a seminar on how to find a job.

One important element of several of these experiments, Meyer writes, was more frequent checks on the eligibility of people receiving UI benefits. The programs also required more frequent visits to the unemployment insurance or employment service offices. For instance, the first Nevada program required interviews and eligibility checks each week.

Three of the six experiments, the two in Nevada and one in Minnesota, resulted in average reductions in UI benefits of 1.6 to 4.3 weeks. The other three job-search programs had more modest effects, of about one-half a week each on average.

Meyer finds that the benefits of the job search experiments tend to exceed their costs by a wide margin. For example, in both the second Nevada experiment and in Minnesota, the savings in UI benefits were about twice the costs of the extensive additional services. And unlike the bonus programs, job search programs do not encourage applications for UI benefits by those expecting to return to work shortly. DRF

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