

Rob Taylor and Simon Blair

Rob Taylor (rtaylor@ifc.org) is a principal financial analyst in the World Bank Group's Private Sector Advisory Services. Simon Blair is chief operating officer of Medibank Private, a health insurer in Australia. Before joining Medibank, he was lead health specialist for two years in the World Bank's Europe and Central Asia Region. Before joining the World Bank, he was chief executive officer of Australia's largest public health provider.

Financing Health Care

Singapore's Innovative Approach

Singapore's health financing system combines universal medical savings accounts with supplementary programs to protect the poor and address potential market failures in health financing. The results have been impressive, with low costs, excellent health outcomes, and full consumer choice of providers and quality of care.

Health care costs are escalating rapidly in many countries. While many factors contribute to rising costs, health insurance plays a part by shielding patients and physicians from the real cost. In an effort to contain costs, governments, employers, and insurers have modified payment schemes and coverage, often leading to rationing and restricted consumer choice and in some cases to denial of care.

Singapore is unique among developed countries in achieving excellent health outcomes at a low economic cost. Part of its success may be attributable to its health financing system, which combines individual responsibility with targeted subsidies.

Despite Singapore's small size, with only 3.2 million residents in a land area of 660 square kilometers, the country has been a stellar economic performer, rising from impoverishment only 40 years ago. Its per capita GDP, US\$427 in 1960, rose to US\$24,740 in 2000, one of the highest in the world.¹ Singapore's health indicators are equally impressive. Its average life expectancy increased by 15 years from 1960 (63

years) to 2001 (78) and is now one of the world's longest. Its infant mortality rate is the world's lowest, at 2.2 per 1,000 live births, much improved from 6.6 in 1990 (and 34.9 in 1960) and far lower than rates in most other countries.

Health care

Both the public and the private sector provide health care in Singapore. The public sector provides 20 percent of primary care and 80 percent of hospital care through two integrated care networks. The private sector dominates primary health care, providing 80 percent through its 1,900 clinics. The 13 private hospitals account for 20 percent of inpatient admissions. Singapore has 11,800 hospital beds (3.7 per 1,000 people).

Patients can choose their providers at all levels of care. All Singaporeans are entitled to basic medical services at government polyclinics and hospitals, where rates are regulated and subsidized. Patients are expected to pay part of the cost, and to pay more when they demand higher levels of service. Rates at private clinics and hospitals are unregulated.



Singapore's health spending totaled US\$2.8 billion (US\$870 per capita) in 2000, equivalent to 3 percent of GDP. In comparison, the global average is 8 percent of GDP, with health spending in OECD countries ranging from 5.8 percent in the United Kingdom to 13.7 percent (US\$4,187 per capita) in the United States.

Health financing

Singapore's health financing system includes complementary programs designed to promote individual responsibility, protect the poor, and address potential market failures.

Medisave

Under the Medisave program introduced in 1984, employees contribute 6–8 percent of their monthly salary (with the share depending on their age) to an individual medical savings account (MSA), while employers make a matching contribution. Medisave contributions are part of a broader compulsory savings program in which employees contribute 16 percent of salaries, and employers 20 percent, to a central provident fund to cover hospitalization (Medisave), pensions, and mortgages.

Medisave contributions are capped monthly and over a lifetime to prevent unnecessary use of medical services. Contributions from the payroll tax in excess of the caps are automatically transferred to an individual's ordinary account within the broader compulsory savings program. Withdrawals above a specified level are permitted after age 55. Upon death, any remaining balance is paid to the nominees of the account holder, free of estate taxes.

Individuals can use their MSA to pay hospital expenses incurred by themselves or their immediate family.² To encourage prudent use and discourage unnecessary hospitalization, there are limits on how much of the MSAs can be used for daily hospital charges, physician fees, and surgical fees. The limits generally allow full coverage of the bills of most patients staying in subsidized wards in public hospitals, but copayments are required from those opting for private hospitals or more expensive accommodation in public hospitals. MSAs can also be used for expensive outpatient treatments such as chemotherapy, HIV drugs, and kidney dialysis.

At the end of 2000 there were 2.7 million Medisave accounts with a total balance of US\$13.1 billion. Roughly 85–90 percent of inpatients use their MSAs to pay their hospital bills. In 2000 new Medisave contributions totaled US\$1.1 billion, and withdrawals US\$227 million.

Medishield

In most countries people face the risk of catastrophic illness with very high expenses. Traditional insurance pools this risk among many policyholders. In Singapore Medisave account holders face the risk that catastrophic illness could wipe out their MSAs. To address this risk—and in the absence of a traditional national health insurance program—Singapore introduced the Medishield program in 1990. All Medisave account holders under age 80 are eligible to buy Medishield insurance and can pay their premiums using their MSAs. Medishield covers hospital expenses (surgery, intensive care) and some high-cost outpatient treatments.

Medishield limits its use to catastrophic illness by setting deductibles for hospital expenses, requiring patient copayments of 20 percent for amounts above the deductible levels (patients can use their Medisave accounts to pay the deductibles and copayments), and setting limits on claims per treatment, policy year, and lifetime.³ In 1994 the government introduced an enhanced program, Medishield Plus, to provide reimbursement for accommodation in private hospitals and premium wards in public hospitals. In 2000 there were 87,000 Medishield claims, with payments totaling US\$35 million.

Medifund

To ensure that no Singaporean is denied good basic care because of inability to pay, the government set up Medifund in 1993 to subsidize health care for the poor (roughly 10 percent of the population). The fund's initial capital of US\$150 million has grown to US\$500 million with contributions during years of overall budget surplus. Under Medifund rules only interest income, not capital, may be disbursed. At each hospital a medical social worker assesses applicants' eligibility through means testing. The hospital's Medifund committee then reviews and approves applications. Hospitals have consider-

able flexibility in determining income criteria. In 2001 they approved 156,800 applications, with disbursements totaling US\$15.2 million.

ElderShield

In June 2002 the government introduced a low-cost insurance program, ElderShield, to provide financial protection for people with severe disabilities. Medisave account holders are automatically enrolled in ElderShield when they reach age 40 unless they opt out. ElderShield pays a monthly cash allowance (for a maximum of 60 months) to those unable to perform three or more basic “activities of daily living.” Because the insurance payout is not tied to reimbursement of institutional care, policyholders have the flexibility of being cared for at home or in a health care facility. By the end of 2002 ElderShield covered more than 700,000 policyholders.

Provider subsidies

The financing system is designed to help individuals pay their share of medical costs. But to ensure that basic medical care is available for all, the government also provides direct subsidies to public hospitals, polyclinics, and nursing homes for the elderly. In 2000 direct subsidies totaled US\$700 million, or 25 percent of health spending.

Unique features

Singapore’s health financing system has a unique mix of features that differentiate it from traditional government-funded or national health insurance programs:

- *Incentives.* Unlike traditional indemnity insurance, MSAs encourage individuals to take responsibility for their own health care needs—by providing incentives to save and to avoid unnecessary use of medical services. MSAs belong to the individual, accumulate over a lifetime, and can be used at the individual’s discretion. Health insurance premiums in other countries do not belong to the individual, do not accrue over time, and are often subject to restrictions on services and providers.
- *Low-cost insurance.* To address the risk of catastrophic illness, Singapore complements MSAs with catastrophic insurance—Medishield and ElderShield. Premiums can

be kept low, since catastrophic events (and payouts) are relatively rare. People can pay their Medishield and ElderShield premiums from their MSAs. Through these two programs most Singaporeans have some basic insurance coverage for long-term care.

- *Targeted subsidies.* To assist those who may have insufficient income to accrue MSAs or pay Medishield premiums—the poor, the unemployed, and the elderly—the government provides targeted subsidies through Medifund and “top-ups” to Medisave and Medishield funds. It also provides direct subsidies to public hospitals to ensure that basic services are available and affordable for all.

Lessons

Most observers agree that Singapore’s health system has succeeded in restraining costs while delivering excellent health outcomes. The country has the lowest-cost health system among developed countries and ranks high on all health indicators. But how much of this success can be attributed to its health financing system—in particular, to its MSAs? And how replicable is this financing system in other countries?

Singapore’s health financing system is supported by characteristics not present in most countries: a high national savings rate, high levels of education and income, and a relatively young population. These factors have helped restrain demand for health care, allow the buildup of Medisave balances, fund subsidies, and enable copayments to fund a large share of spending.

It may still be possible to introduce similar programs in other countries, with adjustments for demographic and fiscal differences.

- Countries without national insurance programs or well-developed private insurance could introduce MSAs by requiring all employers and employees to set up accounts like those in Singapore. This option would be well suited for countries contemplating payroll-financed national health insurance.
- Countries with national insurance programs funded primarily by general tax revenue (Canada, the United Kingdom) could introduce MSAs by allocating part of the tax rev-

enue spent on health care directly to individuals to set up MSAs.⁴ After the initial allocation, the government could continue to collect the same level of tax revenue, annually allocating the share previously used for health spending directly to individual MSAs, or progressively reduce general taxes and replace them with payroll deductions allocated to MSAs.

- Countries with payroll-funded national health insurance (most of Europe) could allocate part or all of existing payroll contributions to individual accounts. Consumers would then choose their provider and pay for eligible expenses, and the national health insurance fund would no longer need to act as the sole buyer of health care on their behalf.
- Countries with well-developed private health insurance covering basic services (Australia, the Netherlands, the United States) could allow consumers to opt for MSAs with a catastrophic insurance provision rather than traditional insurance or managed care. But for MSAs to become truly universal, governments would have to allocate public funding—from general tax revenue or payroll taxes—to individual MSAs.

Issues

Governments considering a Singapore-type health financing system will need to address several design issues:

- Whether to make MSAs mandatory and universal (as in Singapore) or private and voluntary (as in the United States).
- Whether to fund universal MSAs through payroll contributions (as in Singapore) or through general tax revenue allocated to individual accounts (and, if so, how to make the allocations).
- What restrictions to impose on eligible expenses and whether to use deductibles and copayments to ensure fiscal solvency and further restrain demand (as in Singapore).
- How to structure and fund subsidies for low-income patients without sufficient MSA balances and catastrophic insurance.
- Whether to provide tax incentives to promote MSAs and, if so, how to structure such incentives.

The initial net fiscal impact of moving to a Singapore-type program will depend on the underlying health needs of the population and the complementary measures and restrictions adopted. Fiscal sustainability will be reinforced as people accrue MSAs and moderate their demands over time.

Notes

1. All monetary amounts are expressed in U.S. dollars at current exchange rates.
2. Primary care expenses are not eligible for Medisave.
3. There are no deductibles for certain drugs and outpatient chemotherapy, radiotherapy, and kidney dialysis.
4. This approach was proposed by Cynthia Ramsey (1998).

References

- Ramsey, Cynthia. 1998. *Medical Savings Accounts: Universal, Accessible, Portable, and Comprehensive Health Care for Canadians*. Vancouver: Fraser Institute. [<http://www.fraserinstitute.ca>].
- Singapore, Ministry of Health. 2003. "Our Healthcare System." [<http://www.moh.gov.sg>]. February 2003.
- World Health Organization. 2000. *World Health Report 2000: Health Systems—Improving Performance*. Geneva.

viewpoint

is an open forum to encourage dissemination of public policy innovations for private sector-led and market-based solutions for development. The views published are those of the authors and should not be attributed to the World Bank or any other affiliated organizations. Nor do any of the conclusions represent official policy of the World Bank or of its Executive Directors or the countries they represent.

To order additional copies contact Suzanne Smith, managing editor, Room 19-009, The World Bank, 1818 H Street, NW, Washington, DC 20433.

Telephone:
001 202 458 7281
Fax:
001 202 522 3480
Email:
ssmith7@worldbank.org

Copyedited and produced by
Communications
Development Inc.

Printed on recycled paper