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Prologue: As the 1980s move to closure, an increasing amount of attention focuses on the organization and financing of the American health care system. As this exercise has unfolded in academic journals, congressional hearings, and public opinion surveys, more interest has been generated in the health care systems of other Western industrialized nations. One of the facts drawing attention to these foreign systems is data gathered by the Organization for Economic Cooperation and Development (OECD), us published in Health Affairs (Fall 1988). In this paper, Gerard Anderson, a well-regarded policy analyst, looks at the Pacific rim, examining Korea’s health care system. He shows how Korea achieved its goal of universal health insurance coverage, evaluates the impact on the business sector, and suggests lessons for the United States. In 1976, Korea adopted a policy that universal health coverage would be achieved by 1989. Since 1988, all Korean citizens have had health coverage, via private-sector initiatives and medical insurance societies. Anderson finds similarities in the U.S. and Korean health care systems, including a fee-for-service structure and concern for rising health care costs. However, the main difference between the two countries is that Korea has eliminated financial barriers to health care. “Korea has moved from insuring less than 10 percent of the people in 1976 to 100 percent coverage today, while during this same period, the U.S. percentage of covered citizens declined from 86.4 to 82.9 percent,” Anderson reports. He adds that the Korean people attach great importance to health care, as reflected in a 1981 Gallup poll that reported, “Health was the most important issue in their lives, and the factor most closely related to their overall happiness.” Anderson, who holds a doctorate in public policy analysis from the University of Pennsylvania, is director of the Center for Hospital Finance and Management at The Johns Hopkins University in Baltimore. He served from 1978 to 1983 in the office of the Assistant Secretary for Planning and Evaluation at the U.S. Department of Health and Human Services.
In 1976, the Republic of Korea (or South Korea, hereafter referred to simply as Korea) initiated a program to assure universal health insurance coverage for all of its citizens by 1989. At that time, less than 10 percent of the population had any health insurance, and the per capita income was less than $800. Although Korea has experienced considerable political turmoil in the intervening years, it achieved its goal of universal health insurance coverage one year early.

Korea has achieved this objective primarily through private-sector activities. In 1988, the private sector insured 90 percent of the population, while the Korean government insured the remaining 10 percent. Universal health insurance coverage has been accomplished without any major disruption to the overall economy, any apparent harm to specific industries, or any significant adverse impact on small firms. During this period Korea has experienced the most rapid growth in per capita income of any country in the world, growing from $800 in 1976 to $2,813 in 1987, and has been able to expand its exports tremendously as well, from $7.7 billion in 1976 to $30.3 billion in 1985.

The Korean government has a more limited role in the health care system than is the case in most other countries with universal health insurance coverage. The Korean government provides health insurance to the 10 percent of the population who are unable to purchase private health insurance and subsidizes the cost of private health insurance for certain other individuals. It sets fee schedules for providers. Finally, it has mandated universal health insurance coverage by the private sector. In this article, I focus on the latter point.

Korea's success in expanding health insurance coverage is in direct contrast to the experience in the United States, where approximately one-sixth of the population has neither public nor private health insurance. In recent years, both the absolute number of uninsured persons and the percentage of the population without health insurance in this country has increased, prompting a renewed public policy interest in how to reduce the number of uninsured persons.

Recently, the U.S. debate has shifted from national health insurance in favor of a series of private-sector options designed to expand health insurance coverage, including employer mandates and risk pools. Employer mandates require that employers offer health insurance coverage to those employees who work more than a minimum number of hours. Risk pools allow participants to purchase subsidized health insurance coverage. Different states have different plans, but most of the state risk pools are designed to provide access to health insurance for the uninsured worker.\(^1\) Most pools were established originally for individuals at high medical risk who are otherwise uninsurable, but a recent study of the
state pools found that they have a much greater probability of being financially viable if the pool is able to attract a large proportion of the employed uninsured. The price must be comparable relative to other insurance options so that multifarious participants choose to enroll in the state pool, thereby reducing the possibility of adverse selection and underwriting losses.

Much of the concern in the United States about employer mandates and risk pools involves either their adverse impact on business or the cost of providing universal coverage in a largely fee-for-service system. Korea, however, has been able to obtain universal health insurance coverage without adversely affecting the business environment while maintaining a fee-for-service delivery system. In this article, I describe the Korean health care system and give special attention to the aspects of the system that are most relevant to the U.S. debate about how to cover the uninsured using private-sector initiatives.

**Korea’s First Steps**

For most of its history, Korea alternated between rule by Japan and feudal kingdoms. In 1910, Japan annexed Korea and ruled Korea until the end of World War II. As a result of this interaction, the Japanese health care system played an important role in the initial development of the Korean health care system. For example, the Japanese predilection to use pharmacists to both prescribe and dispense medicines still remains in Korea. The Korean War, which followed soon after World War II and divided the country into North and South Korea, eliminated nearly all of the country’s existing health care facilities.

Immediately after the Korean War, Korea devoted most of its energy to economic expansion. Social programs were given much less importance than economic development. Most health care projects were financed from international sources and usually involved the development of government public health activities such as leprosy control or the construction and operation of primary health clinics. The Korean central government was spending less than 1 percent of its national budget on health, while most industrialized nations were spending around 6 percent.

In 1963, Korea passed legislation permitting establishments with more than 300 employees to offer health insurance to their employees. This legislation allowed corporations to create “medical insurance societies.” These can be wholly owned subsidiaries of the corporation, whose exclusive function is to provide insurance to their employees. Other medical insurance societies were created when several smaller corporations joined together.
This step was taken relatively early in Korea’s economic development. In 1963, Korea had a per capita income of less than $100 and was primarily an agrarian economy. Most studies of international health care systems suggest that this is relatively early in the economic development of a country to be turning its attention to health insurance coverage. Korea took this step for a variety of political, economic, and historical reasons that are beyond the scope of this article. It can be noted, however, that Korea was experiencing an extremely rapid increase in per capita income, and international comparisons suggest that its citizens have a higher income elasticity for health care services than most other countries. One indication of the importance that the Korean people place on health care is that Gallup polls taken in Korea in 1981 reported that health was the most important issue in their lives and the factor most closely related to their overall happiness.

At first, the health insurance system developed at a relatively slow pace. It was not until 1969 that a voluntary health insurance society was established. Before then, Koreans could not purchase individual policies. The Pusan Blue Cross plan, a voluntary health insurance corporation, permitted individuals to purchase insurance directly. However, individual policies never became a major source of health insurance coverage in Korea because of a series of government actions that began in 1976.

The Move Toward Universal Coverage

The Korean health insurance program, initiated in 1976 by the government, is based on three principles. The first principle is that coverage is compulsory. Universal health insurance was achieved through a series of laws requiring the gradual phase-in of universal coverage. The second principle is that the level of the contribution should be based on individual income. The compensation level is a fixed percentage of income; thus, individuals with higher incomes pay more for health insurance. The third principle is that the level of benefits is independent of the level of contribution.

The system relies on a series of self-contained medical insurance societies to collect the revenues, determine the benefits, and accumulate reserves. These societies must keep expenditures lower than revenues to remain in business. In general, the societies are owned and operated by for-profit corporations, but they do not earn a profit on their activities. Some societies have accumulated significant reserves over the years.

In 1976, Korea agreed on a plan that would assure everyone health insurance coverage within fourteen years. Exhibit 1 shows some of the major milestones toward the goal of universal health insurance coverage,
Covering the working population. Korea began the program to assure health insurance coverage by starting with the employed population. In 1976, all firms with more than 500 employees were required to provide health insurance. During the next several years, the size of the establishment required to offer health insurance coverage was lowered. It was believed that the largest firms were more capable of absorbing the increased costs of health insurance coverage than were smaller firms. By 1982, all firms with more than sixteen employees were required to provide health insurance.

The total cost of health insurance ranges between 3 and 8 percent of the monthly wage, with the employer and the employee sharing the cost equally. In 1987, the average monthly payroll deduction was 1.8 percent, which was matched by the corporation. Everyone in the corporation has the same percentage of wages deducted. As a result, individuals with higher incomes pay more for health insurance.

Corporations and employees negotiate over the benefit package as long as it meets a minimum set of benefits established by the government. In reality, benefit packages vary little. Collection of employee contributions occurs through monthly payroll deductions. Corporations must make contributions to a bank, which assures that health insurance programs are indeed adequately funded. Over 30 percent of the population were covered through these plans in 1988 (Exhibit 2).

To comply with the legislation, most corporations have established or joined medical insurance societies, which provide health insurance coverage to the employees. Most large firms such as the automaker Hyundai have established their own medical insurance societies, while smaller firms band together to form regional or occupational societies. There are currently 144 medical insurance societies in Korea. The medical insur-
Exhibit 2
Percentage Of Korean Beneficiaries Covered By Insurance

<table>
<thead>
<tr>
<th>Type of coverage</th>
<th>1977</th>
<th>1988</th>
</tr>
</thead>
<tbody>
<tr>
<td>Corporate coverage</td>
<td>8.6%</td>
<td>33.0%</td>
</tr>
<tr>
<td>Government employees, school teachers,</td>
<td>0.0</td>
<td>10.7</td>
</tr>
<tr>
<td>and pensioners</td>
<td>0.2</td>
<td>4.2</td>
</tr>
<tr>
<td>Occupational</td>
<td>5.7</td>
<td>10.0</td>
</tr>
<tr>
<td>Medical assistance</td>
<td>0.0</td>
<td>22.7</td>
</tr>
<tr>
<td>Urban Regional Medical Insurance</td>
<td>0.0</td>
<td>19.4</td>
</tr>
<tr>
<td>Rural Regional Medical Insurance</td>
<td>0.0</td>
<td>19.4</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td>14.5</td>
<td>100.0</td>
</tr>
</tbody>
</table>


Insurance societies are self-funding and are expected to accumulate reserves. In nearly all cases this has been achieved, and the system appears to be fiscally sound.

Administration of all of the societies is conducted by the Federation of Korean Medical Insurance Societies (FKMIS). FKMIS processes all claims and performs certain administrative activities for the individual societies. The arrangement is similar to the U.S. system in which corporations negotiate for administrative services only. The cost of administering these insurance programs is approximately 5 percent of total costs, whereas in the United States the administrative costs were over 17 percent of total outlays by public and private insurers.3

Covering the indigent. The second insurance program, which was established in 1977, covers the indigent. It is a categorical program similar to the U.S. Medicaid program and is administered by the federal government. The first category of beneficiaries consists of individuals living in public facilities. The second category includes individuals who are unemployed and rely on family assistance for financial support. The third category of eligible beneficiaries is the medically needy due to high medical expenses. Individuals whose incomes are below 25 percent of the per capita income of the country are eligible for public assistance for their medical expenses. After an initial phase-in period, the percentage of the population eligible for government assistance has remained relatively constant at 10 percent since the program was established in 1977.

Covering other groups. The third insurance program, which was established in 1979, covers government workers, school employees, and pensioners. In this program, the government and the insured share equally in the contributions, and everyone pays the same amount regardless of income level. Payroll deductions were set at 2.3 percent in 1987, and the government pays an equal amount. These payroll deductions are higher than the deductions for industrial societies because utilization
rates are higher for this population. This population tends to be older and have more dependents than the members of the industrial societies, which are made up largely of young single women. Collections from enrollees are made through payroll deductions, and the government must send their contribution to one of the banks—again assuring that the program is fully funded. Approximately 10 percent of the population are covered by these plans.

**Covering the self-employed.** Societies for self-employed individuals in certain occupational groups such as meat sellers, taxi drivers, and market vendors became available in 1981. All of these societies base the level of the contribution on the income of the family and the number of family members. The government pays some of the administrative expenses of operating the program, but the insured pays all of the remaining costs. Contributions are made directly to a bank, and it is reported that nearly everyone pays on time. The individual medical society is responsible for collecting from those who do not contribute.

**Covering other urban and rural residents.** The final two groups to be covered by health insurance are the urban and rural residents who do not fit into any of the earlier categories. Together these two groups represent over 40 percent of the Korean population. The residents of urban and rural communities were required to purchase health insurance beginning in April 1988. They pay an amount that is graduated based on their income, assets, and the number of family members. The government pays all of the administrative expenses. When the program was originally proposed, it was envisioned that the individuals would pay all remaining costs. As the program has evolved, however, it appears that the government will pay up to 50 percent of the cost to assure cooperation.

Demonstration programs, conducted in three rural provinces beginning in 1981, provide an indication of how this aspect of the health insurance system will operate and some of the problems that will be encountered as the remaining residents are covered. A governing body comprising twenty to thirty members of the society will set policy for a regional medical insurance society. Individuals are expected to pay their monthly contributions at designated locations such as the post office.

In conducting the demonstrations, the government has learned several important lessons. During the first several years, the regional medical insurance societies had difficulty establishing the appropriate payment rate and then collecting the payment from everyone. Several of the demonstrations seriously underestimated the increased level of utilization that the newly insured would have. After two years, use of inpatient services increased almost 75 percent, and use of outpatient services increased by 80 percent.
The regional medical insurance societies also had difficulty collecting from individuals. They had problems identifying the income level of the individuals, since these people are not paid wages; actually collecting the payment; determining the correct number of family members, since there is an incentive for people to declare others as family members to receive benefits without paying; and, finally, confronting the problem that some people are unable to pay their premiums. However, they have had success; the collection rate, which began at 60 percent, reached over 90 percent within four years.4

One political concern is the variation in the contribution rate across regions. As mentioned earlier, each medical insurance society is self-financing; thus, if the utilization rate is higher in one region, then the contribution rate must be higher in that region. Residents in the regions with higher rates, however, find it difficult to understand this relationship. They cannot understand why they have to pay more for an identical level of benefits. This political problem has not been resolved.

**Benefit Package**

With minor exceptions, all the different medical societies have the same benefit package. Hospital, physician, and maternity benefits and drugs prescribed by a physician are all covered services. Beginning in 1988, individuals are entitled to unlimited visits and hospital days. Some groups have the additional benefit of periodic physical examinations. Individuals have access to any facility; the only exception is that rural residents must receive a referral from a primary care physician before they can go to a tertiary care hospital in an urban area. Certain imported high-technology services such as computerized axial tomography (CT) scanners are not covered. Meals in the hospital are also not covered, since the family is expected to care for the personal needs of the patient.

One of the most striking differences between Korea and the United States is that in Korea dependents are automatically covered. Initially dependents included the spouse, children, and parents of the employed person. In 1985, parents-in-law were automatically covered, and by 1988 other in-laws-brothers, sisters, sons, and daughters-also were covered.

Unlike in the United States, there is no program specifically designed to cover the elderly; traditionally, the eldest son has been responsible for the health needs of his parents. Because their needs are addressed this way, 45 percent of the elderly live in families, three-fourths of them with their children.5 This may change in the future as the number of elders continues to increase, especially the very old. In Korea, a person’s sixtieth birthday is a major celebration, and, until recently, there were very few
celebrations. Since the Korean War, however, health status has improved tremendously, and the life expectancy has risen from fifty-one years for males and fifty-four years for females in 1955 to sixty-eight years for males and seventy-three years for females in 1980. The population age seventy-five and older is increasing even faster, at a rate three times the rate of the total population. Two-thirds of the elderly live in rural areas, because most Koreans who migrate to the metropolitan areas are in either their teenage years or early twenties.

By U.S. standards, the standard benefit package imposes a high level of coinsurance. Individuals pay 20 percent of the total inpatient hospital cost. Cost sharing in outpatient clinics is greater and is a complicated set of coinsurance and deductibles designed to prevent individuals from seeking unnecessary care and to prevent them from going to the most advanced facilities. Policies established in April 1988 impose a 55 percent coinsurance rate at tertiary care facilities, 50 percent at community hospitals, and 20 percent in physicians’ offices. Because of these coinsurance rates, it is not surprising that income is a significant determinant of health care utilization. Korea categorizes its citizens into forty-one different income groups. The rate of utilization in the lowest-income groups is four times lower than the rate in the highest-income groups.6

**Unresolved Issues**

**Cost containment.** Korea spent 4.8 percent of its gross national product (GNP) on health care in 1986, or $115 per person on average. Health care expenditures have been rising rapidly in recent years. From 1980 to 1986, health spending per enrollee increased at an average annual rate of 14.4 percent for industrialized workers and 19.9 percent for government employees, teachers, and pensioners. Of this increase, 6.3 percent is attributable to fee increases and the remainder to increased utilization. Because many people had health insurance coverage for the first time, this rate of increase in utilization is not surprising and was anticipated by Korean economists when the program was initiated.

Korea has developed few cost containment programs. The most significant initiative is that fees for hospitals and physicians are set by the government. In setting the rate of increase in fees, the government must balance the requests of providers for higher payments with those of consumers and employers who must pay higher payroll taxes if the medical insurance societies cannot show a positive balance at the end of the year. Because of this tension, medical fees have risen at the same rate as the growth in the overall economy. From 1980 to 1986, the average annual increase in GNP per capita was 6.2 percent, compared to 6.3
percent for medical fees. This continues to be an area of controversy.

Korea relies primarily on coinsurance to control utilization. The only direct monitoring of utilization is a cursory scan of bills by FKMIS to detect payment requests for uncovered services. Korea spends a much greater proportion of its health dollar on prescription drugs than most other countries spend—32.6 percent, compared to 17.4 percent in West Germany, 10.6 percent in England, and 8.8 percent in the United States. Korea is trying to reduce this percentage. To limit the number of drugs being prescribed, the government is now attempting to separate the provider and the dispensary.

Unequal distribution of providers. Korea is trying to redistribute its facilities. In comparison with some other nations, it has a limited number of health facilities. A standard comparison of health facilities is the number of persons per hospital bed. In 1986, there were 411 persons per available hospital bed in Korea, compared to 246 in Japan, 171 in the United States, and 129 in Canada. This represents, however, a major expansion of Korean health facilities. Between 1976 and 1985, the number of hospital beds increased fifteen times faster than the overall population growth. Nearly all of this expansion was in the for-profit hospital sector. Aside from a few government hospitals, all of the hospitals and clinics (which contain hospital beds) are either for-profit or owned by physicians.

There is considerable variation in the availability of hospital beds by province and between rural and urban areas. For example, urban areas had 310 persons per available bed, compared to 848 in rural areas. The Korean government is trying to increase the availability of medical personnel in medically underserved areas by using military physicians. This has been successful in assuring that every town has a physician; however, it is not perceived as a good long-term strategy because the physicians leave after their military obligations are over.

Inappropriate use of resources. There are major problems with inappropriate utilization in Korea despite the high coinsurance levels. Korea has tried to solve this problem by instituting higher coinsurance levels in tertiary care centers. It has not been fully successful, as people continue to seek care in the most sophisticated facilities for simple procedures. Korea has instituted a successful patient referral system in rural areas. After this was adopted, ambulatory visits declined by one-third and physician visits more than doubled.7

Lessons For The United States

Korea and the United States have many similarities in their health care
both are concerned about rising health care costs and the effect of health care costs on specific industries and international competition; in both systems, health insurance is based on employment; and both are concerned about the health status of their own population. The one major difference is that since April 1988, Korea has had universal health insurance coverage, while the United States is still debating the issue. Korea has moved from insure less than 10 percent of the people in 1976 to 100 percent coverage today, while during this same period, the U.S. percentage of covered citizens declined from 86.4 to 82.9 percent.

Korea has accomplished this through employer mandates and the creation of medical insurance societies. In Korea, 90 percent of the population receive care through one of the medical insurance societies, and the remaining 10 percent who are unable to pay are able to receive insurance coverage from the government. The medical insurance societies have been able to limit administrative costs to less than 5 percent of revenues and have given consumers an interest in cost containment. Consumers recognize that if the medical insurance society starts to lose money, their contributions will increase to keep the society solvent. They know that a higher percentage of their wages will be deducted unless they can control health care utilization, and the variation in the level of contribution across societies continually reminds them of the issue.

It is clearly too early to draw any definitive conclusions about the Korean experience, but it does suggest a country to watch as the United States debates the issue of mandatory employer insurance coverage.

NOTES

4. Federation of Korean Medical Insurance Societies, *Outline of Medical Insurance in Korea* (Seoul, South Korea: FKMIS, 1987.)