

# Industrial Policy — Its Role & Limits —

By Hiroya Ueno

Industrial policy is a general term for policies that enable the government to intervene in the activities of individual industries or enterprises to have effect on the market for their products or on factors involved in production. It has specific economic and social objectives, such as the promotion of economic development, modernization of the economy, advancement of the industrial structure to a higher level, strengthening of international competitiveness, encouragement of technological innovation, revitalization of declining industries, maintaining employment, and expansion of regional economies through the protection, fostering, reorganization, restructuring, and relief of specific industries.

However, unlike traditional fiscal and monetary policies, industrial policy demonstrates no clear relationship between its objectives and the means of attaining them. Its conception, content and forms differ, reflecting the stage of development of an economy, its natural and historical circumstances, international conditions, and its political and economic situation, resulting in considerable differences from nation to nation and from era to era. For instance, although Japan, along with France, is considered a typical of those countries relying on industrial policy, owing to the fact that the 1960s was a decade of increasing economic performances and of improving industrial efficiency, its present-day industrial policy conforms far better with the principles of free trade and market principles and its content and form are much softer than those of the past, when the rationale of small countries prevailed and strongly protectionist policy could be adopted to protect target industries.

On the other hand, the United States, which espouses the basic principle of economic democracy and free competition, and West Germany, which advocates a social market economy, have not yet fully grasped the concept of industrial policy; yet in fact they have adopted policy measures which could be regarded as industrial policy.

In so far as its ultimate objectives are concerned, industrial policy encompasses development policy, growth policy, foreign trade policy, employment policy, social policy, and regional policy. It is justified from the viewpoint of the various policies mentioned above and the domestic conditions of each country. Delving into its characteristics, we find that industrial policy is by no means independent of the economic nationalism of individual countries.

It must be pointed out, however, that industrial policy, whatever objectives and form it may assume, is a mechanism basically aimed directly or virtually at specific industries. It is a subsidy scheme for the government to provide specific industries with "outright" or "implicit" subsidies through the channel of various policy measures such as direct subsidies, tax concessions, low-interest loans, loan guarantees, selective finance, nationalization of enterprise, import controls, tariff and non-tariff barriers, special government procurement and administrative guidance. Therefore, those who believe that pure market principles should govern the real economy find it difficult to condone industrial policy as described above.

## Government-industry interface expands

In recent years, however, many policy measures have appeared which may be regarded as verging on industrial policy in all industrialized countries with a mixed economic system. Moreover, one industrial policy measure has begotten others, touching off a chain reaction among nations on the basis of the reciprocal need to reduce the imbalance in the international market caused by other countries' policies. Industrial policy tends to spread in this way. This is the reason why nations of the world are becoming sensitive to the action and reaction of each policy in this area and measures taken by them gradually adopt a similar appearance. The tendency is also reflected in the debate emerg-

ing in the United States as to whether Americans should "attack" or "emulate" other nations' industrial policy.

The situation is illustrated by the fact that all advanced industrial nations have been actively providing government subsidies to R&D projects related to high technology and emerging industries including nuclear energy, aerospace, electronics, new materials, mechatronics, and data processing. The purpose is to secure technological superiority and promote technological innovation to strengthen international competitiveness, accelerate the process of industrial adjustment, and sophisticate the industrial structure. Examples of such policy measures include huge technological development subsidies and special government procurement provided by the Defense Department, NASA and the Energy Agency of the United States; promotion of high technology and fostering of strategic industries under the leadership of the French government; promotion of large R&D projects and investment subsidies for R&D provided by the West German Federal Research and Technology Department and local governments; and special assistance provided by the British National Enterprise Board to investments in venture business involved in high technology areas and special subsidies to the electronics and robotics industries. Japan's development policy for high technology areas, centered round the Ministry of International Trade and Industry, falls in the same dimension as those mentioned above.

Similarly, all countries affirm government intervention and assistance to the motor vehicle, steel, petrochemical, aluminum refining, synthetic textile and other industries suffering from structural recession. From this point of view, they have been taking policy measures that are obviously designed to assist the adjustment of specific industries to changing economic circumstances. Instances of such passive or defensive industrial policies include those for extensive industrial reorganization, such as the nationalization and state capital intervention, pur-





Photo: WWP

Rolls-Royce Ltd. has been reestablished in 1971 as a state-run company.

sued by Britain, France, West Germany, Italy, and other EC nations; the French policy of maintaining and fostering basic materials industries through a combination of energy and industrial policies; and the cleverly conceived policy of assisting industrial adjustment in West Germany in the form of regional policies. Japan's comprehensive measures for industries suffering from structural recession, based on the "Temporary Measures Law for the Structural Adjustment of Specific Industries," are intended to achieve simultaneously the objectives of facilitating a prompt and smooth phasing-out of excess capacity in some industries and of revitalizing their potential through the self-efforts of the industries and deliberate government assistance. The measures cover seven industries, including petrochemicals and aluminum refining. It is a policy for promoting industrial adjustment. It may also be said that trade adjustment assistance (import relief) under the Trade Act of the United States, orderly market agreements, and voluntary export restrictions have the character of import restrictions and a negative type of industrial adjustment.

The trend in recent years toward an increase in such policy measures oriented to industrial policy, irrespective of the basic concept or fundamental principles of the nations' economic policy, is attributable to the deep-rooted stagflation touched off by the 1973 oil crisis in advanced industrial countries, which created massive unemployment, industries suffering from structural recession, economically depressed areas, and trade friction, which could not be dealt with by traditional macroeconomic policy and thereby created serious political and social problems. As a

result, advanced industrial nations tended to adopt "comprehensive policy measures of a nature which meet their objectives better and deal directly with a given situation" which may be grouped in the category of industrial policy that supplements the functions of macroeconomic policies and market mechanisms.

## Positive adjustment policy

As is well known, the worldwide stagflation has been caused by a general decline in growth potential resulting from a sharp fall in the supply of resources and

energy caused by limitations on crude oil supply and a steep rise in crude oil prices. If growth potential under new conditions is at a level lower than that which would guarantee full employment and if real economic growth lies somewhere between the two levels, coexistence of inflation and unemployment seems to be inevitable. In other words, if heavy constraints are imposed on the supply of energy-resources and the economic situation features strong expectations of inflation on that basis, "structural inflation" and "structural unemployment" necessarily emerge at the same time, which would be impossible to adjust with Keynesian aggregate demand management. The situation suggests that syndromes of this type could not be dealt with effectively by the Keynesian policy which was the leading policy principle of market economies for most of the postwar period.

We may also conclude that the classic market adjustment mechanism that "full employment can be brought about by natural price adjustment function" is not working effectively either, judging from the present state of affairs. In the ten years since the first oil shock, major maladjustment still continues in the markets for both products and production factors.

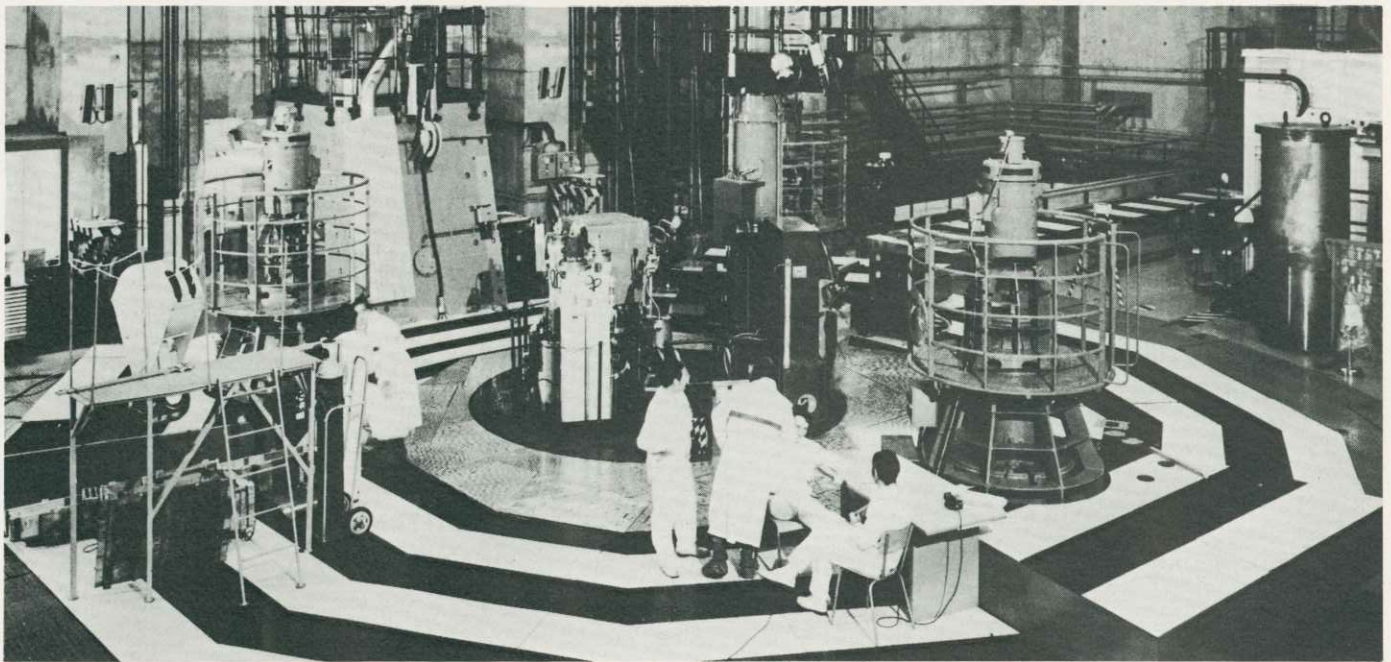
To cut a way out of the impasse of stagflation, there is no alternative but to shift upward the level of growth potential under constraints of a finite energy supply by introducing a supply-side production structure or positive adjustment of the industrial structure. This means that advanced industrial nations should adopt effective supply-side policies with appropriate demand management, in order to avert the situation of declining equilibrium in which structural unemployment



Photo: WWP

Chrysler is one of the U.S. companies that has been bailed out by the so-called industrial policy.





The French government places high priority on R&D projects. The photo shows the fast-neutron prototype reactor "Phénix" built by the government.

would increase, and to sustain economic growth without inflation. This is the reason why West Germany and Japan played the central role in proposing promotion of the "Positive Adjustment Policy (PAP)" at the OECD at an early stage.

From the viewpoint of policy rationale, this is a problem which concerns industrial policy. The principal factors for positive adjustment which will lead to the steady and balanced growth of the world economy include, in reality, the development and diffusion of energy-saving techniques, development and utilization of low-cost alternative energies, and R&D for high technology. Success of the adjustment depends on increased efficiency in the production structure and sophistication of the industrial structure, using technological innovation as a lever.

However, generally speaking, development and commercialization of high technology, progress in technological innovation, and the adjustment and changing of the industrial structure cannot be achieved quickly. They normally involve many uncertain factors and big risks. When investments for R&D and technological innovation involve uncertainties and risks, a competitive market will be unable to provide appropriate information or accurate forecasts and does not necessarily function in such a way as to meet social needs and conform to economic rationality. Nor will the market be capable of giving precise information about dynamic efficiency and economies of scale, to lead the production structure in an optimum direction without incurring excessive cost. If both the market for products and the market for production factors are imperfect and unstable and lack foresight, they will in-

crease rather than decrease risks and lower the desire for investment and technological innovation at "frontline" enterprises.

Industrial policy is a means of removing or easing such market failures and directing the functioning of a competitive market in the right direction. It supplements macroeconomic policy and helps the market system adjust better to circumstances. For instance, a consistent industrial policy aimed at overcoming uncertainties arising from long-term structural changes obviously helps the functioning of the market mechanism by extensively influencing the formation of long-term expectations of enterprises and workers. Japan's "Vision for Industrial Structure" and France's "indicative economic plan" clearly fall in this category, although they differ in the extent of government intervention. Moreover, the above-mentioned measures for assistance to R&D for high technology and to emerging industries in various countries are typical of positive adjustment policies designed to remove such uncertainties and risks.

## The case for government intervention

By comparison, measures to assist industries in structural recession and declining industries are by nature passive and defensive. For instance, industrial sectors that have received the strongest impact of the oil shock are such basic materials industries as petrochemicals, aluminum refining and steel, for which the common problem has been elements of structural recession, including declining demand for their products, a decline in their capacity

utilization, existing excess capacity, and below-cost pricing and operation. Much of the structural unemployment arose from such industries. Existence of an economic excess capacity and massive unemployment provides evidence that industrial adjustment to structural change has not been progressing smoothly. Structural adjustment will not be complete without achieving elimination of excessive facilities, a shift to emerging business, and reorganization and re-vitalization of distressed industries.

The majority of the basic materials industries are capital-intensive and depend on large-capacity production facilities featuring fixed capital which cannot adjust itself to market conditions within a short period of time. Moreover, it is not easy for enterprises in financial difficulties to find a way out of their plight by restructuring, business conversion, and technological innovation solely through their self-help efforts. In addition, recession and low growth are in themselves factors which obstruct the progress of adjustment to structural change. In such a situation, reduction or elimination of excess capacity and inefficient marginal producers will not progress smoothly by natural market forces alone. This will bring about the decline of whole industries. It may be said that, when the reduction and phasing out come to a halt and little progress is made in increasing the efficiency and concentration of industries that can withstand international competition, adequate government intervention is required to supplement and accelerate the industrial adjustment.

It is not easy to wipe out massive unemployment, because the creation or expansion of job opportunities cannot be ex-



pected under conditions of low economic growth. For this reason, unemployment becomes aggravated and gives rise to social problems, if the economy stagnates for a long time and structural recession extends to many industrial sectors. Furthermore, if an entire area is gripped by recession because of the existence of many declining industries, it may become economically desolate. In cases where investment opportunities generally decline and producers become reluctant to invest, it will be difficult for the area to convert its industries or expand them by luring in new businesses. If an industry falls into structural recession and causes a specific area to decline remarkably, the problem becomes one involving major political and social implications.

From this point of view, industrial policy which approves government intervention in and assistance to industries suffering from structural recession or declining industries is justified and implemented in any country for reasons of necessity for short-term adjustment assistance, employment policy, social policy, and regional policy. However, industrial adjustment measures of this type are liable to unnecessarily relieve and sustain inefficient marginal enterprises and protect declining industries, unless the policy makers always listen to the voice of the market, try to increase industrial efficiency, and take care to promote effective competition. There is also the problem that, in the light of experiences in various countries, it is doubtful if declining industries can be restructured and revitalized as a result of government intervention and assistance within the period of a given program.

## The need for self-restraint

In recent years industrial policy has attracted the attention of various countries and become a focus of international confrontation over how it is and should be implemented. This is because the arena of the international economy has changed into a field where countries of different histories and cultures compete fiercely with each other. From a more realistic point of view, differences in competitiveness between industries of various countries have been exposed in the process of adjustment in the past, while both enterprises and nations have intensified a trend for the winners to advocate free competition and free trade principles and for the losers to claim justification for their protectionism, so that government intervention in and assistance to industries has become an important factor to determine conditions for competition and survival of the fittest for both sides.

For instance, products of such basic

materials industries as steel, petrochemicals, aluminum refining, synthetic textile, and paper/pulp are all international and homogeneous commodities. All of these industries require international adjustment as well as domestic adjustment to cut a way out of structural recession. For this reason, both nations and enterprises have to be sensitive to the adjustment process of their rivals, because their relative strength and interests are at stake. Furthermore, the industrial structures of major advanced industrial nations have become extremely homogeneous, so that competition between nations now pivots round the overall industrial power linking the high-technology, processing and assembly, and basic materials industries closely with each other. This creates delicate relations of interest, so that winners and losers can change positions easily as a result of small protective or assistance measures that enable both enterprises and states to gain big profits and deal a heavy blow to their rival enterprises and states. Each nation is thus compelled to be sensitive to the policy measures of others.

If, in these circumstances, governments of industrial nations undertake to foster high-technology industries or protect declining industries excessively, the problem of industries transcends competition between enterprises in the market place and develops into a race between nations. If this happens, industrial policy distorts too much the system of free enterprise and the principle of free trade, and turns into a problem of political struggle between nations. In other words, if nations of the world apply enlarged interpretation of the standards for the application of industrial policy, they will eventually come to shift to each other their respective structural maladjustment through their respective economic policies, so that adjustment of industrial policies themselves, designed to help structural adjustment and economic progress, becomes necessary. Moderation and self-restraint are thus required for the utilization of industrial policy. And PAP agreed in OECD is one of the guidelines which provide rules.

## Pressure groups & human resources

Developments that have taken place so far seem to indicate that the crucial factor for international competition is the ability of the private industrial sectors, toward which industrial policy is directed, to adjust themselves and achieve objectives rather than the policy measures themselves taken in the form of industrial policy. Assuming that this interpretation is correct, it may be that the principles of free competition and the market economy are not spoiled so much in the end by

industrial policy. One reason why the concept of industrial policy has evolved was that with the development of modern industries, conditions for comparative advantage and disadvantage as the decisive factor for specialization and international competition have changed gradually from the classical criteria based on geographic differences in natural endowments such as soil, climate, and natural resources to a new criteria based on human creative power, foresight, ability to choose and ability to adapt to structural changes. I am referring to the organization and management ability of enterprises and governments to make active use of manpower or human resources. In other words, the emphasis has been shifting to the problem of organizing efficiently "man," "things," and "techniques." Another point worth noting is that under the pressure of industrialization, economic activities have become specialized, giving birth to organizations of industrialists, smaller entrepreneurs, farmers, and labor unions, and other types of pressure groups. Increased utilization of industrial policy-like measures is closely related to the activities of these pressure groups, which compete with each other regarding the distribution of public funds and the directing of government activities in the name of "public interest." The former—shift to software—supplies grounds for arguments in favor of positively evaluating the characteristics of industrial policy to "add some soft planning character to a market economy responding to the transformation of the capitalist economy." By contrast, the latter—activities of pressure groups—demonstrates shortcomings in the process of industrial policy decision making and the evil of immoderate expansion. The merits and demerits of industrial policy will depend on how to assess the two factors and the cost-benefit problem.

From this point of view, what is needed is to maximize the desirable "performance-multiplying effect"—increasing efficiency and productivity—of drawing out the vitality of private enterprises by pump-priming by the government, while minimizing the unfavorable "institution-multiplying effect"—multiplying the codes and institutions—of one policy measure begetting another. ●

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