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The Organization of Northern European Ports: What Can We Learn?



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THE ORGANIZATION OF NORTHERN EUROPEAN PORTS:
WHAT CAN WE LEARN?

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One of the greatest concentrations of ports in the world is found in northern Europe. There are hundreds of smaller ports including river ports, recreational ports, and industrial ports, as well as the giant ports of Rotterdam, Le Havre, Antwerp, Hamburg, and London. The organization of these ports provides some useful lessons and examples for the improvement of ports in the Pacific Northwest.

Port Ownership

Private, Local and National

The ports of the German Federal Republic, The Netherlands, and Belgium are owned by cities. The ports of France are owned by the national government, except for a limited number of private facilities operating under government license.

All types of ownership are found in Great Britain. The Port of Felixstowe is wholly owned by the European Ferries Corporation, and management is independent of the national or local government. The city council of Bristol owns the entire dock system, the property, and the navigation aids. The national government owns 19 ports that are administered by the British Transport Docks Board.

A number of British ports are owned (and administered) by self-governing statutory bodies that may be entitled boards, trusts, authorities, or commissions. These are referred to as "trust ports" and include such well-known examples as the Port of London and the Clyde Port Authority. A number are owned by a local municipality or some other royally chartered authority.

Ownership Versus Performance

While the form of ownership may influence financial flexibility, it

appears to have little relationship to success. Three of the most successful ports in northern Europe represent three different forms of ownership: Rotterdam is city owned, Calais is nationally owned, and Felixstowe is privately owned.

Port Administration

Centralized and Decentralized

Compared with nationally owned ports, the administrative structure for municipal ports is relatively simple. For example, the infrastructure (jetties, channels, quays, land, etc.) of the Rotterdam, Amsterdam, and Antwerp ports is administered by a division of their city government while the private sector is responsible for the administration of the superstructure (cranes, warehouses, rail, etc.). The ports administration is similar to a public works department, and in these large ports, the revenue from port activities often subsidizes other municipal functions. The result is greater autonomy for the port administration in comparison to such departments as streets, sewers, and planning.

In the German Federal Republic, port administration of the infrastructure is part of the direct responsibility of the city state (Hamburg, Bremen). The administration of the superstructure is frequently left to a separate entity. For example, until 1973, when it became a private corporation, a city controlled corporation administered the Bremen port superstructure.

In France, port administration is divided, depending on port class. There are three legal classes: autonomous ports, ports of national interest but not autonomous, and local ports. The autonomous ports are designated by the central government, which enacts laws for the administration of each port. The superstructure is administered by a board of 24 directors.

By law, these directors must represent the national Civil Service, users of the port, the local chamber of commerce, and the general public. The manager is a civil engineer trained in the government engineering school. He or she is employed directly by the central government but reports to the board of directors.

The chamber of commerce in France are quasipublic corporations that ad-

minister the superstructure of ports as well as public parking, bus terminals, parks, etc. They are similar to public utilities in the U.S.A. The chamber of commerce has a full staff and receives dues from local business and industry. It is independent of the central government but must cooperate with the port board of directors and the engineer manager in administering a port.

The French ports of national interest are administered by an engineer employed by the central government. There is no board of directors, so the engineer cooperates with the chamber of commerce that administers the superstructure. Finally, the local ports are administered part-time by a regional engineer or a representative of the ministry of public works. There may also be a chamber of commerce that administers the superstructure of the local port.

Private ports, such as Felixstowe, are administered in accordance with a particular corporate structure. At Felixstowe, the manager is the chief executive officer in charge of both infrastructure and superstructure. He in turn reports to the board of directors of the European Ferries Corp., the parent organization.

The 19 ports of the British Transport Docks Board are administered by a board located in London. This board and its central staff handles most port administrative functions. The board then employs a local manager at each of the 19 ports throughout Great Britain. Varying administrative authority is granted to these local managers, depending upon the size and nature of the port. Other nationally owned ports (e.g., Dover, Gloucester, and Sharpness) have administrators appointed by their respective parent agency (Secretary of State for Transport and the Waterways Board).

Administration

A common difficulty in port administration is allocating management time and responsibility between engineering and commerce. At large ports there is sufficient staff to assure some expertise in the commerce as well as the engineering area. However, even in ports as large as Rotterdam the administration is more talented in, and focuses more attention on, engineering. At Amsterdam a separate organization, The Amsterdam Port Association, has developed and assumed much of the commerce-related administrative responsibilities.

There appear to be benefits in separating the administration of commerce from engineering. France has strongly promoted this separation, and there is evidence that even the smaller French ports have benefited, certainly in comparison with smaller British ports.

Port Functions

Three Types of Ports

Port functions are limited by the legal framework (local and national laws), physical constraints (water depth, land area, geographic location, etc.), and by economics. Ports can be classified according to their functions as follows:

1. Landlord ports -- these own and administer infrastructure.
2. Tools ports -- these own and administer infrastructure and/or administer superstructure (cranes, fork lifts, warehouses, trucks, etc.).
3. Service ports -- these own and administer everything.

Rotterdam, Amsterdam, Antwerp, and Falmouth are examples of landlord ports. These ports are responsible for providing protected waters (jetties, locks, basins, canals, etc.), navigable depths, moorage, quays, roadways, graded land, and utilities. Cranes, buildings, fences, trucks, services, labor, etc., are provided by private industry or some other public agency, which in turn pays the port for the use of the water, quays, land, etc.

Le Havre, Dieppe, Calais, Bristol, and London are examples of tools ports. In addition to owning and administering channels, locks, quays, and land, these ports own and administer buildings, terminals, warehouses, cranes, trucks, and utilities. However, there is certainly no uniformity among tools ports. For example, the Port of London also employs dock labor at the enclosed ports; but along the River Thames the superstructure, as well as labor, is private except for the grain-handling facilities.

Manchester, Southampton, Cardiff, and Hull are examples of service ports. Dock workers, machine operators, container scheduling, traffic control, etc., are all provided by the port. Private industry participation is limited to industrial operations, brokerage, banking, and other nonhandling

services.

Northern European ports are involved in water transportation, land transportation, cargo handling, industrial development, passenger traffic, recreational development, business services, air traffic, and a long list of other activities, irrespective of their ownership and administration of warehouses, cranes, traffic control, etc. The primary economic differences among landlord, tools, and service ports appears to be in capital financing and labor conditions.

Capital for the landlord ports superstructure is derived from the private sector and is responsive to general market conditions. For example, Multi-Terminals Corporation of Rotterdam will invest in additional gantry cranes if justified by their own traffic and the corporate opportunity cost of the capital (would it be better invested in a new computer?). However, in the tools and service ports, such an investment will depend upon the general public's willingness to finance the capital outlay, often irrespective of traffic. The opportunity cost may be the benefit of another warplane or government office building.

Functions and Economics

Overcapitalization and undercapitalization of the superstructure is more evident in tools and service ports than in landlord ports, although private corporations are as prone to investment error as public port authorities.

In the service ports, where labor is employed directly by the port authority of the government, there appears to be more rigidity in wages, employment levels, and work practices. For example, British Transport Docks Board employees cannot be fired even under redundancy conditions. As labor needs shift among each of the 19 ports administered by the board, there appears to be very little corresponding shift in the labor pool. In the landlord and tool ports, there appears to be considerable mobility among different employers within the port and some mobility among ports.

These differences would give the landlord ports some economic advantage over the tools and service ports; but in France and Great Britain, where the latter type of port is more common, the port is considered to be a public utility. The economic disadvantage is willingly sacrificed in pursuit of other national or regional interests.

Financial Structure

Public Versus Private Financing

The public funding of some northern European ports is by formula; for others, it is strictly an ad hoc process. In most cases, it is expected that the port will generate enough revenue to amortize all public investment, including jetties, channels, locks, canals, and quays. However, in ports such as Antifer (an energy port) and Toulon (a naval base), public investment is considered to be so much in the national interest that amortization is not expected.

The financing of French ports is by formula. Each port submits annual requests to the Ministry of Transport in Paris. Ports qualify for up to 100-percent subsidy of waterway improvements (jetties, channels, basins), 60-80-percent subsidy of quayside improvements and 40-60-percent subsidy of superstructure improvements. Proposals by all ports always exceed appropriated funds so the Ministry of Transport frequently provides less than formula subsidy. For example, the Port of Marseilles now regularly finances some of its own superstructure and infrastructure improvements. Paris makes 800 million francs (\$134 million on 9/10/81) available for port borrowing. One hundred million francs (\$17,000,000 on 9/10/81) of this is available at subsidized interest rates.

French ports have no local taxing or bonding authority and must enter commercial markets to make up the difference between needs and national subsidies plus loans.

Although it has been the official policy of the British government to leave financial responsibility for all port improvements up to the local port authority, there is, in reality, extensive subsidy of public ports. The government often funds port improvements when political pressure is applied.

Several British ports that have been granted independent authority are among the most highly subsidized ports in northern Europe (London, Bristol, Liverpool).

The Port of Rotterdam's investments are financed with money obtained from that city's general loan fund at normal open market terms. Any operating losses are covered entirely by the account of the "Port of Rotterdam,"

which must be met by calling on reserves or by obtaining an additional loan from the city's general loan fund. Profits are partly added to the reserves and partly paid over to the municipality for general (public) purposes. This is quite different from the Amsterdam situation. In this port, losses are absorbed by the city. Profits are also handed over to the city.

The Dutch Government owns the maritime access to the ports and the inland waterway connections and also controls these waterways. For improvements in maritime access and inland waterway connections within the port area, the Dutch Government asks the city owned ports to contribute one-third of the investment. However, the parties usually negotiate for changes in this arrangement. With regard to the maritime access to the Port of Rotterdam, however, this 1/3-2/3 rule has only applied to the investment for deepening the access to 57 feet. The improvement from 57 to 68 feet (present depth) was financed entirely by the Port of Rotterdam. This will also be the case for the next deepening of the access to 72 feet.

The Belgium Government has decided to construct a major new port at Zeebrugge; while this port is owned and administered by the City of Brugge, the development is funded by the central government.

In general, the public ports in northern Europe do not have authority to issue bonds or commercial paper and, therefore, do not compete with private ports in the money market. In turn, it is rare for ports to subsidize users of port resources. Lease rates, fees, assessments, etc., are generally determined by the market and do not represent an economic favor for private industry.

Finance and Development

It is apparent that the greater the degree of public subsidization of ports, the greater the degree of overcapitalization. Overcapitalization is justified as a means of "meeting the competition" and "preparing for the future." Unfortunately, there are numerous examples of major infrastructure developments subsidized by the central government that were obsolete when completed -- or economically irrational at any time. Similar examples can also be found where no public subsidies were involved. In the latter case, the error can usually be attributed to economic miscalculation; in the former, the error is frequently caused by poor political judgment.

The lack of public subsidies for small port infrastructure development or the lack of port subsidies to local industrial development does not appear to inhibit economic activity. Northern European ports stimulate economic development by providing the appropriate resources, environment, and strong working relationships. Attracted industries in turn pay a fee sufficient to cover these services plus a surplus that can be used for further development.

Conclusions

Northern European ports provide some useful lessons for ports in the Pacific Northwest. While these lessons are not based upon scientific analysis, the concurrence of numerous ports experts does provide some validity.

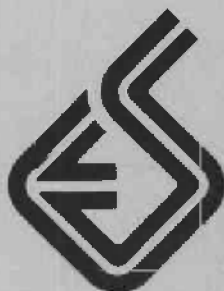
In the final analysis, ports must be judged by the economic contribution they make to local, regional, and sometimes national, communities. Some northern European ports make a significant contribution; others are a burden to their community. While the ports that make a major economic contribution tend to be landlord ports with highly autonomous local administration, there are also a few private, public, and highly subsidized (as well as unsubsidized) ports that are making major economic contributions.

Public subsidies do not make ports successful, but the lack of subsidies may sometimes inhibit economic development. Also, success appears to be less related to ownership than to administrative structure. For example, in a number of French ports dominated by the engineer/manager (weak chambers of commerce), there is an appropriate but grossly underused infrastructure.

In one privately owned British port that is managed by an aggressive, commercially oriented staff, there is inadequate infrastructure but a major and growing contribution to the local economy. In this British port, further infrastructure development would probably relieve some management problems but would probably not significantly affect the level of economic activity.

Ports in the Pacific Northwest identify inadequate infrastructure (and, in some cases, superstructure) as the major barrier to economic development. With a strong business and industrial orientation, northern European ports have overcome the same limitations and eventually have self-financed infrastructure development from surpluses of their commercial activities.

The same opportunities exist for the smaller ports of the Pacific Northwest. It will require enlightened administration and a strong commercial orientation to realize these opportunities.



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