THE ROLE OF THE FEDERAL GOVERNMENT IN THE
DEVELOPMENT OF THE U.S. AIR TRANSPORTATION SYSTEM

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Abstract

A review of the roles of the various federal agencies in the regulation, control, and development of the Air System, with major emphasis on the Department of Transportation (Office of the Secretary, Federal Aviation Administration, and National Transportation Safety Board) and the Civil Aeronautics Board.
The Federal Government plays a central role in the development, finance and operation of the United States Air Transportation System. Figure 1 shows some of the functional relationships between the Government and the other major institutions that are parts of the system. Although local and state governments play a minor role (through the imposition of local taxes or participation in airport ownership and management), the national government is the primary source of political influence and legal control.

Figure 2 shows the government organizations that impact the air system and how they fit into the federal structure. The United States Constitution is the ultimate source of all authority. It allocates governmental functions between the Courts, the Congress and the President. In turn, the legislative and executive branches create and appoint personnel to the independent agencies which are in essence a fourth branch of government - the administrative branch. Each branch interacts with the others, and each plays a particular role.

**THE ROLE OF THE COURTS**

The Courts are not involved in the day-to-day affairs of the air system. Their major function is the supervision of other governmental bodies through the judicial settlement of disputes as they arise. In addition to the resolution of con-
flicts involving the federal government, the Courts settle litiga­tion between the other institutions that make up the system – the users, manufacturers, airlines, etc. Judicial decisions may have major impact and long range policy implications, but since they only arise when parties bring particular disputes before the Courts, one cannot say that these decisions play a decisive or prominent role in shaping air transportation.

THE ROLE OF THE LEGISLATURE

Under Article I, Section 3 of the Constitution, the Congress has the power to regulate commerce among the states. Therefore, the legislature is the major source of air system policy. However, Congress, like the courts, does not participate in the day-to-day affairs of the system. Rather, through legislation, it establishes policy and delegates the implementation of that policy to executive or independent agencies. Through Congressional hearings, it periodically reviews the impact of its legis­lation and will make modifications only when necessary.

Perhaps the most important function of Congress is the control of appropriations sought by the operating agencies. In this way, the legislature can exert pressure on both the administrative and executive bodies that are charged with policy implementation.
General Accounting Office (GAO)

The General Accounting Office is an independent agency in the legislative branch of the government established to assist the Congress in controlling the receipt, disbursement and application of public funds. In general, the audit authority of the GAO extends to all departments and agencies of the Federal Government. Through audits, the GAO monitors the ways in which agencies are discharging their financial responsibilities, the efficiency of operations and program management, and whether Government programs are achieving the purposes intended by Congress. This monitoring activity also extends to state and local governments, quasi-governmental bodies and private organizations when they receive or administer federal funds.

By law, federal agencies are required to pay on presentment bills for freight and transportation services furnished by carriers subject to the Interstate Commerce of Federal Aviation Acts. These payments must be made even if not audited. The GAO monitors these transactions, and is responsible for determining the propriety of the rates and classifications billed, recovering overcharges and settling transportation claims brought for or against the government.

THE ROLE OF THE PRESIDENT

Article II, Section 1 of the Constitution vests the execu-
tive power of government in the President. In addition, the President has specific authority and responsibility covering a large range of topics conferred by statute. In general, he is charged with the implementation of federal policy, which he performs both through the Executive Office of the President and the Executive Departments.

The Executive Office

Many special and general purpose agencies are administratively grouped into the Executive Office. They provide various services and functions to assist the President in his administration and executive duties. Several of these agencies can have major impact on the air system.

Council on Environmental Quality -- The Council was established by the National Environmental Policy Act of 1969 to formulate and recommend national policies to promote and improve the quality of the environment. Its recommendations on aircraft noise and pollution could have great influence on the future of air transportation.

Domestic Council -- Through ad hoc project committees set up to deal with both broad program areas and specific problems, the Domestic Council formulates and coordinates domestic policy recommendations to the President. It assesses national needs and coordinates the establishment of national priorities, recommends integrated sets of policy choices and provides a rapid response
to Presidential needs for policy advice on pressing domestic issues. The Council also maintains a continuous policy review of on-going programs.

**National Aeronautics and Space Council (NASC)** -- Created along with NASA by the National Aeronautics and Space Act of 1958, the NASC is composed of the Vice President, the Secretaries of State, Defense and Transportation, the Administrator of NASA, and the Chairman of the Atomic Energy Commission. An Executive Secretary administers the affairs of the Council assisted by a small staff.

The functions of NASC are to advise and assist the President regarding policies, plans and programs in aeronautics and space. The Council develops comprehensive programs for such activities and fixes the responsibilities of the agencies involved.

**Office of Management and Budget (OMB)** -- OMB is the President's financial watchdog. It also provides valuable interagency coordination and review. In the financial area, OMB assists the President in improving the efficiency and economical conduct of Government services, and in the preparation and formulation of the budget and fiscal programs. It supervises and controls the administration of the budget. OMB also conducts research into new modes of administrative management.

In the area of interagency review, OMB clears and coordinates departmental positions on proposed legislation and monitors the
progress of activities so that the work programs of all the executive agencies may be coordinated and so that Congressional appropriations can be expended in the most economical manner with the least overlap and duplication of effort.

OMB also promotes and coordinates Federal and other statistical services, and plans and develops information systems to monitor program performance.

Office of Science and Technology (OST) -- OST assists the President in the development of technical programs and evaluating and coordinating technical activities to assure that science and technology are used most effectively in the general welfare. Specific tasks include the assessment of selected scientific and technical developments and programs and the evaluation of their impact on national policies. OST also maintains close relations with the Nation's scientific and engineering communities so they will continue to participate in the strengthening of the national technology base.

Special Commissions -- Special boards, committees and commissions are created from time to time for special purposes and administratively report to the Executive Office of the President. Some examples are:

Export Administration Review Board
Federal Safety Council
President's Science Advisory Committee
Aviation Advisory Commission
These commissions are composed of experts from industry and government with full-time staff support. Generally, they undertake a specific important task, and are dissolved when their work is completed.

**The Executive Departments**

**The Department of Agriculture** -- In addition to its more traditional duties, the Department locates, operates and administers airports in the national forest; contracts for aerial services such as seeding, spraying and fire fighting; and through participation in CAB proceedings, the Department seeks to secure adequate air service for its forests. The Department also operates inspection and quarantine stations for plants and animals at airports of entry and assures the humane treatment of animals moving in interstate commerce by air.

**The Department of Commerce** -- Through the United States Travel Service, the Department encourages foreign travel to the United States, and controls the export of aircraft and related equipment. It also disseminates technical data abroad and encourages U.S. businesses to seek foreign contracts.

Through the Bureau of the Census and the Coast and Geodetic Survey, the Department provides population and geographic data essential for airport siting and planning. Through the National Weather Service, the Department provides the weather information vital to aircraft operations.
The Department of Defense (DOD) -- The role of the DOD in the development of the air system cannot be minimized. Through technology spin-off, DOD projects have provided the scientific and technical base for many major developments in civil aviation. In addition to the technology spin-offs, it is a prime source of trained aviation personnel who have completed military service.

The DOD is also a customer for air services. It contracts with carriers for the movement of its personnel and equipment and thus provides a major source of income to them, particularly the supplementals. In connection with its purchases of air services, the DOD appears before the CAB in matters relating to military tariffs.

Department of Health, Education and Welfare -- The Department provides quarantine functions at airports of entry to protect against the import of contagious human diseases and to enforce interstate quarantine and health regulations.

Department of Housing and Urban Development (HUD) -- HUD provides funds for regional and urban planning including research on zoning, land-use planning and airport planning. It can finance studies of urban access problems, but research on rapid mass transit to airports is primarily performed by the Urban Mass Transit Administration.

The Department of the Interior -- The Department controls the use of airports in national parks, monuments and recreational
areas. Through participation in CAB proceedings, the Department attempts to ensure adequate service to these areas as well as for the Pacific Trust Territories which it helps administer.

The Department of Justice -- The Department has several functions that directly relate to the air system. First, through the Immigration and Naturalization Service, it maintains offices at airports of entry to monitor the transit of aliens and foreign nationals. Second, Justice enforces nondiscriminatory practices in the air industry by prosecuting violations. Third, Justice provides enforcement when needed for the rules of air safety such as transport of dangerous items and interference with the pilot. Finally, the Justice Department takes an active role in merger proceedings before the Civil Aeronautics Board and enforces anti-trust laws against manufacturers and suppliers. The Civil Aeronautics Act of 1938 exempts the air carriers subject to the Act from the anti-trust laws and substitutes CAB supervision. However, the other institutions in the air system are subject to prosecutions for anti-trust violations.

The Department of Labor -- The major role of the Labor Department is in the enforcement of policies on minimum wages, limitations on hours of work and the employment of minorities. It also provides statistical information on employment and sponsors some limited vocational and training programs.
Department of State -- The State Department is primarily involved in the international aspects of air transportation, particularly as they affect United States manufacturers and carriers. Through the Agency for International Development (AID) it explores the potential for air transportation systems in underdeveloped countries. State promotes international agreements on air traffic control and airspace standards and facilitates cooperation for international weather data collection and dissemination.

The State Department issues passports and visas for travel to and from the United States. Through the Office of the Deputy Assistant Secretary for Transportation and Telecommunications, the Department formulates policy recommendations and negotiates foreign air transportation agreements.

The Treasury Department -- Two bureaus of the Treasury affect the air system. The Bureau of the Customs conducts all customs operations at airports of entry to the United States. The Bureau of Internal Revenue establishes depreciation policies that affect the purchase of aircraft, and sets the policy for taking deductions for business travel. The latter can affect the use of corporate aircraft and the overall volume of travel.

The Postal Service -- The Postal Service is one of the airlines' largest customers. Although mail rates for certified carriers are set by the Civil Aeronautics Board, the Postal Service has a great deal of control over the amount and timing of airmail movements.
In addition, the Postal Service can negotiate contracts with third level carriers to carry mail to small communities not receiving regular certificated air service. These postal contracts are of major importance to the small operator.

THE ROLE OF THE INDEPENDENT AGENCIES

The independent agencies are created by Congress to perform a particular duty defined in the authorizing statute. Normally, members of the agency are appointed by the President with the advice and consent of the Senate, and once appointed, remain in office either for their specified term or until they resign. Although there is removal power, it can only be exercised if the agency member is guilty of major misconduct in office.

So once the agency is established and its members appointed, in theory it is independent of the other branches of government. However, the President can exert great political pressure, and one can assume that members appointed by the President in office may favor his ideas and policies. Likewise, Congress exerts pressures through financial and budget appropriations and through the threat of amending or revoking the statutory authority that originally set up the agency. The Courts also exert some control over agency action by review of decisions on appeal.

The distinction between members of an agency and agency staff must be made clear. All the independent agencies have
staff to perform day-to-day functions and support agency members. In many organizations, the staff may perform research and make policy recommendations. It may even appear as an independent party in agency proceedings. However, recommendations of the staff are not binding on the agency members who make the actual decisions. For example, it is not uncommon for the Civil Aeronautics Board Staff to take positions that are completely contrary to the final decision of the Board members.

Environmental Protection Agency (EPA) -- To date, the EPA has not had major impact on the air system, deferring most environmental matters involving aviation to the Federal Aviation Administration. However, there are indications that this may not hold true in the future. EPA has a variety of research, monitoring, standard-setting and enforcement activities related to noise and chemical pollution abatement and control. It is logical that these activities will in some way be extended to aviation if a truly systematic attack is to be made on environmental problems. Whether the EPA assumes some of these roles itself, or merely serves as an advisor and consultant to the FAA, it will play an important role in air system development.

Equal Employment Opportunity Commission (EEOC) -- The Commission has two purposes: (1) to end discrimination based on race, color, religion, sex or national origin in the hiring, promotion, firing, wages, testing, training, apprenticeship and all
other conditions of employment; and (2) to promote voluntary action programs by employers, unions and community organizations to put equal employment opportunity into actual operation. The Commission participates in the investigation and enforcement of actions arising from unlawful discrimination.

**Export-Import Bank** -- The Bank aids in the financing and export of commodities from the United States to foreign countries. It supplements rather than competes with private financing and plays a major role in the foreign sale of aviation hardware. A more complete description of its functions can be found elsewhere in these proceedings.

**Federal Communications Commission (FCC)** -- The FCC is charged with the frequency management of telecommunications activities. In particular, it licenses and regulates radio broadcasts for aviation and emergency purposes.

**Federal Mediation and Conciliation Service** -- The Service assists parties to labor disputes where the industry affects interstate commerce, to settle such disputes through mediation and conciliation. The Service possesses no law enforcement authority, but depends wholly on persuasive techniques. Whenever in its judgement, a dispute threatens to cause a substantial interruption of interstate commerce, the Service can offer its services either on its own incentive or at the request of one or more of the parties. The Service is involved with all industries auxiliary
to the airlines including manufacturers or concessionaries, but does not take an active role in disputes involving the airlines, since they are covered by the Railway Labor Act.

**General Services Administration (GSA)** -- The GSA manages the property (and records) of the government, including the construction and operation of buildings, procurement and distribution of supplies, disposal of surplus property, traffic and communications management, stock piling of strategic and critical materials and the creation, preservation and disposal of records.

In particular, the GSA manages the government's Transportation and Communications Service (TCS) which performs traffic management for civil executive agencies. The TCS represents these agencies in negotiations with carriers and in hearings of regulatory bodies. It also develops policies, procedures and regulations for the procurement and utilization of transportation services.

**Interstate Commerce Commission (ICC)** -- The ICC participates with the CAB in establishing air cargo pickup and delivery zones. It has also developed a policy with the CAB, to limit or prevent transmodal transportation systems and intermodal ownership and control of transportation companies.

**National Aeronautics and Space Administration (NASA)** -- NASA's primary programs in aeronautics are managed by the Office of Aeronautics and Space Technology and the research centers assigned
to it. The efforts include research and advanced technological development of aircraft and associated electronics. The primary centers are:

**Ames Research Center** - Research in the configuration, stability, structure and guidance and control of aircraft (and space vehicles).

**Flight Research Center** - Research in extremely high performance aircraft and spacecraft, including flight operations, flight systems and structural characteristics of the vehicles.

**Langley Research Center** - Research in structures and materials for subsonic and supersonic flight.

**Lewis Research Center** - Research in power plants and propulsion.

NASA's work and interest in these areas has expanded rapidly during the past few years and this trend is expected to continue.

**National Labor Relations Board (NLRB)** -- Most of the private institutions involved in the air system are covered by the various provisions of the National Labor Relations Act as amended, with the major exception being the airlines themselves which are covered by the Railway Labor Act. The two major functions of the NLRB are to conduct secret ballot elections among employees to determine whether or not they wish to be represented by a labor organization, and to prevent and remedy unfair labor practices by employers or labor organizations.

Through its regional offices, the NLRB can issue complaints in unfair practice cases, seek settlements of unfair practice
charges, obtain compliance with Board orders and court judgements and petition for injunctions to prevent or remedy unfair practices.

National Mediation Board -- The Board was created by a 1934 amendment to the Railway Labor Act. Its jurisdiction was later extended to carriers by air engaged in interstate commerce or under a mail contract. The purposes of the act are to avoid interruption to commerce, to ensure the rights of employees to organize and to provide for the prompt settlement of disputes.

The principle duty of the Board is to mediate differences between the transportation companies and their employees arising from attempts to reach agreements on rates of pay, rules on employee working conditions and the like. The Board also settles disputes among employees concerning what unions should represent them.

National Science Foundation (NSF) -- The major role of NSF is to strengthen research and education in the sciences in the United States. Many of the projects undertaken are transportation oriented. Through the award of grants and contracts to universities and other nonprofit institutions, NSF encourages research in vital areas.

Securities and Exchange Commission (SEC) -- The SEC guards against fraud in the issuance and sale of securities in interstate commerce or through the mails. It operates primarily by requiring the submission of certain factual data before the stock
can be registered, and periodical data submissions thereafter. It does not guarantee the accuracy of the data filed, but it makes those guilty of fraudulent representations liable for civil or criminal penalties. The SEC also has the power to obtain court orders enjoining acts or practices that could defraud investors or otherwise violate the law.

THE DEPARTMENT OF TRANSPORTATION

There are two federal agencies that merit particular attention: the Department of Transportation (DOT), an executive department of the President; and the Civil Aeronautics Board (CAB), one of the independent agencies.

The DOT is a major institutional factor in the air system. Both through the Office of the Secretary and the Federal Aviation Administration, DOT is involved in policy determination, system analysis and operational problems associated with air service. Through the FAA and the National Transportation Safety Board (which is loosely tied to the DOT for administrative purposes), the Department plays a major role in air safety.

Figure 3 shows the organization of DOT as of 1971. The administrations listed on the bottom line are the operating administrations of the Department. All other functions are collectively said to be in the Office of the Secretary of Transportation (OST).
The Office of the Secretary -- Within OST, the Secretary and the Under Secretary are responsible for overall planning, direction and control of the Department. There are several Assistant Secretaries who play a major role in air system policy development.

Assistant Secretary for Environment and Urban Systems -- Through its concern for environmental matters, the Assistant Secretary's office influences noise and chemical pollution policy and airport planning.

Assistant Secretary for Policy and International Affairs -- The Assistant Secretary is responsible for international and domestic transportation policy, objectives and system planning. He directs programs of international technical cooperation, including technical support to developing countries. A comprehensive transportation data information retrieval system is also being developed in this section of the Department.

Assistant Secretary for Systems Development and Technology -- Scientific and technological research and development in transportation systems, safety, noise abatement and technical policy inspect are under the management of the Assistant Secretary. He also provides overall management for the Transportation Systems Center in Cambridge, Massachusetts which is charged with performing and managing pro-
jects in advanced systems and technological research and development in all transportation disciplines.

The Federal Aviation Administration (FAA) -- The FAA is primarily concerned with safety and the operational aspects of air transportation, as compared with the Civil Aeronautics Board's economic responsibilities. The Administration is more involved with the day-to-day aspects of the system than any other governmental body. It is charged with the promotion of safety and development of the system; achieving efficient use of the air space; and promoting the national airport system. In addition, the FAA is responsible for the development and operation of air traffic control and air navigation systems for both civilian and military usage.

One of the Administration's most important functions is safety regulation. It issues and enforces rules, regulations and standards for aircraft manufacture, maintenance and operation; for the certification of airmen; and for the certification of airports used by carriers under CAB economic control. The FAA also installs and maintains air navigation facilities, communication equipment and electronics needed for control towers and air traffic control centers. The safe and efficient management and utilization of the navigable airspace is one of the Administration's primary objectives.
The FAA provides a system for the registration and recording of the nationality and ownership of aircraft, engines, propellers and appliances, and performs research and development tasks needed to fulfill its statutory responsibilities. The National Aviation Facilities Experimental Center in Atlantic City, New Jersey is maintained as a facility necessary for the experimental phases of research tests.

In addition to other tasks too numerous to mention, the FAA administers programs to identify the type and costs of airports required for a national airport system and provides funds to assist in airport systems planning and airport master plan development. It also administers the Aviation Trust Fund, making grants for runway and taxiway construction on a matching funds basis with airport operators.

The National Transportation Safety Board (NTSB) -- The NTSB, although administratively attached to the DOT, is autonomous in its functions with its own statutory responsibilities and executive authority. The DOT Act of 1966 specifically states that the Board in the exercise of its functions, powers and duties shall be independent of the Secretary and the other officers of the Department. It is required to directly report to Congress annually on the conduct of its duties and make appropriate recommendations for legislation. The NTSB has responsibility for determining the causes of surface accident as well as air.
the air side, it investigates accidents (except where it delegates such investigation to the FAA), determines probable cause and reports all facts and circumstances. It also conducts special studies and makes recommendations for aviation safety and accident prevention.

THE CIVIL AERONAUTICS BOARD

Figure 4 shows the organizational structure of the CAB. The Board itself is composed of the five members shown at the top of the chart. All other offices and positions provide staff support to the Board and its activities.

The Board was created by the Civil Aeronautics Act of 1938 and continued by the Federal Aviation Act of 1958. It has broad responsibility for the encouragement and development of civil aviation. Unlike the Interstate Commerce Commission (ICC), the CAB is charged to both regulate the industry and promote its development at the same time. This often leaves the Board in a dilemma as to which goal should be predominant. For example, when a fare increase is requested, the Board must balance the cost to the consumer against the carrier's needs for more capital.

The Board's five members are approved for staggered six-year terms, and no more than three may be from the same political party. The President annually designates one member as Chairman and another as Vice-Chairman. Board activities can be roughly
grouped as follows:

**Route Authorizations** - The Board through the grant of certificates of public convenience and necessity, authorizes domestic carriers to perform domestic and/or foreign air service between designated points. It also issues permits to foreign carriers to provide air transportation between the United States and foreign countries and authorizes the navigation of foreign aircraft in the United States for other purposes.

**Fares** - The Board has authority over the tariffs, rates and fares charged for civil air transportation. The carriers initiate the rates and the Board oversees and approves them. The Board also authorizes and pays subsidies for service to communities where traffic does not cover the cost of service.

**Inter-Carrier Relationships** - The CAB passes on mergers, agreements, acquisitions of control and interlocking relationships involving air carriers. It also supervises unfair competitive practices of carriers or ticket agents.

**Reports** - The Board requires regular financial and operating reports to be filled by the Carriers. It also specifies the accounting and bookkeeping practices and procedures to be used in preparing the required information.

**International** - The CAB serves as an advisor to the Department of State in foreign negotiations for new or revised air routes and services.

Board decisions in all domestic areas are subject only to court review, and not that of any executive department or agency. Decisions granting or affecting certificates for overseas and foreign air transportation require Presidential approval.

The Board's Office of Consumer Affairs has recently increased in importance. This office is maintained to assist air travelers, shippers, and others interested in air transportation. It processes
complaints arising from the use of air service and attempts to arrange voluntary solutions between members of the industry and the public.

SUMMARY

There are over 30 federal agencies that can affect the development, operation and control of the air transportation system. Because of the many complex roles the government plays, it is impossible to understand our air system without understanding how intimately private and public institutions are related. What might appear to be a simple management decision may involve complicated regulatory and policy issues that could have major unforeseen impact on the overall operation and efficiency of air transportation. One must understand the complexities of the federal role to truly predict the effects of decisions on the system as a whole.
CONSTITUTION

LEGISLATIVE
• GENERAL ACCOUNTING OFFICE

INDEPENDENT AGENCIES
• CIVIL AERONAUTICS BOARD
• ENVIRONMENTAL PROTECTION AGENCY
• EQUAL EMPLOYMENT OPPORTUNITY COMMISSION
• EXPORT-IMPORT BANK
• FEDERAL COMMUNICATIONS COMMISSION
• FEDERAL MEDIATION
• CONCILIATION SERVICE
• GENERAL SERVICES ADMINISTRATION
• INTERSTATE COMMERCE COMMISSIONS
• NATIONAL AERONAUTICS SPACE ADMINISTRATION
• NATIONAL LABOR RELATIONS BOARD
• NATIONAL MEDIATION BOARD
• NATIONAL SCIENCE FOUNDATION
• SECURITIES AND EXCHANGE COMMISSION

EXECUTIVE
• OFFICE OF THE PRESIDENT
  • COUNCIL ON ENVIRONMENTAL QUALITY
  • DOMESTIC COUNCIL
  • NATIONAL AERONAUTICS AND SPACE COUNCIL
  • OFFICE OF MANAGEMENT AND BUDGET
  • OFFICE OF SCIENCE AND TECHNOLOGY
  • SPECIAL COMMISSIONS

EXECUTIVE DEPARTMENTS
• AGRICULTURE
• COMMERCE
• DEFENSE
• HEALTH, EDUCATION AND WELFARE
• HOUSING AND URBAN DEVELOPMENT
• INTERIOR
• JUSTICE
• LABOR
• STATE
• TRANSPORTATION
• TREASURY
• POSTAL SERVICE

JUDICIAL