

**COMMENTS BY THE
AIRPORT COMMUNITIES COALITION**

**CITY OF BURIEN, WASHINGTON
CITY OF DES MOINES, WASHINGTON
CITY OF NORMANDY PARK, WASHINGTON
CITY OF TUKWILA, WASHINGTON**

**ON THE PROPER SCOPE OF THE
ENVIRONMENTAL IMPACT STATEMENT**

**FOR A PROPOSED DEVELOPMENT OF
SEATTLE-TACOMA INTERNATIONAL AIRPORT**

**Submitted to the
Federal Aviation Administration
and Port of Seattle**

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1. Statement of Mayor Arun G. Jhaveri of Burien, Mayor Richard T. Kennedy of Des Moines, Mayor Robert Davis of Normandy Park and Mayor John W. Rants of Tukwila (Feb. 10, 1994).
2. Notice of Intent to Prepare an Environmental Impact Statement and to conduct Scoping for Seattle-Tacoma International Airport, Seattle, WA, 59 Fed. Reg. 645 (1994).
3. Puget Sound Regional Council Resolution A-93-03 (Apr. 29, 1993).
4. A.S. Harris, Review of Community Responses to Changes in Noise Exposure (Nov. 1991).

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CITY OF DES MOINES, WASHINGTON
CITY OF BURIEN, WASHINGTON
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on the
Proper Scope of the Environmental Impact Statement
for a Proposed Development at
Seattle-Tacoma International Airport

I. INTRODUCTION

The cities of Burien, Des Moines, Normandy Park and Tukwila, individually, and collectively as the Airport Communities Coalition ("ACC"),^{1/} submit these comments on the proper scope of the environmental impact statement ("EIS") to be prepared jointly by the Federal Aviation Administration ("FAA") and the Port of Seattle (the "Port") for the proposed expansion of Seattle-Tacoma International Airport ("SEA" or the "Airport").^{2/} On January 5, 1994, the FAA published its Notice of Intent to prepare this EIS.^{3/}

The Port and the FAA assert that the EIS will be prepared pursuant to both the National Environmental Policy Act ("NEPA")^{4/} and the Washington State Environmental Policy

^{1/} The Airport Communities Coalition ("ACC") is a voluntary association of local governmental entities created and established pursuant to the provisions of state law and chapter 39.34 of the Revised Code of Washington.

^{2/} In addition to these Comments, written and oral comments on the scope of the EIS were submitted by the cities of Burien, Des Moines, Normandy Park and Tukwila individually and on behalf of the ACC at the FAA's public scoping meeting held at the Seattle-Tacoma International Airport on February 10, 1994. Copies of the statement of Mayor Arun G. Jhaveri of Burien, Mayor Richard T. Kennedy of Des Moines, Mayor Robert Davis of Normandy Park and Mayor John W. Rants of Tukwila on the scope of the Draft Environmental Impact Statement are attached to these Comments as Exhibit 1.

^{3/} 59 Fed. Reg. 645 (1994) (attached as Exhibit 2 to these Comments).

^{4/} 42 U.S.C. § 4321 et seq.

Act ("SEPA").^{5/} Each statute imposes similar, yet distinct requirements for the proper scope of the EIS.

NEPA "declares a broad national commitment to protecting and promoting environmental quality."^{6/} By enacting NEPA, Congress recognized the critical importance of environmental concerns to the well-being and development of our nation and its citizens. Accordingly, NEPA mandates a detailed and searching study and consideration of the direct and indirect impacts of proposed projects and their alternatives, as well as the relationship of short-term projects to long-term productivity. This process is intended to "create and maintain conditions under which man and nature can exist in productive harmony, and fulfill the social, economic, and other requirements of present and future generations of Americans."^{7/}

To implement this policy, NEPA directs that, to the fullest extent possible:

[A]ll agencies of the Federal Government shall -

.....

- (C) include in every recommendation or report on proposals for legislation and other major Federal actions significantly affecting the quality of the human environment, a detailed statement by the responsible official on-
- (i) the environmental impact of the proposed action,
 - (ii) any adverse environmental effects which can not be avoided should the proposal be implemented,
 - (iii) alternatives to the proposed action,
 - (iv) the relationship between local short-term uses of man's environment and the maintenance and enhancement of long-term productivity, and

^{5/} Chapter 43.21C RCW.

^{6/} Robertson v. Methow Valley Citizens Council, 490 U.S. 332, 348 (1989) (citations omitted).

^{7/} 42 U.S.C. § 4331(a).

- (v) any irreversible and irretrievable commitments of resources which would be involved in the proposed action should it be implemented.^{8/}

The regulations of the Council on Environmental Quality ("CEQ")^{9/} and of the FAA^{10/} describe an EIS as "an action-forcing device to insure that the policies and goals [of NEPA] are infused into the ongoing programs and actions of the Federal Government."^{11/} The CEQ and FAA regulations state that an EIS

shall provide full and fair discussion of significant environmental impacts and shall inform decisionmakers and the public of the reasonable alternatives which would avoid or minimize adverse impacts or enhance the quality of the human environment.^{12/}

As the Supreme Court recently stated:

[S]imply by focusing the agency's attention on the environmental consequences of a proposed project, NEPA ensures that important effects will not be overlooked or underestimated only to be discovered after resources have been committed or the die otherwise cast.^{13/}

SEPA is based upon the recognition that "each person has a fundamental and inalienable right to a healthful environment and that each person has a responsibility to contribute to the preservation . . . of the environment."^{14/} Similar to NEPA, SEPA requires governmental agencies within Washington to prepare a "detailed statement" or EIS, analyzing among other things, the environmental impacts of recommendations, proposals and other

^{8/} Id. § 4332.

^{9/} 40 C.F.R. § 1500 et seq.

^{10/} U.S. Dep't of Transp., Fed. Aviation Admin. Order No. 5050.4A, Airport Environmental Handbook (1985) ("Order 5050.4A"); U.S. Dep't of Transp., Fed. Aviation Admin., Order No. 1050.1D, Policies and Procedures for Considering Environmental Impacts (1986) ("Order 1050.1D").

^{11/} 40 C.F.R. § 1502.1; Order 5050.4A ¶ 71.

^{12/} 40 C.F.R. § 1502.1; Order 5050.4A ¶ 71.

^{13/} Methow Valley Citizens Council, 490 U.S. at 349 (citations omitted).

^{14/} RCW 43.21C.020(3).

major actions "significantly affecting the quality of the environment."^{15/} This requirement is applicable not only to state agencies, but also to municipalities, counties, port districts and other political subdivisions of the State.^{16/}

The EIS is the central, most valuable, tangible, and frequently contested SEPA requirement.

. . . .

The EIS is to be regarded not as an end, in itself, but as a means of integrating SEPA's policies into the actions and agendas of state and local agencies. The EIS, by providing environmental information for agency decisionmakers and interested citizens, is designed to foster government actions consonant with SEPA's policies; moreover, review and comment by interested citizens and agencies during the EIS preparation process should result in more reliable final impact statements [T]he purpose of the EIS is more than mere disclosure, rationalization or justification; it is to be used by agency officials in making decisions on proposed actions.^{17/}

One significant difference between NEPA and SEPA is that SEPA establishes not only procedural requirements for government decisionmaking, but also substantive standards for the protection of human health and the environment.^{18/}

SEPA's directive that "the policies, regulations, and laws of the State of Washington" be "interpreted and administered in accordance with [SEPA's] policies" has sweeping effect. At the very least any inter-pretive or administrative doubts about all state policies, laws, and regulations must be resolved on the basis of SEPA's policies; arguably the provision has universal amendatory effect, engrafting SEPA's policies onto all state law.^{19/}

^{15/} Id. 43.21C.030(2)(c).

^{16/} Id. 43.21C.030(2). Actions taken by municipalities and port districts that may trigger compliance with SEPA include the adoption of comprehensive plans and zoning ordinances. See WAC 197-11-704(2)(b)(ii).

^{17/} Richard L. Settle, *The Washington State Environmental Policy Act: Legal and Policy Analysis* § 14, at 141, 144-45 (1991) (citations omitted).

^{18/} See, e.g., RCW 43.21C.020(2), 030.(1).

^{19/} Richard L. Settle, supra note 17, § 18(a) at 222-23 (footnote omitted).

Although SEPA does not require that the least environmentally damaging alternative be chosen, it prohibits an "unreasonable [choice of] environmental harm. Thus, actions involving unreasonable tradeoffs of environmental values or failure to require reasonable mitigation measures should be judicially invalidated."^{20/}

A. The Factual Foundation for the EIS

1. The Necessity for Integrating the Puget Sound Regional Council Planning Process Into the EIS

The FAA's Notice of Intent states that the Port will act as a joint lead agency with the FAA in the preparation of the EIS.^{21/} An EIS of proper scope must, in addition, include the Puget Sound Regional Council and encompass its contemporaneous planning process for a supplemental airport.

The Puget Sound Regional Council ("PSRC") is a regional planning agency made up of King, Pierce, Snohomish and Kitsap Counties and their incorporated cities and towns joined by an interlocal agreement pursuant to Washington state law.^{22/} The PSRC is designated under federal and state laws as the Metropolitan Planning Organization and Regional Transportation Planning Organization for the central Puget Sound region and is responsible for adopting and maintaining regional growth management and transportation strategies for the region.^{23/}

As the Regional Transportation Planning Organization for the central Puget Sound region,^{24/} the PSRC is the agency authorized under state law to develop and adopt a regional transportation plan, and to certify that the transportation elements of local comprehensive plans conform to requirements of state law and are consistent with the regional transportation plan.^{25/} The PSRC also is empowered under state law to ensure that all transportation projects that have a significant impact upon regional facilities or services

^{20/} Id. at 235-36.

^{21/} 59 Fed. Reg. 645.

^{22/} Puget Sound Regional Council Interlocal Agreement for Regional Planning of the Central Puget Sound Area (Mar. 11, 1993) ("Interlocal Agreement") § V.

^{23/} Id. § VII(A)(3), (4). See also PSRC Res. A-91-01; RCW 47.80.020.

^{24/} PSRC Res. A-91-01; RCW 47.80.020.

^{25/} RCW 47.80.030(1)(a), (b); id. 36.70A.070(6). See also Interlocal Agreement § VI(21).

are consistent with the regional transportation plan.^{26/} As both the regional transportation planner and the arbiter of the consistency of any single plan with regional plans, the PSRC plays a pivotal role in the development of air transportation facilities, because any specific proposal for expanding regional air transportation capacity must be incorporated into the regional transportation plan.

In 1989, the PSRC entered into an agreement with the Port to establish a joint planning process for developing a regional air carrier system plan which, among other things, would provide input to the PSRC for updating and amending the aviation component of its regional transportation plan -- the Regional Airport System Plan.^{27/} The agreement led to preparation -- by the Port and the PSRC -- of a nonproject (or programmatic) environmental impact statement (the "Flight Plan EIS") pursuant to SEPA.^{28/} The Flight Plan EIS examined the long-term needs for increased air transportation capacity in the Puget Sound region and briefly reviewed the environmental effects of a number of conceptual alternates for meeting those needs.^{29/}

Subsequently, the PSRC General Assembly adopted a resolution ("PSRC resolution") amending its Regional Airport System Plan to provide for the development of a major supplemental airport and a third runway at SEA.^{30/} The PSRC resolution declined to approve the construction of a third runway at SEA until an environmental assessment -- including financial and market feasibility studies -- demonstrates that a supplemental airport

^{26/} RCW 47.80.030(1), (2).

^{27/} Port of Seattle and Puget Sound Council of Governments Interagency Agreement for Long Term Air Carrier System Planning (May 23, 1989) at 2. On September 30, 1991, the Puget Sound Council of Governments was dissolved, and on October 1, 1991, the PSRC was formed in its place. PSRC Res. A-91-01 (Mar. 13, 1991). The PSRC thereafter assumed the Puget Sound Council of Governments' role in the Interagency agreement with the Port.

^{28/} RCW 43.21C.030(2)(C). According to SEPA rules, "[n]onproject' means actions which are different or broader than a single site specific project, such as plans, policies, and programs." WAC 197-11-774. The Flight Plan EIS was not prepared pursuant to NEPA and would not comply with federal requirements for a NEPA EIS.

^{29/} Puget Sound Regional Council and Port of Seattle, The Flight Plan Project, Final Environmental Impact Statement (1992).

^{30/} PSRC Res. A-93-03 (Apr. 29, 1993) (attached as Exhibit 3 to these Comments).

would not be feasible and would not eliminate the need for the third runway.^{31/} The PSRC recently initiated a planning and feasibility study for a supplemental airport.^{32/}

Regardless of the outcome of the PSRC's supplemental airport study, the PSRC resolution would not authorize construction of the third runway at SEA unless two conditions are satisfied

- ▶ Demand management and system management programs are pursued and achieved, or determined to be infeasible, based on independent evaluation; and
- ▶ Noise reduction performance objectives are scheduled, pursued and achieved based on independent evaluation, and based on measurement of real noise impacts.^{33/}

Therefore, until the PSRC's study demonstrates that a supplemental airport would not obviate the need for an additional runway at SEA, and until the Port has complied with the other two conditions in the PSRC resolution, the construction of another runway at SEA would not be consistent with state law.^{34/} Only fulfillment of all the conditions in the PSRC resolution would provide the legal foundation upon which any expansion of SEA may proceed. Consequently, the Port does not have the legal authority to undertake the project until such time as it can demonstrate that specified conditions have been satisfied and until the PSRC conclusively determines that a supplemental airport would not eliminate the need for the third runway at SEA. The Port's governing body publicly has recognized the necessity for obtaining final PSRC approval before the Port may begin to implement its proposed expansion plan. The Port Commissioners have stated they would abide by the

^{31/} Id.

^{32/} New York Engineering Firm to Lead Supplemental Airport Study, Daily Journal of Commerce (Seattle, WA) Jan. 26, 1994. "The study, to be performed by TAMS Consultants, Inc., will, among other things, identify potential supplementary airport site(s) in the Puget Sound region and evaluate whether the development of such site(s) for commercial air service can eliminate the need for a third runway at SEA." TAMS Consultants, Inc. Statement of Qualifications to Conduct a Major Supplemental Airport Feasibility Study (Dec. 20, 1993) at 4.

^{33/} PSRC Res. A-93-03 (emphasis added).

^{34/} See, e.g., RCW 47.80.030(1)(a), (b), (2); id. 36.70A.070(6). See also Interlocal Agreement § IV(21).

final decision of the PSRC with respect to the permissibility of undertaking an expansion of SEA.^{35/}

2. The Importance of the PSRC Resolution in Determining the Scope of the EIS

The PSRC resolution conditions are critical for the scoping of the EIS. The legal authority upon which the PSRC resolution is based require that the Port/FAA EIS must assume, at a minimum, that the conditions set forth in the resolution have been met. However, the central role of the PSRC resolution in the preparation of the Port/FAA EIS can not be satisfied merely by legalistic formal compliance with the PSRC's conditions. In fact, the conditions determine the underlying premises upon which the Port's proposed project is based and, therefore, establish the parameters of the EIS.

- ▶ The Port's institution of demand management/system management programs as mandated by the PSRC resolution will 1) affect the need for the project; 2) define the range of reasonable alternatives; and 3) affect the analysis of environmental impacts. The institution of demand management/system management programs also must be studied as cumulative and connection actions.
- ▶ The outcome of the PSRC's supplemental airport study potentially will demonstrate that there is no need for the Port's proposed project.
- ▶ The factual assumptions and the data (e.g., forecasts, projections) which form a basis for the articulated need for the proposed SEA expansion project, the

^{35/} David Schaefer, Port Won't Defy Elected Officials on Runway, The Seattle Times/Seattle Post-Intelligencer, Mar. 21, 1993 at B1.

Port of Seattle commissioners, although overwhelmingly in favor of expanding Seattle-Tacoma International Airport, say they will live with the decision of regional elected officials even if those officials recommend against a third runway.

....

[P]ort commissioners said they doubt they could defy the Puget Sound Regional Council if it recommends against expanding the airport

'We are a participant in a process,' said Port Commission chairman Gary Grant. 'We would abide by the recommendation of the regional council and not pursue the (third runway)' Id.

examination of alternatives and the analysis of environmental effects must be the same in the Port/FAA EIS as those used in the PSRC's supplemental airport study.

- ▶ The Port's institution of a demand management/system management program as mandated by the PSRC resolution will affect the need for the project.
- ▶ The outcome of the PSRC's supplemental airport study will demonstrate whether there exists any need for the Port's proposed project.
- ▶ Until the PSRC's study demonstrates that a supplemental airport would not obviate the need for an additional runway at SEA, and until the Port has complied with the other two conditions in the PSRC resolution, the construction of another runway at SEA would not be consistent with state law.

A properly scoped EIS can not merely discuss broadly the long-term air transportation capacity needs of the Puget Sound region. It must discuss with precision and specificity the Port's authority to develop additional capacity at SEA; it must examine the projects included in the Port's Master Plan Update; it must assess the likelihood that the Port can satisfy the conditions of the PSRC resolution; it must assume that the Port has satisfied all of the requisite conditions; and it must base the EIS on the consequences of satisfying the PSRC's conditions. Most importantly, it must integrate the PSRC's supplemental airport planning process into the entire fabric of the Port/FAA EIS.

B. The Purpose of Scoping Under NEPA and SEPA

1. The FAA Must Independently Fulfill Its NEPA Obligations

The EIS to be prepared jointly by the FAA and the Port must satisfy the requirements of both NEPA and SEPA. The FAA, moreover, must ensure that the scope of the EIS adequately addresses all of the agency's obligations under NEPA, regardless of the extent to which SEPA may authorize a narrower scope.

NEPA directs federal agencies to examine all environmental impacts of proposed projects, to develop and explore all reasonable alternatives to such actions, and to analyze

the potential environmental impacts of those alternatives.^{36/} While the Port is a joint lead agency with the FAA in the preparation of the EIS, the FAA nevertheless has an independent responsibility to comply with the requirements of NEPA with respect to the Port's requested approval for expansion of SEA. Although it need not conduct a "crystal ball inquiry" into every remote impact of the proposed project on the environment, the FAA must identify all foreseeable environmental impacts,^{37/} and conduct the research necessary to develop the information necessary for a thorough evaluation of these impacts consistent with the exacting requirements of NEPA.

No federal funds may be authorized for the proposed Airport expansion until (1) the FAA has prepared and approved a final EIS; (2) the Environmental Protection Agency has published notice in the Federal Register of the availability of the final EIS to the public; and (3) thirty days have elapsed following such publication.^{38/}

The FAA must "independently evaluate the information submitted and shall be responsible for its accuracy."^{39/} The FAA's legal obligation to prepare the environmental impact statement may not be delegated to, or fulfilled by, a project sponsor, even if the sponsor is a joint lead agency.^{40/} There may be an exchange of information between the sponsor of a project and a federal agency in connection with the preparation of an environmental impact statement or of an environmental assessment,^{41/} but the FAA is required to examine the assumptions and conclusions underlying any analysis submitted by the sponsor.^{42/} The United States Court of Appeals for the Fifth Circuit has explained that

[i]n reviewing the role of outside consultants in the preparation of environmental impact statements, this court has specifically ruled that an agency may not

^{36/} 42 U.S.C. § 4332.

^{37/} Town of Huntington v. Marsh, 859 F.2d 1134, 1141 (2d Cir. 1988), cert. denied, 110 S. Ct. 1296 (1990) (citing Vermont Yankee Nuclear Power Corp. v. Natural Resources Defense Council, 435 U.S. 519, 551 (1978)).

^{38/} 40 C.F.R. § 1506.10(b); Order 5050.4A ¶ 96h.

^{39/} 40 C.F.R. § 1506.5(a). See also Order 5050.4A ¶ 77b.

^{40/} Order 5050.4A ¶ 74 et seq.

^{41/} 40 C.F.R. § 1506.5(a).

^{42/} Sierra Club v. Marsh, 701 F. Supp. 886, 912 (D. Me. 1988), vacated on other grounds, 872 F.2d 497 (1st Cir. 1989).

reflexively rubber stamp a statement prepared by others. . . . If the [agency] independently and carefully reviewed [the outside consultant's report] and verified its data, then the [agency] properly performed its regulatory function.^{43/}

The FAA's independence in preparing the EIS is particularly important in this matter because the Port is both the project sponsor and the joint lead agency and because the Port has similar, but distinct obligations to fulfill under its own state environmental policy statute. Although the EIS will be prepared pursuant to both NEPA and SEPA, FAA regulations provide that the most restrictive requirements of each statute must prevail.^{44/} For example, under the concept of tiering, SEPA regulations^{45/} permit the Port to narrow the scope of a site-specific EIS if a nonproject (or programmatic) EIS has been prepared previously.^{46/} The FAA has no such authority to circumscribe the scope of an EIS for which it has not previously prepared a programmatic EIS under NEPA. Consequently, the FAA must ensure that the EIS strictly adheres to NEPA scoping requirements to avoid even the appearance of inappropriately narrowing the scope of the EIS for the proposed expansion of SEA. Therefore, the EIS must critically examine and independently evaluate the factual bases upon which the Flight Plan EIS rests and Flight Plan's conclusions with respect to the regional need for the proposed expansion project, the evaluation of alternatives and the environmental effects of a preferred alternative and other alternative courses of action.

The CEQ and the FAA have described scoping as "an early and open process for determining the scope of issues to be addressed" in an EIS.^{47/} The purpose of the scoping process is not to reach any conclusions as to the environmental desirability of a particular proposal. Rather, the goals of scoping are to

identify the public and agency concerns; clearly define the environmental issues and alternatives to be examined in the EIS including the elimination of nonsignificant issues; identify related issues which originate from separate

^{43/} Save Our Wetlands, Inc. v. Sands, 711 F.2d 634, 642-43 (5th Cir. 1983).

^{44/} "Where State laws or local ordinances have environmental impact statement requirements in addition to but not in conflict with those in NEPA, Federal agencies shall cooperate in fulfilling these requirements as well as those of Federal laws so that one document will comply with all applicable laws." 40 C.F.R. § 1505.2(c) (emphasis added).

^{45/} Chapter 197-11 WAC.

^{46/} WAC 197-11-442, -443.

^{47/} 40 C.F.R. § 1501.7; Order 5050.4A ¶ 74a.

legislation, regulation, or Executive Order . . . ; and identify state and local agency requirements which must be addressed.^{48/}

CEQ regulations state that "[s]cope consists of the range of actions, alternatives, and impacts to be considered in an environmental impact statement."^{49/} The regulations further explain that to determine the proper scope of an EIS, three types of actions, three types of alternatives and three types of impacts must be considered. These include 1) connected, cumulative and similar actions; 2) no action, other reasonable courses of action and mitigated action alternatives; and 3) direct, indirect and cumulative impacts.^{50/} As will be explained in detail in these comments, the FAA's scoping obligations necessitate an EIS which examines several critical actions which may be outside the legal purview of the Port and which may be outside the requirements imposed by SEPA.

The CEQ has stated clearly that scoping is a critical element in the environmental process because of its potential to "have a profound positive effect on environmental analyses, on the impact statement process itself, and ultimately on decisionmaking."^{51/}

NEPA regulations place a "significant responsibility on agencies and the public alike during the scoping process to identify all significant issues and reasonable alternatives to be addressed in the EIS."^{52/} It is in this spirit of public responsibility and interest in the long-range concerns of their citizens -- as well as those of the entire Puget Sound region -- that the ACC submits these comments. Based on the information presently available to it, the ACC has endeavored to present in these comments all of the environmental issues which must be addressed in the EIS.

The ultimate responsibility for ensuring that the EIS adequately addresses all the significant environmental issues associated with the proposed project rests with the FAA. As

^{48/} CEQ Memorandum on Implementation of NEPA Regulations, 48 Fed. Reg. 34,263 (1983), reprinted in, Env't Rep. (BNA) 41:2841 ("CEQ Memorandum").

^{49/} 40 C.F.R. § 1508.25; see also Order 5050.4A ¶ 74a.

^{50/} 40 C.F.R. § 1508.25.

^{51/} CEQ Memorandum, Scoping Guidance (Apr. 30, 1981), 17 Env'tl. L. Rep. 35,031.

^{52/} CEQ Memorandum, Env't Rep. (BNA) at 41:2841.

the joint lead agency,^{53/} it "can not shed its responsibility to assess each significant impact or alternative even if one is found after scoping."^{54/}

2. The Port May Choose to Rely Upon Its Prior SEPA EIS

Scoping plays a more limited role under SEPA.^{55/} The primary objective of scoping is to narrow the scope of the EIS so that it focuses on probable adverse environmental impacts which are significant.^{56/} "The responsible official shall consult with agencies and the public to identify such impacts and limit the scope of an environmental impact statement."^{57/}

The lead agency shall narrow the scope of every EIS to the probable significant adverse impacts and reasonable alternatives, including mitigation measures. For example, if there are only two or three significant impacts or alternatives, the EIS shall be focused on those.^{58/}

Unlike NEPA, SEPA regulations do not require that connected, cumulative or similar actions be included in the scope of a site-specific EIS that has been preceded by a nonproject (programmatic) EIS.^{59/} By definition, the level and detail of analysis required for a nonproject EIS -- such as the Flight Plan EIS -- is less than that for a project-specific

^{53/} The fact that the Port is the other joint lead agency is irrelevant to the FAA's independent obligation to ensure the integrity of the EIS, procedurally and substantively.

^{54/} CEQ Memorandum, Scoping Guidance, 17 Env'tl. L. Rep. at 35,032.

^{55/} See RCW 43.21C.031; WAC 197-11-408.

^{56/} See RCW 43.21C.031; WAC 197-11-408.

^{57/} RCW 43.21C.031.

^{58/} WAC 197-11-408(1).

^{59/} SEPA allows for the preparation of EISs -- such as the Flight Plan EIS -- on broad programs that do not contemplate a specific government action. Nonproject EISs are prepared pursuant to "phased review," under which "[b]roader environmental documents may be followed by narrower documents . . . that incorporate prior general discussion by reference and concentrate solely on the issues specific to that part of the proposal." WAC 197-11-060.(5)(b).

EIS.^{60/} A nonproject EIS is required to analyze the environmental impacts of "alternative means of accomplishing a stated objective," with such analysis being "limited to a general discussion of the impacts of alternate proposals."^{61/}

Another distinction between NEPA and SEPA is that SEPA places no time limits on scoping. In fact, scoping may continue indefinitely, even during EIS preparation.^{62/} Scoping is never final until the agency has completed action on the proposal, and the scope may be revised to reflect major modifications of the proposal, changed circumstances and new information affecting the proposal and its significant impacts.^{63/} In light of the flexible scoping process contemplated by SEPA, the ACC and its constituent cities reserve the right to submit additional scoping comments whenever it appears that project modifications, changed circumstances or new information warrant.

The distinction between the NEPA and SEPA scoping process is crucially important here because of the Port's prior nonproject Flight Plan EIS. While the ACC reserves any objections to the adequacy of the Flight Plan EIS under SEPA, it is abundantly clear that the Port intends to rely upon that document to circumscribe its SEPA obligations. If the Flight Plan EIS meets the requirements of SEPA (an issue about which the ACC does not opine in these comments), the Port's reliance on that document would be entirely appropriate under SEPA. At the same time, any such reliance would be a direct and unquestionable violation of NEPA. Since the EIS at issue is supposedly being prepared pursuant to NEPA -- as well as SEPA -- the FAA may not rely upon the Flight Plan EIS.

C. Summary of the Proper Scope of the EIS

As these comments will demonstrate, the statutory and regulatory requirements of both NEPA and SEPA will not be legally fulfilled unless the EIS to be prepared jointly by the Port and the FAA:

- ▶ Broadly views the project as responding to the need for air transportation capacity improvements in the Puget Sound region through at least 2020;

^{60/} See id. In preparing nonproject EISs, an agency "shall have more flexibility . . . because there is normally less detailed information available on [a program or policy's] environmental impacts and on any subsequent project proposals." Id.

^{61/} Id. 197-11-442(2), (4).

^{62/} Id. 197-11-408(7).

^{63/} Id. 197-11-408(5).

- ▶ Integrates the ongoing cumulative and connected actions of all of the major parties -- the FAA, the Port and the PSRC -- into the entire fabric of the document;^{64/}
- ▶ Defines the need for the project based upon the same factual data and projections used in the PSRC's supplemental airport study;
- ▶ Defines the need for the project and analyzes each alternative based on the assumption that PSRC's supplemental airport study has demonstrated the need for a third runway at SEA;
- ▶ Bases the EIS analysis on the assumption that the Port has complied with all the conditions of the PSRC resolution:
 - evaluating the likelihood of the Port's meeting the conditions; and
 - assessing the affect of having met the conditions on the existing projections of need for the proposed expansion of SEA.
- ▶ Narrowly focuses the purpose of the project to meet the need;
- ▶ Includes in the discussion of connected and cumulative actions the PSRC's supplemental airport planning process, the Port's Master Plan Update, the Port's federally-approved Noise Compatibility Program; and the noise reduction conditions of the PSRC's resolution;
- ▶ Discusses and independently analyzes a broad range of regional alternatives including, but not limited to, demand/system management actions, supplemental and replacement airports, and non-air transportation alternatives; and

^{64/} It also should be noted that legislation presently is pending in the Washington State Legislature that would limit the authority of the Port to site and develop airport facilities on its own and would give the state a substantially larger role in planning, building and operating airports. See, e.g., Joseph Turner, Bigger State Role in Siting Airports on Capitol Agenda, The Morning News (Tacoma, WA), Jan. 24, 1994. In addition, the Washington State Air Transportation Commission ("AIRTRAC") -- created in 1990 for the purpose of developing a state-wide air transportation strategy -- is expected to release a report that might similarly affect the Port's authority to expand SEA.

- ▶ Examines the environmental impacts of all alternatives giving particular consideration, pursuant to SEPA, to the least environmentally harmful alternative and the imposition of mitigation requirements.^{85/}

^{85/} See, e.g., RCW 43.21C.030(1), (2)(b); id. 43.21C.060; WAC 197-11-660(1)(a)-(d).

II. PURPOSE AND NEED

Under both NEPA and SEPA, an essential element of an EIS is the statement articulating the "underlying purpose" and the "need to which the agency is responding" in the proposed action.^{66/} In this context, the terms "purpose" and "need" have different meanings. A "need" is the lack of something requisite, desirable, or useful or a condition requiring relief.^{67/} "Purpose" is defined as an object or end to be achieved.^{68/} Consequently, in the preparation of an EIS, the two terms should be interpreted as complementary, but distinct. The discussion of purpose and need in the EIS for the proposed expansion of SEA should demonstrate the relationship between the need articulated in existing planning documentation and the purpose of the proposed FAA action and FAA funding therefor.

Each element of the statement of purpose and need plays a different role. For NEPA purposes, the statements of purpose and need are of critical importance. The statement of need must be developed first, because it frames and delimits the scope of alternatives in the EIS.^{69/} Moreover, the selection of the preferred federal action also is determined by this statement.^{70/}

The statements of purpose and need have particular significance for establishing the proper scope of the EIS for the proposed expansion of SEA. This is an unusually complicated project, in part because its development is dependent upon two planning processes which have yet to be completed.

^{66/} 40 C.F.R. § 1502.13; WAC 197-11-440(4).

^{67/} Webster's Ninth New Collegiate Dictionary.

^{68/} Id.

^{69/} See Roosevelt Campobello Int'l Park Comm'n v. United States Envtl. Protection Agency, 684 F.2d 1041, 1047 (1st Cir. 1982). See also City of New York v. United States Dep't of Transp., 715 F.2d 732, 743 (2d Cir. 1983), cert. denied, 465 U.S. 1055 (1984) ("The scope of alternatives to be considered is a function of how narrowly or broadly one views the objective of an agency's proposed action."); Trout Unlimited v. Morton, 509 F.2d 1276, 1286 (9th Cir. 1974) (alternatives must be "reasonably related" to statement of purpose).

^{70/} The agency's preferred alternative also is "the alternative which the agency believes would fulfill its statutory mission and responsibilities, giving consideration to economic, environmental, technical and other factors." CEQ Questions and Answers on National Environmental Policy Act Regulations, 46 Fed. Reg. 18,026 (1981), reprinted in, Env't Rep. (BNA) 41:2701, 41:2702.

- ▶ The Port is preparing a Master Plan Update for "a comprehensive airport development plan for the airside, landside, and terminal facilities needed to keep Seattle-Tacoma International Airport operating efficiently to the year 2020 and beyond."^{71/}
- ▶ The PSRC is preparing a feasibility and planning study for the potential development of a supplemental airport site.^{72/}

The results of earlier planning processes, including the Flight Plan EIS and other regional and federal studies, clearly define the need for the present proposal in regional terms. The need is to meet the Puget Sound region's air transportation demands. Any discussion of the need for the Port's proposed expansion of SEA must build upon these studies and must explain how or why the Port and the FAA propose to attempt to meet the regional need on the SEA site.

It is important to recognize that, in addition to completed planning studies on the regional air transportation needs, the PSRC and Port studies are ongoing. Both of these planning processes have the potential to affect future decisions regarding the need for a third runway and other improvements at SEA. Moreover, the FAA must recognize that the need for the Port's proposal is contingent upon the adequate demonstration that (a) a supplemental airport would not obviate the need for a new runway at SEA, and (b) all feasible demand and system management and noise compatibility measures have been implemented at SEA.

There has been widespread public, press, and governmental discussion about the aviation capacity problems of the Puget Sound area, specifically, and of the nation, generally.^{73/} The Port has stated that

[t]he central Puget Sound region is faced with growing demand for commercial air transportation services and a limited capacity at the existing Seattle-Tacoma International Airport. . . .

. . . .

^{71/} Port of Seattle, Seattle-Tacoma International Airport, Request for Proposals, Airport Master Plan/New Runway Planning Project (1993) ("Master Plan RFP") at 1.

^{72/} New York Engineering Firm to Lead Supplemental Airport Study, Daily Journal of Commerce (Seattle, WA) Jan. 26, 1994.

^{73/} See, e.g., U. S. Dep't of Transp., Fed. Aviation Admin., 1993 System Capacity Plan (1993).

The purpose of the Flight Plan Project is to plan for the future air transportation needs of the central Puget Sound region through the year 2020 and beyond . . . Increasing demand without increasing airport capacity in the region will result in longer and longer delays for air travelers and ultimately will hurt the trade-oriented regional economy.^{74/}

While the Port's proposal for redeveloping SEA purports to be designed to address those problems, its own planning document demonstrates that the construction of an additional dependent runway at SEA will not meet projected capacity needs for 2020.^{75/} In fact, some estimates suggest that the addition of a third runway at SEA would be insufficient to meet air transportation demand in the Puget Sound region as early as 2005-2010.

In addition to a new runway at SEA, the FAA has proposed that its EIS examine projects and proposals included in an update of the SEA Master Plan, even though work on the Master Plan will proceed contemporaneously with preparation of the EIS.^{76/} According to the Port's statements, the goal of the Master Plan Update is the assembly of a "comprehensive airport development plan for the airside, landside, and terminal facilities needed to keep Seattle-Tacoma International Airport operating efficiently to the year 2020 and beyond."^{77/} An efficiently operating SEA, however, does not preclude the development of other regional transportation facilities which also may be able to respond to the identified need.

^{74/} Flight Plan EIS, at Introduction, 1-2.

^{75/} The Flight Plan EIS projects that SEA, even with a new dependent runway, would have sufficient capacity for a maximum of 41.8 million passengers and 480,000 operations annually while the Airport is expected to experience 524,000 operations and 45 million passengers by 2020. Flight Plan EIS at Table 1-1, 1-5. Moreover, the "Findings and Recommendations" of the Puget Sound Air Transportation Committee (the joint Port/PSRC organization formed to carry out the initial evaluation of airport capacity and to make recommendations about airport alternatives) declares that "by itself, a third Sea-Tac runway would not be able to meet the capacity needs of our region to the year 2020." Puget Sound Air Transportation Committee (PSATC) Findings and Recommendations, reprinted in, Flight Plan EIS, App. A at A-9.

^{76/} See EIS Public Information Packet at 1. See also Master Plan RFP at 7.

^{77/} Master Plan RFP at 1.

A. Statement of Need for the Proposed SEA Expansion Project

The statement of need should be an objective description of the reason that the project (not necessarily the federal action) is being pursued. For NEPA purposes, the underlying need must be examined without regard to the FAA's policy aims or statutory mission and especially without regard to the Port's desires.^{78/} Similarly, the NEPA statement of need must not be limited by the FAA's statutory mandate or its circumscribed role in reviewing and approving plans for airport projects.

Once the need has been defined, an EIS must include alternative methods of satisfying the need, including those reasonable alternative means which lie outside the jurisdiction of the federal agency. An adequate discussion of alternatives must respond fully to the statement of need.^{79/}

1. The FAA's Statement of Need

Under NEPA, an EIS is adequate only if it examines all reasonable alternative ways of meeting the need for the proposed project.^{80/} In order to satisfy the legal standard under NEPA, the EIS for the proposed expansion of SEA must define need

- ▶ to be the regional need for additional resources to serve demand for increased air transportation capacity at least through the year 2020;
- ▶ to be the regional need to solve the weather limitations on the existing capacity at SEA;^{81/}

^{78/} Coalition for Canyon Preservation v. Bowers, 632 F.2d 774 (9th Cir. 1980). See also Concerned About Trident v. Rumsfeld, 555 F.2d 817, 831 n.2 (D.C. Cir. 1976) (an agency should produce an EIS that observes "objective reasonableness" when evaluating the "concept" behind the action).

^{79/} 40 C.F.R. 1502.14; see also Natural Resources Defense Council v. Morton, 458 F.2d 827, 836 (D.C. Cir. 1972) (alternatives analysis must include reasonable actions to satisfy the need even if they lie beyond agency's jurisdiction).

^{80/} See Citizens Against Burlington v. Busey, 938 F.2d 190 (D.C. Cir. 1991).

^{81/} Weather conditions which allow for two arrival paths occur approximately 55 percent of the year. Flight Plan EIS at 2-17. Under all other weather conditions, because of the proximity of the two runways, only a single aircraft arrival path is permitted at SEA. See Coffman Associates, Noise Exposure Map Update for Sea-Tac International Airport (1989) ("NEM Update") at 1-4. As a result, 44

- ▶ to be based on an assumption that the Port has successfully instituted demand and system management programs at SEA, in compliance with the PSRC resolution;^{82/}
- ▶ to be based on an assumption that the PSRC will recommend against the development of a supplemental airport; and
- ▶ to be based on an evaluation of the effect of legislation under consideration by the Washington State Legislature to authorize the Department of Transportation to undertake the siting and development of a new Puget Sound regional airport.^{83/}

The FAA may not adopt the Port's narrow self-interest as a basis for developing the agency's statement of need for the EIS.^{84/} The FAA must take an objective look at the need for additional air transportation capacity in the Puget Sound region at least through 2020. The FAA's examination must assume that the Port can comply with the conditions in the PSRC's resolution, and it must assess the PSRC's study of a supplemental airport. Only then will the FAA properly be able to articulate a statement of need which reflects the agency's best assessment of its reason for considering funding development of additional aviation capacity in the region.

2. The Port's Statement of Need

In common with NEPA, SEPA places great importance on the statement of need, because the need for the project establishes the parameters of the alternatives that must be considered.^{85/} In fact, SEPA regulations "deemphasize[] the proposal in favor of the agency

percent of the year airport capacity is restricted to that provided by a single runway. See also Seattle-Tacoma International Airport Environmental Impact Statement, Public Information Packet, Public Scoping Meeting (Dec. 23, 1993) ("EIS Public Information Packet") at 4 n.2.

^{82/} PSRC Resolution A-93-03 (April 29, 1993) ("PSRC Res. A-93-03").

^{83/} See Joseph Turner, Bigger State Role in Siting Airports on Capitol Agenda, The Morning News Tribune (Tacoma, WA), Jan. 24, 1994.

^{84/} See Van Abbema v. Fornell, 807 F.2d 633, 638 (7th Cir. 1986) (NEPA requires that the discussion of alternatives be "an evaluation of alternative means to accomplish the general goal of an action . . . not an evaluation of the alternative means by which particular applicant can reach his goals.").

^{85/} See WAC 197-11-440(5)(b).

objective . . . and alternative means of attaining that objective.^{86/} The first section of an EIS prepared pursuant to SEPA is comparative and emphasizes an impartial evaluation of alternative means of pursuing the proposal's objectives.^{87/} Therefore, SEPA regulations encourage agencies to describe public proposals in terms of their objectives rather than the agency's preferred courses of action.^{88/}

The Port previously has defined the need for the proposed expansion of SEA as the need for increased regional air transportation capacity to accommodate projected growth in passenger traffic and aircraft operations through the year 2020.^{89/}

It appears that the Port may rely in the EIS upon its own estimates of the need for additional capacity at SEA. For example, the Port has previously articulated the need for a third runway based upon the following critical forecasts.

- ▶ The number of origination passengers at SEA would grow to 15.03 million passengers in 2020, based on projections of economic growth in the Pacific Northwest.^{90/}
- ▶ Connecting passengers would remain approximately one-third of total traffic.^{91/}

^{86/} Richard L. Settle, *The Washington State Environmental Policy Act: A Legal and Policy Analysis* (1991) § 14 at 146 (citing WAC 197-11-440(5), -784).

^{87/} See, e.g., WAC-197-11-440(5)(c)(i), (v).

^{88/} Id. 197-11-060(3)(a)(iii).

^{89/} See Flight Plan EIS at 1-2 to 1-5, 2-1 to 2-16.

^{90/} Id. at 2-9 to 2-11. The number of destination passengers is assumed by the Port to equal the number of originating passengers. The total number of origination and destination passengers, therefore, is forecasted to equal approximately 30 million passengers. Id. at 2-10. SEA is a small hub for several airlines including United and Alaska and their commuter carriers; its proportion of connecting to origination/destination traffic is relatively low for a hub airport.

^{91/} Id. at 2-9. In the Flight Plan EIS connecting passengers were projected to equal: (a) 27 percent of the total number of passengers using commercial air carriers at SEA; (b) 44 percent of the total number of passengers using commuter airlines; (c) 50 percent of the total number of passenger flying to or from Canadian locations; and (d) 54 percent of the total number of passengers flying to or from international locations. Id.; Peat Marwick Main & Co., Final Report, Phase I Forecasts - Flight Plan Study, Puget Sound Region 1990 at 46, Table 21 ("Phase I Forecasts").

- ▶ The number of passengers per aircraft operation would rise from 50 in 1988 to 95.7 in 2020.^{92/}
- ▶ Commuter operations would decline as a percentage of total operations from nearly 42 percent currently to 23 percent in 2020.^{93/}
- ▶ International operations would grow, but at a progressively slower rate, increasing 7 percent per year from 1988 to 1995, and 4 percent per year from 2010 to 2020.^{94/}
- ▶ General aviation operations would equal 4 percent of total annual operations by the year 2020.^{95/}

Having defined the need for the proposed project in terms of long-term air transportation capacity in the Puget Sound region, the Port is required to evaluate each alternative means of meeting that need. Complicating the Port's task, however, is the fact that the PSRC's project approval and supplemental airport planning processes are superimposed on the Port's ability to plan for, and implement, its proposed SEA expansion project.^{96/} The PSRC -- like the Port -- has defined the need as being regional in dimension and long-term in duration.

However, the PSRC resolution sets conditions which must be met before the Port may proceed with its proposed expansion project.^{97/} These conditions significantly alter the status quo with respect to the calculation of need. Thus, in addition to being regional in perspective, the Port's statement of need must be based on projections of demand/capacity and other indicators of need after the successful institution of demand and system management programs at SEA. In addition, the Port must define need based on two diametrically opposed assumptions: 1) that the PSRC will recommend against the

^{92/} Flight Plan EIS at 2-12. Consistent with industry trends that newer aircraft are larger than the older aircraft they replace, this projection was based on a forecast that, over time, the number of seats-per-aircraft-operation at SEA will increase. Phase I Forecasts at 45.

^{93/} Flight Plan EIS at 2-12.

^{94/} Id. at 2-9.

^{95/} Phase I Forecasts at 46, Table 21.

^{96/} See § I.A., supra.

^{97/} See id.

development of a supplemental airport; and 2) that the PSRC will recommend in favor of a supplemental airport. Finally, the Port's statement of need must evaluate the effect of legislation under consideration by the Washington State Legislature to authorize the state Department of Transportation to undertake the siting and development of a new Puget Sound regional airport.^{98/}

B. Data Supporting the Need for the Proposed Project

The underlying need for the Port's proposal is to satisfy projected growth in aviation activity in the Puget Sound region in light of weather-related capacity constraints at SEA.^{99/} Both the Port and the FAA have prepared studies which project the growth in future aviation activity at SEA.^{100/} These studies, however, often reach vastly different conclusions based upon forecasts of the future demand and need for additional airport capacity, as illustrated in Table 1.

In order for the EIS statement of need to be defensible, the Port and the FAA must reconcile any differing forecasts and projections which form a basis for the articulated need for the project and which provide a justification for how the proposed project satisfies that need. In the present context, because of the pending PSRC planning process, it is especially important that the FAA and the Port coordinate closely with the PSRC so that the data underlying the PSRC study is identical to that underlying the EIS. Any material differences in assumptions, forecasts or projections between the PSRC and Port/FAA studies could make either or both studies vulnerable to legal and technical attack.

Although it is likely that the Port may rely upon its own estimates of the need for additional capacity at SEA, the Port may not rest its articulation of need on second-hand data.

Because of the importance of the statement of need, the Port and the FAA must take extraordinary care in quantifying the need and in ensuring that projections of need are accurate and consistent. This means that the FAA and the Port must explain all underlying

^{98/} See supra note 64 and accompanying text.

^{99/} EIS Public Information Packet at 4 n.2. See also supra note 81.

^{100/} See, e.g., Phase I Forecasts; Puget Sound Air Transportation Committee, Phase II: Development of Alternatives (1991) App. J; Flight Plan EIS at 2-15, Table 2-4; U.S. Dep't of Transp., Fed. Aviation Admin., Aviation System Capacity Plan (1993) App. A at A-2, A-5, A-8, Tables A-2, A-3; Kurth & Company, Inc., Airline Market Potential and Operational Feasibility of Five Airport System Alternatives in the Puget Sound Region (1990).

TABLE 1 ALTERNATIVE OPERATIONAL AND PASSENGER FORECASTS FOR SEATTLE-TACOMA INTERNATIONAL AIRPORT						
Forecast	2000		2010		2020	
	Operations	Total Passengers or Enplanements	Operations	Total Passengers or Enplanements	Operations	Total Passengers or Enplanements
Flight Plan EIS (1990)	411,000	25.4 million (total)	447,000	34 million (total)	524,000	45 million (total)
SEA Update (1992)	419,000		492,000		563,000	
FAA Draft (1992)	419,000		455,000			
FAA Aviation System Capacity Plan (1991)	427,000 (FY)	12.7 million (enplan.)				
AIRTRAC Critique (1992)				25-35 million (total)		
RCAA - Gibson Economics (1993)	340,000*	9.9 million (enplan.)			452,000*	17.6 million (enplan.)

SOURCES: Flight Plan EIS at 2-14, Table 2-4 (for Flight Plan EIS, SEA Update and FAA Draft figures); U.S. Dep't of Transp., Fed. Aviation Admin., DOT/FAA/ASC-91-1, 1991-92 Aviation System Capacity Plan ("FAA Aviation System Capacity Plan"), Tables A-2 and A-3; Washington State Air Transp. Comm'n, Review of Flight Plan Demand and Capacity Analysis, Project II(b) Final Report (Oct. 31, 1992) at 36-37 ("AIRTRAC Critique"); RCAA Report, Gibson Economics, Inc., Review of Flight Plan Air Travel Demand Forecasts and Forecast Analysis Papers (Jan. 14, 1993) at 21 ("RCAA - Gibson Economics").

* These figures represent approximations. Gibson projected operational totals only for air carrier and commuter operations -- 325,000 in 2000 and 431,900 in 2020. Air carrier and commuter operations combined are estimated to represent approximately 95.6 percent of total operations at SEA in both 2000 and 2020. Flight Plan EIS at 2-14, Table 2-4.

projections, including any which have been adopted from earlier studies. The Port and the FAA must specifically

- ▶ document the reasons behind selection of one set of projections of airport activity over another set of projections;
- ▶ carefully discriminate between the use of region-wide projections and statistics and the use of projections and statistics that are particular to SEA;
- ▶ take care to use credible, relevant, up-to-date data in their projections;
- ▶ base the estimate of need on the Port's institution of a demand and system management program in compliance with the PSRC resolution; and
- ▶ also base the estimate of need on a potential PSRC recommendation for the development of a supplemental airport in the Puget Sound region.

C. The Statement of Purpose for the Proposed Project

The statement of purpose in the EIS performs a different function and follows from the statement of need. The statement of purpose should explain how the proposed project and the proposed federal action would satisfy the need. Moreover, the statement of purpose should provide the reader with the key for understanding why one alternative has been selected as the preferred alternative. The statement of purpose should provide the foundation for the economic, political, legal, and -- most importantly -- environmental constraints and criteria which led to selection of the preferred alternative. The statement of purpose, furthermore, should articulate the rationale which led to the rejection of reasonable alternative means of meeting all or part of the need.

If the need for the proposed action is to provide additional air transportation capacity to meet the long-term commercial aviation needs of the central Puget Sound region through at least 2020,^{101/} the statement of purpose should explain if, and to what extent, the Port's proposal (i.e., the addition of a third runway at SEA) would satisfy the articulated need. Thus, it should, for example, explain how the construction of a third dependent runway^{102/}

^{101/} See, e.g., EIS Public Information Packet at 1; Flight Plan EIS at 1-2.

^{102/} The Port proposes to construct a third dependent runway along the western boundary of the existing SEA property, 2,500 feet west of the existing eastern most runway. Flight Plan EIS at 3-7.

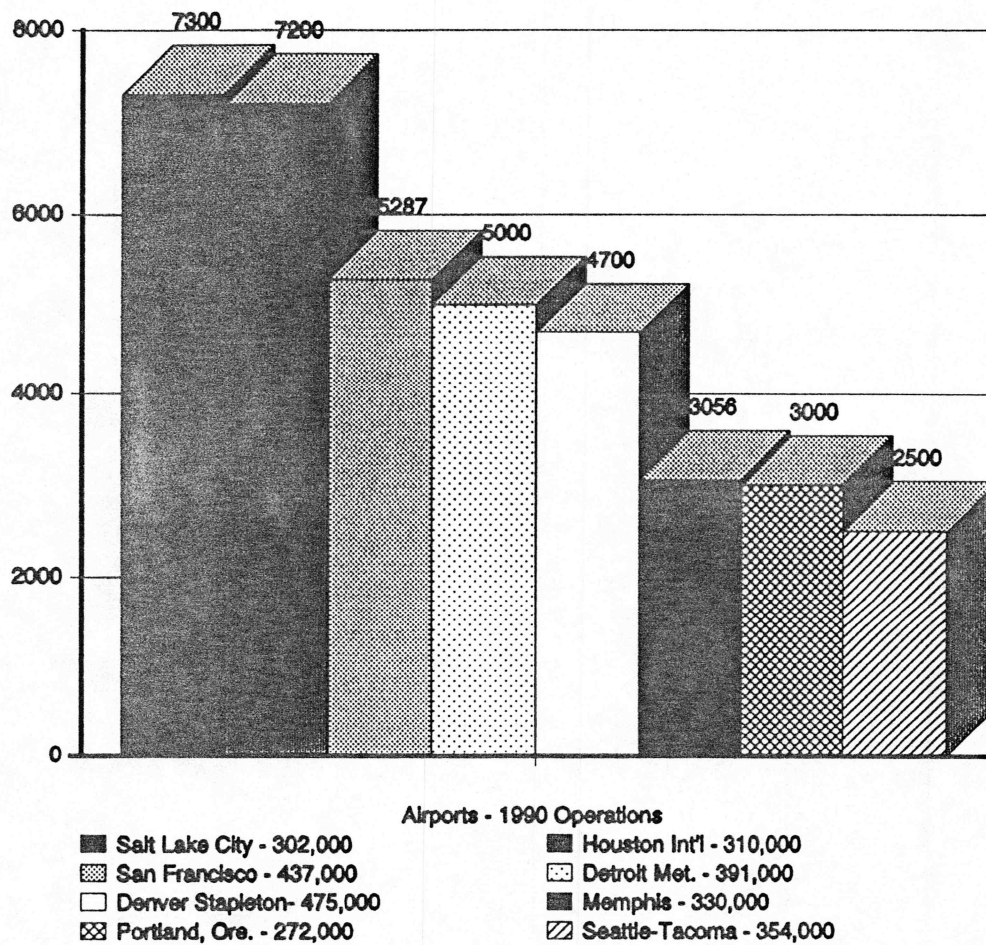
in an airport that is severely limited in size (see Figure 1)^{103/} will overcome permanent weather constraints^{104/} and be able to satisfy long-term capacity needs of the region; and how the addition of a third runway adequately can meet the needs of the projected 45 million passengers and 524,000 annual operations in 2020.^{105/}

^{103/} At 2,500 hundred acres, the land area of SEA is smaller than the acreage at each of the 100 largest airports in the United States. Most airports handling a volume of annual operations similar to SEA have land areas well above 3,000 acres.

^{104/} See supra note 81.

^{105/} Flight Plan EIS at Table 1-1, 1-5. See also Table 1. The Port's own calculations indicate that the increased capacity provided in the year 2001 by the proposed third runway would be inadequate as early as 2010, thereby providing as few as nine years of added capacity. Flight Plan EIS at 2-14, Table 2-4.

FIGURE 1
TOTAL AIRPORT ACREAGE



SOURCES: U.S. Dep't of Transp. Nat'l Flight Data Center, Public Use Landing Facilities by Acreage; U.S. Dep't of Transp., Fed. Aviation Admin., DOT/FAA/ASC-91-1, 1991-92 Aviation System Capacity

1. The FAA's Purpose for the Proposed Project

Unlike the statement of need, the statement of purpose is required to respond to the FAA's statutory mandate, the agency's regulations, and policy statements by the Administrator, Secretary of Transportation and other relevant federal officials.^{106/} Unlike the Port, the FAA has been directed by Congress to implement certain policy goals and objectives with respect to funding for airport expansions under the Airport and Airway Improvement Act.^{107/} These goals and objectives are among the policy objectives and statutory responsibilities which must guide the FAA in identifying the purpose of this project pursuant to NEPA. The Airport and Airway Improvement Act mandates that the FAA give "special emphasis" to the development of reliever airports; requires that the FAA develop integrated systems of airports in metropolitan areas; instructs the FAA to develop airports in small communities; directs that the FAA encourage competition in the commercial aviation industry; and requires that the FAA encourage the entry of air carriers into new markets.^{108/}

These statutory mandates are particularly important here because the FAA is not faced with a single proposed action. Generally, the FAA is requested to approve an airport expansion which has been propounded by an airport proprietor. Under its statutory mandate to encourage the national aviation system, the FAA's statement of purpose can be limited by its obligation to examine whether the proposed action is consistent with that objective.^{109/} In the present situation, however, the FAA is faced with potentially conflicting statutory obligations. At the same time that the Port is proceeding with its own planning, the PSRC is studying -- and may likely recommend -- development of a supplemental airport for the Puget Sound region. The FAA's statutory mandate requires that the agency examine both proposals to determine whether one, both, or neither meets the agency's obligations. Consequently, the FAA's statement of purpose for NEPA purposes must be considerably broader than generally is required for EISs on proposed airport expansions. The statement of purpose must give equal consideration to the development of a supplemental airport and the expansion of capacity at SEA as proposed by the Port. A statement of purpose which does not specifically respond to the FAA's mandate is objectionable and subject to challenge.

^{106/} For a list of relevant statutory obligations, see U.S. Dep't of Transp., Fed. Aviation Admin., Order No. 1050.1D, Policies and Procedures for Considering Environmental Impacts (1986) ("Order 1050.1D") ¶ 6.

^{107/} 49 U.S.C. app. § 2201 et seq.

^{108/} Id. § 2201. See also 49 U.S.C. § 1302.

^{109/} See Citizens Against Burlington v. Busey, 938 F.2d at 196.

2. The Port's Purpose for the Proposed Project

The statement of purpose under SEPA must explain how the proposed project -- and each reasonable alternative -- will satisfy the Port's declaration of need and the requirements of the PSRC resolution. It also must consider the legal constraints placed upon the Port by the State of Washington Growth Management Act ("GMA").^{110/} As discussed in detail below,^{111/} the GMA mandates a collaborative planning process among the Port, King County, the cities and towns in the County and the PSRC with respect to all transportation planning projects.^{112/}

This statutory mandate is particularly important in the context of the Port's discussion of the purpose of its proposed action. The Port is required not only to justify how its proposed action will meet the long-term regional transportation need that it has articulated, but also to explain how the proposed action will satisfy the requirements of the GMA. Therefore, the Port's statement of purpose must satisfy two legal obligations.

- ▶ It must justify how the Port's proposed actions will meet the long-term air transportation needs of the Puget Sound region:
 - explaining how the proposed action will overcome existing weather constraints on Airport operations;
 - explaining how the proposed action will resolve existing and projected air space management problems in the region;^{113/} and
 - explaining how the proposed project will facilitate the large projected increase in passengers and operations given the small size of the Airport property.

- ▶ The Port's statement of purpose also must explain how the Port's proposed actions will satisfy the legal requirements of the GMA.

^{110/} Chapter 36.70A RCW.

^{111/} See § V.A.2, *infra*.

^{112/} See RCW 36.70A.030(1)(b), .070, .100; *id.* 47.80.030(1)(a), (b).

^{113/} See § V.A.4, *infra*.

III. CONNECTED, CUMULATIVE AND SIMILAR ACTIONS

CEQ regulations require that the EIS consider the "total proposal" which is pending before the agency.^{114/} The regulations state that the "total proposal includes the proposed action and all other actions reasonably related to it in time and probability"^{115/} -- those actions which are connected, cumulative and similar actions to those being proposed by the sponsor.^{116/}

The FAA's and Port's scoping notice states that the EIS will be prepared for "a proposal by the Port to develop a new parallel runway and other airport facility improvements to be examined in an update to the Seattle-Tacoma International Airport . . . Master Plan."^{117/} The notice further states that this proposed development "is expected to include numerous projects including, but not be [sic] limited to":

- ▶ Construction of a new parallel runway;
- ▶ Improvements to the passenger terminal;
- ▶ Ground access system; and
- ▶ Other support facilities.^{118/}

In addition to the Port's planning process, the PSRC has undertaken a planning and feasibility study for a supplemental airport in compliance with its April 1993 resolution setting forth conditions which govern the construction of a third runway at SEA.^{119/} The PSRC study unquestionably is a connected action for NEPA purposes which must be studied in the EIS. (For SEPA purposes, the Port may not be obligated to consider the PSRC plans as a connected action because of the Joint Port-PSRC Flight Plan nonproject EIS.)

^{114/} U.S. Dep't of Transp., Fed. Aviation Admin., Order No. 5050.4A, Airport Environmental Handbook (1985) ("Order 5050.4A") ¶ 26C.

^{115/} Id.

^{116/} 40 C.F.R. § 1508.25 et seq. See also Order 5050.4A ¶ 74a.

^{117/} 59 Fed. Reg. 645 (1994) (See Exhibit 2).

^{118/} Id.

^{119/} PSRC Resolution A-93-03 (April 29, 1993) ("PSRC Res. A-93-03"). See also § I.A.1., supra.

The Port's Master Plan presumably would set forth a comprehensive plan for the expansion of SEA which would result in a significant alteration of the Airport property and the way it operates. Along with the on-Airport changes would come necessary off-Airport changes in infrastructure, including roads, water and sewage facilities, and other essential governmental services.

The EIS must examine all of the development that will be recommended in the Master Plan Update including not only the major improvements set forth in the Notice of Intent, but also the other improvements recommended and any other actions associated with the major elements of the Master Plan. Such projects include the construction of additional taxiways, the acquisition of land necessary to accommodate both the proposed construction and FAA required clear zones, the movement of an estimated 13.7 million cubic yards of fill material to provide a stable base for the proposed runway and the expansion of the network of access roads. The interrelationship of the various individual components proposed in the Master Plan Update and in the PSRC's supplemental airport plan requires that they all be considered in the EIS.

Any public works project of the magnitude of the Port's proposal also inevitably would lead to other related projects that must be addressed in the EIS regardless of whether the Port or the FAA funds or undertakes the project. For example,

- ▶ Local and state governments have to take actions, including provision of additional transportation, sewage, or water facilities as a direct result of the proposed project. The impacts of these actions must be addressed.
- ▶ Federal and state law may require that the EIS contain mandatory mitigation measures as required by substantive environmental laws. Such mitigation may include noise-related property purchases, and acquisition of wetlands, farmlands, or parklands to replace affected sites. The impacts of such acquisitions must be addressed in detail as integral, cumulative, and connected actions which are elements of the proposed federal action for purposes of NEPA.
- ▶ The EIS must examine the impacts of the Port's revised Part 150 Noise Compatibility Program and the Mediation Agreement, as explained below.^{120/}

^{120/} See § III.B, *infra*.

It also must examine the effects of the noise reduction activities undertaken by the Port in compliance with the PSRC's resolution.^{121/}

- ▶ The FAA presently is reviewing the existing Four Post Plan governing air traffic near SEA.^{122/} Alterations to the Four Post Plan must be examined in the EIS.^{123/}
- ▶ The Port has prepared plans for a number of improvements to land-side facilities at SEA including terminal improvements, construction of a south access road, and development of a large new aircraft maintenance facility in the southeastern portion of the Airport property.^{124/}
- ▶ The City of SeaTac has zoned a significant portion of its city adjacent to the Airport as an "Aviation Business Community"^{125/} which will accommodate and serve the SEA expansion project.

It is critical to recognize that the EIS will be inadequate to the extent that it focuses solely on activities which are proposed to occur on the Airport site and which are proposed to be undertaken directly by the FAA or by the Port. The FAA has an obligation under NEPA to investigate actions undertaken by other federal and non-federal actors which are reasonably proximate (in location, time, or causation) -- such as the PSRC's supplemental airport planning study -- which may be classified as cumulative, connected, or similar actions.

^{121/} PSRC Res. A-93-03. See § I.A.1, supra.

^{122/} See, e.g., Joseph Turner, FAA to Pay for Sea-Tac Flight-path Study, The Morning News (Tacoma, WA) Oct. 22, 1993; Arthur C. Gorlick, Jet Noise Study for Sea-Tac, Seattle Post Intelligencer, Oct. 13, 1993.

^{123/} See § III.C, infra.

^{124/} See Port of Seattle, South Aviation Support Area - Draft Environmental Impact Statement (Mar. 1992) ("SASA Draft EIS"); Port of Seattle, Terminal Development Program - Seattle-Tacoma International Airport (Draft) (Apr. 1, 1992) ("Terminal Development Program"); Port Commission of the Port of Seattle, Proposed Minutes of the Special Meeting (Feb. 20, 1993) at 4-5; Port Commission of the Port of Seattle, Proposed Minutes of the Regular Meeting (Feb. 23, 1993) at 8-9. See also § III.A, infra.

^{125/} See City of SeaTac Public Notice, File AMD0005-92, Determination of Significance and Request for Comments on Scope of EIS (Feb. 10, 1993).

If the scope of the EIS is limited to those actions listed in the FAA's Notice of Intent, the EIS will be impermissibly narrow in scope.^{126/}

A. Planned Improvements to Land-Side Facilities

Long-term improvements under consideration by the Port for SEA include a range of terminal and other facility expansions, construction of a south access road, and development of a large new aircraft maintenance facility in the southeastern portion of the Airport property. The scope of, and need for, the terminal and facility expansions would depend on whether SEA is expanded beyond its current aviation capacity. Facility developments have been identified for three different annual operation projections -- 380,000, 410,000 and 480,000.^{127/} At 480,000 annual operations, the Port has proposed the following land-side improvements:

- ▶ Maximum expansion of ticketing and baggage claim facilities;

^{126/} See Thomas v. Peterson, 753 F.2d 754, 758 (9th Cir. 1985); Friends of the Earth v. Coleman, 518 F.2d 323, 326 (9th Cir. 1975); Scientists' Inst. for Pub. Info. v. United States Atomic Energy Comm'n, 481 F.2d 1079, 1088-89 (D.C. Cir. 1973)

In City of Davis v. Coleman, 521 F.2d 661 (9th Cir. 1975), plaintiff brought suit to enjoin the construction of a freeway interchange being built by California with the help of federal money on the grounds that the Federal Highway Administration had failed to prepare an EIS. The facts suggested, and the court held, that the interchange was being built "to stimulate and service future industrial development" which the local governments were in the process of planning. Id. at 667. The defendants argued that the "environmental consequences of development will result from local and private action, not federal action, and that therefore they need not consider the consequences of development in determining whether an EIS is required." Id. at 677. The court disagreed:

They are wrong. It must be remembered that the main purpose of the interchange, and its only credible economic justification, is to provide access . . . for future industrial development. The argument that the principal object of a federal project does not result from federal action contains its own refutation. Thus, we hold that NEPA requires consideration of the effects of the planned development.

Id. (citation omitted) (emphasis added).

From these cases, it is clear that the FAA is obligated to examine in the EIS those actions which are functionally dependent upon the Sponsor's Airport development proposal or which would not occur but for the redevelopment of SEA.

^{127/} Terminal Development Program at ES-8, -9.

- ▶ Improvement of interline and outbound baggage system, including implementation of a unified automated system;
- ▶ Maximum expansion and refurbishment of Concourse A;
- ▶ Development of an office building and/or hotel at Concourse D;
- ▶ Maximum expansion of both satellite terminals;
- ▶ Expansion of parking;
- ▶ Relocation of international arrival facilities to Concourse A; and
- ▶ Related utilities, site preparation and facility relocation.^{128/}

The Port recently has acquired property for the proposed development of support facilities, including aircraft maintenance facilities south of the Airport.^{129/} Although there is no timetable for the completion of this project, it is likely to be implemented before the year 2000, because the proposed expansion of Concourse A under the terminal development program would require the demolition and relocation of existing aircraft maintenance facilities used by several air carriers.^{130/} The development of the maintenance facilities would require the partial relocation of Des Moines Creek and the construction of a large new industrial wastewater treatment facility to control and treat stormwater runoff.^{131/}

The Port also proposes to construct a four-lane south access road to connect the passenger terminal with either Interstate 5 or a southern extension of State Route 509.^{132/}

^{128/} Id. at ES-10. SEA's land-side acreage is extremely limited, particularly when compared with airports handling comparable numbers of aircraft operations. See § II.B, supra, Figure 1.

^{129/} See SASA Draft EIS.

^{130/} Id. at 2-3.

^{131/} Id. at 3-8 to 3-9.

^{132/} An environmental impact statement under SEPA is being prepared to examine the effects of construction of the south access road (as well as an extension southward of State Route 509), which would be coordinated and funded jointly with the Washington Department of Transportation, the City of SeaTac, the City of Des Moines, and King County. Port Commission of the Port of Seattle, Proposed Minutes of the Regular Meeting (Feb. 23, 1993) at 8-9. It appears, therefore, that construction of a south access road may be initiated within the next few years.

The EIS must examine the impacts of each of these projects to the extent that proposed land-side developments complement, are connected to, or are cumulatively related to the proposed Airport expansion.

B. Part 150 Noise Mitigation Program and the Mediation Agreement

The Port has adopted a Noise Compatibility Program in accordance with Part 150 of the FAA regulations^{133/} outlining measures designed either to mitigate the impacts of present noise or to prevent further conflict by ensuring compatible future development in noise sensitive areas.^{134/}

In 1985, the FAA approved the Part 150 Noise Compatibility Program ("Part 150 Program") for SEA.^{135/} The 1985 Part 150 Program included the following noise abatement and mitigation proposals:

- ▶ the acquisition of residential properties located within areas of high noise exposure;
- ▶ the installation of sound insulation in certain residential properties and a contribution towards sound insulation in other residential properties;
- ▶ implementation of a model transaction assistance/purchase assurance program for residences affected by high noise exposure;
- ▶ the potential rescheduling of nighttime flights;
- ▶ the elimination of flight training activities;
- ▶ the use of VOR radials to improve the ability of aircraft to use noise abatement flight tracks; and

^{133/} 14 C.F.R. Part 150.

^{134/} Port of Seattle, Sea-Tac International Airport, Part 150 Airport Noise Compatibility Planning (1985).

^{135/} Id.

- ▶ the establishment of an Airport noise abatement office.^{136/}

In 1993, the Port submitted an updated Noise Exposure Map^{137/} and amendments to its Part 150 Program.^{138/} The amendments revise the original noise compatibility programs dealing with sound insulation, transaction assistance and noise monitoring:

- ▶ All non-sound insulated homes within the 65 dB L_{dn} contour would be considered incompatible land uses eligible for a sound insulation design goal of at least 5 dB reduction and an interior noise level no more than 45 dB L_{dn} with preference given to the most noise-affected homes.^{139/}
- ▶ The Port would assume the entire cost of insulating eligible single-family residences upon application by an owner.^{140/}
- ▶ The Port would conduct a pilot project extending sound insulation to public use facilities and multi-family homes.^{141/}
- ▶ The Port would revise its transaction assistance program with a new special purchase option allowing any individual owning a home for more than five years immediately adjacent to property acquired by the Port to apply to have the Port purchase the property at fair market value. After purchase, the Port would

^{136/} Id. at Ch. 6.

^{137/} The Port submitted updated noise exposure maps for SEA to the FAA on June 11, 1992. The maps were accepted by the FAA on April 16, 1993. Seattle-Tacoma International Airport FAR Part 150 Noise Compatibility Program: 1993 Amendments ("1993 Part 150 Program Amendments") at A.3. See also 58 Fed. Reg. 25,695 (1993).

^{138/} 1993 Part 150 Program Amendments. On December 3, 1993, the FAA issued a Receipt of Noise Compatibility Program and Request for Review of the Port's amended Part 150 Program. The notice stated that agency approval or disapproval would be forthcoming by May 18, 1994. 58 Fed. Reg. 64,022 (1993).

^{139/} 1993 Part 150 Program Amendments at A.5-A.6

^{140/} Id. at A.6-A.7.

^{141/} Id. at A.10-A.14. The pilot project would include two churches, one private school, one convalescent home and one multi-family residence with more than four units. Id. at A.9.

insulate the home and offer it for resale.^{142/} Homes not directly adjacent to Port-acquired property within the transaction assistance eligibility areas may qualify for other forms of transaction assistance, if the home has been insulated through the Port's insulation program.

- ▶ The Port would evaluate the Airport's Noise Monitoring System^{143/} to determine whether it should be expanded, modified, or completely replaced.^{144/}

The 1993 Part 150 Program Amendments are intended principally to incorporate components of the 1990 Mediation Agreement among the Port, Airport users, the FAA, local governments and community groups.^{145/} The Mediation Agreement has several components, which collectively are designed to result, by the year 2001, in an overall noise reduction of approximately 50 percent to communities near SEA when compared to 1990 average noise exposure levels.^{146/}

Included among the components of the Mediation Agreement are:

- ▶ a noise budget for all commercial aircraft operations, measured using average noise energy levels;^{147/}

^{142/} Id. at A.19-A.20. The special purchase option would be available only one time for each eligible property. Therefore, a new owner purchasing a home from the Port would not qualify for another special purchase option. Id. at A.19.

^{143/} Id. at A.23.

^{144/} Id. at A.23-A.24. The evaluation would not be initiated until the flight track monitoring system is in operation, fully tested and accepted. Id.

^{145/} 1993 Part 150 Program Amendments. See also Mediation Committee, Final Package of Mediated Noise Abatement Actions for Seattle-Tacoma International Airport (1990) (the "Mediation Agreement").

^{146/} Mediation Agreement at 2.

^{147/} Id. App. A. The noise budget, which became effective January 1, 1991, requires a reduction in SEA's maximum airport noise exposure level from 74.53 dB in the 1989 base period to 71.24 dB in 2001. This reduction is to be achieved through a progressive reduction in the permissible noise each of the commercial carriers serving SEA may generate. Any airline exceeding its annual noise allocation is subject to up to a \$1 million fine. The noise budget also contains an incentive for air carriers to use increasing percentages of stage 3 aircraft at SEA. If a carrier's operations at SEA exceed the stage 3 targets identified in the noise budget, that carrier is allowed to exceed its noise

- ▶ a nighttime phaseout of stage 2 aircraft operations;^{148/}
- ▶ an enhanced noise insulation program;^{149/}
- ▶ preferential flight tracks, supported by improved technology and FAA procedures;^{150/}
- ▶ ground noise controls, including penalties for violations of ground runup restrictions and a prohibition on the use of powerback procedures for gate departures;^{151/}

allocation under the budget. The stage 3 targets range from 70 percent stage 3 operations at SEA in 1991 to 95 percent stage 3 in 1997. Id.; see also NEM Update App. A.

^{148/} The nighttime phaseout, which became effective October 1, 1990, is designed to occur over the course of several years:

- . effective October 1, 1992, stage 2 operations are prohibited between midnight and 6 a.m.;
- . effective October 1, 1993, stage 2 operations are prohibited between 11 p.m. and 6:30 a.m.;
- . effective October 1, 1994, stage 2 operations will be prohibited between 10:30 p.m. and 6:45 a.m.; and
- . effective October 1, 1995 (and thereafter), stage 2 operations will be prohibited between 10:00 p.m. and 7:00 a.m.

Mediation Agreement App. B at 3.

^{149/} The noise insulation program called for in the Mediation Agreement includes doubling the rate at which the Port will insulate residences. Id. at 5. In accordance with the Mediation Agreement, the Port has requested FAA approval of federal funds for soundproofing public buildings other than public schools and hospitals (e.g., libraries, private schools, churches, auditoriums, etc.) Id.

^{150/} The flight tracks preferred under the Mediation Agreement are designed to moderate noise impacts of aircraft overflights on residential communities. Id. at 7, 9. These flight tracks call for the FAA to route aircraft over Elliott Bay and Puget Sound to the extent feasible. Id. To facilitate improved use of noise abatement flight tracks, the Port also committed to seeking FAA support for the installation of a microwave landing system at the Airport. Id. at 8.

^{151/} The Mediation Agreement also requires that a hush house or similar facility be constructed at SEA if a new aircraft maintenance facility is built at the airport. Id. at 10. See § III.B, supra.

- ▶ a state-of-the-art flight track and noise monitoring system;^{152/} and
- ▶ creation of a Noise Abatement Committee.^{153/}

The Port's 1993 Part 150 Program Amendments and the Mediation Agreement specify a number of measures that are designed to abate or mitigate Airport noise. Consequently, the Mediation Agreement and the 1993 Part 150 Program Amendments unquestionably are cumulative actions under NEPA, and, to the extent that they complement the proposed Airport expansion, the EIS must examine the impacts of the 1993 Part 150 Program Amendments and the Mediation Agreement.

C. The Four Post Plan

The so-called "Four-Post Plan" governs air traffic routes and procedures for aircraft using Seattle-area airspace.^{154/} First proposed by the FAA in 1989, the Four Post Plan revised air traffic control procedures for SEA and high altitude aircraft routes used in the Pacific Northwest.^{155/} The FAA's primary rationale for adopting the Four-Post Plan appears to have been to increase airport capacity at SEA and to provide its air traffic controllers with two separate arrival corridors northwest and northeast of the Airport. In its environmental assessment of the Plan, the FAA asserted that the then-existing air traffic control procedures for SEA^{156/} limited airport capacity when the Airport was in a south flow configuration; operations were limited to 42 aircraft arrivals per hour in favorable weather conditions, versus a theoretical maximum of 56 arrivals per hour.^{157/}

^{152/} See Mediation Agreement at 11-13.

^{153/} Id. at 15.

^{154/} See Temple H. Johnson, Jr., Manager, Air Traffic Div., Northwest Mountain Region, Fed. Aviation Admin., Decision and Order (Apr. 2, 1990).

^{155/} U.S. Dep't of Transp., Fed. Aviation Admin., Final Environmental Assessment, Proposed Changes to Air Traffic Arrival and Departure Routes at Seattle-Tacoma International Airport (1990) ("Four Post Plan").

^{156/} Air traffic control procedures for SEA at the time specified that when the Airport was in a south flow configuration, all aircraft enroute to SEA were to be routed over Puget Sound and Elliott Bay (northwest of SEA and downtown Seattle) and were to follow a single approach path to the Airport. This procedure was intended to preclude arrivals from overflying residential areas north and east of downtown Seattle. Id. at 9. Aircraft arrivals when the Airport was in a north flow configuration were not similarly constrained. Id.

^{157/} Id.

Controversial from its inception,^{158/} the Four-Post Plan continues to arouse opposition. The PSRC resolution calls upon the FAA to consider modifying the Four-Post Plan to reduce noise impacts, and the related impacts on regional military air traffic.^{159/} In response to requests by Congressman Mike Kreidler, the FAA has undertaken a review of the Four-Post Plan.^{160/}

The Four-Post Plan is a significant factor in determining SEA's operational capacity and, therefore, the Plan and any proposed or adopted modifications to the Plan must be examined as part of the EIS for the proposed expansion of SEA.

D. The Washington State Air Transportation Commission (AIRTRAC)

The Washington Legislature created the Air Transportation Commission ("AIRTRAC") in 1990 for the purpose of developing a state-wide air transportation strategy through consultation with private business as well as with local and regional governments. In April 1992, the Legislature passed S.H.B. No. 2609^{161/} which delegated additional responsibilities to AIRTRAC and prohibited the initiation of new runway construction at SEA prior to December 1, 1994.^{162/} S.H.B. 2609 instructed AIRTRAC to

- ▶ assess the statewide implications of local and regional air transportation planning;
- ▶ recommend specific goals for air transportation;

^{158/} Following approval of the Four-Post Plan, a lawsuit challenging its adoption by the FAA was filed in the United States Court of Appeals for the Ninth Circuit. See Seattle Community Council Fed'n v. FAA, 961 F.2d 829 (9th Cir. 1992). The suit sought to require the FAA to prepare a full EIS prior to implementing the Plan, and to rely on noise measurements other than the L_{dn} contour of 65 dB to evaluate the impacts of the Plan. Id. at 833. The federal appellate court held that the completion of an environmental assessment satisfied the FAA's obligations under NEPA. Id.

^{159/} PSRC Res. A-93-03.

^{160/} See, e.g., Joseph Turner, FAA to Pay for Sea-Tac Flight Path Study, The Morning News (Tacoma, WA), Oct. 22, 1993; Arthur C. Gorlick, Jet Noise Study for Sea-Tac, Seattle Post Intelligencer, Oct. 23, 1993.

^{161/} Wash. Legis. Serv. ch. 190, S.H.B. No. 2609 (1992).

^{162/} Id. § 2 (codified at RCW 53.08.350).

- ▶ define the relationship between air transportation and environmental and economic policy goals;
- ▶ formulate statewide policy recommendations; and
- ▶ coordinate air transportation with statewide transportation system planning.^{163/}

A principal purpose for AIRTRAC's involvement in the development of statewide air transportation policy has been to ensure that decisions made by the Port and the PSRC are justified and will not result in a flawed solution to the region's and the state's air transportation needs. AIRTRAC was directed to prepare two reports to the Legislature's Transportation Committee including an independent analysis of the Puget Sound Air Transportation Committee's^{164/} forecasts for air transportation demand and capacity in the Puget Sound area, as well as evaluations of the ability of high speed rail, intermodal and air transportation options to satisfy Washington's long-term transportation needs.^{165/}

AIRTRAC issued its final report concerning statewide air transportation policies to the Legislature in November 1993.^{166/} The recommendations are intended to form the basis for any future legislative actions concerning the Port's authority to undertake its Airport development plan. The Legislature's reaction to the AIRTRAC report, therefore, could fundamentally affect the Port's ability to proceed with the implementation of its plans.^{167/} For example, as a result of the AIRTRAC report, legislation presently is pending in the

^{163/} Id. § 1.

^{164/} The Puget Sound Air Transportation Committee was established by the Port and the Puget Sound Council of Governments (the forerunner organization to the PSRC) in 1988 to evaluate air transportation capacity and to recommend airport capacity alternatives. Port of Seattle and Puget Sound Council of Governments Interagency Agreement for Long Term Air Carrier System Planning (May 23, 1989) § 2.

^{165/} S.H.B. No. 2609 §§ 2, 3.

^{166/} Washington State Air Transp. Comm'n., Final Report and Policy Recommendations to the Legislative Transportation Committee (Nov. 1993).

^{167/} State and regional agencies potentially have jurisdiction over construction of a third runway at SEA. These include the Washington Department of Ecology, Department of Transportation, Department of Community Development, Office of Archaeology and Historic Preservation, and the Puget Sound Air Pollution Control Agency. Pursuant to their statutory authorities, these agencies are required to protect, among other things, local, regional and state air and water quality, fish and wildlife habitats, historic and archaeological sites, and wetlands. Consequently, they could impose restrictions on the Port's ability to affect those resources.

Legislature that would limit the authority of the Port to site and develop airport facilities on its own and retain for the state a substantially larger role in planning, building and operating airports.^{168/}

Consequently, consideration of state legislative actions and AIRTRAC's recommendations must be included in the EIS as cumulative and connected actions.

E. City of SeaTac Zoning

The City of SeaTac has zoned a significant portion of its city adjacent to the Airport as an "Aviation Business Community."^{169/} The high densities envisioned in this zoning category would have significant cumulative impacts upon traffic congestion, air pollution, population and employment densities and public services and must be considered in the EIS.

So, too, must the designation of SeaTac as a "urban growth area" under the Growth Management Act.^{170/} As an urban growth area, SeaTac can expect a significant population increase in the coming decades. An expanding population in a community literally surrounding the Airport means that additional residential areas would be exposed to higher noise levels. Moreover, the entire area is likely to experience additional traffic congestion and air and water pollution. The EIS must examine the City of SeaTac's decisions and likely development actions as connected and cumulative actions.

^{168/} See Joseph Turner, Bigger State Role in Siting Airports on Capitol Agenda, The Morning News (Tacoma, WA), Jan. 24, 1994.

^{169/} See City of SeaTac Public Notice, File AMD0005-92, Determination of Significance and Request for Comments on Scope of EIS (Feb. 10, 1993).

^{170/} RCW 36.70A.110; WAC 365-195-335. Designated by the county, urban growth areas are areas within which urban growth is encouraged. RCW 36.70A.110(1). "[T]he urban growth area should represent the physical area within which [that city's] vision of urban development can be realized over the next twenty years. WAC 365-195-335(3)(b).

IV. ANALYSIS OF ALTERNATIVES MANDATED BY NEPA AND SEPA**A. Scope of Alternatives Which Must Be Addressed Under NEPA**

NEPA directs federal agencies to examine all environmental impacts of proposed projects, to develop and explore all reasonable alternatives to such actions, and to analyze the potential environmental impacts of those alternatives.^{171/} Federal courts have emphasized that NEPA's purposes "are frustrated when consideration of alternatives and collateral effects is unreasonably constricted."^{172/} NEPA further directs federal agencies to "study, develop, and describe appropriate alternatives to recommended courses of action in any proposal which involves unresolved conflicts concerning alternative uses of available resources."^{173/}

[W]here . . . the objective of a major federal project can be achieved in one of two or more ways that will have differing impacts on the environment, the responsible [agency] is required to study, develop and describe each alternative for appropriate consideration.^{174/}

As the United States Court of Appeals for the Fifth Circuit has stated, NEPA

was intended to emphasize an important part of NEPA's theme that all change was not progress and to insist that no major federal project should be undertaken without intense consideration of other more ecologically sound courses of action, including shelving the entire project, or of accomplishing the same result by entirely different means. . . . [T]he District of Columbia Circuit [has] recognized that this section did not intend to limit an agency to consideration of only those alternatives that it could adopt or put into effect. We agree. The imperative directive is a thorough consideration of all appropriate methods of accomplishing the aim of the action, including those

^{171/} 42 U.S.C. § 4332(2)(C)(iii).

^{172/} Greene County Planning Bd. v. Federal Power Comm'n., 559 F.2d 1227, 1232 (2d. Cir. 1976), cert. denied, 434 U.S. 1086 (1978).

^{173/} 42 U.S.C. § 4332(2)(E).

^{174/} Trinity Episcopal Sch. v. Romney, 523 F.2d 88, 93 (2d Cir. 1975).

without the area of the agency's expertise and regulatory control as well as those within it.^{175/}

Thus, the analysis of alternatives "is the heart of the environmental impact statement."^{176/} In order to satisfy these demanding requirements the law requires that the EIS examine fully a number of reasonable and practical alternatives to the Port's plan for the proposed expansion of SEA. These alternatives must reflect the regional need for additional long-term air transportation capacity at least through 2020, and should include detailed consideration of the following:

- ▶ the construction of a new, replacement, air carrier airport;
- ▶ the accelerated development of supplemental or reliever airport facilities for either commercial or non-air carrier use;
- ▶ the institution of system and demand management programs at SEA;
- ▶ the imposition of operational restrictions at SEA -- including the diversion of commuter and/or general aviation traffic to other airports -- to limit growth of demand;
- ▶ different runway locations;
- ▶ different runway lengths and uses;
- ▶ alternative transportation modes, such as high speed rail; and
- ▶ the no action alternative.

It is critical that the EIS explore alternatives to the proposed redevelopment at SEA not only to satisfy the legal requirements of NEPA and other substantive environmental laws, but also to educate the public and the applicable government agencies about the range of actions which are available to satisfy the stated purpose and need and the costs and benefits associated with these options.

^{175/} Environmental Defense Fund, Inc. v. United States Army Corps of Eng'rs, 492 F.2d 1123, 1135 (5th Cir. 1974).

^{176/} 40 C.F.R. § 1502.14.

The importance of the alternatives analysis is heightened by the requirements of substantive federal and state environmental laws which prohibit federal actions which cause specific types of environmental damage if alternatives exist to the federal action.^{177/} In examining possible alternatives, an agency may not eliminate alternatives simply because they do not achieve all of the articulated needs for the proposed project or because the agency does not have the authority to implement them.^{178/}

Under NEPA, an alternative is reasonable if it is "practical and feasible from a technical and economical standpoint."^{179/} An alternative, therefore, is reasonable if it meets at least

^{177/} Section 4(f) of the Department of Transportation Act provides that the Secretary of Transportation can not approve any transportation project, including an airport project, which requires the "use of publicly owned land of a public park, recreation area, or wildlife and waterfowl refuge of national, State, or local significance, or land of a historic site of national, State or local significance [in the absence of findings that] (1) there is no prudent and feasible alternative to using that land; and (2) the program or project, includes all possible planning to minimize harm to the park, recreation area, wildlife and waterfowl refuge, or historic site resulting from the use." 49 U.S.C. § 303(c).

The Airport and Airway Improvement Act states that the Secretary:

[W]ith regard to any project included in a project grant application involving . . . runway location which may have a significant impact on natural resources including, but not limited to, fish and wildlife, natural, scenic, and recreation assets, water and air quality, and other factors affecting the environment, . . . shall authorize no such project found to have significant adverse effect unless the Secretary shall render a finding, in writing, following a full and complete review, which shall be a matter of public record, that no feasible and prudent alternative exists and that all reasonable steps have been taken to minimize such adverse effect.

49 U.S.C. app. § 2208(b)(5) (emphasis added).

These statutes, as well as the Clean Water Act, 33 U.S.C. § 1344, require vigorous examination and scrutiny of alternatives to the proposed project which is substantially more probing than the examination required by NEPA alone. FAA regulations require that the EIS comply not only with the strictures of NEPA but also with the requirements of numerous other federal environmental laws.

^{178/} See Town of Matthews v. United States Dep't of Transp., 527 F. Supp. 1055, 1057 (W.D.N.C. 1981); Save the Niobrara River Ass'n v. Andrus, 483 F. Supp. 844, 861 (D. Neb. 1977); Rankin v. Coleman, 394 F. Supp. 647, 659 (E.D.N.C. 1975).

^{179/} CEQ Questions and Answers on National Environmental Policy Act Regulations, 46 Fed. Reg. 18,026 (1981), reprinted in, Env't Rep. (BNA) 41:2701.

some of the needs that the proposed action is intended to serve.^{180/} The United States Court of Appeals for the Seventh Circuit stated this principle succinctly by explaining that "the evaluation of 'alternatives' mandated by NEPA is to be an evaluation of alternative means to accomplish the *general* goal of an action; it is not an evaluation of the alternative means by which a particular applicant [or sponsor] can reach his goals."^{181/} Consequently, for NEPA purposes, the Port's goals are not relevant to the alternatives analysis in the EIS. The FAA can not limit the scope of alternatives to those which the Port desires to -- or has the authority to -- implement.

B. Scope of Alternatives Which Must Be Addressed Under SEPA

Similar to NEPA, SEPA requires that an EIS describe and analyze appropriate and reasonable alternatives to the proposed action.^{182/} The alternatives analyzed need not be exhaustive but should be representative of the range of choices^{183/} to permit intelligent comparative evaluation.^{184/} Such alternatives "shall include actions that could feasibly attain or approximate a proposal's objectives, but at a lower environmental cost or decreased level of environmental degradation."^{185/} Alternatives are considered reasonable if they would attain or approximate the proposal's objectives with less environmental harm even though they would do so outside the authority of an agency with jurisdiction over the proposed project.^{186/}

The discussion of alternatives under SEPA requires that the Port present a comparison of the environmental impacts of reasonable alternatives -- including no action and delayed action alternatives -- and to "[d]evote sufficient analysis to each reasonable

^{180/} Environmental Defense Fund, Inc., 492 F.2d 1123; Joseph v. Adams, 467 F. Supp. 141 (E.D. Mich. 1978).

^{181/} Van Abbema v. Fornell, 807 F.2d 633, 638 (7th Cir. 1986).

^{182/} See RCW 43.21C.030(2)(e); WAC 197-11-440(5).

^{183/} See Toandos Peninsula Ass'n v. Jefferson County, 648 P.2d 448 (1982). See also WAC 197-440(5)(b)(i).

^{184/} WAC 197-11-440(5)(c)(v).

^{185/} Id. 197-11-440(5)(b).

^{186/} Rodgers, The Washington Environmental Policy Act, 60 Wash. L. Rev. 33, 56-57 (1984).

alternative to permit a comparative evaluation. . . . Particular attention should be given to the possibility of foreclosing future options by implementing the proposal."^{187/}

Although NEPA requires the examination of a wider range of alternatives than SEPA,^{188/} the discussion of alternatives under SEPA involves substantive as well as procedural dimensions.

A [state or local] agency which, in response to [SEPA requirements], fails to consider, clearly feasible, more environmentally-benign sites for, say, an airport, shopping center, or major industrial installation just because the proposed site is suitably zoned will have a difficult time convincing a court that the omitted alternatives were not reasonable. SEPA's mission, after all, is to minimize environmental degradation. To allow a[n agency] which needs an airport, shopping center, or new industry to ignore sites other than the one . . . proposed is to invite unnecessary environmental harm.^{189/}

Under SEPA, reasonable alternatives also are considered to be "mitigating measures." Mitigating measures may avoid an impact by not acting;^{190/} may minimize an impact by reducing the scale or modifying the design of the action;^{191/} rectify an impact by repairing, rehabilitating, or restoring the affected environment;^{192/} progressively reduce or eliminate an impact over time by preservation and maintenance operations;^{193/} compensate for an impact by replacement or enhancement actions;^{194/} and monitor an impact in order to take

^{187/} WAC 197-11-440(5)(c)(v)-(vii).

^{188/} See, e.g., Methow Valley Citizens Council v. Regional Forester, 883 F.2d 810 (9th Cir. 1987) (EIS held inadequate for failure to analyze the expansion of existing ski areas as alternative to building new one); Friends of the Earth v. Hall, 693 F. Supp. 904 (W.D. Wash. 1988) (EIS held inadequate for failure to analyze alternative means of dredge spoil disposal).

^{189/} Richard L. Settle, The Washington State Environmental Policy Act: A Legal and Policy Analysis § 14(b)(ii), at 182-83 (1987) (citation omitted).

^{190/} WAC 197-11-768(1).

^{191/} Id. 197-11-768(2).

^{192/} Id. 197-11-768(3).

^{193/} Id. 197-11-768(4).

^{194/} Id. 197-11-768(5).

appropriate corrective action.^{195/} "Since in the SEPA Rules, 'mitigation' is avoidance and amelioration of environmental harm and a 'reasonable alternative' is an action which would attain or approximate a proposal's objective with less environmental harm, reasonable alternatives are mitigating measures. For the most part the two terms are functionally interchangeable."^{196/}

The preparation of a nonproject (or programmatic) EIS, along with its discussion of alternatives at an abstract level, is not a substitute for adequate and detailed alternatives analysis in a site-specific EIS. In accordance with the purpose of a nonproject EIS, the discussion of alternatives in the Flight Plan EIS only examined alternatives at a very general level.^{197/} Moreover, the Flight Plan EIS did not even attempt a site-specific analysis or serious comparison of the environmental effects of each alternative presented. Throughout the discussion of affected environment, significant impacts and mitigation measures, the document warns that an evaluation of surface transportation, local land use impacts near airports, regional airport siting questions, and specific impacts on the natural environment is deferred and "will be examined in detail in subsequent project-level environmental impact statements (EISs)."^{198/}

SEPA rules also provide that preparation of a nonproject EIS allows a project sponsor considerably greater latitude with respect to the subsequent evaluation of alternatives in a project-specific EIS:^{199/} "When a project is then proposed that is consistent with the approved nonproject action, the EIS on such a project shall focus on the impacts and alternatives . . . specific to the subsequent project and not analyzed in the nonproject EIS."^{200/} Thus, because SEPA permits a sponsor preparing a nonproject EIS to focus only on site-specific alternatives in the subsequent project EIS, the Port is permitted under SEPA

^{195/} Id. 197-11-768(6).

^{196/} Richard L. Settle, supra note 189 at 184-1 to 185.

^{197/} See Puget Sound Regional Council and Port of Seattle, The Flight Plan Project, Final Environmental Impact Statement (1992) ("Flight Plan EIS") at 3-1 to 3-30. "System alternatives are generic in nature . . . Site-specific studies to be conducted later will address the more-specific questions of 'Where should we implement the chosen system alternative and how will we make it work?'" Id. at 3-1.

^{198/} Id. at 4-95. See also id. at 4-48, 4-56, 4-79.

^{199/} WAC 197-11-443(2).

^{200/} Id.

to prepare an EIS which examines primarily on-Airport alternatives. Compliance with NEPA requires a much broader consideration of reasonable alternatives.

C. The EIS Must Satisfy Both SEPA and NEPA

The FAA's Notice of Intent to Prepare an EIS^{201/} is based upon the Port's SEPA obligations and not the FAA's NEPA obligations; it suggests an impermissibly narrow range of alternatives which the FAA and the Port propose to examine.

The range of new parallel runway options that may be considered in the EIS are anticipated to be in the immediate vicinity of the existing airfield at Sea-Tac Airport. . . . [O]ther airport developments that may be considered in the EIS would be located on or in the immediate vicinity of the existing Sea-Tac Airport property. . . . Major actions or concepts to be discussed in the draft EIS include the no action alternative and other reasonable alternatives meeting the purpose and need. Such alternatives are expected to include several options related to runway lengths, separations and threshold stagger.^{202/}

Because of the FAA's independent duty to ensure that its EIS examines all reasonable alternatives to the Port's proposed projects, a proper EIS for this project must analyze a much wider range of on- and off-Airport alternatives. The FAA can not rely on the Flight Plan EIS to narrow the scope of alternatives without first conducting its own independent analysis of the range of regional alternatives, and verifying any conclusions contained in the Flight Plan EIS.^{203/}

In addition to NEPA's statutory requirements for the analysis of all reasonable alternatives,^{204/} the PSRC resolution^{205/} would require the FAA, at a minimum, to examine supplemental airport and demand/system management alternatives. In fact, the terms of the PSRC resolution mandate that the alternatives analysis in the EIS be based upon the assumption that the Port successfully has instituted demand and system management

^{201/} 59 Fed. Reg. 645 (1994) (See Exhibit 2).

^{202/} Id. (emphasis added).

^{203/} 40 C.F.R. § 1506.5(a).

^{204/} 42 U.S.C. § 4332(2)(C)(iii).

^{205/} PSRC Resolution A-93-03 (Apr. 29, 1993) ("PSRC Res. A-93-03").

programs at SEA and that the PSRC has determined that a supplemental airport can not eliminate the need for a third runway at SEA.^{206/}

D. Categories of Alternatives to Be Examined

The alternatives which the EIS must examine fall into several broad categories. For each category, the EIS must

- ▶ analyze any reasonable alternatives;
- ▶ quantitatively and qualitatively compare the alternatives to the FAA's and Port's proposed actions;
- ▶ explain the FAA's basis for rejection of each alternative; and
- ▶ disclose the assumptions and projections which underlie each decision.

Each category of alternatives is discussed below.

1. Development of A New Air Carrier Airport

The EIS must examine the alternative of constructing a replacement airport capable of serving regional commercial air transportation needs.

Air transportation plays a major role in the economic growth and development of the Puget Sound region. Demand for air transportation has increased in the recent past, and continued increases in demand are forecast for the future.^{207/} In addition, Seattle and Washington state are well-positioned geographically to take advantage of the considerable trade and tourism opportunities offered by Pacific Rim countries. However, the region's long-term economic prospects are impaired by the limited capacity of SEA, even assuming a new runway is constructed. The small land area of the Airport means that, even with the addition of a third runway, SEA would be inadequate to contain the airport facilities (e.g., long-term demand for passenger terminal space, as well as for on-site parking and cargo facilities) necessary to accommodate forecasted passenger and cargo volumes. Failure to identify an

^{206/} Id.

^{207/} The Flight Plan EIS based its analysis of alternatives on a projected demand level of 45 million annual enplaned passengers and 524,000 operations by 2020. Flight Plan EIS at 1-5, Table 1-1. The FAA must explain the ability of SEA to accommodate the projected growth and the feasibility of a new airport to replace SEA as the principal air carrier facility in the region.

alternative airport site, or to implement a multiple airport system that includes a large, primarily international airport, could prevent Washington state from realizing the vast trade opportunities that are available.

Providing for all the forecasted demand by increasing the capacity of SEA, as the Port has proposed, is not the only option -- nor necessarily the best one -- for meeting regional demand for air transportation capacity. One reasonable alternative would be construction of a replacement airport to serve the increasing demand in a more efficient manner.

Many cities with air carrier hubs presently are considering the construction of a new (or additional) airport to serve regional needs because of physical constraints which limit growth at an existing facility.^{208/} The FAA must take notice of such efforts nationwide and of the practicality of constructing a new airport to serve regional demand in the Puget Sound area. There is no question that a new airport is feasible and prudent as studies for Denver and Chicago have demonstrated.

In preparing the EIS, the FAA can not rely upon the Port's studies on the feasibility of constructing a new air carrier airport. In fact, in this instance, the PSRC also will be evaluating the feasibility of constructing a new or supplemental airport. Because of their interdependence, the PSRC study and the joint FAA/Port EIS should be closely coordinated to assure each study relies on similar assumptions. For example, consultants for the FAA/Port EIS and for the PSRC study should be encouraged to share information and use similar demand forecasts. If the PSRC concludes that a new airport would relieve the need for a third runway at SEA, then the FAA/Port EIS should reflect that conclusion.

Not only must there be a serious and independent discussion of the new airport alternative, but the analysis also must include an examination of sites outside of King County. The Port's legal authority to construct an airport in other counties is irrelevant to the evaluation of this alternative pursuant to NEPA.^{209/} While the Port's desire to confine the SEPA analysis of alternatives to activities and locations over which it has jurisdiction may be understandable and legally defensible from its perspective, the FAA's mandate under NEPA requires a broader, more searching inquiry and an examination of alternatives that do not

^{208/} Denver will close Stapleton International Airport and initiate service at a new replacement airport in two weeks. Other cities, such as Minneapolis, Dallas, Boston and Chicago are engaged in studies to determine whether construction of an additional or replacement airport is practical.

^{209/} CEQ Questions and Answers on National Environmental Policy Act Regulations, Env't Rep. 41:2701.

necessarily meet the Port's objectives.^{210/} NEPA requires that the EIS consider all alternatives which are reasonable in the context of the national airspace system.

2. Construction or Use of Reliever Airports

In addition to evaluating construction of an entirely new replacement airport, the EIS must examine the alternative of developing one or more airports in the region to serve as supplemental or reliever airports to SEA. In fact, the PSRC resolution requires that there be an independent study of a supplemental airport site before the Port may begin construction of its proposed third runway at SEA.^{211/} If the PSRC planning study demonstrates that a supplemental airport is feasible and can eliminate the need for the third runway, then the Port may not proceed with its proposed expansion project.^{212/} Further, the PSRC resolution requires that the Port institute a demand management program at SEA before any expansion of SEA might be approved.^{213/} The diversion of a portion of its operations to supplemental or reliever airports would be an important part of such a demand management program. Therefore, the consideration of a supplemental or reliever airport is a reasonable alternative which must be considered in the EIS.

The FAA has stated that

[r]eliever airports play an important role in easing capacity problems at primary airports by spreading aircraft operations over additional airports near these primary airports. In addition, since reliever airports are used mainly by smaller general aviation aircraft, they tend to segregate airport activity by aircraft size. . . . The segregation of aircraft operations by size increases effective capacity because required time and distance separations are less between planes of similar size.^{214/}

The diversion of commuter operations to one or more supplemental airports makes particular sense with respect to SEA. Since 1986, the number of operations by commuter

^{210/} Id.

^{211/} PSRC Res. A-93-03.

^{212/} Id.

^{213/} Id.

^{214/} U.S. Dep't of Transp., Fed. Aviation Admin., Airport Capacity Enhancement Plan (1988) at 2.7.

aircraft at SEA has increased dramatically, as shown in Figure 2.^{215/} Commuter operations also have increased significantly as a percentage of total aircraft operations at the Airport, and have stabilized in recent years at the relatively high ratio of about 40 percent of total operations. (See Figure 3.) The Port's own studies recognize that much of the current demand for additional capacity at SEA results from the high volume of commuter operations.^{216/}

While commuter operations now represent approximately 40 percent of all aircraft operations at SEA, commuter aircraft provide service to only a small percentage of all passengers using the Airport. (See Figure 4.) Therefore, commuter operations are an inefficient use of limited Airport capacity. Since most of the passengers using commuter aircraft -- approximately 56 percent -- are origination and destination passengers (see Figure 5),^{217/} half of all commuter operations at SEA could be eliminated by diverting origination and destination commuters to a supplemental airport. The diversion of commuter operations would create additional capacity at SEA and would relieve capacity constraints during peak hours. Moreover, by diverting origination and destination commuter passengers to other airports, SEA could serve passenger jet aircraft and connecting commuter operations more efficiently.

A number of existing airport facilities both north and south of SEA presently are equipped to handle commuter aircraft.^{218/} In addition, TAMS Consultants is conducting a study for the PSRC which will, among other things, seek to identify a suitable site or sites within the region for the location of a supplemental airport.^{219/}

^{215/} See Flight Plan EIS at 2-13.

^{216/} See, e.g., *id.* at 2-9, 2-14. Although the Port estimates that the proportion of commuter operations will level off and decline slightly by 2020, the Update of Passenger and Operations Forecasts for Seattle-Tacoma International Airport, prepared by P & D Aviation in 1992, anticipates a steady increase in commuter operations. *Id.* at 2-14.

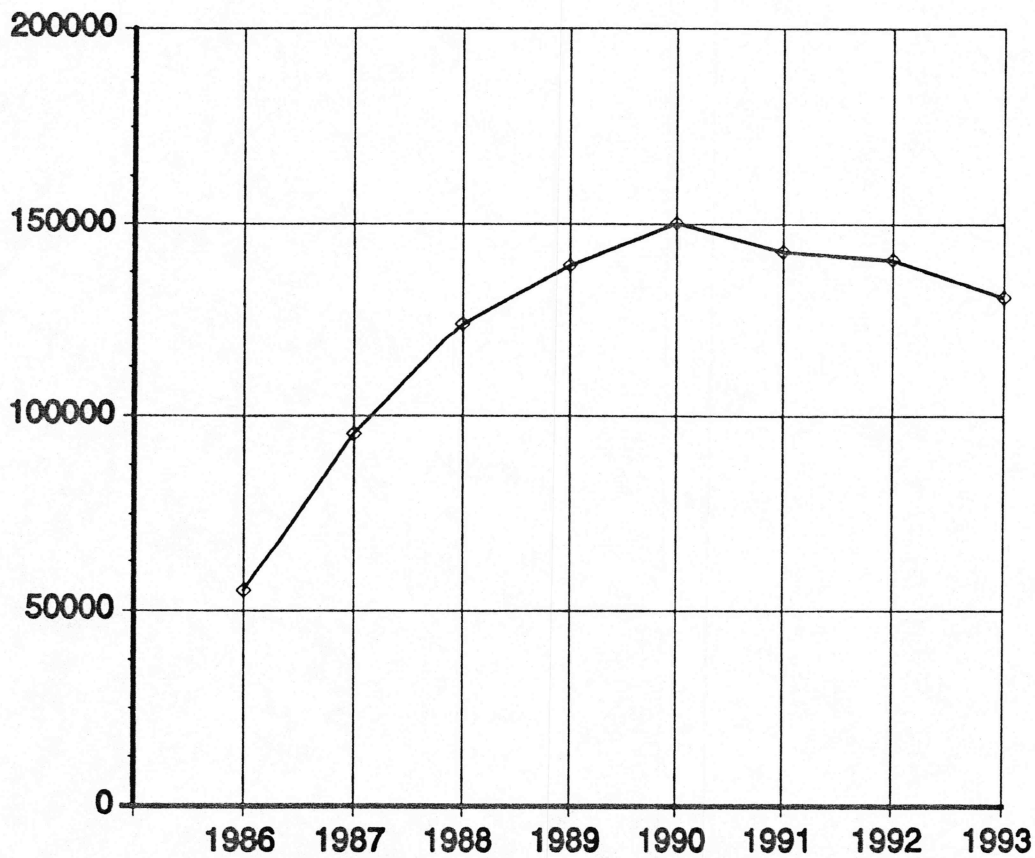
^{217/} See Peat Marwick Main & Co., Final Report, Phase 1 Forecasts - Flight Plan Study, Puget Sound Region (July 1990) ("Phase Forecasts") at 46, Table 21.

^{218/} Potential supplemental airport sites include Boeing Field, Paine Field, Arlington Airport, and possible joint civilian-military use of McChord Air Force Base. See Flight Plan EIS at 3-7 to 3-13.

^{219/} New York Engineering Firm to Lead Supplemental Airport Study, Daily Journal of Commerce (Seattle, WA), Jan. 26, 1994.

FIGURE 2

OPERATIONS OF COMMUTER AIRCRAFT AT SEATTLE-TACOMA INTERNATIONAL AIRPORT 1986-1993

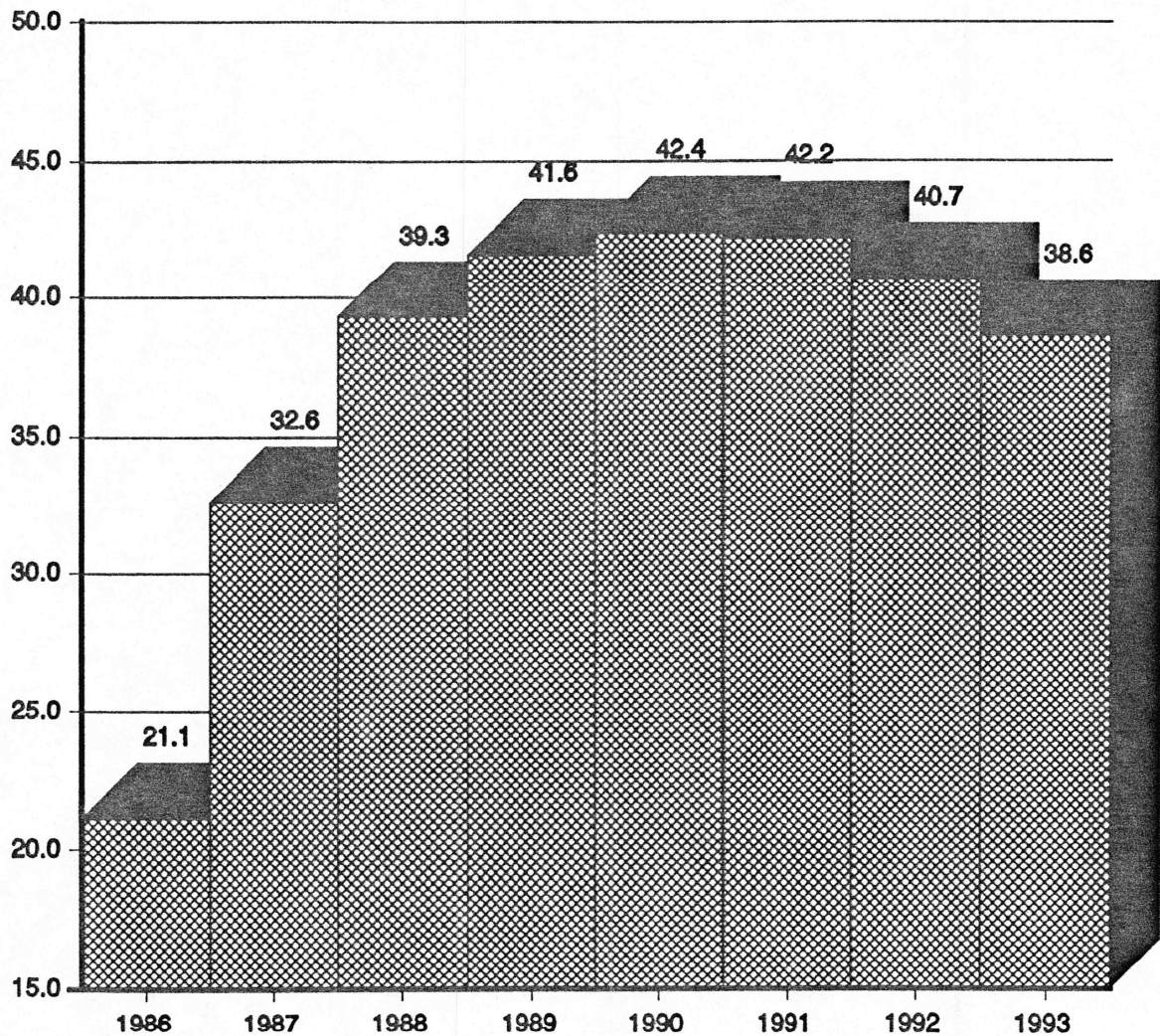


1986	54,977	1990	150,376
1987	95,337	1991	142,828
1988	124,245	1992	140,744
1989	139,215	1993	131,046

SOURCES: Seattle-Tacoma International Airport Traffic and Operations Reports; Flight Plan EIS; Seattle-Tacoma International Airport Noise Abatement Office.

FIGURE 3

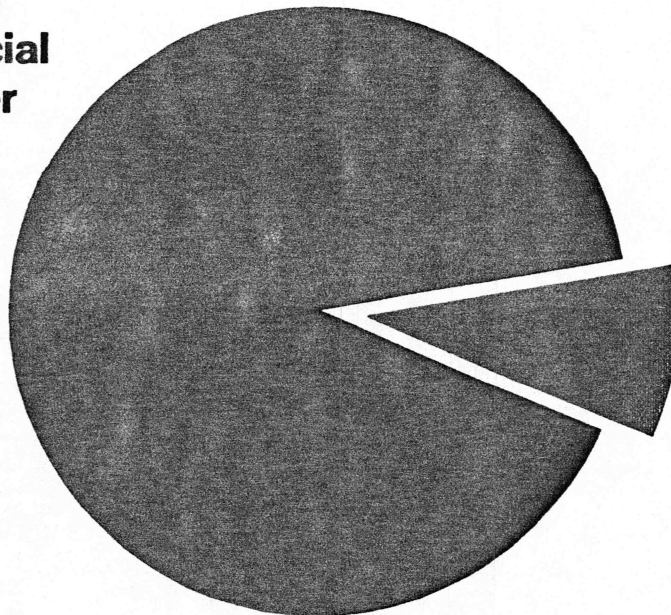
COMMUTER AIRCRAFT AS PERCENTAGE OF TOTAL OPERATIONS
AT SEATTLE-TACOMA INTERNATIONAL AIRPORT
1986-1993



SOURCES: Seattle-Tacoma International Airport Traffic and Operations Reports; Flight Plan EIS; Seattle-Tacoma International Airport Noise Abatement Office.

FIGURE 4
PERCENTAGE OF PASSENGERS USING
SEATTLE-TACOMA INTERNATIONAL AIRPORT
BY AIRCRAFT TYPE

**91% Use
Commercial
Air Carrier**

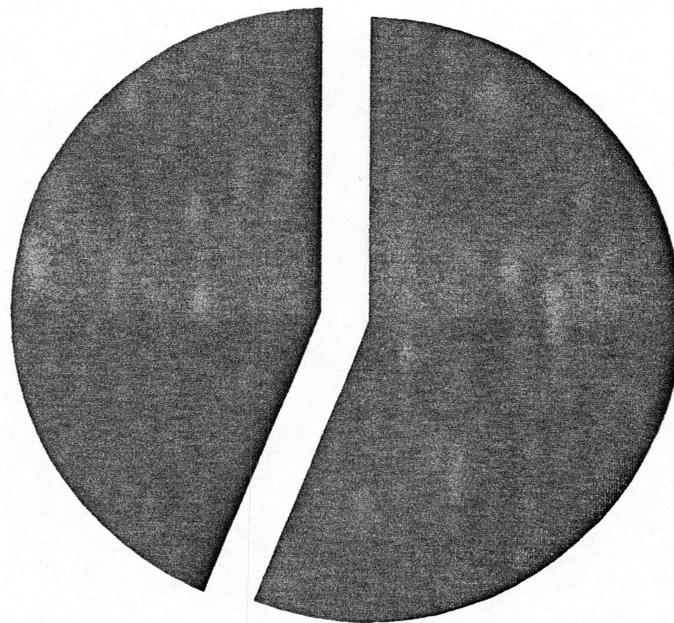


**9% Use
Commuter
Aircraft**

SOURCE: Peat Marwick Main & Co., Final Report, Phase 1 Forecasts - Flight Plan Study, Puget Sound Region (1990) at 12-13, Table 4.

FIGURE 5
COMMUTER PASSENGERS ONLY -
CONNECTING VERSUS ORIGATION AND DESTINATION

44%
Connecting
Passengers



56%
Origination
and
Destination
Passengers

SOURCE: Peat Marwick Main & Co., Final Report, Phase I Forecasts - Flight Plan Study, Puget Sound Region (1990) at 46, Table 21.

Multiple supplemental airports north or south of SEA would be reasonable alternatives to SEA for commuters that do not need to connect to other flights. Such passengers would be able to use a supplemental airport closer to their destination particularly if the airport were connected to downtown Seattle by convenient mass transit.

A new commuter airport would be relatively simple to develop because

- ▶ supplemental airports already exist with adequate runways for commuter aircraft;
- ▶ existing terminal facilities could be used or improved at little cost;
- ▶ extensive baggage handling facilities would not be necessary;
- ▶ little planning would be needed prior to start-up;
- ▶ few capital improvements would be required; and
- ▶ the turboprop aircraft most frequently used for commuter operations tend to generate relatively little noise thereby minimizing noise problems in the surrounding community.

Therefore, the EIS must analyze the supplemental airport alternative.

3. Adoption of Demand Management and System Management Programs and Imposition of Use Restrictions at SEA

The PSRC resolution requires the Port to institute demand and system management programs at SEA.^{220/} The Port must implement these programs before it receives final approval from the PSRC to proceed with the proposed expansion of SEA. Pursuant to the PSRC resolution, the efficacy of the demand and system management programs is subject to "independent evaluation."^{221/} Therefore, the EIS must analyze not only the adoption of demand and system management programs as an alternative, but it must base the determination of need on the assumption that such programs already have been successfully implemented. The EIS also must base the analyses of connected and cumulative actions

^{220/} PSRC Res. A-93-03.

^{221/} Id.

and of environmental impacts on the assumption that such programs have been implemented.

Demand and system management options can take several forms. The EIS must investigate the alternative of imposing use restrictions at SEA which would permit the Airport to serve a greater number of passengers without expansion of its airside capacity. Such restrictions could include limitations on the type and size of aircraft that can operate at SEA at all times or during peak hours, and measures designed to spread out the peak flows in order to use existing facilities more efficiently. Such measures could include giving preferences for larger aircraft or limiting the number of commuter and general aviation aircraft operations at SEA. These alternatives would increase the existing capacity of SEA without requiring an extensive expansion and reconfiguration of the current facilities.

Although it has shown little interest in instituting demand and system management which it considers "a short-term strategy to help buy time while capacity improvements are made,"^{222/} the Port's proprietary interest in expanding its airport can not be allowed to predominate over a full and fair consideration of this alternative. The FAA has an independent obligation to ensure that all reasonable alternatives are considered, not simply those which the Port prefers. The EIS, therefore, can not summarily reject the possibility of limiting growth by levying fees on certain operations, limiting use of the facility by certain aircraft at certain times, or other restrictions which would have the effect of changing the projected growth in demand. While it is questionable whether constraints on aviation growth would satisfy the entire need which the Port has articulated, the fact that the entire need is not met by such an alternative does not render it unreasonable on its face.^{223/}

4. Development of Alternative Transportation Modes

The examination of all reasonable alternatives requires analysis of other modes of transportation that could meet some or all of the need for increased air transportation capacity in the Puget Sound region.

^{222/} Flight Plan EIS at 3-5.

^{223/} Placing constraints on growth of demand is not the same as the no-action alternative. The latter assumes that there is no federal action, in which case demand is allowed to grow according to market conditions and likely would become constrained by market forces. In the former situation, the FAA (in cooperation with the Port) would impose regulations or controls on growth of demand so that demand is controlled in an orderly fashion.

Approximately one-fifth of the flights at SEA are between Seattle and Portland, Oregon or Vancouver, B.C.^{224/} In 1992, travel between these cities accounted for nearly 70,000 of the 346,000 non-cargo aircraft operations at SEA,^{225/} and studies by the Port predict that travel between Seattle and Portland and Vancouver will continue to grow into the next century.^{226/} Because of the proximity of Portland and Vancouver, high-speed rail would divert many origination and destination commuter passengers from SEA. It also would eliminate many connecting commuter passengers who board aircraft in Portland, change at SEA and continue onto Vancouver, or to intermediate points north of Seattle.

Such a rail system potentially could be initiated quickly with Amtrak service similar to that which presently exists between New York City and Washington, D.C. Service could then be upgraded by the introduction of high-speed rail or other technologically-advanced equipment, such as magnetic levitation trains. The Vancouver to Seattle to Portland corridor already has been designated as one of five high-speed rail corridors by the Secretary of Transportation pursuant to the Intermodal Surface Transportation Efficiency Act.^{227/} That designation has enabled federal funds to be used for the removal of grade crossing and other system impediments to the development of high-speed rail networks.

High-speed rail is no longer a futuristic concept. Fast, reliable trains already have absorbed some of the air transportation capacity demands in the Northeast. Trains can be expected to provide passengers with an alternative to flying in the Pacific Northwest. As a result, present air capacity demand at SEA would decrease and future demand would increase more slowly than originally projected.

The Port's lack of interest in transportation modes over which it has no control or jurisdiction must not undermine the consideration of the high-speed rail alternative in the EIS.

5. Alternative Runway Locations and Configurations

The EIS must analyze alternative runway locations that would meet the need for increased air transportation demand at SEA.

^{224/} Flight Plan EIS at 3-6.

^{225/} Id.

^{226/} Id.

^{227/} Pub. L. No. 102-240, 105 Stat. 1914 (1991).

Although the Flight Plan EIS does not identify a preferred alternative, the Port has selected a location for its proposed third runway at SEA.^{228/} "Such a runway would be approximately 7,000 feet long and located along the western boundary of the existing Airport property about 2,500 feet west of the existing eastern most runway."^{229/}

While the Port's conclusions are relevant for the FAA in preparing the EIS, they should not be the sole basis upon which the FAA considers or rejects potential alternative ways of expanding SEA. The EIS also must examine alternatives relating to different runway lengths. For example, constructing a short runway which necessarily would be limited to general aviation or small commuter aircraft traffic, would provide additional capacity, but might produce significantly less noise impacts and might be considerably less expensive. The EIS examination of runway lengths must consider not only existing FAA regulations (and air traffic practices) relating to the desirable length of runways and separation requirements, but also probable or potential changes in those regulations because of changes in technology or in composition of the aircraft fleet using SEA.

In the EIS, the FAA and the Port must set forth the criteria by which potential alternatives are accepted or rejected and must evaluate all potential alternatives in order to develop a list of reasonable alternatives. Again, while the FAA's criteria for selection of on-site alternatives may be similar to those adopted by the Port, those criteria undoubtedly can not be identical because of the different legal, practical, environmental, and economic parameters within which the two agencies operate.

For example, the possibility that other runway configurations at SEA may be more expensive does not render them unreasonable. Other configurations may have benefits which the proposed location of the a third parallel runway does not fulfill. Other configurations may well involve less noise and environmental impacts on the communities surrounding the Airport.

^{228/} Flight Plan EIS at 3-7.

^{229/} Id.

6. No-Action Alternative

NEPA and SEPA require that the EIS examine a no-action alternative,^{230/} and SEPA requires that a delayed action alternative be evaluated as well.^{231/} The no-action alternative must consider the environmental consequences of not undertaking the proposed action.^{232/} The analysis of the no-action alternative must do more than state that the underlying need would not be met; it must inform the public and the decisionmakers of the environmental consequences of not meeting the need. Most importantly, the EIS analysis of the no-action alternative must assume that the FAA takes no action to supplement existing capacity of Airport facilities anywhere in the Puget Sound region. The no-action alternative must assume that the FAA will continue any existing or projected actions which are not related to the proposed expansion of SEA but which might affect aviation demand in the future.

The EIS must explain all assumptions which underlie the no-action alternative, including assumptions relating to

- ▶ adoption of advanced technology (e.g., CRDA radar technology or GPS navigation) and its ability to aid in increasing capacity at SEA;
- ▶ reduction in minimum runway separation for parallel independent operations in IFR weather conditions;
- ▶ construction, use, capacity of, and demand at reliever airports;
- ▶ implementation of demand and system management programs at SEA; and
- ▶ changes in fleet mix of commercial air carriers which serve (or will serve) SEA.

All such assumptions must be disclosed so that the public and federal decision-makers have a reasoned basis upon which to assess the likelihood that the no-action condition will occur as projected. Each of these assumptions must be considered because it appears possible that changes in any one of these factors may allow the existing SEA

^{230/} 40 C.F.R. § 1502.14(2).

^{231/} WAC 197-11-440(5)(c)(vii). "The agency perspective should be that each generation is, in effect, a trustee for the environment for succeeding generations. Particular attention should be given to the possibility of foreclosing future options by implementing the proposal." Id.

^{232/} CEQ Questions and Answers on National Environmental Policy Act Regulations, Env't Rep. (BNA) 41:2701.

facilities to provide an acceptable level of service considerably longer into the future than projected in the Flight Plan EIS. The EIS must clearly distinguish between the no-action and the no-build alternatives.

7. Alternatives to Connected and Similar Actions Associated With the Proposed Action

The EIS must examine alternatives for the connected, cumulative and similar actions which are to be examined in the EIS. For example, the PSRC is preparing a study of a supplemental airport, and the FAA is considering revisions to the Four-Post Plan. The EIS must consider these actions and their bearing on the discussion and analysis of other alternatives. Additionally, alternative locations for any new facilities must be examined.

The EIS discussion of alternatives can not be limited to examining alternatives to the major project elements (i.e., runways and terminals). The EIS can not ignore alternatives to project elements of connected, cumulative, and similar actions within the context of each alternative to the major project elements.

V. IMPACTS WHICH MUST BE EXAMINED IN THE EIS

A. Direct and Indirect Impacts

An EIS must consider both the direct and indirect impacts of the proposed action and its alternatives.^{233/} Direct impacts^{234/} are those "caused by the action and occur at the same time and place,"^{235/} and indirect impacts "are caused by the action and are later in time or farther removed in distance, but are still reasonably foreseeable."^{236/} NEPA and SEPA regulations further delineate several specific impacts which must be addressed in an EIS.^{237/} To assist the FAA and the Port in the preparation of the EIS for the proposed expansion of SEA, these comments will discuss some of the environmental impacts which must be addressed and the type of data that should be evaluated in the EIS.

1. Noise

High noise exposure levels already cause significant problems for the communities surrounding SEA.^{238/} For example, nighttime aircraft operations at SEA often generate single event noise levels of 80 dB even several miles south of the Airport.^{239/} Severe Airport-related noise problems in the vicinity of SEA have prompted the Port to undertake noise compatibility planning in accordance with FAA regulations^{240/} and to enter into a

^{233/} 40 C.F.R. § 1508.25(c)(1), (2).

^{234/} In the CEQ regulations the terms "impacts" and "effects" are used synonymously. See *id.* § 1508.8.

^{235/} *Id.* § 1508.8(a).

^{236/} *Id.* § 1508.8(b).

^{237/} U.S. Dep't of Transp., Fed Aviation Admin., Order 5050.4A, Airport Environmental Handbook (1985) ("Order 5050.4A") ¶ 85; WAC 197-11-060(4), -440(6), -444.

^{238/} Sea-Tac International Airport, Noise Exposure Map Update (Draft)(1991) at App. D ("1991 NEM Update").

^{239/} Regional Comm'n on Airport Affairs ("RCAA"), Optimum Enrichment Noise Report, Sea-Tac Noise Study (Jan. 28, 1993) at Tables C, D.

^{240/} 40 C.F.R. Part 150. See § III.B, *supra* for a description of the Port's Part 150 Program.

Mediation Agreement with Airport users, the FAA, local governments and community groups.^{241/} The Mediation Agreement was designed to produce an overall noise reduction of approximately 50 percent in communities near SEA.^{242/} The Mediation Agreement, however, did not anticipate the construction of a third runway at SEA, and it is probable that the addition of another runway and increased numbers of operations at SEA would cause residences in the neighborhoods near the Airport to continue to be subjected to unacceptable noise levels.

Flight paths for the proposed runway likely would cause aircraft to overfly many areas that do not currently experience unacceptable levels of aircraft noise, thereby subjecting new properties to the effects of airport noise. The noise effects of the proposed third runway would be most acute in residential neighborhoods in Des Moines, Normandy Park, Burien and the North Hill community, particularly those west of 16th Avenue South. Many of the potentially affected residential neighborhoods are not included in the Port's noise mitigation program (which provides for the installation in residences of sound insulation materials). Even residences that are eligible for the Port's sound insulation program would obtain relief only from high interior noise levels. High outdoor noise levels would continue to erode the enjoyment of property and the quality of life in communities near the Airport.

The third runway proposal also would increase noise levels in area schools. The Port's most recent noise exposure map indicates that a large number of schools currently are located within the L_{dn} contour for 65, 70 or 75 dB.^{243/} Table 2 contains a list of schools currently exposed to high noise levels. Interior single event noise levels in excess of 85 dB have been measured in at least one school district.^{244/} If a third runway were constructed at SEA, many of the schools currently subjected to noise exposure of L_{dn} in excess of 65 dB may not realize the contemplated decrease in aircraft noise, particularly those schools located under the western flight paths. With approximately 6,000 students enrolled in schools within a few miles of SEA, increased aircraft operations and altered flight paths would harm the quality of education in local schools.

^{241/} Mediation Committee, Final Package of Mediated Noise Abatement Actions for Seattle-Tacoma International Airport (1990) ("Mediation Agreement"). See § III.B, *supra* for a description of the Mediation Agreement.

^{242/} Mediation Agreement at 2.

^{243/} Sea-Tac International Airport, Noise Exposure Map Update (Draft) (1991) App. D ("1991 NEM Update").

^{244/} RCAA, James C. Chulupnik, Noise from Sea-Tac Airport: Adverse Affects on the Health of Puget Sound Citizens (Jan. 26, 1993) at 2.

TABLE 2
SCHOOLS EXPOSED TO NOISE LEVELS OF 65 LDN OR GREATER
(1991)

School	Address	School District	1991 Noise Level (Ldn)	Projected 1996 Noise Level (Ldn)
Cascade View Elem.	13601 - 32nd South	South Central	65-69	< 65
Cedarhurst Elem.	611 South 132nd	Highline	65-69	< 65
Des Moines Elem.	22001 - 9th South	Highline	65-69	65-69
Hilltop Elem.	12250 - 24th South	Highline	70-74	65-69
Holy Innocents Elem.	2530 South 298th	Private	65-69	< 65
Madrona Elem.	3030 South 204th	Highline	65-69	65-69
Mark Twain Elem.	2450 S. Star Lake Rd.	Federal Way	65-69	< 65
Midway Elem.	22447 - 24th South	Highline	75 +	70-74
New Life Christian Academy	21650 - 24th South	Private	75 +	70-74
North Hill Elem.	19835 - 8th South	Highline	65-69	65-69
Olympic Elem.	615 South 200th	Highline	65-69	< 69
Parkside Elem.	2104 South 247th	Highline	70-74	70-74
Riverton Hts. Elem.	3011 South 148th	Highline	65-69	65-69
St. Philomena Elem.	1815 South 220th	Private	75 +	75 +
Seattle Christian	19835 - 8th South	Private	65-69	65-69
Southern Hts. Elem.	11249 - 14th South	Highline	70-74	65-69
Sunnydale Elem.	15631 - 8th South	Highline	65-69	< 65
Wildwood Elem.	2405 South 300th	Federal Way	65-69	< 65
Cleveland Elem.	5511 - 15th Street	South Central	65-69	< 65
Woodmont Elem.	26454 - 16th South	Federal Way	70-74	65-69
Pacific Middle School	22705 - 24th Place S.	Highline	75 +	70-74

<p style="text-align: center;">TABLE 2</p> <p style="text-align: center;">SCHOOLS EXPOSED TO NOISE LEVELS OF 65 LDN OR GREATER (1991)</p>				
School	Address	School District	1991 Noise Level (Ldn)	Projected 1996 Noise Level (Ldn)
Evergreen Lutheran High School	2021 South 260th	Private	70-74	65-69
Mount Rainier High School	22450 - 19th South	Highline	75 +	70-74
Satellite Alternative High School	440 South 186th	Highline	65-69	< 65
Seattle Christian High School	19639 - 28th South	Private	75 +	75 +
Sea-Tac Occupational Skills Center	18018 - 8th South	Highline	65-69	65-69
Hamlin Robinson	10211 - 12th South	Private	65-69	< 65
Dominion College	21024 - 24th South		75 +	70-74
Highline Community College	2400 South 240th		75 +	70-74

SOURCE: Port of Seattle, Noise Exposure Map Update (Final), Seattle-Tacoma Int'l Airport (1991).

Current operations at SEA subject many other noise sensitive resources -- such as hospitals, nursing homes and churches, as shown in Table 3 -- to average noise levels of 65 dB or greater.^{245/} The Port has estimated that the number of noise sensitive areas exposed to L_{dn} in excess of 65 dB would decline by 1996, a prediction upon which residents in these communities have relied. The construction and operation of a third runway at SEA, however, likely would prevent a number of hospitals, nursing homes and churches near SEA from realizing significant reductions in their noise exposure levels. Moreover, many locations could be expected to be exposed to even higher numbers of overflights and to greater noise levels than they experience today.

FAA regulations require that the noise impacts associated with the proposed actions and the alternatives to those actions be considered in the EIS.^{246/} Accordingly, the EIS must examine the increased noise impacts that would result from increased operations at SEA under the Port's proposal and each alternative.

^{245/} 1991 NEM Update at D-10, Table D-3.

^{246/} Order 5050.4A ¶ 85a.

TABLE 3 SELECTED NOISE SENSITIVE PROPERTIES IN COMMUNITIES ADJACENT TO SEA	
Property	Location
St. David of Wales Anglican Parish	22975 - 24th South
Assembly of God	26421 Pacific Hwy. South
Assembly of God Church of Des Moines	21650 - 24th South
Crossroads Assembly	26454 - 16th South
First Baptist Church of Des Moines	22415 - 19th South
Sound View Baptist Church	2045 South 216th
Victory Baptist Church	1807 South 223rd
St. Philomena Catholic Church	1790 South 222nd
Christian Tabernacle Church	25234 Pacific Hwy. South
Midway Community Covenant Church	22460 - 24th South
Des Moines Foursquare Church	2038 South 222nd
Grace Lutheran Church	22975 - 24th South
Lutheran Church of the Resurrection - Missouri Synod	134 South 206th
Des Moines United Methodist Church	22225 - 9th South
Amazing Grace Christian Center	21625 - 29th South
Christian Faith Center	21024 - 24th South
Des Moines Gospel Chapel	21914 - 7th South
Eternal Temple of Truth & Light	25040 Pacific Hwy. South
Seattle Full Gospel Church	24645 Pacific Hwy. South
Highline Reformed Presbyterian Church	106 South 206th
Marcus Whitman Presbyterian Church	2130 South 248th

<p style="text-align: center;">TABLE 3</p> <p style="text-align: center;">SELECTED NOISE SENSITIVE PROPERTIES IN COMMUNITIES ADJACENT TO SEA</p>	
Property	Location
First Unitarian Universalist Church of Seattle	25701 - 14th Place South
Des Moines Masonic Temple	2208 South 223rd
Dance Club West	25600 Pacific Hwy. South
Zenith Place	1826 South 240th
Des Moines Yacht Club	22737 Marine View Drive South
North Hill Community Club	4th Avenue South
Wesley Homes	
Masonic Home	
Judson Park	
SeaToma Convalescent Center	
Des Moines Vista	
Midway Manor Convalescent	
Monarch Care	
Highline Community Hospital	
Highline Specialty Center	12400 Military Road
John Knox Church	
Normandy Park Congregational Church	
Southgate Assembly of God	
Three Tree Point Baptist Church	

The FAA must examine the effect of noise on newly exposed noise-sensitive areas as well as the dispersion of noise over a larger area surrounding the Airport. Such areas include the following:

- ▶ parks and recreation areas;
- ▶ historic structures and locations;
- ▶ residential communities;
- ▶ schools;
- ▶ health related facilities;
- ▶ cultural resources;
- ▶ businesses; and
- ▶ houses of worship.

The noise analysis must include an examination of impacts within the L_{dn} contour of 65 dB^{247/} and the effect upon noise-sensitive areas outside the L_{dn} contour of 65 dB. The EPA has stated that "limiting noise analysis to the L_{dn} 65 contours does not provide adequate disclosure of all significant noise impacts."^{248/}

In a recent rulemaking,^{249/} the FAA apparently endorsed the EPA's position that it should "modify the definition of [noise study area] so as to eliminate the perception that the area with the DNL 65 dB contour is the sole area to be considered for noise impacts, while

^{247/} Id. ¶ 85a(1).

^{248/} Letter from Richard E. Sanderson, Director, Office of Fed. Activities, U.S. Env't'l. Protection Agency, to Office of the Chief Counsel, Fed. Aviation Admin. (Jan. 18, 1989) (attachment: EPA's Detailed Comments Concerning FAA's Notice on Airport Noise Compatibility Planning).

^{249/} Airport Noise and Access Restrictions, Final Rule, 56 Fed. Reg. 48,661 (1991) (to be codified at 14 C.F.R. Part 161).

retaining the flexibility of extending beyond the DNL 65 dB contour.^{250/} The EIS must acknowledge, therefore, the existence of credible evidence that even relatively low average noise levels can adversely affect a community when pre-existing noise levels were comparatively low or when single noise events are particularly intrusive.^{251/}

In addition, the EIS must analyze the noise effects of the proposed expansion using metrics other than the L_{dn} metric. Although the L_{dn} metric includes calculations of the noise produced by single-events, the number of events, and the time of day when the events occur, the L_{dn} metric obscures the impacts of each of these factors alone and does not provide any useful information about the level of noise attributable to individual overflights. The effect of noise upon a number of noise-sensitive areas in the vicinity of SEA can not be described adequately or analyzed solely using the L_{dn} metric. Activities that take place primarily during the day or in the early evening when the number of Airport operations are at their peak can not be represented accurately by an L_{dn} contour. Therefore, the impact of noise on public schools, on health care and retirement facilities, or on the normal business activities of commercial establishments can not be evaluated through the exclusive use of the L_{dn} metric. A number of different noise metrics must be used to examine the effects on these noise-sensitive institutions and activities.

The FAA on occasion has agreed to perform single-event analysis "for . . . EISs for projects resulting in a significant change in an existing airport's commercial/cargo operational characteristics."^{252/} Similar studies should be included in the EIS for the proposed expansion of SEA. Consistent with the criteria applied elsewhere, the Port's expansion proposal certainly would result in a significant change in the existing commercial/cargo operation characteristics at SEA.^{253/} Consequently, it is critical that the FAA include single-event noise analysis in the EIS in order to evaluate adequately the noise impacts which the Port's proposal and its alternatives would have on the Puget Sound region.

^{250/} Id. at 48,670.

^{251/} Harris, A.S., Review of Community Responses to Changes in Noise Exposure (Nov. 1990) (six case studies indicating that any increase in noise levels can negatively affect a community even though outside of the L_{dn} contour of 65 dB). See Exhibit 4.

^{252/} Letter from Barry L. Harris, Deputy Administrator U.S. Dep't of Transp., Fed. Aviation Admin., to F. Henry Habicht, II, Deputy Administrator, U.S. Evtl. Protection Agency (June 15, 1990) at 3.

^{253/} See, e.g., Puget Sound Regional Council and Port of Seattle, the Flight Plan Project, Final Environmental Impact Statement ("Flight Plan EIS").

Because the EIS will be prepared jointly by the Port and the FAA, the adequacy of the document can not be judged solely by reference to prior FAA-generated EISs. The Port has an independent obligation to assess the noise impacts from the proposed third runway. The Port may not fulfill its obligations under SEPA merely by echoing the FAA's policies and regulations on analysis of noise.^{254/} Specifically, although the FAA may insist that it has no obligation to examine noise impacts outside the L_{dn} contour and that it has no obligation to use metrics other than the L_{dn} , the Port must recognize the considerable scientific debate over the propriety of the FAA's threshold of significance and its sole reliance on the L_{dn} metric.^{255/} To fulfill its obligations under SEPA, the Port must include in the EIS (a) noise analysis using single-event noise metrics, and (b) analysis of noise impacts in excess of 60 dB L_{dn} and in excess of an SEL of 90 dB.

The EIS also must include studies of the noise effects which would result from construction and operation of the Port's Airport expansion proposal. Site preparation and construction of the proposed third runway would take as long as six years to complete.^{256/} In addition to the high noise levels associated with most heavy construction activities, additional noise would be generated in this situation by the thousands of large trucks required for the transportation of 13.7 million cubic yards of fill material necessary to provide a stable base for the runway.^{257/}

2. Land Use

SEA is owned and operated by the Port of Seattle, a municipal corporation under Washington state law,^{258/} and it is governed by a five-person elected Commission.^{259/} The

^{254/} See, e.g., WAC 197-11-630(1).

^{255/} National Parks & Conservation Ass'n v. FAA, 998 F.2d 1523, 1532-22 (10th Cir. 1993). See also Federal Interagency Committee on Noise, Federal Agency Review of Selected Airport Noise Issues (Aug. 1992) ("FICON Report").

^{256/} See letter from Gary Grant, Pres. Port of Seattle Comm'n, to Wade Bryant, Manager Seattle ADO, Fed. Aviation Admin. (Aug. 24, 1993) attachment at 5 (indicating that the proposed SEA expansion is expected to begin in 1997 and be completed in 2002).

^{257/} See Puget Sound Regional Council, The Regional Airport System Plan Alternatives: Flight Plan Workshop II (Jan. 21, 1993) at 6.

^{258/} RCW 53.04.060.

Airport is located almost entirely within the corporate boundaries of the City of SeaTac, although a portion of Airport property is located in the City of Des Moines.^{260/} Federal law and FAA regulations mandate that the EIS examine the compatibility of the proposed expansion plan with the land use plans of surrounding communities.^{261/} SEPA regulations also require the Port to examine the relationship between its expansion proposal and existing land use plans and to discuss the likely impact of a third runway at SEA on land use and the "built environment."^{262/} Development of a third runway at SEA would conflict with the Mediation Agreement, the Port's Part 150 Plan and the Port's 1985 Master Plan Update.^{263/} Surrounding jurisdictions have relied upon the assurances and goals in the Mediation Agreement, the Part 150 Plan and the 1985 Master Plan in developing comprehensive plans to govern the orderly growth of their communities and to protect desirable land uses, including parks, recreation areas, fish and wildlife habitat areas, wetlands and residential properties. Development of the proposed runway at SEA would alter the expectations of local jurisdictions by subjecting protected land uses to new and additional noise impacts from increased numbers of aircraft operations and altered flight tracks.

More importantly, the expansion of SEA would conflict with the comprehensive plans adopted by the cities of Burien, Des Moines, Normandy Park and Tukwila -- among others -- pursuant to the Washington Growth Management Act ("GMA").^{264/} The GMA, enacted in 1990, created an enforceable planning process to ensure that county and city comprehensive planning are consistent with one another, and to make such plans binding

^{259/} Port Commissioners are elected by the citizens of King County as at-large representatives.

^{260/} See 1991 NEM Update. The property within Des Moines was acquired as part of SEA's noise abatement and acquisition program, and is not used for airport operations. Id. at 2.

^{261/} 40 C.F.R. § 1502.16(c); Order 5050.4A ¶¶ 47e(2), 85(b); 49 U.S.C. app. § 2208(b)(1)(a).

^{262/} See WAC 197-11-440(6)(d)(i), (e), -444(2)(b)(i).

^{263/} The 1985 Master Plan Update assured the communities surrounding the Airport and no additional runways would be developed at SEA. Peat Marwick, Final Report, Master Plan Update for Sea-Tac International Airport (Sept. 1985) at 2-3.

^{264/} Chapter 36.70A RCW.

on all jurisdictions, including the state.^{265/} The vehicles established by the GMA for accomplishing this objective are comprehensive plans prepared by counties and their constituent cities, and regional transportation plans, prepared by local jurisdictions on a countywide or multi-county basis.^{266/}

Comprehensive plans developed pursuant to the GMA must address a wide array of topics including 1) multiple modes of transportation; (2) affordable housing and economic development; 3) open space, recreation, fish and wildlife; 4) air and water quality; 5) public facilities and services; and 6) historical and archaeological sites and structures. Comprehensive plans also must designate where growth is to occur, where new capital facilities will be located and how they will be financed.^{267/} Moreover, the GMA requires that plans adopted by the Port for essential public facilities -- such as SEA -- must be consistent with the comprehensive plans of the county and neighboring cities.^{268/}

The GMA mandates a collaborative planning process in which the plans of cities and counties must be coordinated and made consistent with one another.^{269/} Transportation plans have particular consistency requirements.

- ▶ The transportation elements of comprehensive plans adopted by counties, cities and towns within a region must conform to the requirements of the GMA and be consistent with regional transportation plans;^{270/}

^{265/} See id. 36.70A.020.

^{266/} Chapter 36.70A RCW.

^{267/} See id. 36.70A.020., .070, .080, .110, .200.

^{268/} WAC 365-195-340(2)(b)(iv).

^{269/} RCW 36.70A.100.

^{270/} Id. 47.80.030(1)(a). See also id. 36.70A.070(6).

- ▶ The Regional Transportation Planning Organization^{271/} must develop and adopt a regional transportation plan that is consistent with county, city and town comprehensive plans,^{272/} and
- ▶ All transportation projects within a region having an impact on regional facilities or services must be consistent with the regional transportation plan.^{273/}

As the Regional Transportation Planning Organization created pursuant to the GMA, the PSRC must certify the consistency of regionally significant transportation projects -- such as the Port's proposed expansion of SEA -- with local comprehensive plans and the Regional Transportation Plan.^{274/} Thus, the PSRC has the final authority to determine whether to certify the Port's plans to develop a third runway at SEA. As discussed above,^{275/} to date the PSRC has not yet approved unconditionally the Port's proposed expansion of SEA. If the conditions stipulated in the PSRC resolution^{276/} are not met, the PSRC could decline to approve the project, and the Port would not have the legal authority to implement the project. The EIS must examine the effect of PSRC actions on the proposal.

3. Wetlands

Wetlands are an important and diminishing natural resource of the United States. They play a crucial role in maintaining high water quality, anchoring shorelines, supporting the aquatic food chain, and providing important habitat for waterfowl, fish and mammals.^{277/}

^{271/} In the Puget Sound region the PSRC is the Regional Transportation Planning Organization. See § I.A.1, supra.

^{272/} RCW 47.80.030(1)(b). Therefore, the Regional Airport System Plan must be consistent with both existing local comprehensive plans and those developed pursuant to GMA.

^{273/} Id. 47.80.030(2).

^{274/} Id.

^{275/} See § I.A.1, supra.

^{276/} PSRC Resolution A-93-03 (Apr. 29, 1993) ("PSRC Res. A-93-03").

^{277/} See U.S. Env'tl. Protection Agency, Region VIII, A Citizen's Handbook for Wetlands Protection (1989).

Considering the importance given to the protection of wetlands, the EIS must examine the impacts which the proposed SEA expansion plan would have on wetlands. For example, the placing of more than 13 million cubic yards of fill necessary to build the third runway is likely to affect several local streams and their associated wetlands. One stream -- Miller Creek -- drains two small lakes (Lake Reba and Lora Lake) near the northwestern boundary of SEA, and flows along the base of the hillside along SEA's western border and through Normandy Park before emptying into Puget Sound. U.S. Fish and Wildlife Service maps identify several types of palustrine wetlands along a portion of Miller Creek lying between South 156th Way and State Route 518 and within the City of Sea-Tac's corporate boundaries.^{278/} Additional wetlands are located on SEA property east of State Route 509 and north of 12th Place South.^{279/} Wetlands at both locations are situated on property that the Port has proposed to acquire -- and may need to alter -- to make way for the proposed third runway.^{280/} Other wetlands in the vicinity are located within Burien.^{281/} Even wetlands not physically destroyed by construction of a new runway at SEA could be altered or harmed significantly. Construction and operation of a new runway could threaten the existence -- or at least the functionality -- of all wetlands within the Miller, Walker, Massey, Barnes and Des Moines Creek watersheds by increasing the paved areas at the Airport, generating larger volumes of stormwater discharges, and causing increased runoff of chemicals and petroleum-based products used in airport de-icers and jet fuel.^{282/}

The FAA must insure that all practicable measures to minimize harm to wetlands are included in the Port's proposal.^{283/} FAA regulations require the agency to avoid affecting wetlands and to choose a no-impact alternative, if one is practicable.^{284/}

^{278/} U.S. Dep't of Interior, Fish and Wildlife Serv., Nat'l Wetlands Inventory Map, Des Moines, Wash. (1987).

^{279/} See City of Des Moines, Comprehensive Plan (Update), Ordinance 861 - Wetlands Map attachment (Oct. 14, 1992).

^{280/} See Flight Plan EIS at 4-60.

^{281/} U.S. Dep't of Interior, Fish and Wildlife Serv., Nat'l Wetlands Inventory Map.

^{282/} Stormwater treatment facilities as SEA already have been cited by the state Department of Ecology for failure to provide adequate treatment. Regional Commission on Airport Affairs Reports, Ingrid Hansen, Water Quality Issues (Jan. 26, 1993).

^{283/} Order 5050.4A ¶ 85k(2)(b).

^{284/} Id. ¶ 47e(11)(e).

In order to engage in construction activity in a wetlands area, the FAA affirmatively must find

- a. that there is no practicable alternative to such construction, and
- b. that the proposed action includes all practicable measures to minimize harm to wetlands which may result from such use.^{285/}

The EIS must contain a discussion of the basis for any such findings along with a discussion of the various alternatives which have been considered.^{286/}

The Port then will be required to obtain a permit pursuant to Section 404 of the Clean Water Act^{287/} in order to dredge or fill any affected wetlands.^{288/} The FAA is required to insure that the analysis in the EIS also satisfies the NEPA obligations of the EPA and the Army Corps of Engineers with respect to any Section 404 permit that those agencies issue.^{289/}

SEPA regulations require the Port to analyze the effect of the proposed expansion project the quantity and quality of surface water runoff and on habitat for plants, fish and wildlife.^{290/} Moreover, Washington has its own wetlands protection provisions which compliment and supplement the federal requirements. They are incorporated in an executive order issued by the Governor^{291/} and in GMA provisions dealing with critical areas.^{292/} In

^{285/} Id. ¶ 47e(11)(b)2. See also id. ¶ 83e which requires a finding of "no practicable alternative" for construction activity in a wetland area.

^{286/} Id. ¶ 85.

^{287/} 33 U.S.C. § 1344.

^{288/} Id.

^{289/} This requirement is mirrored in the Corps' NEPA regulations which obligate the District Engineer to coordinate with the lead agency as a cooperating agency "to insure that agency's resulting EIS may be adopted by the Corps for purposes of exercising its regulatory authority." 33 C.F.R. Part 325, App. B § 8(c).

^{290/} WAC 197-11-444(a)(c)(ii), (d)(i).

^{291/} See Flight Plan EIS at 4-95.

addition, the cities of Normandy Park and Des Moines have adopted ordinances dealing with environmentally sensitive areas (including wetlands) which regulate and restrict development activities in these areas.^{293/} Both cities restrict development in areas in which "significant important wetlands and their buffers" are located.^{294/} Where development is allowed, buffers of 100 feet and 35 feet must be maintained for significant and important wetlands, respectively.^{295/} A similar regulatory regime is found in Tukwila's Sensitive Area Overlay Zone.^{296/}

The EIS, therefore, must examine the negative impacts which the proposed action could have on wetlands. It must weigh these impacts against the effects of other reasonable alternatives. Further, it must discuss the permitting process and the effect that the requirements of that would have on the proposed expansion project. Finally, it must consider the restrictions placed on the destruction or degradation of wetlands by state and local laws.

4. Air Space

Construction of a third runway at SEA will complicate the already crowded air space in the Puget Sound region. A study prepared for the FAA has found that the presence of Boeing Field only 5 miles north of SEA limits the ability of the Port to increase SEA's capacity when the Airport is in a north flow configuration, particularly during weather conditions with poor visibility or a low cloud ceiling.^{297/} The study found that in the year 2000, even with construction of another runway at SEA, the close proximity of Boeing Field would cause departures to be delayed in excess of 60 minutes during poor weather conditions and north

^{292/} RCW 36.70A.170, .060(1); WAC 365-190-040.

^{293/} Normandy Park, Wash., Mun. Code Chapter 13.16 ("NPMC"); Des Moines, Wash., Mun. Code Chapter 18.86 ("DMMC").

^{294/} Significant and important wetlands are defined in the NPMC 13.16.030(52)(A), (B), and DMMC 18.04.663(1), (2). NPMC 13.16.060(a)(1); DMMC 18.86.060(a).

^{295/} NPMC 13.16.0070(a)(2)(A), (B); DMMC 18.86.070(2)(A), (B).

^{296/} See Tukwila, Wash., Mun. Code Chapter 18.45.

^{297/} Aviation Systems International, Inc., Impact of Boeing Field Interactions on the Benefits of a Proposed New Runway at Seattle-Tacoma International Airport (July 1992). Approximately 30 percent of annual operations at SEA occur during a north flow configuration. *Id.* at 8, Figure 2-1.

flow configuration.^{298/} Moreover, by 2015, a three-runway SEA would experience air space gridlock when the Airport is in north flow during poor weather conditions.^{299/} The study concludes that "[a]dding a third runway at SEA would further complicate the airspace interaction between SEA and [Boeing Field]. It may not be possible to develop procedures that will permit full use of the runways at both airports under all conditions."^{300/} Consequently, the EIS must examine the effect on Boeing Field operations from a third runway at SEA.

The effect of an additional runway at SEA also must be examined in the context of the FAA's Four Post Plan^{301/} which governs air traffic routes and procedures for aircraft using the congested Seattle-area airspace. A third runway could require modifications in the Four Post Plan which potentially would affect noise exposure levels of residential and other noise sensitive areas and could affect operations at other airports in the region.

The EIS must examine these regional air space allocation issues and determine how the proposed expansion and its alternatives would affect air space conditions and requirements and air traffic patterns in the entire Puget Sound region.

5. Air Quality

The increased number of aircraft and ground vehicles which would use an expanded SEA would have a detrimental effect on the air quality of the Puget Sound metropolitan region. Additionally, the disturbance of particulate matter during construction would result in further air quality degradation. The FAA legally is required to examine these and other impacts on regional air quality associated with the Port's proposal for expansion of SEA.

The Puget Sound region currently experiences a number of air quality problems, including a failure to attain state and federal air quality standards for carbon monoxide, particulate matter and ozone.^{302/} The state Department of Ecology has identified operations at SEA as a contributing factor to the Puget Sound area's failure to attain air quality

^{298/} Id. at 27.

^{299/} Id.

^{300/} Id. at 1.

^{301/} See § III.C, supra.

^{302/} Flight Plan EIS App. D at D-6.

standards. According to the Department of Ecology, activities at SEA are the source of approximately 5 percent of all nitrogen oxide emissions in King County, and about 8 percent of all carbon monoxide emissions.^{303/}

Increased numbers of aircraft operations at SEA, including taxiing, maintenance, and testing activities -- as well as departures and landings -- collectively could increase substantially the emissions of airborne pollutants at the Airport. Further, by increasing the capacity at SEA, the proposed runway project also could increase considerably vehicle exhaust emissions in the vicinity of the Airport, as greater numbers of passengers travel to the Airport via car, taxi or bus. Thus, construction of a third runway at SEA could exacerbate the existing ill effects of Airport operations on local air quality.

The FAA long has recognized the potential for adverse air quality impacts caused by the many activities associated with the operation of an airport. Therefore, the decision whether or not to expand an airport requires that potentially adverse air quality impacts be analyzed thoroughly.

The federal Clean Air Act^{304/} requires each state to submit to the EPA a State Implementation Plan ("SIP") which includes state and local legislation, regulations and other necessary measures to achieve and maintain the national ambient air quality standards ("NAAQS") "in each air quality control region (or portion thereof) within such State."^{305/} When approved, the SIP, or any approved portion thereof, becomes federally enforceable.^{306/} The Washington Clean Air Act^{307/} authorizes the Puget Sound Air Pollution Control Agency to implement the requirements of the federal and state clean air statutes on a regional basis.^{308/}

Section 176(c) of the federal Clean Air Act, as well as the new regulations implementing the provisions of that section, require that no federal agency "shall engage in, support in any way or provide financial assistance for, license or permit, or approve any

^{303/} Id. at D-7.

^{304/} 42 U.S.C. § 7401 et seq.

^{305/} Id. § 7410(a)(1).

^{306/} Id. § 7413.

^{307/} Chapter 70.94 RCW.

^{308/} See id. 70.94.053.

activity which does not conform to an applicable [state] implementation plan.^{309/} The EPA has concluded that new airports and airport expansion projects are federal actions likely to be subject to the conformity provisions of the Clean Air Act.^{310/} Conformity is determined in accordance with the specific and detailed procedures set forth in the conformity regulations.^{311/}

Similarly, Section 509 of the Airport and Airway Improvement Act prohibits FAA approval of any airport expansion project unless the Governor of the affected state certifies that the location, design, construction and operation of the project will comply with applicable air and water quality standards.^{312/}

SEPA regulations also require the EIS to include an examination by the Port of the effects of the its proposed third-runway project on air quality.^{313/}

If it is determined that the proposed expansion of SEA (and its connected actions)^{314/} is not consistent with the Washington SIP, mitigation or offset measures must be developed to "bring the project within conformance" to the SIP.^{315/} If the project still results in a violation of NAAQS, "then further considerations must be given to alternative airport

^{309/} 58 Fed. Reg. 63,214, 63,253 (1993) (to be codified at 40 C.F.R. Part 51, subpart W § 51.850(a) and 40 C.F.R. Part 93, subpart B § 93.150(a)).

^{310/} Preamble, 58 Fed. Reg. at 63,223. Although airport projects generally are not direct federal undertakings, FAA funding statutes require that grants for airport development or expansion be conditioned on the adoption of mitigation measures to achieve conformity with state SIPs. These grant conditions are incorporated into grant agreements and become part of an enforceable contract between the FAA and the grant recipient. *Id.* Thus, the FAA's role in airport development or expansion projects probably would be a "Federal action" as defined in the EPA regulations.

^{311/} 58 Fed. Reg. 63,214.

^{312/} 49 U.S.C. App. § 2208(b)(7)(A).

^{313/} WAC 197-111-444(1)(b)(i).

^{314/} Order 5050.4A ¶ 26(d).

^{315/} U.S. Dep't of Transp., Fed. Aviation Admin., Report No. FAA-EE-81-21, Air quality Procedures for Civilian Airports and Air Force Bases (Dec. 1982) ("FAA Air Quality Handbook") at II-4.

designs or operating procedures which will reduce pollutants to the acceptable levels.^{316/} The results of all air quality analyses must be "documented for inclusion" in the EIS.^{317/}

The exhaustive analysis of air quality effects, required by federal and state law, would provide the information essential to formulating a reasoned determination on the air quality impacts of the proposed SEA expansion proposal.

6. Surface Transportation

SEPA requires that the EIS consider the effect on surface transportation of the proposed expansion at SEA.^{318/} According to current traffic studies, surface streets around SEA already are highly congested. Most key intersections operate at the worst possible levels of service.^{319/} Travel on highways in the vicinity of SEA continues to increase more rapidly than the population and the number of jobs.^{320/} Therefore, it is not surprising that surface transportation delay in 1990 was estimated at 200,000 vehicle hours per year, and it is projected to increase by 20 percent by 2020.^{321/}

Existing ground congestion would be made significantly worse by expansion of the Airport. The construction of an additional runway at SEA and new passenger facilities can be expected to increase the number of passengers using the Airport, thereby increasing the number of motor vehicles jamming the already overcrowded roads surrounding the Airport. The dangerously congested surface roads near the Airport would, in turn, prevent SEA from operating effectively.

In addition, the approximately four years it would take to prepare the site and construct the runway would further overburden the neighboring road system. Because of the enormous quantity of fill required for runway construction, trucks delivering fill to the runway construction site would cause significant problems for surface roads near the Airport.

^{318/} Id.

^{317/} Id.

^{318/} WAC 197-11-444(1)(c).

^{319/} For example, I-5 and State Route 405 near SEA is at gridlock for increasing portions of each day.

^{320/} Flight Plan EIS at 4-40.

^{321/} Id. at 4-40, 4-41.

An estimated 1,300 truckloads of fill per day^{322/} would have to be transported to the Airport to deliver the required amount of fill over the six-year construction period.^{323/} This increased construction-related traffic could generate serious gridlock conditions on already heavily congested area roads particularly during those hours when it is estimated there will be 100 trips per hour.^{324/}

The EIS must examine the effect on the local road system of 1) the SEA construction project; 2) the operation of an expanded SEA (attributable both to a new runway and to additional passenger and cargo facilities); and 3) the alternative proposals. Among other considerations, the discussion should focus on emergency access plans, passage for emergency vehicles and peak hour traffic effects.

Although NEPA does not require the FAA specifically to discuss the effect on surface transportation of the proposed third runway at SEA, the EIS must include an examination of the construction impacts of the proposed project.^{325/} In fact, where construction activities would create severe impacts that can not be mitigated, the EIS must contain a thorough discussion of those impacts.^{326/}

7. Section 4(f) of the Department of Transportation Act and Section 509 of the Airport and Airway Improvement Act of 1982

Section 4(f) of the Department of Transportation Act prohibits the Secretary of Transportation from approving any transportation project (including a airport improvement project) which requires the "use of publicly owned land of a public park, recreation area, or wildlife and waterfowl refuge of national, State, or local significance, or land of an historic site of national, State or local significance"^{327/} unless there is "no prudent and feasible alternative

^{322/} Based on 10 cubic yards of fill per truck. See Turner, Collie & Broden, Statement of Qualifications for Preliminary Engineering for a Third Independent Runway at Seattle-Tacoma International Airport (June 8, 1993) at I-33.

^{323/} Id.

^{324/} Id.

^{325/} Order 5050.4A ¶ 85s.

^{326/} Id.

^{327/} 49 U.S.C. § 303 (C). Land protected by section 4(f) will hereinafter be referred to as "Section 4(f) lands."

to using that land"^{328/} and the proposed project "includes all possible planning to minimize harm to the park, recreation area, wildlife and waterfowl refuge, or historic site resulting from the use."^{329/} Thus, Section 4(f) grafts substantive environmental considerations onto the procedural aspects of NEPA.

The FAA's proposed use of federal funds to support construction of the proposed Airport expansion also triggers the applicability of Section 509(b)(5) of the Airport and Airway Improvement Act,^{330/} which imposes obligations with respect to resources similar to those protected in Section 4(f).^{331/}

An alternative is "feasible" if it can be built as a matter of sound engineering.^{332/} An alternative is "prudent" unless there are "truly unusual factors present in a particular case or the cost of community disruption resulting from alternative[s] . . . reach[] extraordinary magnitudes," or the other alternatives themselves "present unique problems."^{333/}

The requirements of Section 4(f) can be triggered by activities which do not result in the actual "acquisition" of protected lands, but which nonetheless "impair substantially the value of the site in terms of its environmental, ecological, or historical significance."^{334/}

^{328/} Id. § 303(c)(1)

^{329/} Id. § 303(c)(2).

^{330/} 49 U.S.C. app. § 2208(b)(5).

^{331/} Courts invariably have looked to the Supreme Court's interpretation of section 4(f) in Citizens to Preserve Overton Park (Overton Park) v. Volpe, 401 U.S. 402 (1971) for guidance in interpreting the Airport Act. See Life of the Land v. Brinegar, 485 F.2d 460 (9th Cir. 1973), cert. denied, 416 U.S. 961 (1974). Citizens Airport Comm. v. Volpe, 351 F. Supp. 52, 60-61 (E.D. Va. 1972).

^{332/} Overton Park, 401 U.S. at 411; Druid Hills Civic Ass'n v. Federal Highway Admin., 772 F.2d 700, 715 (11th Cir. 1985), cert. denied, 488 U.S. 819 (1988).

^{333/} Overton Park, 401 U.S. at 413.

^{334/} Citizen Advocates for Responsible Expansion, Inc. (I-CARE) v. Dole, 770 F.2d 423, 441 (5th Cir. 1985); see also Allison v. United States Dep't of Transp., 908 F.2d 1024, 1028 (D.C. Cir. 1990); Ringsred v. Dole, 828 F.2d 1300, 1301 (8th Cir. 1987); Stop H-3 Ass'n v. Dole, 740 F.2d 1442 (9th Cir. 1984), cert. denied, 471 U.S. 1108 (1985); Adler v. Lewis, 675 F.2d 1085, 1092 (9th Cir. 1982); Louisiana Envtl. Soc'y, Inc. v. Coleman, 537 F.2d 79, 84-85

Consequently, the effect that the proposed project would have upon the utility or importance of Section 4(f) land is the determining factor in the analysis, rather than the distance between the proposed project and the Section 4(f) land.^{335/} For example, increased noise and air pollution can be substantial enough to constitute a use of Section 4(f) land that triggers the protections afforded by that statutory provision.^{336/} The proposed construction of a third runway at SEA may require the Port to acquire one or two historic sites, each of which may qualify as a Section 4(f) property. As shown in Table 4, a number of other historic properties currently lie within the noise-affected area for SEA operations,^{337/} and they can be expected to experience significant increases in noise exposure if a third runway is constructed at SEA.

(5th Cir. 1976); D.C. Fed'n of Civic Ass'ns v. Volpe, 459 F.2d 1231, 1239 (D.C. Cir. 1971), cert. denied, 405 U.S. 1030 (1972).

^{335/} Adler, 675 F.2d at 1091-92.

^{336/} Coalition Against a Raised Expressway, Inc. v. Dole, 835 F.2d 803, 811-12 (11th Cir. 1988).

^{337/} 1991 NEM Update at App. D.

TABLE 4 SELECTED PROPERTIES IN COMMUNITIES ADJACENT TO SEA WITH HISTORIC, ARCHITECTURAL, ARCHAEOLOGICAL OR CULTURAL SIGNIFICANCE	
Property	Location
Des Moines I.O.O.F. Lodge #305 (Community Club Hall)	728 South 225th
Pedersen House (Van Gasken House)	402 South 222nd
Old Gay House (Latimer House)	21617 7th Place South
Hacker Residence (Finnel House, Dickenson House)	22514 - 6th South
Elsy House	921 South 223rd
Case Home	22006 - 10th South
Roger Fotte Residence (Rayback House)	22018 - 11th South
Walsworth House	1104 South 223rd
Pool Residence (L.H. Smith House)	22204 - 9th South
McConnaughey Residence (Lindahl House)	304 South 216th
Whisler Residence (Chesney House)	1255 South 216th
Des Moines Field House (WPA Park Building)	1000 South 220th
Jacob Reith Homestead (Muckleshoot Indian Campground)	26225 Pacific Hwy. South
Shell midden	
Des Moines Beach Park (Covenant Beach Historic District)	22030 Cliff Avenue South
Masonic Home of Washington	23660 Marine View Drive South

In addition, aircraft using a third runway at SEA are likely to cause a considerable increase in the noise level exposure of numerous parks near the Airport including Saltwater State Park, Zenith Park, Des Moines Creek County Park, Marine View Park, Nature Trails Park, Miller Creek Open Space, Normandy Park Recreation Center, Barnes Creek Nature Trail, Des Moines Beach Park and tidelands. Aircraft noise can constitute a "use" of Section 4(f) resources if future noise impacts would exceed current noise levels.^{338/}

Absent a thorough analysis of alternatives that would avoid Section 4(f) lands and a determination that no feasible and prudent alternative exists, the project can not go forward. As to each Section 4(f) property, the EIS must document its current use and the degree to which the use would be affected by the proposed Airport expansion. The EIS must discuss both the average and maximum noise levels (on a daily and annual basis) at Section 4(f) properties which would be noise-affected. The EIS must disclose the increase in noise levels for each year, not just those for selected target years in the future. Analysis which does not exhaustively examine impacts to Section 4(f) lands would render the EIS objectionable.

While the Port is not governed directly by Section 4(f), SEPA regulations require the EIS to discuss the effect of the proposed expansion project on recreation plans, historic and cultural preservation activities, parks and other recreational, and historic and cultural resources.^{339/}

8. Historic, Architectural, Archeological, and Cultural Resources

The National Historic Preservation Act^{340/} provides that every federal agency, prior to approving the expenditure of any federal funds on an airport project, must "take into account the effect of the undertaking on any district, site, building, structure or object that is included in or eligible for inclusion in the National Register" of historic sites.^{341/} The FAA must consider the impacts which a project may have on both eligible and listed historic sites, and

^{338/} Allison, 908 F.2d at 1028; Sierra Club v. United States Dep't of Transp., 753 F.2d 120, 128 (D.C. Cir. 1985).

^{339/} WAC 197-11-440(6)(d)(iv), -444(2)(b)(v), (vi), (d)(iv).

^{340/} 16 U.S.C. §§ 470a-470w.

^{341/} Id. § 470f.

must engage in consultation with the appropriate state historic preservation officer^{342/} prior to an attempt to avoid or mitigate such impacts. The Port also is required by SEPA to consider the effects of its proposed expansion project on historic and cultural preservation activities and on historic and cultural resources.^{343/}

Historic or archaeological sites may be disturbed by exposure to severe noise levels or by being subjected to the effects of noise vibration. As discussed above,^{344/} it is possible that two historic sites would be physically destroyed by construction of the proposed Airport expansion project. Several other properties would be subject to increased noise exposures and vibrations.^{345/} It is therefore necessary for the EIS to examine not only the impacts of noise, but also the impacts of vibrations which fall outside the range examined in a noise analysis.

9. Water Quality

NEPA and SEPA regulations mandate consideration in the EIS of the water quality impacts of the proposed expansion of SEA.^{346/} Miller Creek and Des Moines Creek each drain a portion of the Airport site and/or land in the vicinity of the Airport. As a result, operations at SEA already have had a damaging effect on these creeks, and construction of a third runway would exacerbate existing surface water quality problems. The additional runway and increased use of Airport facilities could further overload the capacity of the Port's permitted industrial wastewater treatment facility which collects wastewater and pollutant runoff from fueling, maintenance and de-icing activities at SEA.^{347/}

^{342/} Washington law designates the Office of Archaeology and Historic Preservation, within the Department of Community Development, as the State office with principal responsibility for protecting the State's historic and archaeological properties. RCW 27.34.210-.220. An employee of that office is the designated "preservation officer" for the State. Id. 27.34.210.

^{343/} WAC 197-11-440(6)(d)(iv), -444(2)(b)(vi).

^{344/} See § V.A.7, supra.

^{345/} See id., Table 4.

^{346/} Order 5050.4A ¶ 85f; WAC 197-11-444(1)(c).

^{347/} Flight Plan EIS at 4-106.

In addition, SEA operations also may have contributed to groundwater contamination of aquifers underlying the Airport area that are used for drinking water supply. The City of Seattle operates three groundwater wells in the Riverton Heights area of the City of SeaTac, and takes water from the wells for municipal use from July to October. These wells could become contaminated by leaking fuel storage tanks and improper handling of petroleum products and hazardous wastes at SEA.

The EIS must examine the effects on the Miller, Walker, Massey, Barnes and Des Moines Creek drainage basins of

- ▶ the discharges of de-icing agents and other hazardous materials; increased industrial waste discharges; and intentional and accidental aviation and other fuel source spills;
- ▶ increased stormwater runoff from new runways, taxiways, service roads and other newly paved areas;
- ▶ construction activities, including, but not limited to, the introduction of 13.7 million yards of fill material;
- ▶ present, and potentially increased deficiencies in the Port's industrial wastewater treatment system; and
- ▶ the capacity of the Miller and Des Moines Creek Sewer Plants to handle increased stormwater runoff.

Paralleling NEPA requirements, the Airport and Airway Improvement Act requires the Governor of Washington to certify in writing that there is reasonable assurance that the proposed expansion of SEA would be implemented so as to comply with all applicable water quality standards.^{348/} The EIS must demonstrate whether this certification is to be issued.

10. Social and Induced Socioeconomic Impacts

The EIS must discuss and analyze the social and socioeconomic effects of the proposed expansion of SEA and of other reasonable alternatives.^{349/} These effects are considerable, as the Port's proposal likely would require the acquisition of 230 residential

^{348/} 49 U.S.C. § 2208(b)(7)(A).

^{349/} Order 5050.4A ¶ 85c, d; WAC 197-11-440(6)(d)(iv), (e), -444(2)(b), (c), -448.

properties and would threaten the social and economic stability of the cities surrounding the Airport.

Additionally, an increase in the capacity at SEA would cause communities near the Airport to be exposed to greater numbers of overflights and potentially increased levels of noise exposure, negatively affecting the quality of life of residents. High noise exposures have been shown to depress residential property values.^{350/} This would cause harm to residential neighborhoods in Des Moines, Burien, Normandy Park, Tukwila, and other nearby communities by contributing to further industrialization and commercialization of properties in the Airport vicinity. Pressure would mount to convert residential properties to commercial uses, contrary to the comprehensive plans adopted by the jurisdictions surrounding the Airport. Moreover, the loss of stable, residential areas would disrupt neighborhoods, affect school enrollment, threaten the tax base and undermine the social fabric of the affected communities.

The EIS must examine these and related social and economic effects of the proposed Airport expansion.

11. Endangered and Threatened Species and Biotic Communities

The Endangered Species Act mandates that each federal agency carefully examine the potential effects of projects on endangered and threatened species and critical habitat. The objective of the statute is to

insure that any action authorized, funded, carried out by [a federal] agency . . . is not likely to jeopardize the continued existence of any endangered species or threatened species or result in the destruction of adverse modification of habitat of such species which is determined . . . to be critical.^{351/}

SEPA also requires the Port to examine the effects of its SEA expansion proposal on unique species and habitat for species of plants, fish or other wildlife.^{352/}

^{350/} See, e.g., Apogee Research, Inc., Negative Economic Effects of Proposed Expansion of Dallas-Fort Worth International Airport on Euless, Grapevine and Irving, Texas (Nov. 1990).

^{351/} 16 U.S.C. § 1536(a)(2).

^{352/} WAC 197-11-444(1)(d).

Because of SEA's proximity to Puget Sound, the EIS should analyze whether Airport operations or the construction of an additional runway would affect any endangered or threatened species, including fish species (such as salmon) in Des Moines and Miller Creeks and peregrine falcons and bald eagles known to frequent the vicinity.

Additionally, the effects of the proposed Airport expansion project on other wildlife or plant species must be evaluated.

B. Irreversible and Irretrievable Commitment of Resources

NEPA requires that irreversible and irretrievable commitments of resources be addressed in the EIS before a proposed action may be implemented so that decision-makers are able to evaluate the risks of embarking on a path from which there may be no return and to assess alternatives to the proposed action in light of those risks.^{353/}

The proposed third runway at SEA would be the most expensive single runway project in the United States. Table 5 demonstrates that, at a cost in excess of \$250 million (and potentially greater than \$500 million), the proposed runway would be considerably more expensive than any other runway project in the nation.^{354/}

^{353/} 42 U.S.C. § 4332(2)(c)(v).

^{354/} It should be noted that most of the runways cited in the Table 5 would be longer than the runway proposed at SEA. In addition, most would allow parallel independent operations, which a third runway at SEA would not permit. Consequently, most of the other runways would yield twice as much benefit in airport capacity than would be provided by the proposed runway for SEA.

<p style="text-align: center;">TABLE 5</p> <p style="text-align: center;">RUNWAY PROJECT COMPARISON</p>			
Airport	Runway Length and Type	Projected Operational Date	Projected Cost (in \$ millions)
SEATTLE	7,000' dependent	2005	300
Atlanta	5,500' dependent	1996	130
Baltimore	7,800' independent	1996	48
Charlotte	10,000' independent	1997	40
Ft. Myers	10,000' independent	1999	139
Houston Int'l	9,000' independent	1999	44
Kansas City	9,500' independent	2005	65
Louisville	10,000' independent	1995	175
Memphis	8,500' independent	1995	105
Orlando	9,000' independent	1997	100
Pittsburgh	8,200' independent	1995	100
Raleigh-Durham	9,000' independent	1996	37
Salt Lake City	12,000 independent	1995	235
Spokane	8,800' independent	2000	11
Tulsa	9,600' independent	1998	100
Washington Dulles	10,000' independent	2000	60

SOURCE: U.S. Dep't of Transp., Fed. Aviation Admin., DOT/FAA/ASC-93-1, 1993 Aviation System Capacity Plan, Table 2-5.

However, the cost of the Port's proposal involves more than monetary resources. Implementation of the inadequate and expensive third-runway project at SEA may foreclose future opportunities to address the real long-term transportation needs of the Puget Sound region, and may thereby inflict permanent economic harm to the region and to the state. There are finite financial and community resources -- and a scarcity of air space -- for undertaking significant investment in transportation capacity and enhancing trade opportunities. These resources should not be squandered on what the Port admits to be a short-term solution.

The EIS must examine the implications of SEA expansion for the long-term aviation needs of the region and consider the extent to which construction of the proposed third runway and the other actions proposed in the Port's Master Plan Update would constitute an irreversible and irretrievable commitment of environmental and economic resources.

VI. CONCLUSION

The ACC wholly supports efforts to provide an atmosphere that promotes economic prosperity for the Puget Sound area. Further, the ACC recognizes that increasing the region's air transportation capacity is an essential step in creating this prosperous economic environment. Nonetheless, the ACC believes that a properly prepared EIS will reveal significant deleterious environmental impacts associated with the Port's proposed expansion plan for SEA. Further, the ACC believes that the costs of this proposed expansion -- in terms of money, time, environmental impacts and lost opportunities -- would be unfairly borne by its Airport neighbors, who also would receive less than their share of the benefits of such a massive project.

A properly prepared EIS is essential to enable local, state and federal decision-makers to make rational and informed decisions regarding the aviation planning and development for the Puget Sound region. Ultimately, these decision-makers must determine whether to commit the financial and natural resources of the region to the Port's proposal despite its considerable short-comings, or to consider a more flexible, long-term solution to air capacity needs that would enable the Puget Sound region to compete successfully for future economic development. A failure to examine the proposed actions and their alternatives in the EIS would violate NEPA and SEPA.