NOTICE: All slip opinions and orders are subject to formal revision and are superseded by the advance sheets and bound volumes of the Official Reports. If you find a typographical error or other formal error, please notify the Reporter of Decisions, Supreme Judicial Court, John Adams Courthouse, 1 Pemberton Square, Suite 2500, Boston, MA, 02108-1750; (617) 557-1030; SJCReporter@sjc.state.ma.us

SJC-11405 SJC-11407

BROCKTON POWER COMPANY LLC \underline{vs} . ENERGY FACILITIES SITING BOARD & others.

CITY OF BROCKTON \underline{vs} . ENERGY FACILITIES SITING BOARD & another² (No. 2).

Suffolk. March 4, 2014. - July 31, 2014.

Present: Ireland, C.J., Spina, Cordy, Botsford, Gants, Duffly, & Lenk, JJ.³

Energy Facilities Siting Board. Public Utilities, Electric company, Energy company. Municipal Corporations, Electric plant, Water supply. Environment, Air pollution. Electric Company. Administrative Law, Decision, Judicial review, Substantial evidence.

 ${\tt C\underline{ivil}\ action}$ commenced in the Supreme Judicial Court for the county of Suffolk on October 28, 2011.

The case was reported by Spina, J.

 $^{^{\}rm 1}$ City of Brockton (city), and various residents of the city and the town of West Bridgewater, interveners.

 $^{^{2}}$ Brockton Power Company LLC, intervener (Brockton Power or company).

 $^{^{3}}$ Chief Justice Ireland participated in the deliberation on this case prior to his retirement.

C<u>ivil action</u> commenced in the Supreme Judicial Court for the county of Suffolk on October 26, 2011.

The case was reported by Spina, J.

Gregor I. McGregor (Nathaniel Stevens with him) for city of Brockton.

David S. Rosenzweig (Erika J. Hafner & Michael J. Koehler with him) for Brockton Power Company LLC.

Sookyoung Shin, Assistant Attorney General, for Energy Facilities Siting Board.

Lisa C. Goodheart (Phelps T. Turner, Joshua D. Nadreau, & Staci Rubin with her) for Frank J. Babbin & others.

Wendy B. Jacobs & Aladdine D. Joroff, for Massachusetts Rivers Alliance & others, amici curiae, submitted a brief.

BOTSFORD, J. On August 7, 2009, the Energy Facilities

Siting Board (board), acting pursuant to G. L. c. 164, § 69J4

(§ 69J4), approved the petition of Brockton Power Company LLC

(Brockton Power or company), to build and operate a 350-megawatt combined-cycle energy generating facility (facility or project)

powered by natural gas and ultra-low sulfur distillate (ULSD) in the city of Brockton (city). As approved by the board, the facility would use wastewater from the city's advanced wastewater reclamation facility (AWRF) for its cooling tower.

In a consolidated appeal by three of the interveners, we affirmed the board's decision. See Brockton v. Energy

Facilities Siting Bd. (No. 1), ante (2014) (Brockton [No. 1]), decided today.

On April 9, 2010, while the consolidated appeal was pending, Brockton Power submitted a project change filing (PCF)

to the board, seeking approval of three changes to its project. In the PCF, Brockton Power sought to: (1) change the source of the facility's cooling tower water from the AWRF to the Brockton municipal water supply (BMWS); (2) eliminate the use of ULSD as an alternative fuel and rely solely on natural gas as the facility's fuel; and (3) make certain changes in the design of the facility. After additional public comment, extensive discovery, testimony, and six days of evidentiary hearings that the board considered as a "continuation of the [o]riginal [p]roceeding," the board issued its PCF decision, denying Brockton Power's proposal to use BMWS but approving the two other project changes. Brockton Power appealed from the board's denial of the PCF with respect to the facility's water source, 5 and the city appealed from the board's approval of the design and fuel changes. A single justice of this court reserved and reported the appeals to the full court. We affirm the board's final decision with respect to both appeals.

⁴ The city, Brockton Power, various residents of the city and the town of West Bridgewater represented by Alternatives for Communities and Environment, Inc., and the Taunton River Watershed Alliance intervened in the project change filing (PCF) proceeding.

⁵ We acknowledge the amicus brief filed by Massachusetts Rivers Alliance, Charles River Watershed Association, Jones River Watershed Association, North and South Rivers Watershed Association, and Taunton River Watershed Alliance.

The scope of our review of the board's PCF decision is the same as in <u>Brockton (No. 1)</u>, <u>supra</u>, and is set forth in G. L. c. 164, § 69P. The board's evidentiary rulings are entitled to deference, and the appellants bear the burden of showing that the board's decision is invalid. <u>Alliance to Protect Nantucket Sound</u>, Inc. v. <u>Energy Facilities Siting Bd</u>., 448 Mass. 45, 51 (2006) (Alliance I).

1. Board's authority to consider PCF as part of original proceeding. In its August 7, 2009, final decision, the board required Brockton Power to notify it of "any changes other than minor variations to the proposal so that the [board] may decide whether to inquire further into a particular issue." In addition to this general requirement, noting "the uncertainty . . . around the availability of the Brockton AWRF water supply," the board directed Brockton Power to "work with the [city] regarding use of [the city's] AWRF water, and to provide a report to the [board] with respect to the outcome of such efforts." In the event that Brockton Power determined not to

⁶ General Laws c. 164, § 69P, provides that the court's review is limited to "whether the decision of the board is in conformity with the constitution of the commonwealth and the constitution of the United States, was made in accordance with the procedures established under [G. L. c. 164, §§ 69H to 690,] and with the rules and regulations of the board with respect to such provisions, was supported by substantial evidence of record in the board's proceedings, and was arbitrary, capricious or an abuse of the board's discretion under the provisions of [§§ 69H to 690]."

use the AWRF water and instead "to use potable [municipal] water for the majority of the water requirements of its proposed facility," the board directed the company to "provide a project change filing to the [board], together with a detailed analysis focused on those issues that are germane to the use of potable water, including opportunities for water conservation."

Consistent with this directive, on April 9, 2010, Brockton Power submitted its PCF to the board seeking approval of a change in the source of the facility's water supply for the cooling tower, approval of the nonuse of ULSD as an alternate fuel, and approval of building design changes. Over the objection of interveners, who argued that the PCF should be treated as a new petition, the board, as previously described, held evidentiary hearings on the PCF and issued a decision rejecting the proposed change in source of water supply for the cooling tower, but approving the two other changes.

Under \S 69J¹4, fifth and sixth pars., the board may approve, reject in whole or in part, or conditionally approve a petition for an electrical generating facility. The statute provides

 $^{^7}$ General Laws c. 164, § 69J½ (§ 69J¼), fifth and sixth pars., provide in relevant part:

[&]quot;The board shall, within one year from the date of filing, approve a petition to construct a generating facility if the board determines that the petition meets [certain enumerated] requirements . . .

that "[i]n the event of rejection or conditional approval, the applicant may, within 180 days, submit an amended petition.

Public and evidentiary hearings on the amended petition shall be held on the same terms and conditions applicable to the original petition." G. L. c. 164, § 69J4, sixth par. See note 7, supra. The city contends that Brockton Power's PCF was an "amended petition" within the meaning of § 69J4, sixth par., and because it was submitted on April 9, 2010, 245 days after the board issued its original decision, the board did not have the authority to consider it as part of the original proceeding — the window for filing an amended petition had already closed.

According to the city, the board should have reviewed the PCF as a new petition, which would have required readjudication of the full range of issues the board considered in its original decision issued on August 7, 2009. The city's argument fails.

"We accord substantial discretion to an agency to interpret the statute it is charged with enforcing" Alliance to Protect Nantucket Sound, Inc. v. Energy Facilities Siting Bd.,

[&]quot;If the board determines that the standards set forth above have not been met, it shall, within one year of the date of filing, either reject, in whole or in part, the petition, setting forth in writing its reasons for such rejection, or approve the petition subject to stated conditions. In the event of rejection or conditional approval, the applicant may, within 180 days, submit an amended petition. Public and evidentiary hearings on the amended petition shall be held on the same terms and conditions applicable to the original petition."

457 Mass. 663, 681 (2010). Moreover, "administrative agencies have broad discretion over procedural matters before them."

Zachs v. Department of Pub. Utils., 406 Mass. 217, 227 (1989)

(Zachs). We defer to an agency's procedural rulings and review them for "error of law or abuse of discretion." Id. This is so in particular when the ruling concerns whether to reopen a proceeding or an administrative record. See Alliance to Protect

Nantucket Sound, Inc. v. Department of Pub. Utils. (No. 2), 461

Mass. 190, 193-194 & n.7 (2011); Box Pond Ass'n v. Energy

Facilities Siting Bd., 435 Mass. 408, 420 (2001) (Box Pond).

The board determined that Brockton Power's PCF was not an "amended petition" within the meaning of § 69J4, sixth par. As interpreted by the board, the "amended petition" provision is limited to an amended filing submitted by a project proponent within six months after the board has issued a final decision rejecting the original petition or imposing conditions from which the proponent seeks relief. The board contends that its power under § 69J4, fifth and sixth pars., to approve a petition with conditions, combined with its ability to "issue orders with respect to any matter over which it has jurisdiction," see G. L. c. 164, § 69H, provides it with more than sufficient authority to include in a final decision an order requiring the project proponent to bring back to the board for potential review any

proposed changes to the project that may affect the basis on which it was originally approved.

The board's interpretation of its "statutory mandate will be disturbed only if the interpretation is patently wrong, unreasonable, arbitrary, whimsical, or capricious." Box Pond, 435 Mass. at 416, quoting TBI, Inc. v. Board of Health of N. Andover, 431 Mass. 9, 17 (2000). Where, as here, the relevant statutes are silent on the means of enforcing compliance with its orders, the board has broad discretion to establish appropriate procedures. See Zachs, 406 Mass. at 227-228. administrative agency may, as here, "adopt policies through adjudication as well as through rulemaking." Alliance I, 448 Mass. at 51, quoting Arthurs v. Board of Registration in Med., 383 Mass. 299, 312-313 (1981). The board's interpretation of § $69J^{1}_{4}$, fifth and sixth pars., is a reasonable one to which we accord deference, and the procedure the board adopted to review potentially material changes to Brockton Power's project does not constitute an abuse of its discretion.8

2. <u>Water source</u>. The board in its original final decision approved Brockton Power's proposed use of water from the city's

Moreover, requiring new proceedings on the full petition would be futile, because "[a] final order of an administrative agency in an adjudicatory proceeding . . . precludes relitigation of the same issues between the same parties." Box Pond Ass'n v. Energy Facilities Siting Bd., 435 Mass. 408, 419 (2001) (Box Pond), quoting Tuper v. North Adams Ambulance Serv., Inc., 428 Mass. 132, 135 (1998).

AWRF for the facility's cooling tower. Because the city refused to supply recycled wastewater from the AWRF for the facility, Brockton Power submitted a PCF based on the use of water from BMWS, which supplies potable water to the city. The board concluded that the environmental impacts associated with the Brockton Power's use of BMWS water failed to "minimize the environmental impacts consistent with the minimization of costs associated with the mitigation, control, and reduction of the environmental impacts of the proposed generating facility."

G. L. c. 164, § 69J4, fifth par.

Brockton Power argues that the board's analysis of environmental impacts intruded on the authority of the Department of Environmental Protection (DEP) was unsupported by substantial evidence. We disagree, and conclude that Brockton Power has not met its burden of showing that the board's decision is invalid. See Alliance I, 448 Mass. at 51.

The record reflects the following facts. The city draws its water supply from the Silver Lake system, the Brockton Reservoir, the Hubbard Avenue well and, beginning in 2008, a desalination plant owned and operated by Aquaria, LLC (Aquaria), in Dighton. The city's permits issued under the Water Management Act (WMA), G. L. c. 21G, authorize withdrawals of

 $^{^{\}rm 9}$ The Silver Lake system includes Silver Lake, Monponsett Pond, and Furnace Pond.

11.94 million gallons per day (mgd) from the Silver Lake system and Brockton Reservoir. ¹⁰ In addition, the city is authorized to purchase up to 4.07 mgd from Aquaria, which draws water from the Taunton River. ¹¹

In 1986, subsequent to a prolonged drought, the predecessor agency of the DEP issued an administrative order and emergency declaration that, among other requirements, directed the city to control water demand and withdrawals, and to develop new water sources. Thereafter, in 1995, an administrative consent order (ACO) replaced the emergency declaration. Pursuant to the ACO, the city reestablished its water commission and, among other measures, prepared a comprehensive water management plan concerning its water supply. In 1997, a modification to the ACO

The Water Management Act (WMA), G. L. c. 21G, permits for the Silver Lake system authorize withdrawals of 11.11 million gallons per day (mgd). The WMA permit for the Hubbard Avenue well authorizes withdrawals of 0.04 mgd, but this well may be used only in emergency situations with permission of the Department of Environmental Protection (DEP). The WMA permit for the Brockton Reservoir authorizes a withdrawal of 0.83 mgd. Since 1994, however, the city has obtained less than ten per cent of its supply from the Brockton Reservoir.

¹¹ By contract, the city is entitled to 3.5 mgd from Aquaria, LLC (Aquaria), in 2014, a withdrawal amount that will increase incrementally to 4.07 mgd by 2019. The city also has the right to purchase the first 1 mgd of excess water from Aquaria and to demand Aquaria produce and provide a minimum of 0.5 mgd of excess water during June, July, and August in addition to the contracted amounts described above. In 2014, the city is expected to pay Aquaria \$5.8 million for the right to 3.5 mgd of water from the plant, not including any payments for excess water purchased.

also established a "safe yield" of 10.33 mgd for the city from its then existing sources, which did not yet include the Aquaria plant. The ACO provides that in the event the city's water withdrawals exceed 11.3 mgd or 110 per cent of the "safe yield," whichever is larger, the excess withdrawal will "constitute a request for the imposition of a [d]eclaration of [w]ater [e]mergency." From 1996 to 2010, the city's average annual water use was relatively constant, at approximately 10 mgd. In 2014, the city is estimated to require between 10.15 and 11.44 mgd of water from all sources. The ACO, and the safe yield limits, remain in effect.

As proposed to be modified by the PCF, the facility's cooling tower will require 1.75 mgd of water at full capacity on

¹² Pursuant to G. L. c. 21G, § 2, "[s]afe yield" is defined as "the maximum dependable withdrawals that can be made continuously from a water source including ground or surface water during a period of years in which the probable driest period or period of greatest water deficiency is likely to occur; provided, however, that such dependability is relative and is a function of storage and drought probability."

¹³ In its November, 2009, comprehensive water management plan (CWMP), which has not yet been approved by the DEP, the city sought to increase its permissible withdrawals from the Silver Lake system and Brockton Reservoir to 13.1 mgd from the currently approved 11.3 mgd.

¹⁴ In its draft CWMP required as a part of the MEPA certification for use of water from the Aquaria plant, the city requested that the administrative consent order (ACO) be lifted. However, the DEP has not yet lifted the ACO.

a typical day, or 1.1 mgd on an average annual basis.^{15,16} During the summer electrical peak period, when the Silver Lake system is the most stressed, the facility is expected to use water at the rate of 2.1 mgd, roughly twice its estimated annual average rate.¹⁷

Brockton Power contends that BMWS readily can supply the volume of potable water necessary for the facility's cooling tower, essentially because, in Brockton Power's view, "most (if not all) of the incremental water needed to supply [the facility] will come from Aquaria rather than the city's historic system." The board disagreed, noting that the city had never had to manage the supply demand of a water customer the size of the Brockton Power facility, that the facility would account for

¹⁵ The estimate for operating at full capacity on a typical day is based on the facility's operation at one hundred per cent capacity on a day with a temperature of fifty-nine degrees Fahrenheit. The average annual basis estimate is based on operation at seventy per cent capacity, which Brockton Power asserts would be typical for the facility, on a day with a temperature of fifty-nine degrees Fahrenheit. Due to design changes, these estimates represent reductions from the volumes initially approved by the board for the use of effluent from the city's AWRF.

¹⁶ In Brockton Power's original petition as approved by the board, it was estimated the facility would require 0.257 mgd of potable water from the city for process and sanitary water needs. The city has issued a permit approving the facility's use of this quantity, and this aspect of the original project filing remains unchanged in Brockton Power's PCF.

 $^{^{17}}$ This estimate is based on operation at full capacity on a day with a temperature of ninety degrees Fahrenheit.

more than ten per cent of the city's current water demand, and that despite greater flexibility in water withdrawal allocations due to Aquaria, "some, and possibly even a significant portion, of the [facility's] municipal water could come from Silver Lake." Noting that the city's water supply problems have resulted in significant environmental impacts to the Silver Lake system over the years and that Brockton Power had not provided evidence concerning the additional environmental impacts on that system that might result from Brockton Power's increased consumption for the project, the board concluded that Brockton Power had not met its burden to show that the environmental impacts of the proposed change would be minimized consistent with the minimization of related costs, as required by § 69J4, fifth par.

On appeal, Brockton Power contends that the board impermissibly intruded into the DEP's statutory and regulatory authority as expressed in the ACO's threshold for triggering a declaration of water emergency for the city. Brockton Power argues that the DEP's "determination of safe yield as the basis for the 1995 ACO limit of 11.3 [mgd] specifically included minimization and balancing of environmental protection factors" to which the board was obligated to defer in conducting its review of the PCF. We disagree.

In evaluating a claim that the board's determination is arbitrary, capricious, or unsupported by substantial evidence, we "give[] great deference to the board's expertise and experience." Alliance I, 448 Mass. at 51. "In determining whether an agency decision is supported by substantial evidence, we must consider the record as a whole and reverse the agency's decision if 'the cumulative weight of the evidence tends substantially toward opposite inferences.'" Boston Gas Co. v. Department of Telecomm. & Energy, 436 Mass. 233, 237 (2002), quoting Cobble v. Commissioner of the Dep't of Social Servs., 430 Mass. 385, 391 (1999). Here, Brockton Power has not met its burden of showing that board's decision was erroneous.

Pursuant to § 69J4, fifth par., the board is the agency charged with determining whether a project proponent's petition is an accurate and complete description of the environmental impacts of the proposed facility, and also minimizes environmental impacts consistent with the minimization of costs associated with mitigation, control, and reduction of environmental impacts. "A permit issued by the board is only the first of many permits and licenses that will be required of a developer of a generating facility, and no other State agency may issue a construction permit for a generating facility until it has first been approved by the board." Andover v. Energy Facilities Siting Bd., 435 Mass. 377, 380 (2001) (Andover). The

Legislature has provided for complementary but independent roles for the board and the DEP. Just as the board does not delegate or abdicate its statutory responsibility by recognizing the authority and expertise of the DEP over water management issues, see id. at 381, the board's independent exercise of its statutory authority does not intrude upon DEP's authority over issues relating to municipal water supplies under the WMA, G. L. c. 21G, §§ 3, 7.

In short, the board's and the DEP's mandates are not identical although they touch on many of the same environmental concerns; "sensible administrative coordination" between the two agencies is necessary. See Andover, 435 Mass. at 382. The board's approval of a petition to construct an energy facility will not necessarily satisfy the DEP's requirements for a permit for that facility under the WMA. Cf. id. at 380-381 (discussing different roles of board and DEP in relation to review of air emissions). Likewise, a DEP permit issued to a municipality

¹⁸ General Laws c. 164, § 69H, fourth par., provides in part: "In carrying out its functions, the board shall cooperate with, and may obtain information and recommendations from every agency of the state government and of local government which may be concerned with any matter under the purview of the board. Each state or local government agency is directed to provide such information and recommendations as may be requested by the board." In addition, § 69H, second par., provides that the board membership include "the secretary of energy and environmental affairs, who shall serve as chairman, . . . the commissioner of the department of environmental protection, . . . or the designees of any of the foregoing . . . "

under the WMA is not equivalent to a determination that a proposed facility would minimize environmental impacts as required by § 69J4, nor does the existence of such a permit compel the board to grant a petition under that statute. Far from intruding on the DEP's authority, the board would have abdicated its statutory duties if it had based its decision on the proposed water source change wholly on the DEP's municipal water withdrawal determinations under the WMA.¹⁹

Moreover, the board's determination was supported by substantial evidence. In its PCF, Brockton Power contended that because the city was already withdrawing close to the limit of its ACO threshold from its traditional sources, the incremental water volume required by the facility would primarily come from the Aquaria plant, which provided a significant new source of

¹⁹ Although Brockton Power correctly notes that environmental protection principles, including water conservation, are an integral component of DEP's water management authority, it does not follow that the ACO threshold limit of 11.3 mgd (or 110 per cent of the system's safe yield at the time of the ACO) is "fully protective" of the environmental concerns that the board must consider under § 69J4, fifth par. Indeed, other than the DEP's general mandate to consider environmental effects of water withdrawals under G. L. c. 21G, § 7, there is no evidence that the ACO specifically considers the environmental effects of the safe yield threshold. Rather, the focus of the ACO is to "ensure an ample supply of potable water is available to [the city]." The safe yield established by the ACO merely sets a threshold at which a declaration of water emergency will be imposed on the city if the twelve month average exceeds the designated amount; it does not purport to establish a level of water withdrawals that is protective of the city's traditional water sources, such as the Silver Lake system.

potable water for the city. Consequently, Brockton Power urged, despite the city's historical water supply challenges, the facility would not have a negative effect on the environment of the Silver Lake system. As the board recognized, however, the city's water conservation efforts and stable population forecast made it likely that the city's withdrawals would remain under the ACO threshold. Moreover, Brockton Power had no control over the origins of the municipal water required by the facility, and given the city's view of the Aquaria plant as a supplemental source of its water needs, the volume required by the PCF might come entirely or at least in part from the Silver Lake system. Given the evidence that the city's municipal water withdrawals continue to have a significant environmental impact on the Silver Lake system, the board concluded that Brockton Power had not met its burden of proving that the environmental impacts of the incremental potable water usage from BMWS had been minimized consistent the requirements of § 69J4, fifth par.

Brockton Power complains that the board did not analyze sufficiently the environmental impacts of the additional withdrawals anticipated by the PCF on the Silver Lake system, but this appears to have been the result of the position the company itself took before the board: the PCF filing proceeded on the assumption that most or all of the increased water

required by the facility would come from the Aquaria plant. 20
Nevertheless, it is apparent that the board did analyze and consider the effect of the proposed water use on the city's traditional water sources, including two studies and expert testimony indicating that the city's withdrawals have a continued impact on the environment of the Silver Lake system by degrading freshwater mussel habitat and increasing environmental stress on the Jones River, the major tributary of Silver Lake.

Moreover, contrary to Brockton Power's assertion, the board considered the city's water conservation progress in light of continuing environmental challenges to the Silver Lake system and the facility's projected water needs. 21

In its PCF decision, the board noted: "The [c]ompany did not provide information on or analysis of the different environmental impacts on the Silver Lake system that would result from the [c]ity's water consumption with the [p]roject's use of [Brockton municipal water supply (BMWS)] water as compared to the [c]ity's water consumption without the [p]roject. Rather the [c]ompany restricted its argument to the unsubstantiated and, in fact, highly questionable, claim that its cooling tower water would predominately come from Aquaria. Without analysis specific to the Silver Lake system, the environmental impacts of the [p]roject change cannot be reliably assessed."

²¹ Brockton Power's remaining arguments are without merit. The board need not address or make findings with respect to all the evidence in the record. See $\underline{\text{Box Pond}}$, 435 Mass. at 418. The board's initial approval of 0.257 mgd of BMWS water for sanitary and process use by the facility does not compel the conclusion that the proposed use of 1.1 mgd for the facility's cooling tower minimized environmental impacts as required by § 69J¹4. Further, the board did not deviate impermissibly from its precedent. Although the board previously has granted siting

Although the board's denial of the PCF with respect to BMWS appears to preclude construction of the facility as currently proposed, we briefly review the city's appeal of the board's approval of the two other proposed changes.²²

3. Elimination of ULSD capacity. As initially approved by the board, the facility would use ULSD as an alternative fuel for up to sixty days per year. In its PCF filing, Brockton Power proposed to construct the facility with natural gas-only generators, eliminating the facility's capacity to use ULSD.²³

permits for energy facilities utilizing municipal water for their cooling towers, the board's decision on the PCF here discussed and distinguished these precedents based on the evidence of environmental threats to the Silver Lake system contained in the record. See Tofias v. Energy Facilities Siting Bd., 435 Mass. 340, 349 (2001), quoting Robinson v. Department of Pub. Utils., 416 Mass. 668, 673 (1993) ("'reasoned consistency' . . . means only 'that any change from an established pattern of conduct must be explained'"). Finally, Brockton Power asserts also that the board's decision interfered with its right to obtain potable water from the BMWS in a nondiscriminatory manner. Because of the projected quantity of water that Brockton Power will need for the facility's cooling tower, discussed infra, the company is not situated similarly to other users of the system. See Rounds v. Board of Water & Sewer Comm'rs, 347 Mass. 40, 44 (1964).

The board concluded, "The evidence in this case demonstrated that the three proposed [p]roject changes are not interrelated in such a way that implementation of one [p]roject change without implementation of one, or both, of the other two changes is prevented. Accordingly, our findings stated above are made considering each proposed change on a stand-alone basis."

²³ The PCF did not propose modifying the facility's use of three ULSD-powered "black-start" generators, used for restarting the turbine when power is not available.

According to Brockton Power, a gas-only plant would reduce air emissions, visual impacts, most ULSD deliveries, and the facility's water requirements, while the expansion of gas supplies in the Northeast would guarantee the reliability of the facility's energy supply. The board found that a gas-only plant would "reduce the environmental impacts, consistent with the minimization of costs associated with the mitigation, control, and reduction of the environmental impacts" of the facility, as required by § 69J4, fifth par.

On appeal, the city primarily asserts deficiencies with respect to the air emission findings in the board's original final decision. As stated previously, in reviewing a PCF, the board need not consider issues that have already been decided in the original decision. The board's PCF decision analyzed the PCF for accuracy and completeness and "compared the

²⁴ For example, the city argues that the board erred by relying on the Environmental Protection Agency's National Ambient Air Quality Standards (NAAQS) to evaluate the facility's estimated emissions, and by using Logan Airport meteorological data. We address these issues in Brockton v. Energy Facilities (2014) (Brockon [No. 1]), also Siting Bd. (No. 1), ante decided today. In addition, the city alleges that the board erred by not considering an alternative turbine and cooling tower design. However, the board was under no obligation to examine design alternatives in the context of a review of the PCF for a facility that it had already approved. See Box Pond, 435 Mass. at 419-420. Finally, the city argues that the board failed to apply the Environmental Justice policy (EJ policy) to the PCF. We also discuss the EJ policy in Brockton (No. 1), supra. In this appeal, the city does not claim that the board failed to implement the procedural protections of the EJ policy in relation to the PCF.

environmental impacts of the facility as originally approved with the environmental impacts of the project as changed." This approach is reasonable and consistent with the board's statutory mandate. See Zachs, 406 Mass. at 227 ("administrative agencies have broad discretion over procedural aspects of matters before them"). Our review of the city's appeal is limited to new issues raised by the PCF. See Box Pond, 435 Mass. at 419-420 (rejecting attempt to relitigate issues already decided in underlying proceeding). With respect to the elimination of ULSD fuel, we conclude that Brockton Power's PCF was accurate and complete, and "minimize[d] the environmental impacts consistent with the minimization of costs associated with the mitigation, control, and reduction of the environmental impacts." G. L. c. 164, § 69J%, fifth par.

The record indicates that with the elimination of ULSD, the emissions of all criteria pollutants will be reduced from the level estimated in the original petition, which the board has already approved (and we have upheld).²⁵ Accordingly, there is

Brockton Power's estimated percentage reductions based on a comparison of the emission estimates in the proposal to those in the original final decision are as follows: nitrogen dioxide (twenty-nine per cent); carbon monoxide (ten per cent); particulate matter up to ten micrometers in diameter (thirty-nine per cent); particulate matter up to 2.5 micrometers in diameter ($PM_{2.5}$) (forty-two per cent); sulfur dioxide (twenty-three per cent); and volatile organic compounds (thirty-eight per cent). A smaller portion of this reduction is due to updated estimates (with respect to the proportion of particulate

no basis upon which the board could have concluded that the PCF would not minimize environmental impacts, as required by G. L. c. 164, § 69J¼, fifth par. 26 The city has not met its burden of showing that the board's decision is invalid, unsupported by substantial evidence, or an abuse of discretion. See Alliance \underline{I} , 448 Mass. at 51.

The city also argues that the board erred by underestimating the carbon monoxide (CO) emissions from the facility by basing its analysis on Brockton Power's allegedly inaccurate estimates of plant "start-up and shut-down" events. 27 In its PCF decision, the board noted that the city and Brockton Power disagreed about the modeling of the CO emissions. Without analyzing the dispute, the board noted Brockton Power's lower

matter classified as $PM_{2.5}$) and improved aerodynamic downwash resulting from changes in the design features in the PCF. See note 26, infra.

 $^{^{26}}$ With respect to the NAAQS for annual $PM_{2.5}$ levels, Brockton Power's new estimate, based on a gas-only plant, updated projections regarding emissions, and design changes, is 9.46 micrograms per cubic meter ($\mu g/m^3$) annual $PM_{2.5}$. In Brockton (No. 1), supra, we affirmed the board's approval of annual $PM_{2.5}$ at a level of 10.15 $\mu g/m^3$.

Prockton Power estimated that the gas-only facility plant would emit 98.5 tons per year (tpy) of CO, a ten per cent reduction from 108.9 tpy for the facility approved by the board in the original final decision. According to the city's expert, the correct estimate for the facility's CO emissions is 138.8 tpy. The city alleges that the lower figure, accepted by the board, is "conveniently below the then-applicable 100 tpy threshold for a rigorous review under the [F]ederal Clean Air Act's Prevention of Significant Deterioration . . . permitting process."

figures and stated that the facility would be subject to

"enforceable annual and hourly limits . . . set out in [the

DEP's] Conditional Air Plan Approval." Brockton Power's CO

emissions estimate, 98.5 tpy, represents 8.6 per cent of the

NAAQS threshold for one-hour CO, and 18.9 per cent of the NAAQS

threshold for eight-hour CO. Although the city's estimate of

138.8 tpy is higher than Brockton Power's, it is still well

below the NAAQS limit for this pollutant. The board is entitled

to rely on the NAAQS thresholds to determine whether a project

proposal has minimized the environmental impacts pursuant to its

review. See Brockton (No. 1), supra at . The board did not

err by concluding that the CO emissions from a gas-only plant

satisfied the standards of § 69J4, fifth par.

4. Structural design changes. In the original final decision, the board declined to grant Brockton Power's requested zoning exemption under G. L. c. 40A, § 3, which would have excused the facility from the Brockton zoning ordinance.

Brockton Power did not appeal this aspect of the board's original decision. In its PCF, however, Brockton Power proposed three changes to the facility as approved in the underlying decision, which, in its view, would make the facility compliant with the city's zoning ordinance. Although the board took no

²⁸ First, Brockton Power proposed to replace the 130-foot building enclosing the heat recovery steam generator with four

position on whether the modifications would meet the city's zoning ordinance, it analyzed the changes with respect to noise and visual impacts, and concluded that the changes minimized the facility's environmental impacts as required by G. L. c. 164, \$ 69 J^{1}_{4} , fifth par. 29

On appeal, the city argues that the board erred by approving a project that does not comply with a local zoning ordinance. This argument is without merit. In contrast to the minimization of visual and noise impacts, compliance with local zoning is not a precondition for the approval of a siting petition under § 69J¼. The board's determination that zoning issues were "outside the scope" of its § 69J¼ review is reasonable.

5. <u>Conclusion</u>. We affirm the board's PCF decision in all respects.

So ordered.

¹¹⁶⁻foot sound walls. Second, Brockton Power proposed to reduce the height of the main power facility building from sixty-four to sixty feet. Third, Brockton Power proposed to redesign the accessory buildings so that all of them would be under twenty-five feet in height.

²⁹ At the time of the board's PCF decision, the zoning dispute was the subject of a case pending before the Land Court.