

UNITED STATES DISTRICT COURT
FOR THE DISTRICT OF VERMONT

ENTERGY NUCLEAR VERMONT YANKEE, LLC
and ENTERGY NUCLEAR OPERATIONS, INC.,

Plaintiffs,

v.

Docket No. 1:11-cv-99 (jgm)

PETER SHUMLIN, in his official capacity as
GOVERNOR OF THE STATE OF VERMONT;
WILLIAM SORRELL, in his official capacity as the
ATTORNEY GENERAL OF THE STATE OF
VERMONT; and JAMES VOLZ, JOHN BURKE
and DAVID COEN, in their official capacities as
MEMBERS of THE VERMONT PUBLIC
SERVICE BOARD,

Defendants.

DECISION¹ AND ORDER ON THE MERITS
OF PLAINTIFFS' COMPLAINT
(Doc. 1)

Plaintiffs Entergy Nuclear Vermont Yankee, LLC (ENVY) and Entergy Nuclear Operations, Inc. (ENOI) (collectively “Entergy”)² own and operate the Vermont Yankee Nuclear Power Station (Vermont Yankee), a merchant plant in Vernon, Vermont that sells electrical power wholesale on the interstate market. Plaintiffs’ Complaint against Vermont’s governor, its attorney general, and members of the Vermont Public Service Board, asserts three claims. Count One seeks a permanent injunction and declaration that three Vermont enactments governing

¹ The Court attaches a Table of Contents at the end of this Decision.

² ENVY and ENOI are indirect subsidiaries of parent Entergy Corporation, a Delaware corporation headquartered in New Orleans, Louisiana. They are co-holders of NRC Facility Operating Licence No. DPR-28 and Renewed Facility Operating License No. DPR-28.

Vermont Yankee, title 10, section 6522 of the Vermont Statutes³ (added by Act 74), Act 160, and Act 189,⁴ are grounded in nuclear safety concerns and therefore invalid under the Supremacy Clause of the United States Constitution because they are preempted by the Atomic Energy Act. See U.S. Const. art. VI; Atomic Energy Act, 42 U.S.C. § 2011 et seq.

According to Act 160's provisions, when a nuclear plant petitions for continued operation, if the Vermont legislature declines to act, or is unable to pass, for any reason, affirmative legislation approving a certificate of public good (CPG) for continued operation, the plant's petition will remain pending and its current certificate will expire. Here, Vermont Yankee's current certificate expires March 21, 2012. By operation of a legislative pocket veto of legislation proposed in 2010, and if the legislature fails to take any further action before March 21, 2012, Vermont Yankee may be required to shut down after that date. Act 74 permitted Vermont Yankee to seek approval to construct spent nuclear fuel storage facilities from the Public Service Board (PSB or "the Board") and created a Clean Energy Development Fund, funded by Entergy. Plaintiffs challenge only section 6522, which contains a provision requiring affirmative legislation to permit storage of spent fuel derived from operations after March 21, 2012. Act 189 called for a "Comprehensive Vertical Audit and Reliability Assessment" of the

³ Plaintiffs, at the close of trial, with no objection from the State, represented to the Court they are abandoning their challenge to section 6523, which established the Vermont Clean Energy Development Fund, under Count One. Defendants are not prejudiced by the abandonment, and it is within the Court's sound discretion to permit amendment of the pleading to conform to the evidence at trial. Fed. R. Civ. P. 15(b).

⁴ Act 74, 2005 Vt. Acts & Resolves 599; Act 160, 2006 Vt. Acts & Resolves 204; and Act 189, 2008 Vt. Acts & Resolves 478 are available at 2005 Vt. Laws 74 (LexisNexis), 2006 Vt. Laws 160 (LexisNexis), and 2008 Vt. Laws 189 (LexisNexis), respectively. They are also searchable in VT-LEGIS-OLD (West) and at www.leg.state.vt.us/Research.

systems at Vermont Yankee, which resulted in an audit performed by Nuclear Safety Associates, independent consultants.

Count Two seeks a permanent injunction and declaration stating the Federal Power Act, 16 U.S.C. § 791a et seq., preempts Vermont state actors from conditioning Vermont Yankee's continued operation on the existence of a below-market power purchase agreement (PPA) between Vermont Yankee and Vermont's retail utilities, on grounds the Federal Energy Regulatory Commission is vested with exclusive jurisdiction to regulate the transmission and sale of wholesale power sold in the interstate market, and neither Vermont's Public Service Board,⁵ nor any other state actor, can dictate the wholesale rates, terms, or conditions of any sales between Vermont Yankee and a third party.

Count Three seeks a permanent injunction and declaration that Vermont may not under color of state law condition continued operation upon the existence of a satisfactory below-market power purchase agreement with Vermont retail electric utilities, because to do so is coercive and places substantial burdens on interstate commerce, in violation of the Commerce Clause, U.S. Const. art. I, § 8, cl. 3, and 42 U.S.C. § 1983.

⁵ The Public Service Board is a three-member, quasi-judicial board given statutory authority to supervise the rates, quality of service, and overall financial management of Vermont's public utilities, such as electric, gas, telecommunications, and private water companies. The Department of Public Service oversees laws relating to public service corporations, and firms and individuals engaged in these business; it represents the State in the procurement of energy and represents the interests of the people of the state in hearings before the Board. See Vt. Stat. Ann. tit. 30, §§ 2, 3, 9, 203; and see generally Vt. Stat. Ann. tit. 30, chs. 1, 3, 5. Vermont law provides that the Board and the Department have jurisdiction over companies "engaged in the manufacture, transmission, distribution or sale of gas or electricity directly to the public or to be used ultimately by the public." Vt. Stat. Ann. tit. 30, § 203(1).

This Court held a three-day bench trial on the merits of Plaintiffs' Complaint from September 12 to 14, 2011. It has considered pre- and post-trial briefs filed by the parties, the evidence admitted at trial, and evidence from the preliminary injunction hearing of June 23 and 24, 2011, moved into the trial record. It has also reviewed and considered pre- and post-trial memoranda by amici curiae the Massachusetts Attorney General, New England Coalition, Inc., Vermont Natural Resources Council, and the Conservation Law Foundation together with the Vermont Public Interest Research Group, all in support of Defendants.

This Court's decision is based solely upon the relevant admissible facts and the governing law in this case, and it does not purport to resolve or pass judgment on the debate regarding the advantages or disadvantages of nuclear power generation, or its location in this state. Nor does it purport to define or restrict the State's ability to decline to renew a certificate of public good on any ground not preempted or not violative of federal law, to dictate how a state should choose to allocate its power among the branches of its government, or pass judgment on its choices. The Court has avoided addressing questions of state law and the scope of a state's regulatory authority that are unnecessary to the resolution of the federal claims presented here.

For the reasons that follow, Act 160 and a single provision in Act 74 – requiring affirmative legislative approval for storage of spent nuclear fuel after March 21, 2012 – are held to be preempted by the Atomic Energy Act. See infra Sections III.A-B. The challenge to Act 189 is moot. See infra Section III.C. Furthermore, Plaintiffs are entitled to injunctive relief on their Commerce Clause claim. See infra Section IV.B and Section VI (Conclusion).

I. BACKGROUND

The Vermont Yankee Nuclear Power Station, a boiling water reactor, began operating in 1972 under a federal forty-year Facility Operating License issued by the Atomic Energy Commission, the federal agency preceding the Nuclear Regulatory Commission (NRC). That current license extends to March 21, 2012, and the NRC in March 2011 renewed it through March 21, 2032. At its inception, Vermont Yankee was owned by Vermont Yankee Nuclear Power Corporation (VYNPC), a joint venture of eight New England retail utilities, including two Vermont utilities⁶ that held a combined stake of 55 percent. Since 1972, Vermont Yankee has produced approximately one-third of the electricity consumed by Vermont. This consumption today represents approximately 55 percent of the station's output, with the remaining 45 percent purchased by utilities in neighboring states.

In 1999, VYNPC contemplated selling Vermont Yankee. In February 2001, the Public Service Board rejected an attempted sale to AmerGen Energy Co., LLC. In the summer of 2001, VYNPC invited further bids at auction. Entergy successfully bid to acquire the plant and participated in ten-month-long proceedings before the Board, requesting a Certificate of Public Good to own and operate the plant. During the time preceding the contemplated sale, VYNPC held a state-issued CPG under the authority of title 30, sections 101-103 of the Vermont Statutes. See June 13, 2002 PSB Order in Dkt. No. 6545, at 12 (approving sale), Pls.' Ex. 378 (Doc. 4-66).

VYNPC presented the proposed Entergy transaction to the Board, which included a Memorandum of Understanding signed on March 4, 2002 (2002 MOU) by VYNPC, the two Vermont electric utilities with a controlling stake in VYNPC, ENVY and ENOI, and the

⁶ Central Vermont Public Service (CVPS) and Green Mountain Power (GMP).

Vermont Department of Public Service (DPS or “the Department”), a state executive agency representing the public interest of Vermonters in energy-related matters. See 2002 MOU, Pls.’ Ex. 361 (Doc. 4-49). The 2002 MOU provided its terms were subject to approval by the Public Service Board,⁷ provided for the Board’s jurisdiction over a possible CPG renewal for continued operation after 2012, allowed the Vermont nuclear engineer increased inspection access to Vermont Yankee by virtue of a separate memorandum of understanding, called for ENVY to share fifty percent of “excess revenue”⁸ with VYNPC for ten years should it operate beyond 2012, and offered Vermont utilities the first opportunity to negotiate contracts if Vermont Yankee increased its output or operated past 2012. Id.; see also June 13, 2002 PSB Order in Dkt. No. 6545, at 156, Pls.’ Ex. 378 (Doc. 4-66) (describing the 2002 MOU).

⁷ The 2002 MOU recites it is “being entered into for settlement purposes” and, upon approval of the Board, would be incorporated in the Purchase and Sale Agreement and related documents. 2002 MOU ¶ 16-3, Pls.’ Ex. 361. It also recites that if “the Board fails to approve this agreement in its entirety or acts to overrule or disapprove any portion hereof,” the agreement “may terminate” in each party’s sole discretion. Id. ¶ 9. The parties did not exercise their rights to terminate the 2002 MOU upon receiving the Board’s order.

⁸ Entergy agreed to share with VYNPC fifty percent of its Vermont Yankee revenues in excess of a negotiated strike price for the first ten years of operation after 2012. This captured “some of the value” of relicensing for the selling entities. Pls.’ Ex. 378 at 71. As of 2009, two Vermont utilities own a combined 92.5 percent of VYNPC. A 2009 report prepared by consultants GDS Associates, Inc. estimated the net present value of the projected total of ten years’ excess revenue to the two Vermont utilities (expected to flow to their ratepayers) would be \$587.8 million in 2012 dollars. GDS Assocs. Report to DPS, at 11-4 (Feb. 27, 2009), Pls.’ Ex. 327 (Doc. 4-18). Under the 2002 MOU, while Entergy is obligated “as a result of license extension” after 2012, to offer VYNPC a commercially reasonable 30-day opportunity to negotiate on an exclusive basis, its only obligations are to offer notice of the opportunity and to bargain in good faith; if Vermont Yankee’s license and CPG are extended beyond 2012, Entergy appears free under the 2002 MOU to sell power to any purchaser at wholesale market prices. See 2002 MOU ¶ 1(a).

Plaintiffs assert they were aware the Board had, on its own initiative, raised the possibility of ordering the immediate or future shutdown of Vermont Yankee, and therefore made substantial concessions regarding the power purchase price for Vermont utilities and commitments regarding future decommissioning, in exchange for the Department's promise to recommend to the Board that it approve the sale and issue a CPG. Compl. ¶ 53. In the application proceedings for the sale, ENVY informed the Board that it intended to pursue three projects ENVY identified "as fundamentals in Entergy's business model to make the power station a viable business," namely, to secure an extended power uprate, construct a dry fuel storage facility, and renew the plant's operating license through 2032. See Entergy Nuclear Vt. Yankee, LLC v. United States, 95 Fed. Cl. 160, 173 (2010) (citing testimony by ENVY executive Jay Thayer in that case); see also Defs.' Ex. 1226 at JA 1035 (Thayer Test. before U.S. Court of Federal Claims (stating the three projects were identified to the Board in the proposed sale, and noting, "take away any one of those and the business case falls apart"))).

In a paragraph entitled "Board Approval of Operating License Renewal," the 2002 MOU provided that Entergy's CPG pursuant to the sale would authorize operation only until March 21, 2012, and continued operation would be allowed "only if application for renewal . . . is made and granted." 2002 MOU ¶ 12. Furthermore, the signatories agreed as follows:

(a) that the Board has jurisdiction under current law to grant or deny approval of operation of the VYNPS [Vermont Yankee Nuclear Power Station] beyond March 21, 2012 and (b) to waive any claim each may have that federal law preempts the jurisdiction of the Board to take the actions and impose the conditions agreed upon in this paragraph to renew, amend, or extend the ENVY CPG and ENO CPG to allow operation of the VYNPS after March 21, 2012, or to decline to so renew, amend or extend.

Id.

At the time the 2002 MOU was signed, the Public Service Board was the quasi-judicial entity bestowed with statutory authority to consider petitions and grant CPGs for all corporations and utilities subject to its jurisdiction. The Board has the power to accept petitions and hold hearings, is required to “make . . . findings of fact,” to “state its rulings of law when they are excepted to,” and its decisions can be appealed to the Vermont Supreme Court, which is required to accord them deference. Vt. Stat. Ann. tit. 30, §§ 11, 12. Furthermore, Vermont law provides that a license subject to an agency’s notice and hearing requirements does not expire until a final determination on an application for renewal has been made. *Id.* tit. 3, § 814. Entergy filed its petition for a CPG pursuant to the sale, citing title 30, sections 102 and 231 of the Vermont Statutes as authority for the CPG.

The Board approved the sale in a June 13, 2002 Decision and Final Order, with unilateral Board modifications excluding and amending portions of the parties’ 2002 MOU, none of which are at issue here. See June 13, 2002 PSB Order in Dkt. No. 6545, at 158 ¶ 3 & app. D., Pls.’ Ex. 378 (amending a provision to require that all, not just part, of excess decommissioning funds contributed by Entergy be given to ratepayers).

In its decision and final order, the Board found: ENVY would be able, particularly with its parent company’s resources, to safely operate the plant; Vermont utilities had obtained a power purchase agreement through 2012 for approximately 55 percent of Vermont Yankee’s output, under a formula which ensured Vermonters rates lower than the estimated operating costs over the remaining license term, and capped in a way that shielded ratepayers from projected higher wholesale market prices, such that they were projected to pay significantly less than they would had utilities retained plant ownership; and finally, the sale transferred to ENVY significant

financial risks associated with ownership, operation, and the decommissioning fund, which, without the sale, would have been shouldered by Vermont utilities and ratepayers. See id. at 3-5, 8. The decision noted the PSB had considered three options: continued ownership by VYNPC; sale to ENVY; and, on its own motion, the plant's early closure. Id. at 6, 12-16. The Board concluded the sale was the best option for ratepayers. Id. at 6. The Final Order called for issuance of a CPG under title 30, section 231 of the Vermont Statutes, to expire on March 21, 2012. Id. at 159. The sale of Vermont Yankee to ENVY for \$180 million closed on July 31, 2002. See July 17, 2009 DPS Br. in Dkt. No. 7440, at 5, Pls.' Ex. 557.

In 2002, ENVY received FERC's authorization to sell power into the ISO-New England interstate market at market-based rates. See Compl. ¶ 42. This authorization has remained in effect to date. Id. ISO-New England is a non-profit independent system operator, regulated by FERC, that administers New England's wholesale electricity markets. ISO-New England, ISO-New England – An Overview of Markets, Planning and Vermont Issues at 4, 6 (Jan. 21, 2010), Pls.' Ex. 344 (Doc. 4-35); Kee Decl. ¶ 16 (Doc. 4-11); Potkin Test., Tr. 95. Its three primary responsibilities are to ensure reliable operation of New England's bulk electric power system; to administer New England's wholesale electricity marketplace; and to manage the bulk system and markets' planning processes to address future electricity needs. Compl. ¶ 40. The interstate transmission system "must meet mandatory reliability standards set by the North American Electric Reliability Corporation, the Northeast Power Coordinating Council, ISO-NE [ISO-New England], and the region's transmission owners." ISO-New England, Summary of Vermont/New Hampshire Transmission System 2010 Needs Assessment at 1 (Feb. 17, 2011), Pls.' Ex. 343 (Doc. 4-34).

At the time of the 2002 sale, a Vermont law first enacted in 1977 prohibited construction or establishment of a spent nuclear fuel facility unless the General Assembly, through either bill or joint resolution, first found that it promoted the “general good of the state” and approved a petition. Vt. Stat. Ann. tit. 10, § 6501.⁹ A later-enacted “Exemption” provision, however, carved out an exception to this requirement, without expressly repealing or abrogating section 6501, and provided subchapter 1 did “not apply to any temporary storage by Vermont Yankee Nuclear Power Corporation” of spent fuel. Id. § 6505 (added in 1979).

In 2003, Entergy began to take steps to capture additional revenue with a twenty percent power uprate, increasing the plant’s output. See Entergy Nuclear Vt. Yankee, LLC v. United States, 95 Fed. Cl. 160, 173 (2010). It petitioned the Board for a certificate approving the uprate and physical modifications to the plant, and it sought uprate approval from the NRC. Id. at 174.

In the fall of 2003,¹⁰ Entergy entered into a memorandum of understanding by which the Department agreed to support the power uprate, and in turn Entergy agreed to pay approximately \$6 million, representing a portion of its uprate-related revenues, to State Benefit Funds, including environmental benefit, low-income, and economic benefit funds. Id.; accord Mar. 15, 2004 PSB Order in Dkt. No. 6812, at 3, available at www.state.vt.us/psb/orders/2004/mar.htm. The Board

⁹ Section 6501 provides in relevant part: “No facility for deposit, storage, reprocessing or disposal of spent nuclear fuel elements or radioactive waste material shall be constructed or established . . . unless the general assembly first finds that it promotes the general good of the state and approves, through either bill or joint resolution, a petition for approval of the facility.” Vt. Stat. Ann. tit. 10, § 6501(a).

¹⁰ Also, in November 2003, ENVY filed a complaint in the Court of Federal Claims seeking damages for the Department of Energy’s (DOE’s) partial breach of a statutorily mandated contract requiring the DOE to accept nuclear waste from Vermont Yankee and transport it to a federal repository. Entergy Nuclear Vt. Yankee, 95 Fed. Cl. at 173.

issued a CPG approving the uprate on March 24, 2004. Entergy Nuclear Vt. Yankee, 95 Fed. Cl. at 188.

Because the uprate would exhaust Vermont Yankee's existing spent fuel storage space approximately 18 months earlier than planned, i.e., sometime in 2008, Entergy began preparing to petition the Board to approve construction of a dry cask spent fuel storage facility, and the Board decided to consult with the legislature and the Attorney General's Office. See Thayer Test., Tr. 375-76 (Doc. 168). Then-Senator Peter Welch wrote the Vermont Attorney General, William H. Sorrell, seeking an opinion regarding the General Assembly's authority to address the storage of spent nuclear fuel, in light of Vermont Yankee's new ownership, because the uprate meant on-site storage of spent fuel would reach the capacity limits of existing facilities sooner. See Letter from Vermont Attorney General's Office to Peter Welch, Pres. Pro Tempore of the Vermont Senate, 2004 WL 1737093, at *1 (Apr. 30, 2004), Pls.' Ex. 308.

On April 30, 2004, the Vermont Attorney General's Office responded with a legal opinion letter concluding that section 6505's exemption from legislative approval for new storage construction was owner-specific, not site-specific, such that Vermont Yankee, now owned by ENVY, did not come within the exemption, and a court would more likely than not find any assignment of VYNPC's rights under the exemption unenforceable. Id. at *4. This development concerned ENVY, because running out of storage capacity in 2008 would have forced it to cease operations. See Apr. 26, 2006 PSB Order in Dkt. No. 7082, at 4, 16, Pls.' Ex. 362 (Doc. 4-50). The concrete dry cask storage system and pad Entergy anticipated constructing had been previously reviewed and approved by the NRC, id. at 18, and did not require further NRC

permitting. Given the Attorney General's opinion that Entergy was not exempt from sections 6501-03, Entergy proceeded to lobby for a new exemption.

A. History of Act 74, Dry Cask Storage Authorization of 2005 (H.545)

The Vermont General Assembly is comprised of citizen legislators, 150 in the House of Representatives and 30 in the Senate, serving terms of two years. The legislature generally is in session from early January through late April or May each year. Legislators have no personal staff. A small, professional non-partisan staff serves the entire assembly. See generally www.leg.state.vt.us.

Late in the General Assembly's 2004 session, Entergy proposed section 6505 be amended to change the name of the entity to which the exemption applied from "Vermont Yankee Nuclear Power Corporation" to "Vermont Yankee Nuclear Power Station," but the proposal failed to obtain support. See Thayer Test., Tr. at 378 (Doc. 168).

In February 2005, the House and Senate's respective Natural Resources and Energy Committees held hearings and a joint meeting to discuss how the legislature would proceed. See List of Hearings and Debates for Act 74, Defs.' Legis. Hist. App. to Pre-Trial Br. at 30 (Doc. 143-2); see also Pls.' Exs. 2-9 (hearing recordings).

On March 10, 2005, Entergy proposed legislation, entitled "Relating to the Temporary Storage of Radioactive Material," that sought to place approval in the hands of the Public Service Board, subject to the criteria outlined in title 30, section 248. The proposal provided in relevant part:

Notwithstanding the provisions of chapter 157 of title 10, a company may construct a dry fuel storage facility at the site of the Vermont Yankee nuclear power station subject to the following:

1. The Company shall load no more than twelve dry fuel storage containers unless the public service board finds after hearing that loading a different number of containers is necessary to operate the Vermont Yankee Nuclear Power Station through its existing license from the Nuclear Regulatory Commission and to off load the station's fuel core.

2. The company shall not commence construction of any dry fuel storage facility before receiving a certificate of public good from the public service board pursuant to section 248 of title 30.

Letter from John Hollar to Chairman Dostis (Mar. 10, 2005) (transmitting proposed legislation), Pls.' Ex. 460 (Doc. 39-37).

Entergy's proposal, which appears in the legislature's bill file for Act 74, was confined to requiring Board approval to construct a facility; it did not require Plaintiffs to seek legislative approval for storage of fuel after 2012.

Between March 2005 and May 23, 2005, the House and Senate's respective Natural Resources and Energy Committees held hearings, as did the House Ways and Means Committee. See List of Hearings & Debates for Act 74, Defs.' Legis. Hist. App. to Pre-Trial Br. at 30 (Doc. 143-2); see also Pls.' Exs. 10-90 (hearing recordings).

During these committee hearings, legislators heard more than a dozen witnesses testify regarding their safety concerns surrounding spent fuel storage. See e.g., Pls.' Leg. Hist. App. to Pre-Trial Br., Vol. I (listing excerpts identified as Pls.' Exs. 27A, 27B, 27D, 27E, 27F, 27G, 27H, 28A, 28B, 28C, 45A, 46A, 46B, 46C, 46D, 47A, 82A).¹¹ The committee legislators were advised by one expert witness hired by legislative counsel: "The problem that we're dealing with

¹¹ For ease of reference, where available, the Court refers to the lettered exhibit numbers in Plaintiffs' Legislative History Appendix (Doc. 144-1), which aid the Court in locating the relevant excerpts, noting that the actual evidence is the audio recording bearing that exhibit number.

here is that a lot of the concerns that citizens have are concerns that you can't address directly the way they want them to be addressed." Pls.' Ex. 57A (Track 1 00:28:19). When one legislator explained that dry cask storage, "in my mind, it's a safety issue," the expert responded, "I don't think you want to address this from the point of view of safety at all." Pls.' Ex. 31A (Track 1 00:09:00). Despite being told that safety was not in the legislature's purview, legislators frequently raised safety considerations in addressing the spent fuel storage issue. See, e.g., Pls.' Ex. 58A (Track 1 00:04:39) ("one of my big problems and why I want some money from somebody that if the federal government or Entergy doesn't protect it, we're going to have to do it because we are not going to let our citizens . . . blow up"); Pls.' Ex. 65A (Track 1 00:00:40-00:02:17) (legislator asking, "this one comes at a question of creative use of statute . . . someone might have a safety issue in mind, but – their want to shield the physical impact – the visible impact of these casks from the river?" was told by a DPS witness such an issue could be addressed in terms of "aesthetics"); id. (Track 1 00:01:30) (another representative asking about radiation limits for cask perimeters). In a May 18, 2005, House Ways and Means Committee hearing, a representative expressed "it really bothers me that a private company is going to be able to have an uprate, which was questionable a year ago and there were issues of safety around that, . . . and so why wouldn't we charge them for at least making money and planting again dangerous material on our soil?" Pls.' Ex. 80A (Track 1 00:55:14). Other references to safety by legislators and witnesses are too numerous to recount here. See Pls.' Legis. Hist. App. at 2-34 (excerpting statements from hearings and debates on H.545 recorded in Pls.' Exs. 2-124).

1. H.545, As Introduced

The bill, as introduced on May 23, 2005, contained the following provisions. The legislative findings in section 6521(a)(1) noted that the federal government “is in breach of contract for its failure” to provide for “disposal of spent nuclear fuel.” See H.545, Bill As Introduced, Defs.’ Ex. 1129.¹² Absent this failure, Vermont Yankee “would not require dry cask storage” for “an unknown and indefinite period of time.” Id. § 6521(a)(3). Section 6521(a)(4) provided: “Payments made by Entergy Nuclear VY for the privilege of storing spent nuclear fuel in Vermont are incurred because of the failure of the DOE to accept title and delivery of the spent fuel as required by law, and should be subject to review and recovery in a court of law for damages for breach of contract.” Id. § 6521(a)(4). In section 6521(b), entitled “Intergenerational equity,” the bill articulated findings, of which three subsections stated:

(3) It is necessary in the interests of intergenerational equity to help balance the burdens and benefits of nuclear power among succeeding generations of Vermont electricity consumers.

(4) In that pursuit, the entity profiting from the continued operation of Vermont Yankee is required by this subchapter to provide a specified degree of offsetting benefit to Vermont’s future electricity consumers.

(5) To make this equitable reallocation, this subchapter redirects a small part of the revenue stream generated near the end of the nuclear system operating life in order to provide succeeding generations of Vermonters with an offsetting benefit in the form of assistance for varied, reliable, economic, and sustainable sources of electricity for the future.

Id. § 6521(b)(3)-(5).

¹² The Court notes that Vermont maintains a Bill Tracking System at its Main Legislative Research Page, available at www.leg.state.vt.us.

Subsection (c) of the legislative findings addressed Vermont Yankee's power uprate and found that as an unregulated wholesale generator, the energy generated by ENVY's 20 percent uprate would be sold,

at competitive market prices, with additional revenues estimated at more than \$35 million per year. These additional power sales are not subject to rate regulation by the public service board nor are they committed primarily to the benefit of Vermont utilities or ratepayers.

Id. § 6521(c)(2).

Furthermore, "[a]s a result of the uprate," ENVY would be "creating additional spent fuel," that needed to be stored in Vermont. Id. § 6521(c)(3). Subsection (c)(5) found:

As a condition of granting the privilege to an independent power producer to store additional spent fuel assemblies and dry casks in Vermont, it is appropriate to impose a spent fuel storage charge for so long as spent nuclear fuel is stored in the state.

Id. § 6521(c)(5). The legislative findings also called for the creation of a "clean energy development fund" dedicated to developing a diverse power supply by 2012. Id. § 6521(c)(8).

Section 6522 set out the substantive provisions requiring Vermont Yankee to go before the Board for a CPG before they could commence "construction or establishment of any new facility." Id. These substantive provisions included a statement, which remained in place until the final enactment, that compliance with the subchapter "shall not confer any expectation or entitlement to continued operation of Vermont Yankee" after March 21, 2012, however, they provided that for continued operation, or expansion of the spent fuel storage facility "beyond the capacity" authorized, Vermont Yankee "must first obtain the approval of the general assembly," and then a "certificate of public good from the public service board." Id. § 6522(c)(5).

Section 6523 of the bill as initially introduced provided that a “Spent Nuclear Fuel Storage Charge” would fund the Clean Energy Development Fund. Id. § 6523. The charge was to be “at the rate of one mill per kilowatt hour,” “with a minimum annual charge of \$4,000,000.00 per year,” to be “adjusted annually to reflect changes in the consumer price index,” and to be paid regardless of whether the plant was “generating, out of service, or decommissioned,” and the obligation would last “so long as spent nuclear fuel from the plant is stored within the state of Vermont.” Id. § 6523(a). The charge could be offset if ENVY invested in renewable energy resources. Id. § 6523(b).

Section 6524 called for a “generation facility charge,” applicable to facilities generating in excess of 400 MW (and therefore applicable only to Vermont Yankee), of \$25.00 per year for each kW of installed capacity at a facility in excess of 510 MW, which would also be paid into the Clean Energy Development Fund. Id. § 6524. Section 6525 called for financial review, and permitted amendment of the storage charges. Id. § 6525. Among the factors reviewed were ENVY’s ability to recover facility costs from other sources, sales in the competitive power market, cost-sharing from sources outside Vermont, and any damage recoveries from the federal government. Id. § 6525(b).

Section 6526 created the Vermont Clean Energy Development Fund and provided it would be funded by the spent fuel charge and the generation facility charge assessed under the bill, and the revenue sharing contributions called for by the memorandum of understanding governing the uprate, and any other memorandum of understanding entered before July 1, 2005. Id. § 6526.

2. H.545, As Passed the House

On May 31, 2005, a representative for the Committee on Natural Resources recommended amendment by entirely replacing the proposed sections 6521 through 6526 with newly drafted sections 6521 through 6523. May 31, 2005 House J. at 1475-76 (also reflecting amendment of emergency management procedures). The section 6521 legislative findings were replaced in their entirety. Id. at 1476. The new amendment required legislative approval for fuel storage after 2012, and a CPG from the Board for continued operation. Id. The House passed this amended version of the bill on the same day. See H.545, As Passed the House.

On June 2, 2005, the Senate Finance Committee held a hearing where a legislator repeatedly expressed the legislature's desire to act on radiological safety concerns, despite being told this was not in the body's purview, and where the benefits of having preempted concerns appear in the MOU were discussed. See Pls.' Exs. 110D, 110 (Track 1 00:51:08-00:54:40); see also Pls.' Exs. 111A, 112A. On June 3, 2005, the Senate Natural Resources and Energy Committee recommended the Senate insert a few words into section 6523, striking out a subdivision requiring reports on fund expenditures. June 3, 2005 Senate J. at 1321.

During the Senate floor debate on H.545 on June 3, 2005, numerous senators made statements. One senator reported: "Our goal in Natural Resources and Energy was to review and provide the safest possible storage for spent fuel rods while they're in Vermont. . . . [W]e have protected ourselves as best we can as Entergy goes forward and we will have dry cask in the State" Pls.' Ex. 124A (Track 1 00:20:34). Another stated: "In January when we began talking about this, it was quite obvious that the issue of public safety was going to be of paramount concern. We couldn't compromise cash for safety, permits for safety, or any of the

apprehensions people have. Safety is not, was not, is not for sale under no conditions.” Pls.’ Ex. 124C (Track 1 00:28:17). This same senator stated, of Senate Finance Committee colleagues, “we took very, very seriously this question of safety and the burden of responsibility on us, what was the right decision or what was the right recommendation to make to this General Assembly. . . . But every time there has been a question about whether we could do anything that would increase the role of our safety oversight, I favored it.” Pls.’ Ex. 124D (Track 1 00:30:11). Furthermore, the senator stated: “[A]ll of us will have to make that independent judgment about what’s in the best interest of the State. But I, for one, want to state categorically and explicitly that safety is the prime concern, safety is not for sale, no amount of money is worth it to increase any risk of danger to Vermonters.” Pls.’ Ex. 124E (Track 1 00:40:41). See also Pls.’ Legis. Hist. App. at 24-34 (excerpting other safety-related statements from the Senate debate and committee hearings, too voluminous to recount here); Pls.’ Exs. 103-124 (full recordings of proceedings).

Following the debate, the Senate passed the proposed amendments, and House and Senate Agreement took place on June 4, 2005.

3. H.545, As Enacted

The final version of H.545, designated Act 74, added subchapter 2, comprised of sections 6521, 6522 and 6523, to Chapter 157 of title 10 of the Vermont Statutes. Act 74, 2005 Vt. Laws 74 (LexisNexis). Section 6521 states the General Assembly’s findings, noting that whether Vermont Yankee Station continues operating or is relicensed, a “large fraction of the state’s [power] supply will need to be replaced.” Vt. Stat. Ann. tit. 10, § 6521. The findings call for accelerated investment in economically and environmentally sound electricity resources, investment in renewable energy sources and energy efficiency, and states that in support of these

objectives, the assembly and PSB created the “statewide energy efficiency fund,” and notes the need for a “clean energy development fund” to support investment in clean energy resources. Id.

Section 6522 prohibits commencement of “construction or establishment of any new storage facility for spent nuclear fuel before receiving a certificate of public good” from the Board “pursuant to 30 V.S.A. § 248.” Id. § 6522. Section 6522 calls for application of section 248's criteria governing modification of facilities, and imposes additional criteria and limitations. Id. The following Board findings are prerequisites to construction: First, that “[a]dequate financial assurance exists for the management of spent fuel” for as long as it is located in Vermont; second, the applicant has committed to remove spent fuel from Vermont to a federal facility; third, the applicant will implement a spent fuel management plan to facilitate removal; and fourth, the applicant was “in substantial compliance with any memoranda of understanding” with the State. Id. § 6522(b). Section 6522 also imposed additional limitations to be included in the CPG. First, the CPG to provide permission to store spent fuel was limited to fuel from Vermont Yankee, not any other source; second, the CPG’s permission was limited to the “cumulative total amount” of fuel “derived from the operation of the facility up to, but not beyond, March 21, 2012.” Id. § 6522(c)(1)-(2). Subsection (4) noted that compliance with the subchapter “shall constitute compliance with the provisions of this chapter that require that approval be obtained from the general assembly before construction or establishment of a facility” for spent fuel, “but only to the extent specified in this subchapter.” Id. § 6522(c)(4).

By these provisions, Act 74 essentially gave Entergy a dispensation in 2005 from other provisions in Chapter 157 requiring approval by the General Assembly for construction of a storage facility, channeling the petition to the Board instead.

The Act also provided: “Storage of spent fuel derived from the operation of Vermont Yankee after March 21, 2012 shall require the approval of the general assembly under this chapter.” Id. § 6522(c)(4). Notably, there are no other provisions in Chapter 157 that require General Assembly approval for storage within already constructed facilities.

Finally, section 6522 noted that compliance with sections 6522 and 6523 “shall not confer any expectation or entitlement to continued operation of Vermont Yankee following the expiration of its current operating license on March 21, 2012.” Id. § 6522(c)(5). “Before the owners of the generation facility may operate . . . beyond that date, they must first obtain a certificate of public good from the public service board under Title 30.” Id.

Section 6523 of the final enactment established a Clean Energy Development Fund, funded by payments made by Entergy under the memorandum of understanding in PSB Docket No. 6812 (revenue shares from the uprate), “together with the proceeds due” under any “subsequent memoranda of understanding entered before July 1, 2005.” Id. § 6523(a)(1). In Docket 6812, Entergy’s commitment to share revenue from the uprate was estimated, for shared revenue through 2012, to have a net present value of \$6.1 million. See Mar. 14, 2004 PSB Order in Dkt. No. 6812, at 3. The anticipated June 21, 2005 memorandum of understanding (2005 MOU) in the dry cask storage docket would also require payments into the fund. Section 6523 provided the fund was to be used to promote “cost-effective and environmentally sustainable” power “for the long-term benefit of Vermont electric customers.” § 6523(c). Subsection (d) of section 6523 governs the administration and authorized expenditures from the fund, and has been substantially amended since 2005. § 6523(d). Entergy has not challenged those subsequent amendments and has abandoned its challenge to the Clean Energy Development Fund.

In a June 6, 2005, email from Vermont Yankee's then-site vice president Jay Thayer to Vermont Yankee employees, shortly after the Senate approved the House bill, Thayer explained that Entergy employees had testified at legislative hearings on Act 74 to urge the legislature to avoid what early draft legislation proposed, namely, imposing a yearly fee on storage that ended only when the fuel was transferred to the federal government, which "represented open-ended liability connected with" the dry fuel initiative. Email from Thayer to VY Employees (June 6, 2005), Defs.' Ex. 1225. "The solution arranged between Entergy and the legislative leadership was therefore for Entergy to agree to a finite number of payments," conditioned on revenue from the power uprate. Id. (describing State's concessions as "good news"). Entergy reported that its anticipated obligation, under the forthcoming memorandum of understanding (the 2005 MOU), would be about \$2.5 million per year, totaling \$15 million over the seven years until 2012. Id.

Entergy, to facilitate the assembly vote, had negotiated with the Department a memorandum of understanding governing the dry storage facility construction. Signed June 21, 2005, the day Act 74 was enacted, the 2005 MOU required Entergy to petition the Board for a CPG approving the construction. See 2005 MOU, Defs.' Ex. 1007 (Doc. 46-19). The 2005 MOU provided for, inter alia, line-of-sight barriers, pad siting, cask spacing, access road siting and construction, cask temperature monitoring and radiation surveillance, and finally, a recognition the legislation was contingent upon the company's agreements under the MOU, "to fund a Clean Energy Development Fund" with quarterly "payments calculated to total \$15,625,000." Id.; see also Apr. 26, 2006 PSB Order in Dkt. No. 7082, at 83, Pls.' Ex. 362 (Doc. 4-50). The 2005 MOU also expressly waived any federal preemption claim to prevent enforcement of its obligations under the memorandum. 2005 MOU ¶ 12, Defs.' Ex. 1007.

According to Jay Thayer’s trial testimony in this case, the legislature provided the Board with certain technical requirements – which overlapped with NRC regulations – that appeared in the 2005 MOU, apparently to avoid their appearance in Act 74. See Tr. 384:1-3, 385:6-16; 10 C.F.R. §§ 72.122, 72.128; accord Pls.’ Legis. Hist. App. Exs. 110B-C, 111A (senator noting health and safety issues were dealt with in the agreement), 112A (Department witness stating potentially preempted issues are “in an MOU instead of in the legislation”) (Doc. 144-1).

On June 22, 2005, the day after Act 74 went into effect, Entergy filed its petition for dry fuel storage construction with the Board. Apr. 26, 2006 PSB Order at 5, Pls.’ Ex. 362. The construction involved a 76- by 132-foot concrete storage pad with capacity to hold up to thirty-six Holtec HI-STORM dry cask units. Id. at 19. The NRC had already pre-licensed and pre-approved the system. Id. at 18. Over the next eight months, the Board held conferences and a public hearing, considered testimony, briefs filed by the parties and intervenors, and held technical hearings. Id. at 5-7. The Board also received almost 500 public comments, of which, it noted, “[t]he vast majority . . . highlighted public concerns about the power uprate that we previously approved, and the desire for an independent safety assessment, general nuclear safety concerns, and Vermont Yankee as a terrorist target.” Id. at 12. A minority “addressed dry fuel storage directly.” Id. The Board granted the petition for a CPG on grounds Entergy had shown the facility would not cause “undue harm to the natural environment,” could be constructed “without discernable increased safety risk,” and “without affecting the reliability of Vermont Yankee.” Id. at 3.

The Board noted that “[t]he single most significant factor” in its decision was “the economic benefit of the facility,” because without it, Vermont Yankee would run out of storage

before the end of its current license and “early shutdown could impose substantial costs on Vermont ratepayers,” who were receiving “favorably priced power,” under the Power Purchase Agreement, which from late 2008 until the expiration of the license reduced rates by “approximately \$61 million,” reflecting the difference between the PPA and the anticipated wholesale spot price for that period. Id. at 3-4, 8, 34 (also noting economic benefits from the revenue-sharing arrangement under the uprate, state and local tax payments by Entergy, and Entergy’s presence as employer of what was then approximately 495 employees).

The Board, however, imposed a few additional conditions requiring: financial assurances to ensure spent fuel could be managed through decommissioning; an amendment to the Spent Fuel Management Plan based on the assumption the DOE would not remove fuel as scheduled; assurance that Entergy would restore the site to greenfield condition; and submission of a study addressing the stability of adjacent banks. Id. at 4-5, 89-91. The Board’s order also expressly limited the total fuel that could be stored to amounts derived from operation through 2012, the end of the current operating license. Id. at 90.

The Board’s order recognized Entergy’s position that “notwithstanding the provisions of 30 V.S.A. § 248 and 10 V.S.A. § 6522, the Board’s jurisdiction is ‘limited to assessing the state’s need for the power as well as siting and land-use criteria that do not interfere with the federal government’s exclusive authority over plant construction and operation, spent-fuel possession, handling and storage and the attendant issue of radiological safety.’” Id. at 14 (quoting Entergy’s brief to the Board). The Board, however, concluded that Entergy’s “characterization of the extent of federal preemption is overbroad,” id. at 15, and stated federal law “reserves substantial jurisdiction to the state of Vermont over nuclear facilities and the dry fuel storage facility, so long

as we are not regulating radiological safety and are acting within the areas of traditional state concern.” Id. at 16. The Board’s Final Order authorizing a CPG for dry cask storage issued April 26, 2006.

Entergy thereafter began constructing the dry cask storage facility. According to an exhibit submitted by Entergy in its suit for damages before the U.S. Court of Federal Claims, the newly constructed storage pad “was designed to hold 36 loaded casks, a number sufficient to allow the plant to operate through the end of the potentially renewed NRC license, or through 2032.” Entergy Nuclear Vt. Yankee, 95 Fed. Cl. at 189.

On January 27, 2006, a few months before the PSB issued its order permitting dry cask storage, the NRC received ENVY and ENOI’s application for a twenty-year NRC license extension. The NRC initiated an extensive five-year review of Vermont Yankee, which entailed, among other things, auditing aging management programs and reviews to ensure it could operate without undue risk to public health and safety, an audit to ensure ENVY adequately reviews the plant’s systems for radiological health and safety risks, multiple site inspections to analyze safety risks, and multiple public meetings and hearings to address environmental and safety concerns regarding continued operation. Compl. ¶ 49 (with NRC link to extensive NRC procedures).

B. History of Act 160 (S.124)

A few days after Entergy filed for the federal license extension, on February 1, 2006, the Senate Committee on Finance held the first hearing on a draft of Senate Bill 124, proposing Act 160, regarding a “Certificate of Public Good for Extending the Operating License of a Nuclear

Power Plant.” See Act 160 Hr’gs and Floor Debates,¹³ Defs.’ Legis. Hist. App. at 149 (Doc. 143-2). The bill was introduced on the Senate Floor on February 24, and then referred to the Senate Committee on Finance.

1. S.124, As Introduced

The first version of S.124, discussed at the February 1, 2006 Senate Finance Committee hearing, amended section 248 of title 30 to add provisions prohibiting application to the NRC for federal re-licensing or re-licensing within the state absent a CPG from the Board. See S.124, As Introduced; see also Jan. 1, 2006 Senate Fin. Comm. Hr’g Excerpt, Pls.’ Ex. 398 (Doc. 46-21). A DPS witness advised such a provision would likely run afoul of preemption principles. Pls.’ Ex. 398 at 14. The bill also required the Board to obtain the General Assembly’s approval, determining that relicensing “will promote the general welfare,” before it could issue a CPG. S.124, As Introduced.

At the February 1, 2006 hearing, Tim Nulty, of the Vermont State Nuclear Advisory Panel, advised the Committee that the issues of dry cask storage and continued operation were linked, as was the uprate in electricity output, because this would “dramatically” increase the amount of spent fuel Vermont Yankee would generate, and commented that “the PSB is not institutionally equipped to think of them all together. It’s not allowed to think about safety, as you know. . . . [A]t the very least the legislature would have jurisdiction to think about

¹³ Defendants submitted an Appendix of excerpts of the legislative history in support of their pre-trial brief. While House Committee hearings are recorded, and actions taken on the floor recorded in the legislative journal, Defendants note that Vermont’s “House does not record any of its floor debates, and at least one Senate floor debate on Act 160 was not recorded either.” (Doc. 143-2 at 2.) Plaintiffs have submitted DVD disks containing the audio recordings of Committee hearings and existing Senate floor debates. Pls.’ Exs. 126-163; see also Pls.’ Ex. and Witness List (Doc. 162 at 5-7), which indexes the disks.

compensation.” Feb. 1, 2006 Senate Fin. Comm. Hr’g Excerpt, Pls.’ Ex. 399 (Doc. 46-22); Pls.’ Ex. 127A (Track 1 00:10:25). Furthermore, Mr. Nulty commented that while the NRC may deem the plant safe,

their view of safety is an on off situation. . . . [T]hat doesn’t mean it is utterly safe. Even below that threshold there are degrees of risk. . . . [T]hat doesn’t mean it’s absolutely safe and if there are measurable additional risks associated with let’s say an uprate, even though it was deemed to be safe, should some compensation be arranged for this? . . . [A] safety problem has economic implications also.

Pls.’ Ex. 399 at 3; Pls.’ Ex. 127A.

Later in the discussion, a senator noted that the NRC’s assessment that a plant was safe turned on its assessment that “if something appears to be going wrong that the plant can be shut down and the electricity turned off and prevent anyone from being injured or hurt or radioactivised . . . But once that happens, the electricity is gone.” *Id.* at 4; Pls.’ Ex. 127A.

Also at the February 1, 2006 committee hearing, an Entergy lobbyist stated the company’s position briefly and concisely, “Entergy Vermont Yankee does not support S.124. We are committed to pursuing a certificate of public good before the Public Service Board.” Morris Test., Defs.’ Legis. Hist. App. at 171-72 (Doc. 143-2).

A version of S.124 dated February 26, 2006, proposed amending title 30, section 231 to add a subsection (c), requiring a certificate of public good governed by the requirements of both 231 and 248, and adding words to the existing provisions of subsection 248(e) that would require, in addition to the existing requirement for legislative approval for new construction of a nuclear plant, legislative approval for operation. Feb. 26, 2006 Draft of S.124, Pls.’ Ex. 401 (Doc. 46-24). Proposed language regarding the objectives of a public engagement process called

for “discussion of broader economic, environmental and safety issues relating to the operation of a nuclear facility.” Id. at 2-3.

At a February 28, 2006 Senate Finance Committee Hearing, one senator stated: “We’re asking that studies be provided to legislators on health and safety and economics.” Pls.’ Ex. 130A (Track 1 00:25:35). A senator, explaining why the process should not let the Board decide the issue on its own, also stated:

There’s the question of whether we believe the General Assembly should have some right to participate in looking at the evidence about health and safety, and economics, and energy policy, and there’s a second question, which is the same as you and dry cask, whether, on behalf of the people of the State, there’s some desire to have some bargaining leverage, frankly. Because what’s going to happen here is that Vermont Yankee gets relicensed and they have no obligation whatsoever to sell us a kilowatt of power.

Pls.’ Ex. 130B (Track 1 00:27:28) (to which another senator suggested the Assembly’s purview could be broader).

In the same hearing, the following exchange took place between a senator and a testifying Vermont Law School professor and former PSB chair, who had just advised the committee that “the State is preempted in its concerns about radiological safety”:

Senator: “I understand that only the feds are allowed to think of safety issues, and we carefully don’t use that word here. But is this – ”

Professor: “–although I think I saw it somewhere in the draft, but go ahead.”

Senator: “But even though these really are about safety issues, in a lot of cases. That won’t sort of mess things up that we’re asking the board to deal with those kinds of issues? Do you know what I’m – do you understand what I’m asking?”

Pls.’ Ex. 130D (Track 2 00:12:22).

In a Senate Finance Committee Hearing on March 2, 2006, during a discussion of a draft of S.124, regarding the public engagement section, Public Service Board Chairman Volz pointed out that “on the fourth line [of the public engagement section] you mention safety, safety issues, and . . . you know, technically the state is pre-empted from engaging in those.” Mar. 2, 2006 Senate Fin. Comm. Hr’g Excerpt at 2, Pls.’ Ex. 403 (Doc. 46-26); Pls.’ Ex. 134A (Track 1 00:06:51). The Chair of the Committee asked whether they were “allowed to talk about environmental safety?” Id. Chairman Volz responded: “We’re allowed to talk about effect on the environment.” Id. Chairman Volz also advised: “If somebody suggests that the legislature’s decision was really based on that safety discussion that’s in this report and it’s not really based on other factors that are probably as well so.” Id. The Committee Chair responded: “Okay, let’s find another word for safety.” Id.

Chairman Volz also pointed out: “Yes, and the same thing happens at the bottom of the page where you reference public health issues. That’s another . . . potential problem.” Id. A senator asked: “We’re not supposed to talk about public health?” Volz responded: “Well, it depends on if it relates, to, you know, it depends on how broad it is. All right. If it’s radiological.” Id. A member of the Department of Public Service offered similar advice regarding the use of the words “safety” and “public health” in the statute. Hoffman Test., Mar. 2, 2006, Senate Fin. Comm. Hr’g, Pls.’ Ex. 134B (Track 1 00:17:48).

Later at that same March 2, 2006 hearing, a senator commented: “I also think that if we base our legislation on what we learn from our constituents most of that is gonna be about safety. That’s what most of the arguments are about. So does all of our work get overturned because --

by the feds because it's based on safety? That's all it's going to be based on." Pls.' Ex. 135A (Track 1 00:12:50).

Also at that hearing, following a discussion that the committee would "strike references to safety," one senator discussed the issues and information to be conveyed and considered by the Assembly: "So we want the General Assembly to have the information as developed through the process at the PSB because it's relevant to their consideration, cost/benefit, their studies, and safety questions. We want to give latitude to the General Assembly." Pls.' Exs. 134D (Track 1 00:41:42), 134E (Track 1 00:54:28).

Other Senators addressed whether the early version of the bill gave the legislature any ability to make re-certification contingent on a favorable contract with Vermont ratepayers to purchase electricity:

Senator 1: "We can say contingent upon Entergy entering into a contract that is beneficial to the ratepayers of Vermont, you know, under the supervision of the Department of Public Service and the Public Service Board."

...

Senator 2: "Here's the bottom line. 2012 comes. They seek re-licensing. They get re-licensing. Alright? Through the certificate process. There is absolutely no requirement that VY sell us a kilowatt of power."

Senator 3: "But can the board ask them to do that?"

Senator 2: "No, it can –"

Senator 3: "I mean, can that be part of something that we put in the statute that we look at?"

Senator 4: "The board could ask for that, couldn't they, as part of the re-licensing. It's a Certificate of Public Good. How good is it for us if we can't buy any electricity?"

Pls.' Ex. 134F (Track 1 01:03:55).

2. S.124, As Passed the Senate

On March 14, 2006, a senator, speaking for the Committee on Finance, reported to the Senate floor, recommending a Senate amendment to the first version of the Bill as Introduced, and presenting the financial implications of the bill. See Defs.’ Legis. Hist. App. at 159 (Doc. 143-2); Pls.’ Ex. 137 (Track 1 00:09:05). In introducing the bill, the senator stated: “this bill is not, and you will not find the word anywhere in the bill or anywhere else, this bill is not about the safety of nuclear fission or any entity that exists in the state. Safety is the pure duty of the NRC to determine.” Id. at 160. The senator summarized the bill, as amended, as one requiring Entergy to file a petition for re-licensing before the public service board four years prior to the expiration of its current license. Id. at 162-63.

Under the amended bill, the Board was to conduct fact-finding, permit public comment, and perform analysis for two years, and then report back to the legislature no later than March 2010. Id. at 163. Then the legislature would consider whether to approve continued licensing. The same senator noted, “we have serious, serious problems in energy,” and thereafter, “how volatile [the energy] industry is,” and that it was “becoming more complicated.” Id. at 163-64. He informed the Senate that Vermont had two long-term contracts, one with “Hydro Quebec which ends in 2020 and the other with Entergy which ends in 2012” and that “it is highly doubtful that long-term contracts will be able to be met in either case.” Id. at 164.

The senator continued: “[I]t puts the State in a much better position to – to have this – this bill – bill in place. . . . [W]hen people talk about the cheap energy we’re having and how long it will – how long it’s going to go on [O]nce the contract ends in 2012, it’s a whole new ball game.” Id. at 164-65. Furthermore, it was “going to be terribly important for – for the

State to have every bit of leverage it possibly can as we go forward in the energy business. . . . And . . . selling electricity to Vermont under the current contract I would be very surprised if that would be as profitable as – as Entergy would like it to be,” noting that the spot market price was “\$75 a kilowatt hour.” Id. at 165. The legislature would be “derelict,” the senator suggested, “if the legislature did not maintain itself in the best possible position to take any action they felt necessary that this current crisis, and it’s looming greater, crisis goes on.” Id. at 166.

Another senator commented that the bill preserved the authority of the PSB, but that it “also allows the legislature, people elected by the State of Vermont, to decide yes or no on the basis of whatever policy reasons that the legislature felt had to be a part of consideration to make its decision.” Id. at 168. The same senator continued, “the legislature is free in that consideration to take into account its perception of what this does for Vermont’s energy future, how it helps ratepayers, what the economic trade-offs are, whatever negotiations may occur between the administration and/or the legislature and the licensed applicant.” Id. at 168-69. The Senate voted on March 14, 2006, agreeing to the recommended amendment, and the next day passed the bill as amended. See Mar. 14, 2006 Senate J. at 325 (reporting recommended amendments and vote accepting them); Mar. 15, 2006 Senate J. at 331 (bill read third time).

3. S.124, House Proposal of Amendment

On March 16, 2006, the Bill As Passed by the Senate was read for the first time on the House Floor and referred to the House Natural Resources and Energy Committee. It remained in Committee from March 16 until April 27, 2006. See H. Natural Res. Comm. Hr’g Recordings, Pls.’ Exs. 141-156.

While S.124 was with the House Committee, the Senate Committee held another hearing on March 22, 2006, regarding the bill and discussed its implications. A senator observed:

So we need, as a Legislature, to say, okay, do we want another 40 years worth of radioactive materials sitting somewhere in this state? I think the people down in Windham County are getting a little concerned and obviously the closer you live to that radioactivity, the more concerned you are.

Pls.' Ex. 140A (Track 1 00:47:27).

Testifying later that day before the House Natural Resources Committee, the same senator advised:

When something goes wrong with a nuclear power plant, the possible negative results are a lot worse than if a windmill breaks a blade or kills some birds or throws some ice. You know, it's just that there is a potential here, enough potential that the Legislature felt that it was a public policy decision that they needed to make.

Pls.' Ex. 140B (Track 2 00:01:39). A few minutes later, the same senator noted:

I don't think we want to make a premature decision at this point, driven either by the fact that we need this electric power to keep our rates reasonable or in five years we may find out we don't need that power. I mean, if we get up enough wind farms or somebody discovers a new source of power. We don't know that yet, but I think, but I think we'd like to be able to negotiate and negotiate with some bargaining leverage in there.

Pls.' Ex. 140C (Track 2 00:05:35).

During House Committee Hearings, representatives also inquired regarding Vermont's ability to secure a contract with Vermont Yankee after 2012 under the legislation:

Representative: "In the 248 process and the CPG process, when you're weighing out the – for the public good, do you take into consideration whether or not there is an agreement in place that Vermonters will get kilowatt hours from this plant and at a preferable – for a lack of a better term – price? If the CPG process can't – if they were going to the CPG process and there was no –

and they're a merchant plant and there is no agreement on where this electricity is going to be sold to, is that taken into consideration?"

Chairman Volz: "Yes, section 248 requires that there be an economic benefit to the state."

Mar. 29, 2006 House Natural Res. Comm. Hr'g, Pls.' Ex. 144A (Track 1 00:10:40). When one representative mentioned, regarding Act 74, "[i]f you just have the dry cask storage issue as the safety gap, as the only stopgap measure that you have – ," another representative quickly interjected, "OK 'cause we don't say safety when we're talking Vermont Yankee in this room." Pls.' Ex. 144D (Track 2 00:44:26). Another representative questioned a witness if wind power required the same "level of questioning," suggesting some sources were "low probability, high impact in terms of risk to the public. You have to guard it. You have to insure it from terrorist attacks." Pls.' Ex. 146A (Track 1 00:47:18).

S.124, As Passed the Senate, envisioned a two-step process whereby the PSB would begin CPG proceedings and a public engagement process first, and then transmit its findings in a report to be provided to the legislature no later than two years before approval should take effect. See S.124, As Passed the Senate. A Committee member questioned whether, with a process where the PSB may determine in the first step that a CPG for continued operation was in the economic benefit of the state, the legislature would be under a tremendous amount of political pressure to concur, or they may be obligated to give deference to the Board's findings. Mar. 29, 2006 House Natural Res. Comm. Hr'g, Pls.' Ex. 144 (Track 1 00:12:00).

On April 19, 2006, the House Natural Resources Committee considered the issues that would be within the Board's purview and the legislature's power to withhold approval through inaction. Rich Smith, Deputy Commissioner of the Department of Public Service, testified at the

hearing and responded to questions as follows regarding the new directions taken in amendments, including the now singular public engagement process, a process by which Entergy would seek both dry cask storage and a renewed CPG, and finally, the fact that the legislature would make the first decision:

Deputy Commissioner: “. . . Clearly that the legislature acts first, before the Board goes through the CPG process, we think that’s important. So those are the three principles we hope are in here, we think they’re heading that way, but we want, I think clarity would be helpful.”

Representative: “Can I get clarification on that last statement. You said the legislature acts first, as you read that, is there any option for the legislature not to act on that bill, or do they have to act?”

Deputy Commissioner: “I think there is, that’s one of our concerns, is, and I think it was raised here earlier, by representative Larrabee, that if the legislature doesn’t act, it is acting by saying we’re not going to allow this bill to go forward. I am not sure how to address that. You could have some kind of failsafe language where it says if the legislature doesn’t act by a certain time it is deemed approved to go forward. That’s something we could talk about.”

Apr. 19, 2006 House Natural Res. Comm. Hr’g, Pls.’ Ex. 151 (Track 1 00:02:46).

Later in the same hearing, a representative, taking note of suggestions that the legislature should be given a deadline by which it had to act, stated that Act 74 was written in such a way that “they need the permission of the legislature to store any spent fuel after March of 2012 and there’s nothing in that act that requires the legislature to act.” Id. (Track 1 00:16:01).

On April 20, 2006, the Natural Resources Committee heard testimony from two Vermont electric utilities with long-term contracts with Vermont Yankee set to expire in 2012. During Central Vermont Public Service’s testimony, a representative noted:

There’s going to have to be a deal in place that the Public Service Board is, is going to be able to have to, is going to be looking at, that’s going to be part of whether they decide a CPG is proper to go forward with. Because if the people of Vermont are not going to benefit from a sufficient amount of power at a

good enough price or a long enough contract – there’s no reason to have this plant operate in our, in our region.

Pls.’ Ex. 155B (Track 1 00:24:23).

Both utilities expressed interest in a “date-certain” for the legislature’s decision on continued operation, which would permit them to make decisions regarding power sources going forward. Pls.’ Ex. 155 (Track 1 00:03:45 and 00:18:29). One legislator questioned the witness regarding the expected duration of any long-term contract with Vermont Yankee. The witness responded that given the regulatory environment in Vermont, it would be in Entergy’s “enlightened self interest” to offer a longer contract, perhaps as long as five, seven, or ten years. Id. (Track 1 00:34:20). A legislator noted in response: “It’s interesting that the main public good for a CPG is the price of power, but we may not be able to go out more than three years on price of power.” Id. (Track 00:35:00). In closing, a legislator stated she wanted to make a comment and said:

I think for all these power sources what we’re trying . . . what I want to see happen is that we make a rational analysis of the risks and then we say, are those risks worth the benefit that we get. . . . In the public process, here, we want to look at all risks, not just how much the power is going to cost, we need to include a whole range of risks for all of these things for the people of Vermont. We don’t want to make any decisions out of ignorance or out of lack of proper questioning. No matter what the answer. That’s what this bill is designed to do.

Id. (Track 1 00:37:45). There were no further House hearings on the bill between April 20 and April 27, 2006.

On April 27, 2006, the House voted 130 to 0 to accept and propose the amendments to the Senate. See Apr. 27, 2006 House J. at 1378-84 (reflecting text of proposed amendments and roll call vote accepting them). The proposed amendments expanded the policy and purpose

section to include a discussion of Act 74, eliminated amendments locating CPG renewal provisions within title 30, sections 102 and 231, and instead inserted them in section 248. The House amendments also reversed the order in which the Board and the General Assembly would consider approval, removing the requirement that the PSB first issue a certificate that the General Assembly would then approve, providing instead for General Assembly approval followed by PSB proceedings. Id.

4. S.124, As Passed by House and Senate

House and Senate Agreement took place May 4, 2006 and the governor signed the bill May 18, 2006. The bill, as passed by both House and Senate, reflected only a few word changes and minor typographical edits.

5. S.124, As Enacted

The final enacted version of S.124, designated Act 160, inserted subsections 248(e)(2) and 248(m) regarding continued operation of a nuclear plant into section 248 of title 30, and a new section 254 under the same title. Before it was amended by Act 160, the provisions of section 248 governed a certificate of public good for purchase, investment, or construction of new gas and electric facilities. The existing section 248(b) governing such new projects required Board findings regarding the “orderly development of the region”; whether a facility was “required to meet the need for present and future demand for service which could not otherwise be provided in a more cost effective manner”; or “will not adversely affect system stability and reliability”; “will result in an economic benefit to the state and its residents”; and “will not have an undue adverse effect on esthetics, historic sites, air and water purity, the natural environment and the public health and safety.” Vt. Stat. Ann. tit. 10, § 248(b).

Subsection 248(e)(2) requires approval by the General Assembly before the Board may issue a certificate of public good permitting continued operation of a nuclear plant in the state:

No nuclear energy generating plant within this state may be operated beyond the date permitted in any certificate of public good granted pursuant to this title, including any certificate in force as of January 1, 2006, unless the general assembly approves and determines that the operation will promote the general welfare, and until the public service board issues a certificate of public good under this section. If the general assembly has not acted under this subsection by July 1, 2008, the board may commence proceedings under this section and under 10 V.S.A. chapter 157, relating to the storage of radioactive material, but may not issue a final order or certificate of public good until the general assembly determines that operation will promote the general welfare and grants approval for that operation.

Id. § 248(e)(2).

Subsection 248(m) directs the board to evaluate a petition for continued operation on “current assumptions and analyses and not an extension of the cost benefit assumptions and analyses forming the basis of the previous certificate.” Id. § 248(m).

Section 254 established a four-year timeline¹⁴ and procedures for handling petitions for both nuclear plant continued operation and new construction, and laid out the objectives and criteria for the public engagement and fact-finding process conducted by the Board, and to be provided to the General Assembly.

¹⁴ While the process contemplated in Act 160 is designed to take place over the course of at least four years, the Court notes that members of the Vermont General Assembly serve only two-year terms. By operation of the statute, it also appears a nuclear plant, faced with legislative inaction, cannot be certain of the status of its petition for renewal until March 21, 2012. It is a “well-settled principle that ‘[a] legislature cannot limit the power of amendment of a subsequent legislature.’” Connecticut v. Schweiker, 684 F.2d 979, 987 (D.C. Cir. 1982) (quoting Appellee’s Br. at 37 (citing 1A C. Sands, Sutherland Statutes & Statutory Construction § 22.02, at 107 (4th ed. 1972))). Furthermore, a “legislature can amend acts passed at a previous session of the same legislature.” 1A Norman J. Singer & J.D. Shambie Singer, Sutherland Statutes & Statutory Construction § 22:2 (7th ed. 2007).

Section 254(a) requires that a petition for construction or continued operation be submitted to the Board at least “four years before the date upon which approval may take effect.”¹⁵ Vt. Stat. Ann. tit. 30, § 254(a)(1). The Board must then notify the General Assembly of the petition. *Id.* § 254(a)(2). Then, the Department may arrange for studies to “support the general assembly in the fact-finding and public engagement process.” *Id.* “Upon completion of the studies,” the Department is to provide the studies and any other information requested by the General Assembly to the Board and three legislative committees. *Id.* § 254(a)(3).

Section 254(b) articulates a long list of objectives for the public engagement and fact-finding, including to “facilitate public discussion of long-term economic and environmental issues” relating to operation, to “assess the potential need for the operation” and its “long-term economic and environmental benefits, risks, and costs,” to assess “practical alternatives” that may be “more cost-effective” or “better promote the general welfare.” *Id.* § 254(b)(1). Furthermore, the studies arranged by the Department and joint energy committee and the public engagement must assess “long-term accountability and financial responsibility issues” surrounding spent fuel, “closure obligations,” “federal obligations” and funds providing for any undischarged federal responsibilities, “emergency management requirements and evacuation plans,” and “financial responsibility” for periods the facility is out of service. *Id.* § 254(b)(2)(A).

Further, studies must also “identify, collect information on, and provide analysis of long-term environmental, economic, and public health issues, including issues relating to dry cask storage of nuclear waste and decommissioning options,” and any analysis of economic

¹⁵ NRC regulations provide that where a nuclear plant applies for renewal of an operating license at least five years before expiration of the existing license, the existing license will not expire until the application has been finally determined. 10 C.F.R. § 2.109(b).

issues must be “under present day cost-benefit assumptions” and not those forming the basis for the previous certificate of public good. Id. § 254(b)(2)(B)-(C).

Section 254(b)(3) requires three public meetings, and billing back the cost of experts, counsel, advisors, stenographers, research assistance, and studies, to Vermont Yankee. Id. § 254(b)(3). It also requires the Department to report to the Natural Resources and Energy committees, the House Commerce Committee, the Senate Finance Committee, and to the public. Id.

Section 254(b)(5) provides the “general assembly shall conduct proceedings it deems appropriate in order to complete the fact finding and public engagement process.” Id. § 254(b)(5). Finally, section 254(c) prescribes that the Board, in acting on a petition (presumably after both houses of the legislature have approved continued operation in enacted legislation) “shall consider the objectives of the studies to be arranged by the department, the objectives of the public engagement process as a whole, and the general and specific issues that the studies are required to address, as specified in subsection (b) of this section.” Id. § 254(c).

The substantive provisions of Act 160 are silent regarding a procedure or criteria for either legislative or Board approval of a CPG to store fuel derived from operation after March 21, 2012. However, Act 160's legislative policy and purpose section provides what may be quasi-substantive guidance and suggests the questions of storage and continued operation will be decided “concurrently.” Act 160, § 1.¹⁶ The policy and purpose section states, in relevant part:

¹⁶ Act 160's policy and purpose section was not codified. Vermont's statutes are published by West and Lexis. The policy and purpose section of Act 160 can be found in West's historical notes to Chapter 157 of title 10, Vermont Statutes Annotated (West 2011).

(a) It remains the policy of the state that a nuclear energy generating plant may be operated in Vermont only with the explicit approval of the General Assembly expressed in law after full, open, and informed public deliberation and discussion with respect to pertinent factors, including the state's need for power, the economics and environmental impacts of long-term storage of nuclear waste, and choice of power sources among various alternatives.

(b) It is the purpose of this act to establish a statutory process to implement this policy with respect to the operation of any nuclear energy generating plant in the state beyond the date of any certificate of public good

(c) Pursuant to No. 74 of the Acts of the 2005 session, the owner of the Vermont Yankee nuclear power station:

(1) is required to obtain approval of the general assembly before storage of spent fuel derived from the operation of Vermont Yankee nuclear power station after March 21, 2012, and also

(2) is required to obtain a section 248 certificate of public good from the public service board before operation beyond that date.

(d) It is appropriate that the spent fuel storage issue be framed and addressed as a part of the larger societal discussion of broader economic and environmental issues relating to the operation of a nuclear facility in the state, including an assessment of the potential need for the operation of the facility and its economic benefits, risks, and costs; and in order to allow opportunity to assess alternatives that may be more cost-effective or that otherwise may better promote the general welfare.

(e)

(f) For the foregoing reasons, the general assembly shall consider concurrently the issue of storage of spent nuclear fuel derived . . . after March 21, 2012 . . . and the operation of Vermont Yankee after March 21, 2012 . . . and shall grant the approval or deny the approval of such activities concurrently. . . .

Act 160, § 1.

C. History of Act 189 (S.269/S.364)

1. Act 189, As Introduced

On January 8, 2008, Senate Bill S.269, entitled “An Act Relating to an Independent Safety Assessment of the Vermont Nuclear Facility,” sponsored by Senators White and Shumlin, was first introduced and referred to the Senate Finance Committee. Jan. 8, 2008 Senate J. at 11. The statement of purpose called for “an independent safety assessment” of Vermont Yankee. S.269, Bill as Introduced.

The bill would have added a subsection (d) to section 254 of title 30, providing:

Independent safety assessment. In order to enable the assessment under this section of the long-term economic and environmental benefits, risks, and costs related to the operation of a nuclear facility in the state, and to enable the assessment of related long-term accountability and financial responsibility issues, the owners of a nuclear energy generating plant petitioning for extended operation for the plant shall finance and make public an independent safety assessment of the plant in question. This assessment shall be completed within the five years immediately preceding the date of the proposed commencement of extended operations and shall be performed by an individual or entity approved by the public service board, and in a manner that shall be overseen as provided by the public service board. This requirement shall be deemed to be met if the public service board determines that other studies required under this section have been crafted in a manner that assures that all issues pertinent to an independent safety assessment will be adequately addressed without such an assessment. If a court of competent jurisdiction determines that the state of Vermont lacks authority to require an independent safety assessment, this subsection shall be construed as a request to the plant owners to finance an independent safety assessment; a request intended to facilitate the process established under this section and to enable the timely and comprehensive determination of the economic, environmental, financial, and accountability issues considered under this section.

Id.

The Senate Finance Committee held multiple hearings in January and February and modified multiple drafts. See, e.g., Pls.’ Exs. 408 (Feb. 27, 2008 “Draft 4”), 427 (Feb. 20, 2008

“Draft 3”), 433 (Feb. 20, 2008 Fairwinds Assocs.’ Edits to “Draft 3”); see also Defs.’ Legis. Hist. App. at 256 (Doc. 143-3) (reflecting hearings in those months on S.269). Between drafts three and four, the bill was revised to remove the word safety in most places. Compare Pls.’ Ex. 427 with Pls.’ Ex. 408. “Safety” was either replaced with “operating,” “operational,” or “emergency,” or omitted altogether. Id. There was, however, little change to the substance of the bill. The final version of the Act as passed made only four references to safety. Act 189, 2008 Vt. Laws 189 (LexisNexis).

Then-Senator Shumlin opened a Senate Finance Committee hearing on January 29, 2008, noting, “when I was a private citizen and you all were talking about the uprate, there was general agreement among the governor, the Legislature, the department, that there should be an independent safety inspection before an uprate was approved.” Pls.’ Ex. 164A (Track 1 00:01:26). Defendant Board member Volz told the Senate Finance Committee on February 26, 2008: “We can look at safety in the context of its effect on reliability or its effect on economic benefit. But we can’t actually . . . pass judgment on whether something is or isn’t safe, that’s really the NRC’s area. So, I would just caution you on that and suggest that you make sure the bill is properly focused on reliability and economic impacts and not so much on safety.” Pls.’ Ex. 175A (Track 14 00:03:30). A day later, the chief legislative counsel told the Senate Finance Committee: “[W]e also intend to change the title, an act relating to an independent audit rather than a safety assessment.” Pls.’ Ex. 177A (Track 10 00:00:57). He also noted there were “editorial changes” to the draft including “deleting the word safety and putting the word emergency, things like that.” Id.

The Senate Finance Committee introduced the bill to the Senate, S.364, now titled “A Comprehensive Vertical Audit and Reliability Assessment of the Vermont Yankee Nuclear Facility.” The Senate discussed the bill from March 11 to 13, 2008. See Journals of the Senate, Mar. 11-13, 2008 at 269, 302, 307, respectively. During floor debate, one senator noted “there is a fair amount of public concern about the adequacy of the NRC’s inspection process.” Pls.’ Ex. 180A (Track 4 00:04:14). At the same debate, another senator stated: “I support the review of the safety of Vermont Yankee.” Pls.’ Ex. 180L (Track 15 00:02:03). The Senate passed the bill on March 13, 2008. Mar. 13, 2008 Senate J. at 307. Several days prior, on March 3, 2008, Entergy had filed its petition seeking the approvals necessary for a CPG for continued operation after March, 21, 2012, in PSB Docket No. 7440. Compl. ¶ 68.

2. Act 189, As Passed by House and Senate

On March 18, 2008, the bill was referred to the House Natural Resources and Energy Committee, which held multiple hearings throughout March and April. See Defs.’ Legis. Hist. App. at 256. A senator explained the proposed bill to the House Natural Resources Committee:

It’s actually a pretty simple little bill. . . . [W]hat this bill does, in essence, is the governor has called for an independent safety assessment, the congressional delegation has called for an independent safety assessment, the Legislature has talked about the need to do something. What this bill does is define what we mean by an assessment. And we talk about a reliability assessment because safety is not within our purview.

Pls.’ Ex. 183A (Track 1 00:00:24).

On March 25, the director of Public Advocacy for DPS presented “Preemption from 50,000 Feet” to the Committee. See Defs.’ Legis. Hist. App. at 244-46 (Doc. 143-3). She noted the legislators should “be careful with what you’re talking about in this room. Be careful about the record you’re making and later on you’ll see why I think that’s actually important.” Pls.’ Ex.

186A (Track 1 00:01:39). She continued, “it’s not to say you can’t talk about things, just be aware of language, that reliability is something to talk about where maybe safety is not.” Pls.’ Ex. 186B (Track 1 00:05:20). In April, after this testimony, a representative referred to the “comprehensive vertical audit” bill stating, “I think we were doing that in an effort to avoid safety language.” Pls.’ Ex. 195A (Track 1 00:13:54).

On April 21, 2008, the bill was referred to the House Appropriations Committee. Apr. 21, 2008 House J. at 1063. On April 25, the House passed the bill after making amendments to appointment provisions regarding a Public Oversight Panel (POP). Apr. 25, 2008 House J. at 1484-86. Another representative explained her vote stating: “I commend the Natural Resources Committee on a job well done! You truly put the safety and well being of Vermonters before anything else.” *Id.* at 1487. A conference committee further refined the POP’s membership and appointment provisions. *See* Apr. 30, 2008 House J. at 1852-53; May 1, 2008 Senate J. at 1596-97.

3. Act 189, As Enacted

On June 5, 2008, Governor Douglas signed Act 189, formally titled “An Act Relating to a Comprehensive Vertical Audit and Reliability Assessment of the Vermont Yankee Nuclear Facility.” Act 189, § 1; 2008 Vt. Laws 189 (LexisNexis). The Act’s purpose was “to provide for a thorough, independent, and public assessment of the reliability of the systems, structures, and components of the Entergy Nuclear Vermont Yankee facility.” *Id.* § 1(d). The Act stated: “It is . . . the intent of the general assembly to determine on behalf of the people of the state of Vermont the reliability issues associated with operating ENVY for an additional 20 years after its scheduled closure in 2012.” *Id.* § 1(b).

The Act required inspection of seven “whole plant systems,” including the electrical, emergency, mechanical, primary containment, heat removal, cooling, and underground piping systems. Id. § 3. Each system was to be reviewed both vertically and horizontally. Id. § 5(a).

Act 189 called for a Public Oversight Panel to consist of between three and five members with expertise in nuclear technology or regulation. Id. § 6. The Act directed the POP to “publicly report its findings and evaluation to the general assembly,” no later than January 30, 2009. Id. § 6(d). The POP’s report and the audit findings were “to represent the interests of the public” before the Board in CPG proceedings. Id. § 6(e).

Finally, the Act, effective immediately on June 5, 2008, authorized the Board to “commence proceedings” on Vermont Yankee’s petition for continued operation.¹⁷ Id. § 9. Though the original bill had called for Act 189 to be codified as an addition to section 254 of the Vermont Statutes, the final version of Act 189 was not codified.

Nuclear Safety Associates, a company hired by the Department of Public Service, conducted the Assessment under Act 189. See Nuclear Safety Associates (NSA) Reliability Assessment, Pls.’ Ex. 391 at 8 (Doc. 4-79). The Department also hired Bruce Hinkley, a senior nuclear industry consultant, to support the state nuclear engineer in managing and overseeing the Reliability Assessment. Tr. 510:12-20. Act 189 gave the POP, in consultation with the Department, authority to add to Act 189’s requirements. Act 189, § 5(b).

Mr. Hinkley testified the Reliability Assessment was to assess overall plant reliability at Vermont Yankee and, in final form, included a review of six to seven whole systems using a

¹⁷ Act 160 had added to section 248 a July 1, 2008 commencement date for Board CPG proceedings in the absence of a General Assembly vote. See Vt. Stat. Ann. tit. 30, § 248(e)(2).

vertical slice methodology, a review of six or seven technical areas, a sister plant review, individual extended looks at root cause analysis, and a management culture overview. Tr. 515:8-9; 517:15-22. The technical focus areas required evaluation of multiple systems. Tr. 526:22-527:15. The Act required evaluation of any underground piping systems carrying radionuclides, and Nuclear Safety Associates was informed no such system existed. Pls.' Ex. 391 at 262. As an alternative, Nuclear Safety Associates evaluated the buried piping in the service water system.

Id.

At trial, Mr. Hinkley testified that, while the assessment reviewed some systems the NRC reviews, it also focused on equipment the NRC would not typically have reviewed. Tr. 521:16-23. Nuclear Safety Associates reviewed the NRC's reports on the assessed systems, if any existed. Tr. 546:8-19. The assessment made recommendations affecting reliability. Tr. 523:20-524:2. On cross-examination, Mr. Hinkley conceded all the systems reviewed, except for the transformer and switchyard system, are at least partially safety related. Tr. 541:14-18. John Herron, Chief Nuclear Officer at Entergy, testified the NRC – with inspectors on site daily – reviews all aspects of plant operations, especially if there is any impact on radiological safety, and said the NRC reviews each of the specific systems identified in Act 189. Tr. 41:17-42:3; 47:20-48:1; 53:6-63:12.

Peter Bradford, an expert for Defendants and a former member of the NRC, was a member of the POP and served as the chair of that committee for a time. Tr. 426:15-17; 428:17-18; 465:8-10. He testified the assessment process gathered and analyzed information, but did not draw safety-related conclusions, though it contained information about safety-related systems. Tr. 469:9-11, 18-20. He further testified the POP's "fundamental" conclusion "was that the plant

has been reliable and continued to be reliable as long as a number of conditions . . . that were enumerated are met.” Tr. 470:11-18.

Nuclear Safety Associates completed the resulting 300-page Reliability Assessment¹⁸ of the Vermont Yankee Nuclear Facility on December 22, 2008, and concluded: “ENVY is operated reliably.” NSA Reliability Assessment at 1, Pls.’ Ex. 391 (Doc. 4-79). “Overall, many station managerial and technical areas meet or exceed industry standards for performance.” *Id.* at 2. Mr. Hinkley testified “there was an expectation it would continue to perform reliably in . . . extended operation . . . conditioned upon the effectiveness of management addressing the recommendations.” Tr. 536:9-14. Mr. Hinkley did not believe any recommendations had to be “fully implemented” before a CPG could be issued, but he believed ENVY should “commit” to addressing them. Tr. 551:3-15. The POP’s Report to the General Assembly on the Reliability Assessment concurred that Vermont Yankee was reliable: “Acceptable reliability of VY for operation beyond 2012 is possible if the recommendations of this report and the NSA Report are taken.” Report of the POP at iii, v (Mar. 17, 2009), Pls.’ Ex. 382 (Doc. 4-70).

The Reliability Assessment is notable, however, for what it did not review: the turbine and generator, and their subsystems.¹⁹ The turbine and the generator ultimately produce the plant’s power by converting steam into electricity. Tr. 67:15-68:13. Mr. Herron testified that

¹⁸ The final report also included eight appendices totaling over 100 pages.

¹⁹ The Reliability Assessment also did not analyze capacity factor, which was not required by Act 189, though Mr. Hinkley testified capacity factor is a measure of reliability. Tr. 544:12-545:6. The NRC defines capacity factor as: “The ratio of the net electricity generated, for the time considered, to the energy that could have been generated at continuous full-power operation during the same period.” See www.nrc.gov/reading-rm/basic-ref/glossary/capacity-factor-net.html (last updated Oct. 6. 2011).

“[n]ext to the reactor,” the turbine, generator, and their subsystems are “the most critical” to the reliable operation of a plant. Tr. 67:4-14; see also Pls.’ Ex. 614 (a demonstrative diagram).

Defendants’ witness Mr. Hinkley conceded the turbine and generator impact plant reliability and not safety. He reaffirmed his deposition testimony, stating “[i]f the generator doesn’t work or if the turbine falls off, . . . it is a significant reliability issue.” Tr. 557:20-558:10.

D. Events in 2010²⁰ and the General Assembly’s Failure to Pass Legislation

On January 7, 2010, ENVY confirmed test results from the day prior indicating tritium, a low-energy radioactive isotope of hydrogen, a byproduct of nuclear operations,²¹ was detected in tests of monitoring wells at Vermont Yankee. That day, ENVY immediately notified the NRC and various Vermont agencies. Compl. ¶ 77 (Doc. 1). Entergy conducted an internal investigation to locate and stop the leak. NSA Supplemental Report at 76-77 (Apr. 2010), Pls.’ Ex. 387 (Doc. 4-75).

On January 21, 2010, the vice president of system planning at ISO-New England briefed the Vermont Senate Finance Committee regarding the impact of Vermont Yankee’s closure on system reliability. See Kee Decl. ¶ 69 (Doc. 4-11); see also ISO-New England, ISO-New England – An Overview of Markets, Planning and Vermont Issues 4, 6 (Jan. 21, 2010), Pls.’ Ex. 344 (Doc. 4-35).

²⁰ This Court notes that events in 2010 have no bearing on the Court’s determination of the purposes the General Assembly had in mind at the times the assembly enacted Acts 74, 160, and 189.

²¹ Trace amounts of tritium can also appear naturally in the environment.

On February 15, Entergy's team identified a leak source in a concrete pipe tunnel. Test. Vt. State Nuclear Engineer at 235:5-7, 235:13-16, 237:15-16, PSB Dkt. No. 7600, Jan. 13, 2011, Pls.' Ex. 390 (Doc. 4-78); NSA Supplemental Report at 84, table 7 (Apr. 2010).

On February 17, 2010, legislative counsel first presented S.289, "An act relating to approval for continued operation of the Vermont Yankee nuclear power station," to the Senate Finance Committee. The Committee heard testimony on February 18 from Entergy, the Department of Public Service (the Commissioner), Vermont utilities CVPS and GMP (the plant's former owners), Vermont Public Interest Research Group, and New England Coalition. The Commissioner testified: "[A] fact remains that right now . . . the question of what do we have on the site and what sort of public health and safety issues do we need to address is sort of priority one." Pls.' Ex. 273B. One senator noted she believed Vermonters are "uncomfortable" with Vermont Yankee and "don't want to sleep with . . . one eye open waiting for something to happen down there that can't be controlled." Pls.' Ex. 273C (Track 2 00:33:30).

On February 19, 2010, the Senate Finance Committee introduced the bill to the Senate floor. Feb. 19, 2010 Senate J. at 160. The bill's statement of purpose provided:

This bill proposes to determine that the continued operation of the Vermont Yankee Nuclear Power Station beyond its scheduled closure on March 21, 2012 will promote the general welfare and to approve for an additional 20 years the continued operation of the station and the storage of spent fuel at the station.

S.289, Bill as Introduced.

The bill provided in relevant part:

(a) The general assembly determines that continued operation of the Vermont Yankee Nuclear Power Station (VYNPS) for 20 years following its currently scheduled closure date of March 21, 2012 will promote the general welfare of this state.

(b) The general assembly finds that storage of spent nuclear fuel derived from the operation of the VYNPS for 20 years following the currently scheduled closure date of March 21, 2012 will promote the general good of this state.

(c) The general assembly approves until March 21, 2032 the continued operation of the VYNPS and the storage of spent nuclear fuel derived from the operation of the VYNPS, provided that the VYNPS obtains from the public service board and any other agencies such certificates, permits, and approvals related to continued operation of the VYNPS and storage of spent fuel at the VYNPS as are required by law.

S.289, Bill as Introduced § 2.

On February 24, 2010, the bill was read for the second time by title only. Feb. 24, 2010 Senate J. at 196. A motion to commit the bill to the Committee on Economic Development, Housing and General Affairs was disagreed to 24 to 6. Id. A motion by a group of senators to amend the bill to add significant detail was defeated 25 to 5. Id. at 196-200. The same group moved to amend the bill to require the Board to issue a request for proposals and select a potential owner of a second nuclear generation plant on the Vermont Yankee site. Id. at 200-05. The motion was defeated 24 to 6. Id. at 205.

During a Senate floor debate that same day, a senator noted “we are concerned that we have not gotten the favorable purchase power agreement we had.” Pls.’ Ex. 276C (Track 33 00:02:28). Then-Senator Shumlin also commented on the PPA issue, stating the Vermont utilities had not entered a PPA with Entergy because “they’ve concluded that the price is no

good; that Vermonters would have to pay too much. I agree with that assessment.”²² Pls.’ Ex.

277A (Track 3 00:01:10). He went on to state:

[R]eliability. Listen, I don’t think that needs any further discussion than has been offered by our two chairs, except to say that if you don’t think that leaking tritium and, I believe cobalt, into the ground water and the Connecticut River, and the environment of the state of Vermont, that every single Vermonter cherishes and holds dear and we all agree is the bedrock and the foundation of the values that we hold as Vermonters. I don’t know what else you can have as an indicator that reliability is a problem.

Pls.’ Ex. 277D (Track 3 00:04:40; Track 4 00:00:00). The senator concerned with the lack of a favorable PPA reiterated later in the debate, “regular rate payers . . . are going to pay . . . more whether you buy it off the market, or you buy it from Entergy. Because they’re not offering us a good deal.” Pls.’ Ex. 277G (Track 11 00:04:27). See generally Pls.’ Legis. Hist. App. at 96-104 and Pls.’ Exs. 273-278 (detailing other hearing and floor statements by legislators discussing safety, the lack of a favorable PPA, the tritium leak, and reliability).

Pending the question, “shall the bill be read a third time,” the question was disagreed to 26 to 4. Feb. 24, 2010 Senate J. at 205. A senator explained his affirmative vote as follows:

There is no debate . . . Vermont Yankee has made bad decisions and has been a less than perfect partner with the State. Their breach of trust with people of Vermont leaves a terrible scar on their relationship with all of us. In my mind there are still many, many unanswered questions about whether we should relicense the plant for another 20 years.

²² A February 4, 2010 presentation to the Senate Finance Committee indicated Entergy had offered a 20-year PPA in exchange for 55% of the 10-year revenue sharing agreement. The projected PPA savings over wholesale prices were significant, worth more than twice the \$220 million-portion of the revenue sharing to be exchanged for it, with benefits flowing directly to all Vermonters, not just VYNPC (92.5 percent owned by Vermont utilities), and VYNPC would continue to receive 45 percent of the value of the RSA. Presentation to Senate Finance Committee (Feb. 4, 2010), Pls.’ Ex. 553. According to Mr. Potkin, who attempted to negotiate the PPA for Entergy, Entergy failed to reach an agreement with the utilities despite the PPA’s additional value over the RSA. Potkin Test., Tr. 115:20-116:19.

Today, I and others have tried many avenues in order to be responsible and compromising before the final outcome . . . to no avail.

I cannot stand by and vote to support a blatant political power play. My “yes” vote is to remind my colleagues that there is more at stake today than scoring political points. The future of 600 jobs, affordable power and the Vermont economy should not be decided in a rush to judgment. Unfortunately for the people of Vermont, politics came before a responsible process. This is not the way we should serve Vermonters. Vermonters deserve better.

Feb. 24, 2010 Senate J. at 206 (ellipses in original).

The Senate vote took place before it received several reports.

In March 2010, the Joint Fiscal Office released the Executive Summary Consensus Economic and Fiscal Impact Analyses Associated with the Future of the Vermont Yankee Power Plant. March 2010, Consensus Report, Pls.’ Ex. 324, Defs.’ Ex. 1240. The Executive Summary was prepared by energy and economic consultants hired by the General Assembly’s Joint Fiscal Committee, GMP and CVPS, DPS economists and power planners, and CVPS and GMP power planning experts, Pls.’ Ex. 329 at 1, and was the result of a 16-month process that evaluated the economic and fiscal impact of “four possible future power supply scenarios.” Id. at 3. The consensus concluded a shut down would “result in about 1,100 fewer jobs per year” and more than \$60 million less per year in disposable personal income levels. Id. at 9. Alternatively, the study determined relicensing and aggressive renewable energy policies would yield positive employment and economic impacts, “with immediate job gains, no job losses and lower longer term power bills.” Id. at 11.

On April 16, 2010, the NRC issued a letter with results of its tritium leak investigation, concluding “the public’s health and safety and the off-site environment were not adversely affected” by the leak. Letter from Roberts to Colomb (Apr. 16, 2010), Pls.’ Ex. 388 (Doc. 4-76). Vermont’s State Nuclear Engineer had earlier concluded the same, noting the low dose. Test. Vt.

State Nuclear Engineer at 237:7-8, PSB Dkt. No. 7600, Jan. 13, 2011, Pls.’ Ex. 390. In July 2010, the Vermont Agency of Natural Resources concluded tritium levels off-site were several orders of magnitude below the level authorized by ENVY’s federal Clean Water Act permit. See Prefiled Test. of Richard Spiese at 5, PSB Dkt. No. 7600, July 2, 2010, Pls.’ Ex. 389 (Doc. 4-77).

In April 2010, Nuclear Safety Associates released a Supplemental Report to the Reliability Assessment which examined the buried pipe and tank inspection program, stating its initial conclusions remained the same. NSA Supplemental Report at ii, Pls.’ Ex. 387. “ENVY’s activities related to locating and excavating the AOG [Advanced Off-Gas] leaks were timely, appropriate, and planned effectively,” id. at 94; and “[a]lthough the AOG leak investigation and repair was a significant event, it did not affect the overall reliability of the plant.” Id. at 95.

The POP’s July 20, 2010 supplemental report to the legislature following the tritium leak also did not change its initial conclusions. See POP Supplemental Report, Defs.’ Ex. 1320.

On March 21, 2011, following a five-year review, the NRC issued a Renewed Facility Operating License for Vermont Yankee Station, certifying that continued operation from March 22, 2012 through March 21, 2032 could be “conducted without endangering the health and safety of the public.” NRC Renewed Facility Operating License No. DPR-28 (Doc. 1-1).

Entergy filed this suit April 18, 2011.

In May 2011, Green Mountain Power announced it had reached a 23-year power purchase agreement to buy electricity from a nuclear plant in Seabrook, New Hampshire, subject to approval by Vermont regulators. See GMP-Seabrook Power Purchase Agreement, Pls.’ Ex. 489 (Doc. 68-13); see also John Curran, Vt. Utility to Buy Power from NH’s Seabrook,

Associated Press, May 24, 2011, Defs.' Ex. 1093 (noting DPS had commented favorably on the deal).

II. LAW GOVERNING ATOMIC ENERGY ACT PREEMPTION

The first count of the Complaint asserts three Vermont enactments governing Vermont Yankee are preempted by the Atomic Energy Act of 1954 (AEA) and therefore run afoul of the Supremacy Clause, which provides federal law “shall be the supreme Law of the Land,” “any Thing in the Constitution or Laws of any State to the Contrary notwithstanding.” U.S. Const. art. VI, cl. 2. This section will examine the law governing AEA preemption.

In preemption analysis, the first task is to define the scope of the preempted field by examining the language, structure, and purpose of the federal statute and discern Congressional intent. See Allis-Chalmers Corp. v. Lueck, 471 U.S. 202, 208 (1985) (whether “state action is pre-empted by federal law is one of congressional intent”); Ingersoll-Rand Co. v. McClendon, 498 U.S. 133, 138 (1990) (intent is discerned from statutory language, structure, and purpose). A court must then turn to the state statute at hand and examine whether state action infringes upon the preempted field.

Courts have identified three general circumstances in which state law may be preempted by federal law. First, a federal statute may explicitly define the extent to which its enactment preempts a state law or regulates a field. English v. Gen. Electric Co., 496 U.S. 72, 78-79 (1990). Second, in the absence of explicit statutory language in federal law, state law may be preempted if it regulates conduct in a field Congress intended the federal government to occupy exclusively, either because the federal regulatory scheme is “so pervasive” that a court may infer Congress left “no room for the States to supplement it,” or federal interest in the field is so

dominant it “will be assumed to preclude enforcement of state laws on the same subject.” Id. at 79. Third, state law may be preempted to the extent it conflicts with federal law, such that a party could not possibly comply with both state and federal laws, or where state law obstructs accomplishment of the full purposes and objectives of federal law. Id.; Silkwood v. Kerr-McGee Corp., 464 U.S. 238, 248 (1984). The Supreme Court has noted these three categories are not “rigidly distinct,” and indeed, “field pre-emption may be understood as a species of conflict pre-emption.” English, 496 U.S. at 79 n.5; accord Gade v. Nat’l Solid Wastes Mgmt. Ass’n, 505 U.S. 88, 104 n.2, 110 (1992) (reiterating that preemption categories “not rigidly distinct” but observing a category will nevertheless “carry with it substantive implications for the scope of pre-emption,” and that for conflict preemption, where the challenged law is one of general application, at least, a “high threshold must be met” in establishing actual conflict). Plaintiffs’ arguments train the Court’s focus on Congress’ implied intent to preempt the entire field of radiological safety and public health.

A. The Atomic Energy Act

The Atomic Energy Act of 1954 created a comprehensive and pervasive program of federal regulation and licensing that permitted the private use, control, ownership, and operation of commercial nuclear power reactors, the development of which had, until then, remained a federal monopoly. Duke Power Co. v. Carolina Env’tl. Study Grp., Inc., 438 U.S. 59, 80-81 (1978). Congress believed private development of nuclear energy would serve the national interest. Id. The Act gave the federal government “exclusive jurisdiction to license the transfer, delivery, receipt, acquisition, possession and use of nuclear materials,” and regarding these subjects, “no role was left for the states.” Pac. Gas & Electric Co. v. State Energy Res. Conserv.

& Dev. Comm'n, 461 U.S. 190, 207 (1983) (citing 42 U.S.C. §§ 2014(e), (z), (aa), 2061-64, 2071-78, 2091-99, 2111-14); English, 496 U.S. at 81.

The Nuclear Regulatory Commission's²³ “prime area of concern in the licensing context . . . is national security, public health, and safety.” Pacific Gas, 461 U.S. at 207 (quoting Vt. Yankee Nuclear Power Corp. v. Natural Res. Def. Council, Inc., 435 U.S. 519, 550 (1978); see also 42 U.S.C. § 2012(e) (regulation of “production and utilization of atomic energy and of the facilities used in connection therewith is necessary in the national interest to assure the common defense and security and to protect the health and safety of the public”), and 10 C.F.R. § 8.4(b) (licensing and regulation were “for the protection of the public health and safety from radiation hazards and for the promotion of the common defense and security”). Congress’ decision to foreclose “states from conditioning the operation of nuclear plants on compliance with state-imposed safety standards” and otherwise “regulating the safety aspects of nuclear development” is based on “its belief that the Commission was more qualified to determine what type of safety standards should be enacted in this complex area.” Silkwood, 464 U.S. at 250-51.

In 1959, Congress amended the Atomic Energy Act to authorize agreements between the Commission and state governors permitting limited state regulation of certain materials “for the protection of the public health and safety from radiation hazards.” 42 U.S.C. § 2021(b). The cooperation provisions permit limited state regulation of certain less hazardous nuclear materials, such as byproduct materials, source materials, and special nuclear materials insufficient to form a critical mass, id., but retain the Commission’s sole “authority and responsibility with respect to

²³ In 1974, the NRC replaced its predecessor, the Atomic Energy Commission, as the body exercising licensing and regulatory functions. See Energy Reorganization Act, 42 U.S.C. § 5801 et seq., which also expanded the NRC’s range of safety responsibilities.

regulation of,” among other things, “the construction and operation of any production or utilization facility,” i.e., a nuclear plant. § 2021(c). Notably, spent fuel waste from nuclear power plants does not fall within any of the categories potentially subject to state regulation under such agreements. See 10 C.F.R. § 62.2 (2007). Vermont has not contracted with the NRC to be an agreement state under 42 U.S.C. § 2021(b).

The Supreme Court, examining these provisions of the AEA, has concluded “the federal government has occupied the entire field of nuclear safety concerns, except the limited powers expressly ceded to the states.” Pacific Gas, 461 U.S. at 212.

The Atomic Energy Act includes two savings clauses expressly preserving state regulatory authority over matters not regulated by the Act. The Act defines the NRC’s agency jurisdiction in § 2018 of Chapter 23:

Nothing in this chapter shall be construed to affect the authority or regulations of any Federal, State or local agency with respect to the generation, sale, or transmission of electric power produced through the use of nuclear facilities licensed by the Commission: Provided, That this section shall not be deemed to confer upon any Federal, State, or local agency any authority to regulate, control, or restrict any activities of the Commission.

42 U.S.C. § 2018. Furthermore, § 2021(k) states, with respect to the section governing cooperation agreements with the states:

Nothing in this section shall be construed to affect the authority of any State or local agency to regulate activities for purposes other than protection against radiation hazards.

42 U.S.C. § 2021(k).

In 1982, in response to accumulated spent nuclear fuel and fuel reprocessing waste problems, Congress passed the Nuclear Waste Policy Act, 42 U.S.C. §§ 10101-10270, which established a schedule for developing a permanent federal repository, a federally monitored

temporary storage program, and required private facility operators to provide for interim spent fuel storage and exhaust onsite storage options. While the AEA does not refer to storage or spent fuel disposal, “it has long been recognized that the AEA confers on the NRC authority to license and regulate the storage and disposal of such fuel,” and the NRC has promulgated detailed regulations regarding spent fuel storage, including record-keeping and inspection requirements, site evaluation criteria, design requirements, quality assurance, and personnel training and certification. Bullcreek v. NRC, 359 F.3d 536, 538 (D.C. Cir. 2004); see 10 C.F.R. Part 72.

The NRC has acknowledged that NRC license renewal alone does not ensure continued operation of a plant. A Commission document, entitled Statement of Considerations for Environmental Review for Renewal of Nuclear Power Plant Operating Licenses, provides:

After the NRC makes its decision based on the safety and environmental considerations, the final decision on whether or not to continue operating the nuclear plant will be made by the utility, State, and Federal (non-NRC) decisionmakers. This final decision will be based on economics, energy reliability goals, and other objectives over which the other entities may have jurisdiction.

61 Fed. Reg. 28467, 28473 (June 5, 1996) (10 C.F.R. Part 51) (emphasis added). Most recently, the NRC issued a document, entitled Final FAQs for License Renewal, recognizing states may have some regulatory jurisdiction over continued operation of nuclear power plants, stating:

It is possible that a license renewal application could satisfy the NRC’s safety and environmental reviews and still not operate. This is because the NRC does not have a role in the energy-planning decisions of state regulators and licensee officials. . . . Thus, whether the facility will continue to operate is based on factors such as the need for power or other matters within the state’s jurisdiction or the financial interests of the owners.

NRC, Final Report, Frequently Asked Questions on License Renewal at 1-7 (Mar. 2006), Defs.’ Ex. 1003 (Doc. 39-2).

B. Key Precedents Defining the Preempted Field and Examining State Action

1. Pacific Gas

Where Congress intends to occupy “the entire field of nuclear safety concerns, except the limited powers expressly ceded to the states,” the test of preemption under the AEA is “whether the matter on which the state asserts the right to act is in any way regulated by the federal government.” Pac. Gas & Electric Co. v. State Energy Res. Conserv. & Dev. Comm’n, 461 U.S. 190, 212-13 (1983) (internal quotation omitted). Pacific Gas, the key Supreme Court precedent in AEA preemption, warrants discussion, particularly since both parties cite it in support of their arguments.

In Pacific Gas, the Supreme Court addressed whether the AEA preempted a California state law imposing a moratorium on certification for new nuclear plants until the state energy commission found there existed federally approved means for permanent disposal of nuclear waste. Id. at 194-95, 197-98. The petitioners, two public utilities, had wished to build nuclear plants and undertook efforts in seeking certification, but were forced to cancel their plans because of the uncertainties. Id. at 198, 201 & n.13; see also Pac. Legal Found. v. State Energy Res. Conserv. & Dev. Comm’n, 659 F.2d 903, 910, 914 (9th Cir. 1981). Petitioners and amici argued the California statute was preempted by the Atomic Energy Act because the statute regulated plant construction and was predicated on safety concerns (and therefore intruded on a preempted field). Pacific Gas, 461 U.S. at 204. They also argued it conflicted with federal judgments concerning nuclear waste disposal and frustrated the federal goal of developing nuclear technology. Id.

The Supreme Court rejected the argument that the preempted field included all regulation governing construction and operation of a nuclear plant, and defined the federal government's field as regulation of "the radiological safety aspects involved in . . . construction and operation," while "the States retain their traditional responsibility in the field of regulating electrical utilities for determining questions of need, reliability, cost and other related state concerns." Id. at 205; but cf. id. at 212 ("It would clearly be impermissible for California to attempt to do so [regulate the construction or operation of a nuclear power plant], for such regulation, even if enacted out of non-safety concerns, would nevertheless directly conflict with the NRC's exclusive authority over plant construction and operation.").

The Court, recognizing that the proposed plants at issue would be regulated retail utilities granted a franchise by the state, over which California had traditional authority to determine "need," "economic feasibility," and "rates and services," id. at 205, began its analysis with a presumption against preemption, such that "the historic police powers of the States were not to be superseded by the Federal Act unless that was the clear and manifest purpose of Congress." Id. at 206 (quoting Rice v. Santa Fe Elevator Corp., 331 U.S. 218, 230 (1947)); cf. United States v. Locke, 529 U.S. 89, 108 (2000) (noting that "an 'assumption' of nonpre-emption is not triggered when the State regulates in an area where there has been a history of significant federal presence"). The Court, however, held Congress' purpose in the AEA was clear with respect to radiological safety, such that "the federal government maintains complete control of the safety and 'nuclear' aspects of energy generation; the states exercise their traditional authority over the need for additional generating capacity, the type of generating facilities to be licensed, land use, ratemaking, and the like." Pacific Gas, 461 U.S. at 212. The Court pointed out that

Congress' intent to leave states' traditional "authority over the generation of electricity itself, or over the economic question whether a particular plant should be built," *id.* at 207, in state hands was made clear in the savings clauses within Chapter 23 and § 2021, but recognized that this traditional authority over the economic aspects of generation was subject to an exception, where FERC had "broad authority," "over the need for and pricing of electrical power transmitted in interstate commerce," *id.* at 205-06.

Having defined the scope of the preempted field, the Court's next step was to analyze the purpose motivating the state statute at hand. On its face, the California statute evinced neither safety nor economic purposes for the moratorium. *Id.* at 214 (noting "[w]aste disposal safety . . . is not directly addressed by the bills" and the statute "evinces no concern with the economics of nuclear power.") As a general matter, the Pacific Gas Court recognized "[t]here are both safety and economic aspects to the nuclear waste issue." *Id.* at 196.

The Court discussed whether concern about safety could be a permissible purpose for the California moratorium. It observed:

State safety regulation is not preempted only when it conflicts with federal law. Rather, the federal government has occupied the entire field of nuclear safety concerns, except the limited powers expressly ceded to the states. . . . A state moratorium on nuclear construction grounded in safety concerns falls squarely within the prohibited field. Moreover, a state judgment that nuclear power is not safe enough to be further developed would conflict directly with the countervailing judgment of the NRC A state prohibition on nuclear construction for safety reasons would also be in the teeth of the Atomic Energy Act's objective to insure that nuclear technology be safe enough for widespread development and use – and would be preempted for that reason.

Id. at 212-13.²⁴

²⁴ A concurring opinion by Justice Blackmun, joined by Justice Stevens, disagreed with the majority to the extent it suggested "a State may not prohibit the construction of nuclear power

Given that a moratorium “grounded in safety concerns” would be preempted, the Court found it “necessary to determine whether there is a non-safety rationale” for the moratorium. Id. at 213. The State, in support of its argument the moratorium “was aimed at economic problems, not radiation hazards,” pointed to a state legislative committee report stating the waste disposal problem was largely economic, not safety related, and created a “clog” in the system, making containment of the problem costly and risking reactor shutdowns. Id. at 213.

Petitioners argued the California laws were written “with safety purposes in mind,” pointing to slightly more attenuated evidence of motive – the historical context for the moratorium legislation – which showed it was enacted as an alternative to a rejected voter initiative proposing a similar moratorium that recited the threat of harm to the land and people of California. Id. at 215 & n.27. Petitioners also pointed to the statutory context, where the moratorium’s companion provisions required the state commission to consider “public health and safety.” Id. at 215 n.27. Faced with these arguments, the Court stated, “we should not become embroiled in attempting to ascertain California’s true motive,” finding California’s economic purpose was consistent with states’ regulatory power to “halt the construction of new nuclear plants . . . on economic grounds.” Id. at 216. The Court concluded, “[t]herefore, we accept

plants if the State is motivated by concerns about the safety of such plants,” because there was nothing in the AEA to “force States to be blind to whatever special dangers are posed by nuclear plants” in exercising their traditional powers to choose “which technologies to rely on in meeting their energy needs.” Pacific Gas, 461 U.S. at 223-25 (Blackmun, J., concurring in part and concurring in the judgment). This Court notes this is not the Pacific Gas majority’s conclusion and is bound by the rule that states may not regulate radiological safety, unless Congress acts to change it. Entergy argues that a state’s energy “needs,” when they are met by wholesale suppliers on the interstate market, is a question of choosing from which sources to buy power. Pls.’ Post-Trial Br. at 14 (Doc. 174) (arguing “state-regulated utilities may pursue energy diversity by choosing (or being ordered) to purchase from non-nuclear suppliers” and noting Pacific Gas, 461 U.S. at 205-06, recognized FERC has authority over “need” in interstate commerce).

California's avowed economic purpose as the rationale for enacting [the moratorium].

Accordingly, the statute lies outside the occupied field of nuclear safety regulation." Id.

The Pacific Gas Court did not articulate precisely how it ascertained the economic rationale behind the challenged statute. As noted above, the moratorium provision in question did not recite an enactment purpose on its face. The Court indicated it was placing "considerable confidence" in the lower court's interpretation of and reliance on the Reassessment Report in the legislative history, written by the state legislative committee that drafted and proposed the challenged statutes, where the report recited the economic purpose. Id. at 214 (rejecting attempt to "upset this interpretation"). The legislative committee report characterized the lack of a federally approved method of disposing of nuclear waste as "largely economic or the result of poor planning, not safety-related." Id. at 213. The Pacific Gas Court also held the moratorium neither conflicted nor interfered with federal regulation. Id. at 217-22.

2. Precedents Examining Preempted Purpose

Where radiological safety concerns are the sole purpose for an enactment or regulation, courts have easily concluded the state action is preempted. The Tenth Circuit, in Skull Valley Band of Goshute Indians v. Nielson, held the AEA preempted Utah's sweeping state licensing scheme for spent nuclear fuel storage facilities, and those provisions based solely on safety concerns were preempted out of hand. Skull Valley, 376 F.3d 1223, 1246 (10th Cir. 2004). Provisions that specifically required counties to assess effects of storage on the health and safety of its citizens before a facility could be permitted were held preempted on their face. Id. A provision permitting counties to ban storage altogether, but which did not expressly refer to safety, and for which officials failed to offer a "non-safety rationale," was preempted as

“grounded in safety concerns.” Id. With respect to County Planning Provisions barring the provision of municipal services to spent fuel transportation and storage facilities, Utah had defended these as concerning areas of state interest in law enforcement, fire protection, waste, and garbage collection. Id. at 1247. The panel found those justifications were trumped by safety motivations, reasoning the state could not use its traditional authority indirectly “as a means of regulating radiological hazards.” Id. at 1247-48.

In Long Island Lighting Co. v. County of Suffolk, a district court enjoined enforcement of a local law criminalizing participation in a nuclear plant’s emergency evacuation plan because it was motivated solely by safety purposes and therefore preempted. Long Island Lighting Co., 628 F. Supp. 654, 665 (E.D.N.Y. 1986) (examining a local law’s articulated purpose and legislative history, noting that apart from broad reference to “police powers,” officials failed to articulate law’s non-safety rationale, and finding law was motivated by opposition to the facility “on the basis of a perceived radiological hazard”).

The following Second Circuit and Supreme Court precedent in other preemption contexts suggest that even if an allegedly preempted statute is enacted with multiple purposes, some permissible, others impermissible, the impermissible purposes will doom the statute and it will be preempted. The Second Circuit has held that courts cannot “blindly accept” a challenged statute’s “articulated purpose,” because doing so would enable legislatures to “nullify nearly all unwanted federal legislation by simply publishing a legislative committee report articulating some state interest or policy – other than frustration of the federal objective – that would be tangentially furthered by the proposed state law.” Greater N.Y. Metro. Food Council, Inc. v.

Giuliani, 195 F.3d 100, 108 (2d Cir. 1999) (quoting Gade v. Nat'l Solid Wastes Mgmt. Ass'n, 505 U.S. 88, 106 (1992)).

In Greater N.Y. Metro., a New York City ordinance prohibited tobacco advertisements near schools, playgrounds, and certain businesses serving children, and prescribed that only text-only “tombstone” signs near store entrances could signal tobacco products were sold there. Id. at 103, abrogated on other grounds by Lorillard Tobacco Co. v. Reilly, 533 U.S. 525, 538-39 (2001). A federal statute expressly preempted states from prohibiting, “based on smoking and health,” any advertising or promotion of cigarettes that were otherwise labeled in conformity with federal law. Id. at 105 (quoting 15 U.S.C. § 1334(b)). In finding that the tombstone provision, which regulated content and format, was preempted, the Second Circuit declined to defer to the ordinance’s express legislative findings that its purpose was to “strengthen compliance with” and “enforcement of” laws prohibiting tobacco sales to children, but was rather “based on,” or motivated by, the City’s concerns with smoking and health. Id. at 108. “That the City Council drafted a declaration of intent that recites a law enforcement goal while scrupulously avoiding any mention of the word ‘health’ simply cannot control our preemption analysis,” the panel reasoned. Id.

With respect to purpose, the Greater N.Y. Metro. court held it was preempted where, despite the legislative findings, the legislative history was “‘replete’ with references to the twin purposes of promoting ‘health’ and combating the dangers of smoking.” Id. (considering committee testimony by third parties and statements of legislator and law’s sponsor).

Five years earlier, in Vango Media, Inc. v. City of New York, the Second Circuit had held the same federal statutory provision, 15 U.S.C. § 1334(b), expressly preempted a New York

City ordinance which required, for every four tobacco advertisements displayed on certain city-licensed property, one public health message regarding health dangers of smoking, or benefits of not smoking. Vango Media, 34 F.3d 68, 74-75 (2d Cir. 1994). The law's declaration of legislative findings and intent stated that "[b]esides the grave dangers posed by tobacco use to . . . health," tobacco use threatened the general welfare "by causing enormous financial costs . . . in the form of health care benefits, and a loss of productivity," and the city argued the law was enacted "in light of the economic costs related to smoking." Id. at 73. The Vango Media court held the legislative findings indicated economic motivations were "secondary" to the City's "health concerns." Id. Furthermore, the law's effect was to educate the public regarding smoking health risks, and it imposed conditions on the display of cigarette advertisements that subjected advertisers to conflicting regulations. Id. at 73, 75. In concluding that, of the City's dual purposes, the permissible one did not save the statute, the court noted it was a "truism that almost all matters touching on matters of public concern have an associated economic impact on society," and in the case at hand, it did not displace what it concluded was the City's "primary interest" in public health. Id. at 73.

Similarly, in Gade v. National Solid Wastes Management Assoc., the Supreme Court considered a state occupational safety law which had dual purposes, or a "dual impact," one preempted by OSHA, the other within the state's authority, and held the state regulation could not avoid preemption "simply because the regulation serves several objectives rather than one." Gade, 505 U.S. at 104-07 (noting Court would not "adhere to the aberrational doctrine . . . that state law may frustrate the operation of federal law as long as the state legislature . . . had some purpose in mind other than one of frustration," and recognizing proposition that courts

examining statutory purpose are “not bound” by the “name, description or characterization” given by legislatures or state courts (internal quotations omitted)).

Plaintiffs’ counsel suggests the challenged statutes in this case would be preempted under an even more lenient standard than the one gleaned from the above-cited precedent. Counsel points to a but-for causation standard, well-tested in other contexts where multiple purposes are advanced for a statute, which posits that where it is evident the statute was motivated, even in part, by an impermissible purpose, the burden shifts to the Defendants to establish that the same decision would have resulted from the other purposes motivating the legislature, had the impermissible purpose not been considered. See Pls.’ Pre-Trial Br. at 17; Pls.’ Post-Trial Br. at 8-9; Tr. 731-32 (Doc. 171 at 6). The Supreme Court identified this as the appropriate framework to evaluate permissible and racially discriminatory motivations advanced for the denial of a zoning request challenged under the Equal Protection Clause, Village of Arlington Heights v. Metropolitan Housing Dev. Corp., 429 U.S. 252, 271 n.21 (1977), and in evaluating claims of retaliation in violation of the First Amendment, Mt. Healthy City School District Bd. of Education v. Doyle, 429 U.S. 274 (1977). See Mt. Healthy, 429 U.S. at 285-86 (noting the standard has been applied in other areas of constitutional law as well). This framework is in keeping with Pacific Gas, where the economic purpose professed in the legislative history was plausibly served by the moratorium at issue.

Defendants urge that this Court must accept the purposes articulated in the text of the challenged statutes without looking any further, and that it should not consider legislative history to elucidate purpose. This Court, however, would be remiss if it failed to evaluate the purposes behind Vermont’s enactments “as a whole,” and failed to consider and weigh the significance of

a legislative history filled with references to safety, particularly where the legislation is specifically targeted at the only nuclear plant operating in the state.

3. Precedents Examining Preempted Effect

Plaintiffs argue that the Court need go no further once it finds a preempted purpose. However, numerous precedents, and logic, indicate that a law enacted for an impermissible purpose must have a preempted effect in order to be invalid under the Supremacy Clause. The threshold showing of preempted effect may vary depending on the type of preemption asserted.

In Greater N.Y. Metro., the Second Circuit considered itself required to examine both the purpose and effect of the challenged provision to determine whether it fell into the preempted field in imposing a prohibition with respect to advertising or promotion of cigarettes. It first considered “the purpose of the ordinance as a whole,” and looked beyond the ordinance’s textually articulated purpose to consider a legislative history “replete” with references to health and smoking dangers, before considering effect. Greater N.Y. Metro., 195 F.3d at 108. The panel held that preempted “effect” was satisfied largely because it found a preempted purpose; it held the provision in question had the “effect” of promoting health “because the underage sales prohibitions whose enforcement it explicitly seeks to promote are inherently based on health concerns.” Id. (emphasis added). The legislation in Greater N.Y. Metro. also directly pertained to tobacco advertising because it affected its content and format.

The test for preempted effect has been more stringent in conflict preemption cases involving laws of general application, or state action that has no relationship to a preempted field or a federally regulated subject, where inquiry into purpose would be fruitless and “not relevant.” See English v. Gen. Electric Co., 496 U.S. 72, 84 (1990). In Silkwood v. Kerr-McGee Corp. and

English v. General Electric Co., the Supreme Court considered claims and damages under longstanding, generally applicable state tort laws, clearly not enacted with radiological safety purposes in mind, and which therefore could never satisfy any test of improper purpose, and the Court in English required, instead, a strong showing that the tort claims at issue had a “direct and substantial effect” on radiological safety. See English, 496 U.S. at 85; cf. Silkwood v. Kerr-McGee Corp., 464 U.S. 238, 255-57 (1984).

In contrast, in Pacific Gas the Court’s analysis primarily addressed the purpose of the nuclear plant construction moratorium at issue – which was not a law of general applicability, but rather addressed itself directly to nuclear plants – asking whether it was “grounded in” safety or non-safety concerns. Pacific Gas, 461 U.S. at 213. The Court recognized that an inquiry into effect alone may be called for where a statute directly regulated plant construction or operation, because such a regulation, “even if enacted out of non-safety concerns, would nevertheless directly conflict with the NRC’s exclusive authority over plant construction and operation.” Id. at 212. While the Pacific Gas Court did not discuss effect in its analysis, the challenged law directly affected nuclear plants.

III. MERITS OF ATOMIC ENERGY ACT PREEMPTION CLAIM

Given the facts and legal framework described above, this Court turns to the merits of Plaintiffs’ claim. This Court, of course, begins its analysis “with the assumption that the historic police powers of the States [are] not to be superseded . . . unless that was the clear and manifest purpose of Congress.” Rice v. Santa Fe Elevator Corp., 331 U.S. 218, 230 (1947). States have historically regulated retail markets and vertically integrated electric generation utilities with monopolies within the state, serving captive customers; this situation requires regulation because

competitive market forces do not serve as a check on price and service quality, for example. This Court is mindful that the energy landscape has changed since the Supreme Court's decision in Pacific Gas, and notes that Vermont Yankee is a merchant plant free to sell electricity wholesale to any customer in the interstate market. While this status has not entirely displaced state regulation, the range of issues subject to state regulation may have narrowed. The precise scope of the state's regulatory authority is – absent preemption under the AEA or FPA, or burdens on interstate commerce – a question that is not before this Court.

A. Effect and Purpose of Act 160

1. Effect Apparent From Legislative Text

As described supra, in Section I, Act 160 enacted three new substantive provisions governing Vermont Yankee, codified in title 30, sections 248(e)(2), 248(m), and 254. Section 248(e)(2) provides that “[n]o nuclear energy generating plant within this state may be operated beyond the date permitted in any certificate of public good . . . unless the general assembly approves and determines that the operation will promote the general welfare.” Vt. Stat. Ann. tit. 30, § 248(e)(2).

By its terms, section 248(e)(2) permits a Vermont legislature, or successive legislatures, to effectively deny a pending renewal petition by taking no action on the petition, for any reason, procedural or substantive, stated or unstated, permissible or impermissible under federal law. As occurred with S.289 in 2010, the inaction can take the form of failing to pass proposed affirmative legislation approving a petition, leaving the pending petition unresolved. Because Act 160 requires the passage of a special law affirmatively approving continued operation, the General Assembly has a virtually unreviewable power to allow Entergy's current CPG to lapse

and effectively deny a pending petition for renewal, even if it does so for reasons preempted under federal law. See, e.g., Bd. of Educ. of Kiryas Joel Vill. Sch. Dist. v. Grumet, 512 U.S. 687, 703, 716 (1994) (“unlike an administrative agency’s denial of an exemption from a generally applicable law, which would be entitled to a judicial audience, a legislature’s failure to enact a special law is itself unreviewable” and “legislative refusal to act would not normally be reviewable by a court” (internal quotation omitted)). In the circumstances presented in this case, this is a problem if, and only if, the legislature did so with a preempted purpose in mind.

Section 248(m) simply calls for the Board to consider “current assumptions and analyses,” rather than those informing the previous grant of a CPG, in evaluating a petition for continued operation. Vt. Stat. Ann. tit. 30, § 248(m).

Section 254 requires a renewal application to be filed four years before a renewed CPG is to take effect and authorizes the PSB to arrange for studies to support the General Assembly’s fact finding. Id. § 254. In defining the many objectives of the public engagement and fact-finding processes, it includes a requirement that studies “identify, collect information on, and provide analysis of long-term environmental, economic, and public health issues, including issues relating to dry cask storage of nuclear waste and decommissioning options.”

§ 254(b)(2)(B). Regardless of whether one reads the final clause, “including issues relating to dry cask storage,” as modifying all three issues in the preceding series, or as modifying only the last item in closest proximity, the plain text of this provision calls for an analysis of public health issues that includes a subset of public health issues relating to storage of nuclear waste.

Consideration of radiological public health in re-licensing decisions is the exclusive province of

the NRC under the Atomic Energy Act. A state's consideration of it in determining whether to license a plant's continued operation is preempted.

Given section 248(e)(2)'s effect, described above, and the fact that section 254 calls for consideration of radiological public health, the Court turns to examine Act 160's purpose.

2. Legislative Purpose

The Act's purpose "as a whole" must be informed by its legislative history and context. "Examination of purpose is a staple of statutory interpretation." McCreary Cnty., Ky. v. Am. Civil Liberties Union of Ky., 545 U.S. 844, 861 (2005). The inquiry looks to the "'plain meaning of the statute's words, enlightened by their context and the contemporaneous legislative history,'" as well as "'the specific sequence of events leading to [its] passage.'" Id. at 862 (quoting Edwards v. Aguillard, 482 U.S. 578, 594-95 (1987)).

The legislative policy and purposes expressed in Section One of Act 160 do not refer to preempted purposes for the Act. Section One reiterates the state's policy that a nuclear energy generating plant may operate "only with the explicit approval of the General Assembly expressed in law" after discussion of the "state's need for power, the economics and environmental impacts of long-term storage of nuclear waste, and choice of power sources among various alternatives." Act 160, § 1; 2006 Vt. Laws 160 (LexisNexis).²⁵ Vermont's arguments that this Court should look no further, and that it need not be required to introduce evidence the legislature actually considered these non-preempted purposes, are unpersuasive. Defs.' Pre-Trial Br. at 2, 10; Tr. at 761-62 (Doc. 171). While this Court is aware that "a legislature's stated reasons will generally

²⁵ "The declaration of policy, like the preamble, is not part of the substantive portion of the statute." 1A N. Singer & J. Singer, Sutherland Statutes & Statutory Construction § 20:12 (7th Ed. 2007); see also Bissette v. Colonial Mortg. Corp. of D.C., 477 F.2d 1245, 1247 n.2 (D.C. Cir. 1973).

get deference,” a Court cannot be “so naive” in its purpose inquiry to accept “any transparent claim,” McCreary, 545 U.S. at 863-64, and Second Circuit precedents make clear that in preemption analysis, a court cannot “blindly accept” a challenged statute’s “articulated purposes,” because doing so would enable legislatures to “nullify nearly all unwanted federal legislation.” Greater N.Y. Metro., 195 F.3d at 108 (quoting Gade, 505 U.S. at 106). Inquiry into the legislative history of Act 160 is particularly important here, where there is evidence the statute was motivated by and grounded in radiological safety concerns, and the statute on its face empowers future legislatures to apply the statute to deny continued operation for radiological safety reasons and evade review.

This Court has been mindful, in reviewing the legislative history, that the remarks of witnesses at committee hearings “are accorded little weight in determining the intent of the legislature.” 2A N. Singer & J. Singer, Sutherland Statutes & Statutory Construction § 48:10, at 583 (7th ed. 2007). It is also mindful that the laws at issue went through various drafts, and that legislator’s comments regarding later drafts may be more reflective of legislative intent. This Court also has taken care to consider each challenged enactment separately.

The legislative history of Act 160 reflects that legislators’ concerns regarding the radiological safety of Vermont Yankee were a primary motivating force for giving the legislature the power to take no action to approve a certificate of public good for continued operation. Some of the numerous references to safety reflect legislators’ responsible recognition that Vermont is preempted from regulating radiological health and safety and indicate their desire to avoid invalidating their work on that ground. See Pls.’ Exs. 134D, 136A, 144C (advice from DPS witness), and audio recordings of same exhibit number. Other references, almost too numerous

to count, however, reveal legislators' radiological safety motivations and reflect their wish to empower the legislature to address their constituents' fear of radiological risk, and beliefs that the plant was too unsafe to operate, in deciding a petition for continued operation. See id. (listing excerpts identified as Pls.' Exs. 127A (legislator discussing NRC's limited view of safety), 130A (legislators to ask for studies on health and safety), 130B (legislature's right to look at health and safety, and desire for bargaining leverage), 130D (legislator asking if fact that bill addressed matters that "really are about safety issues" was a problem), 134A ("let's find another word for safety"), 134E (studies for legislature to include "safety questions," and desire to "give latitude" to the assembly), 135A (asking if legislation could be overturned "because it's based on safety?" because "[t]hat's all its going to be based on"), 135B (suggesting legislature could consider "broader range" of issues than Board, referring to "three-headed turtles and sterile sheep"), 140A (expressing concern with 40 more years of radioactive materials in the state, and "the closer you live to that radioactivity, the more concerned you are"), 140B (potential for accidents made legislature feel relicensing was a policy decision they should make), 140C (referring to electric rates and desire to "negotiate with some bargaining leverage), 149A (risks and dangers of nuclear waste), and audio recordings of same exhibit number. Of these two types of statements, this Court finds, after reviewing the legislative history, and listening to the key audio recordings and exhibits in context, that the legislature's motivation to regulate radiological safety, and to empower itself to be responsive to constituents' beliefs and fears that the plant was unsafe, emerges substantially net positive.

Furthermore, there is insufficient evidence the legislature, absent this radiological safety motivation, would have enacted Act 160 for the purposes articulated in its text. First, as

evidence the legislature considered “the economics and environmental impacts of long-term storage of nuclear waste,” Defendants point to a passage in the legislative history of Act 160 where a witness from the Vermont State Nuclear Advisory Panel suggested the legislature would be “institutionally equipped” to think about the “entire range of issues” in nuclear matters. Defs.’ Post-Trial Br. at 5 & n.2 (Doc. 173) (referring to Defs.’ Legis. Hist. App. at 186-94).

Examination of this discussion, however, reveals a primary focus not on economics or the environment, but on safety, for the debate quickly devolved into a discussion of the legislature’s ability to exact compensation for perceived radiological safety risks, with the witness again suggesting:

[T]his range of issues is not – the PSB is not institutionally equipped to think of them altogether. It’s not allowed to think about safety, as you know. . . . It’s – there are some questions about the jurisdiction of – of the legislature, but at the very least, the legislature would have jurisdiction to think about compensation.”

Def.’s. Legis. Hist. App. at 191.

Later in the discussion, the witness says more explicitly, “even if a plant is deemed to be safe, that doesn’t mean it’s absolutely safe. . . . [E]ven though it was deemed to be safe, should some compensation be arranged for this?” Id. at 192.

Second, with respect to the state’s interests in “need for power” and “choice among power sources,” Defendants cite to a passage where a senator states, “we have serious, serious problems in energy.” Defs.’ Post-Trial Br. at 5 & n.2 (referring to Defs.’ Legis. Hist. App. at 163). Examination of the statement in context reflects the energy problem Vermont faced was the end of its favorably priced long-term power contract with Entergy. The senator concluded, “[i]t’s going to be terribly important for – for the State to have every bit of leverage it possibly

can as we go forward.” Defs.’ Legis. Hist. App. at 164:18-19, 165. The legislative history makes clear that the demand for a favorable power purchase agreement was itself rooted in safety concerns, because the General Assembly wanted financial compensation for the perceived safety risk of having Vermont Yankee within the state. See Pls.’ Exs. 130B, 134F, 140C (excerpts of audio recordings of the same exhibit number); see also Pls.’ Ex. 155 (Track 1 00:37:45).

Defendants also cite a passage referring to the need to “craft an energy policy,” although the Court notes the statement appears in the context of a discussion regarding the supply sources from which Vermont planned to buy power following 2012. Defs.’ Legis. Hist. App. at 236-37. Defendants suggest that if legislators were mistaken that Vermont Yankee’s status as a merchant generator may have limited their authority to condition continued operation on whether Vermont Yankee would satisfy the “need” for power or be a viable choice among power sources, this mistake is not a legitimate reason for “rejecting the rationales legislators actually relied upon.” See Defs.’ Post-Trial Br. at 6-7. The Court is not persuaded that a genuinely held invalid purpose can save a statute where the primary motivation for the statute is preempted, and to accept such an argument undermines the purpose of a but-for causation burden-shifting test, which is to avoid invalidating state action that would otherwise be valid. Furthermore, none of the passages Defendants cite persuades the Court that Act 160 would have been enacted absent the legislature’s safety motivations because the legislature had other valid purposes in mind,.

This Court holds there is overwhelming evidence in the legislative record that Act 160 was grounded in radiological safety concerns and the concomitant desire to empower the legislature to act on those concerns in deciding the question of Vermont Yankee’s continued operation. That this preempted radiological safety purpose was a primary motivation among

others advanced for Act 160 is sufficient to invalidate it under the standards articulated in Pacific Gas, 461 U.S. 190 (1983), Gade, 505 U.S. 88 (1992), Greater N.Y. Metro, 195 F.3d 100 (2d Cir. 1999), and Vango Media, 34 F.3d 68 (2d Cir. 1994), discussed supra in Section II.B. The result is the same even under a but-for causation standard, as articulated in Village of Arlington Heights, 429 U.S. 252, 271 n.21 (1977), and Mt. Healthy, 429 U.S. 274, 285-86 (1977). Therefore, because Act 160 has both a preempted purpose and effect, this Court holds it is preempted under the Atomic Energy Act.

B. Effect and Purpose of Act 74

1. Effect Apparent From Legislative Text

Of the three provisions enacted by Act 74, Plaintiffs have abandoned their AEA preemption claim regarding section 6523, which established the Clean Energy Development Fund, seeded by proceeds from Entergy.²⁶ The General Assembly's findings in section 6521 regarding the state's future power supply and the investment in renewable energy sources relate to the Fund created in section 6523.

Section 6522 provides that the owners of Vermont Yankee must obtain a certificate of public good from the Board before commencing "construction or establishment of any new storage facility for spent nuclear fuel." Vt. Stat. Ann. tit. 10, § 6522(a). It provides that section

²⁶ A portion (\$5.6 million) of Entergy's payments into the Fund have been refunded to Entergy in damages awarded by the Court of Federal Claims in September 2010. See Entergy Nuclear Vt. Yankee, LLC, 95 Fed. Cl. at 167 (noting ENVY's payments to DOE pursuant to spent fuel contract totaled over \$91 million through April 2008, and awarding damages of \$46 million, which includes approximately \$9.6 million expended for the Vermont spent-fuel storage CPG, of which \$5.6 million represents payments to the Fund during the relevant time period).

248 standards will apply to the new construction, and imposes additional special criteria for construction.²⁷ § 6522(a)-(c).

It also imposes an additional limitation on storage after March 21, 2012, providing: “Storage of spent nuclear fuel derived from the operation of Vermont Yankee after March 21, 2012 shall require the approval of the general assembly under this chapter.” § 6522(c)(4).

Defendants concede that with the interposition of the General Assembly storage approval requirement for fuel derived from operations after 2012, Vermont Yankee essentially lacks state authority to operate beyond that date, absent affirmative action by the General Assembly. Defs.’ Pre-Trial Br. at 9. On its face, the limitation prohibiting storage after 2012 absent an affirmative enactment granting approval, like section 248(e)(2) of title 30, permits the General Assembly to fail to act on a pending petition to store spent fuel for radiological safety reasons, in a manner that evades review. This leads the Court to inquire, as with Act 160, whether this provision was enacted with a preempted purpose in mind.

2. Legislative Purpose

The legislative history shows Act 74, including the provision that storage of spent nuclear fuel derived from post-March 21, 2012 operations requires legislative approval, is grounded in the legislature’s radiological safety concerns. As the excerpts from the legislative record in the Background, supra Section I.A, and cited here, reveal, the legislature’s desire and intent to regulate the radiological safety of dry cask storage is crystal clear. See Pls.’ Exs. 3A

²⁷ The Court notes that section 6522 is the only substantive provision within Chapter 157 that addresses the act of storing waste, as opposed to construction or establishment of a facility, and that the provision within section 6522(c)(4) requiring legislative approval appears to be the only provision in Chapter 157 which requires approval of any kind to store fuel beyond March 21, 2012.

(legislator asking which was safer storage scenario), 3C (witness urging legislature to protect public health and safety), 58A (expressing fear Entergy and government would not protect the spent fuel and desire for compensation for this risk), 65A (asking how safety issues could be creatively addressed in terms of aesthetics), 70B (stating DPS was inadequate advocate for health and safety), 70C (wanting assurance PSB and DPS's past failure to advocate for health and safety and environment would not happen with Vermont Yankee), 101B (noting new legislative findings were emasculated and sanitized), 110B (asking DPS how it had advocated for the public safety in the MOU), 110 & 110D (insistence legislature wished to act on safety concerns, despite being told this was purview of NRC (Track 1 00:51:08-00:54:40)), 111A (noting health and safety issues dealt with in MOU), 114B (legislator expressing greater trust in General Assembly than the NRC), 117A (bill was means of getting dry cask under desired financial and safety terms), 119A (discussing safety conditions), 124A (stating goal was safest possible storage), 124C (stating safety of paramount concern, and not for sale), 124D (stating Senate Finance Committee took safety question "very seriously"), 124E (stating safety the prime concern, not for sale), 124F (expressing concern with safety and lack of faith in the federal government), inter alia. In all, the recordings of committee hearing testimony and floor debate for Act 74 catalog an extensive record of legislators' statements of radiological safety purposes – statements that are too numerous to recount again here. See Pls.' Legis. Hist. App. at 2-34 (outlining excerpts from the actual audio recordings).

The record reflects witnesses also urged "the Legislature to maintain oversight over dry cask storage," because there was "very little faith in the Nuclear Regulatory Commission." Pls.' Ex. 3C (Track 1 00:45:57).

Defendants have pointed to passages in the legislative history which they claim reveal non-safety motives for passing Act 74. See Defs.’ Post-Trial Br. at 5 n.1. Some of these relate to the legislature’s reasons for seeking payments into the Clean Energy Development Fund. Others relate to dry cask storage approval. One legislator expressed it was an effrontery that Entergy had threatened to decommission earlier than 2012. See Defs.’ Legis. Hist. App. at 52:20-53:4. Another legislator suggested the bill was not about “black helicopters” or “terrorists,” but was a “terrible policy,” following statements that relicensing would be a mistake because the plant’s reasonable life expectancy ended in 2012, and expressions of fear Entergy would decommission and walk away. Id. at 54:15-56:17. Others referred to cask aesthetics, disclaiming focus on safety; the need for the facility to avoid the plant’s early closure; and the need to address fuel storage because the federal government had not created a federal repository. Id. at 129:13-22; 64:17-65:16; 62:9-18.

None of these passages persuades the Court that the legislature would have enacted the provision requiring legislative approval for storage after 2012 for the reasons Defendants advance, had the legislature not also been motivated to regulate radiological safety. The Court finds, after reviewing the legislative history and transcripts, and listening to recordings of relevant legislator statements, that radiological safety concerns were the primary motivating force for enacting Act 74, in particular for the requirement for affirmative legislative approval for spent fuel storage after March 21, 2012.

The provision requiring affirmative legislative approval to store spent nuclear fuel after March 21, 2012, is the only provision within the now-challenged portions of Act 74 that satisfies the test of both preempted purpose and effect. In the unique circumstances presented here, this

provision, enacted with radiological safety purposes in mind, and having the effect of giving the General Assembly the unreviewable power to prohibit storage of fuel, and therefore to prohibit continued operation for preempted radiological safety reasons, is preempted under the AEA.

C. Effect and Purpose of Act 189

While the legislative history for Act 189 is replete with references to a safety purpose, and the study it required focused on safety-related systems regulated by the NRC and directed Plaintiffs to address recommendations, the State represents Act 189 is no longer in effect. The Act 189 assessment teams, which began their work in 2008, reported to the legislature in March 2009; and the POP performed follow-up work in 2010 following the tritium leak, but “has now completed its work, and the State has no plans to reconvene it.” Defs.’ Pre-Trial Br. at 17 (Doc. 143.) Plaintiffs do not dispute this representation, but argue that for the currently pending Board proceedings in Docket No. 7440, Act 160 requires the Board to consider the study and its objectives. Since this Court has held Act 160 is preempted, and because the Act 189 assessment is no longer in effect, the Court holds the challenge to Act 189 is moot, and any prospective injunctive relief is unnecessary. See Frew ex rel. Frew v. Hawkins, 540 U.S. 431, 437 (2004) (Eleventh Amendment permits only prospective injunctive relief against state officials).

IV. MERITS OF ENTERGY’S FEDERAL POWER ACT PREEMPTION AND COMMERCE CLAUSE CLAIMS

A. Federal Power Act Preemption Claim

In Count II of the Complaint, Plaintiffs assert the Federal Power Act (FPA) preempts Vermont Defendants from requiring that Plaintiffs enter into power purchase agreements with Vermont retail utilities at below-market prices as a condition of renewed operation. The scheme, they argue, conflicts with the Federal Energy Regulatory Commission’s (FERC’s) “exclusive

authority to regulate the transmission and sale at wholesale of electric energy in interstate commerce.” New Eng. Power Co. v. New Hampshire, 455 U.S. 331, 340 (1982); see also 16 U.S.C. § 824(b)(1) (providing federal jurisdiction over “the transmission of electric energy in interstate commerce and . . . the sale of electric energy at wholesale in interstate commerce”). Plaintiffs represent that no state has ever shut down an operating wholesale nuclear plant for failure to offer a below-market PPA, although states have negotiated PPAs with companies as part of an initial acquisition of a wholesale plant, at arms’ length and without the threat of a regulatory shutdown.

Under the Federal Power Act, 16 U.S.C. § 791a et seq.:

Congress has drawn a bright line between state and federal authority in the setting of wholesale rates and in the regulation of agreements that affect wholesale rates. States may not regulate in areas where FERC has properly exercised its jurisdiction to determine just and reasonable wholesale rates or to insure that agreements affecting wholesale rates are reasonable.

Miss. Power & Light Co. v. Miss. ex rel. Moore, 487 U.S. 354, 374 (1988). FERC is responsible for assuring that a wholesale rate, and any “rate regulation, practice or contract affecting such rate,” is not “unjust, unreasonable, unduly discriminatory or preferential.” 16 U.S.C. § 824e(a); id. at 382 (Scalia, J., concurring) (quoting same). Furthermore, a state “must . . . give effect to Congress’ desire to give FERC plenary authority over interstate wholesale rates, and to ensure that the States do not interfere with this authority.” Nantahala Power & Light Co. v. Thornburg, 476 U.S. 953, 966 (1986).

Under the “filed-rate doctrine,” state courts and regulatory agencies are preempted by federal law from requiring the payment of rates other than the federal filed rate. See Entergy La., Inc. v. La. Pub. Serv. Comm’n, 539 U.S. 39, 47 (2003) (“The filed rate doctrine requires ‘that

interstate power rates filed with FERC or fixed by FERC must be given binding effect by state utility commissions determining intrastate rates.” (quoting Nantahala, 476 U.S. at 962)).

ENVY’s market-based rate tariff filed with FERC on June 24, 2010, states Entergy “may sell electric energy and capacity from time to time at rates, terms and conditions established by agreement with the purchaser All such transactions shall be voluntary. . . . All sales shall be made at rates established by agreement between the purchaser and Entergy Nuclear VY.” Defs.’ Ex. 1030 ¶¶ 1(a), 3. Market-based tariffs, instead of setting rates, “simply state that the seller will enter into freely negotiated contracts with purchasers.” Morgan Stanley Capital Grp. Inc. v. Pub. Util. Dist. No. 1 of Snohomish Cnty., 554 U.S. 527, 537 (2008) (emphasis added). The theory underpinning market-based tariffs “is that a seller cannot raise its price above the competitive level without losing substantial business to rival sellers unless the seller has market power, and therefore that FERC’s determination that a seller lacks market power provides a strong reason to believe that sellers will be able to charge only just and reasonable rates.” Pub. Util. Dist. No. 1 of Snohomish Cnty. v. Dynegy Power Mktg., Inc., 384 F.3d 756, 760 (9th Cir. 2004) (internal quotation and citation omitted). Here, Plaintiffs have introduced evidence of intent to condition approval for continued operation on the existence of a PPA at below-wholesale-market rates.

This case presents unique facts, and the precedents cited by the parties offer little guidance regarding whether FERC’s regulatory authority would extend to preventing the denial of continued operation based upon the failure to enter into a below-market power purchase agreement. The decisions make clear FERC has jurisdiction to review rates and agreements to ensure they are just and reasonable. Where FERC has mandated certain allocations, the FPA’s

preemptive reach prohibits state action trapping costs with the producer. In Mississippi Power & Light Co. v. Mississippi ex rel. Moore, the Supreme Court held a state's public service commission was preempted from exercising "its undoubted jurisdiction over retail sales to prevent [a] wholesaler-as-seller from recovering the costs of paying the FERC-approved rate," which FERC had directed the entity to pay for its allocation of power from a nuclear plant. Miss. Power, 487 U.S. at 372 (internal quotation and citation omitted). The state's court-ordered prudence review of the nuclear plant's initial construction project effectively and impermissibly "trapped" the FERC-mandated costs with the wholesaler, because the state commission thereafter rescinded a previously approved rate increase to retail customers. Id. at 372 & n.12.

Where FERC has not imposed a rate or cost on a regulated wholesaler, but the wholesaler agrees "by contract to a rate affording less than a fair return," the Supreme Court has held, in circumstances where the contract appears to have been freely negotiated, the entity is not "entitled to be relieved of its improvident bargain." Fed. Power Comm'n v. Sierra Pac. Power Co., 350 U.S. 348, 355 (1956) (remanding for reconsideration of whether low rate had adverse effect on the public interest by impairing utility's ability to continue service, cast excessive burdens on consumers, or was unduly discriminatory).

Here, if ENVY in fact did enter into a coerced below-market agreement, it would have recourse to have the contract terms and conditions reviewed by FERC to determine if the agreement and the rates were just and reasonable and had an adverse effect on the public interest. But it is not clear what preemptive effect the FPA has to prevent Defendants from refusing to consider continued operation without such an agreement, given that this necessarily means there

is no agreement subject to review, or demonstrable agreed-upon or demanded rate over which FERC has jurisdiction under the FPA.

On Count II, the Court declines to issue a declaratory judgment that Vermont's regulatory scheme is preempted by the Federal Power Act or to permanently enjoin Defendants on that ground.

B. Commerce Clause Claim

In Count III of the Complaint, Plaintiffs assert that under the Commerce Clause, conditioning approval of a CPG for continued operation on the existence of a power purchase agreement at below-wholesale market rates violates their right, protected by 42 U.S.C. § 1983, to be free from state action that unconstitutionally burdens interstate commerce.

The dormant Commerce Clause, a doctrine inferred from the Commerce Clause in Article I, section 8 of the U.S. Constitution, is "a restriction on permissible state regulation" that applies "even in the absence of a conflicting federal statute." Hughes v. Oklahoma, 441 U.S. 322, 326 (1979). Where "simple economic protectionism is effected by state legislation, a virtually per se rule of invalidity has been erected." City of Philadelphia v. New Jersey, 437 U.S. 617, 624 (1978). Electricity transmitted in interstate commerce is subject to the protections of the Commerce Clause. Pub. Util. Comm'n of R.I. v. Attleboro Steam & Electric Co., 273 U.S. 83, 86 (1927).

In New England Power Co. v. New Hampshire, New England Power – which owned twenty-one wholesale hydroelectric facilities in New Hampshire – together with two neighboring states, challenged an order by the New Hampshire public utilities commission requiring New England Power to sell all its output from New Hampshire facilities to New Hampshire retail

utilities at special rates. New Eng. Power, 455 U.S. at 333-35. Plaintiffs contended the order was preempted by the Federal Power Act and impermissibly burdened interstate commerce. Id. at 337. The commission had concluded the company's energy, sold wholesale primarily in other states and serving only six percent of New Hampshire's population, was "required for use within the State" and that discontinuation of exportation would serve the "public good." Id. at 333, 335-36. The power produced by the facilities flowed through the interstate transmission grid of the New England Power Pool, operated without regard to state boundaries, and the exportation ban had to be effected by means unspecified in the order. Id. at 336. The Court noted the record before the commission suggested the exportation ban would be effected by securing contracts for power quantities equal to the output of the in-state facilities, at "special rates adjusted to reflect the entire savings attributable to the low-cost hydroelectric generation." Id. at 336 & n.3. An economist testified this could be accomplished by billing New Hampshire for the economic cost of production, i.e., the cost of production including depreciation, plus a return on invested capital. Id. at 336 n.3. In contrast to the State's calculation of "benefits," described by the economist, the Court observed that the "economic benefit" of hydroelectric facilities was presumably "currently reflected in the company's general wholesale rates," and the benefit was shared "pro rata by its customers in Massachusetts, Rhode Island, and New Hampshire." Id. (referring to New England Power's brief, which explained how costs and benefits underlying the wholesale rates in a term contract with the plant were reflected in the rates and contracts on file and approved by FERC).

The Court, reasoning that the Commerce Clause "precludes a state from mandating that its residents be given a preferred right of access, over out-of-state consumers, to natural resources

located within its borders or to the products derived therefrom,” and that states are “without power to prevent privately owned articles of trade from being shipped and sold in interstate commerce on the ground that they are required to satisfy local demands or because they are needed by the people of the State,” held the commission’s order was a “protectionist regulation” violating the Commerce Clause. Id. at 338-39 (internal quotations and citations omitted) (finding it unnecessary to reach FERC preemption claim).

Here, there is evidence of intent to condition continued operation on the demonstration of some marked “economic benefit,” or “incremental value,” beyond that reflected in market rates for long-term contracts, in the form of below-wholesale-market long-term power purchase agreements for Vermont utilities. Vermont Yankee sells in the wholesale electricity market operated by Independent System Operator New England (ISO-New England). Retail utilities and wholesale producers respectively buy and sell electricity in the short-term ISO-New England wholesale markets. Kee Decl. ¶¶ 17, 18 (Doc. 4-11). Both buyers and producers also manage risk in the short-term market by entering into long-term purchase agreements of one year or more for some portion of their demand or production. Id. ¶ 17.

A requirement that a power purchase agreement exist before either the PSB or the legislature can evaluate or approve continued operation presents a unique problem for contracting – a form of the “chicken or egg” causality dilemma. Furthermore, according to Edward Kee, Entergy’s expert witness from NERA Economic Consulting, absent a CPG Entergy could only enter into new long-term electricity sale agreements if those agreements include a contingency related to the station’s continued operation. Id. ¶¶ 19, 20. According to Kee, “[i]t is likely that

the prices in electricity purchase agreements with this major contingency would be lower than prices in electricity purchase agreements without this major contingency.” Id. ¶ 20.

The currently pending PSB docket for continued operation contains evidence that the Department’s position is that a below-market PPA is required for continued operation. The Department’s brief filed in Docket No. 7440 on July 17, 2009, concluded that the “primary” obstacle to its recommendation for continued operation was the lack of a favorably priced PPA:

Petitioners have failed to demonstrate that an extended period of operations for VY will promote the general good of the state under 30 V.S.A. § 248(a)(2) because they have not produced any PPA for consideration by the Board, much less one with favorable rates, terms and conditions for Vermont utilities and their ratepayers.

July 17, 2009 DPS Br. in Dkt. No. 7440, at 2, 60, Pls.’ Ex. 557.

The brief noted Vermont Yankee was “in a position to provide unique benefits,” which “include first and foremost a PPA with Vermont utilities with prices that are below market expectations . . . with stable pricing characteristics . . . [and] that contains substantially reduced or no counter-party credit terms.” Id. at 59. Furthermore, “[a]ny suggestion by Petitioners that VY cannot provide a price below long-term market expectations should be roundly rejected by the Board.” Id. at 61. “Accordingly, the Board should require that a favorably-priced PPA be made available to Vermont utilities before it makes an affirmative finding” of general good²⁸ for the state. Id. at 61 & n.37 (“To be clear, the Department does not support issuance of a CPG

²⁸ The brief also stated that consideration of the general good should not take into account the value of the 2002 revenue sharing agreement, the benefits of which would flow upon relicensing to Vermont ratepayers through payments to former VYNPC owners. Consideration of the revenue sharing benefits should be rejected as “double counting,” the brief states, because the value of the revenue sharing was relied upon as part of the consideration in the sale of the plant, to capture additional value upon potential relicensing that was not already reflected in the 2002 sale price. July 17, 2009 DPS Br. in Dkt. No. 7440, at 61-62, 60, Pls.’ Ex. 557.

subject to a condition that a PPA ultimately be negotiated. No CPG should issue until a satisfactory contract is available to all Vermont utilities.”).

Earlier in the PSB proceedings in Docket No. 7440, on February 11, 2009, David Lamont, the director for Regulated Utility Planning with the Department of Public Service, filed direct testimony stating,

the lack of a PPA which promises to deliver power to Vermont ratepayers under favorable terms relative to alternatives is such a major shortcoming . . . that I am not able to conclude that approval of the petition would promote the general good of the state. The desired benefit from this plant is in the form of power supply for Vermont ratepayers. . . . The basis of the bargain should be that ratepayers are afforded a materially favorable power supply agreement in return for accepting certain risks that are unique to a nuclear facility.

Feb. 11, 2009 Lamont Prefiled Direct Test. at 21-22, PSB Dkt. No. 7440, Pls.’ Ex. 555 (noting “the risk/reward equation . . . continues to lie at the heart of our statutory definition of public good”).

Later, in his April 2009 testimony filed in the same docket, Mr. Lamont stated:

“Without a power contract or PPA, and one that is executed on favorable contract terms for the Vermont ratepayer, I cannot say that continued operation of the plant will promote the general good of the state.” Apr. 24, 2009 Lamont Surrebuttal Test. at 1-2, PSB Dkt. No. 7440, Pls.’ Ex. 556 (rebutting Thayer’s testimony that the economic benefits to the state in the form of jobs and tax revenues were sufficient, and discussing the uncertainties of the economic benefit associated with the revenue sharing agreement with the utilities, from which benefits flowed indirectly to 80 percent, but not all, Vermont ratepayers). Furthermore, Mr. Lamont testified, Entergy could demonstrate that continued operation promoted the general good “in the form of a power price that is below current market expectations,” and that “has a fixed price or one indexed to

something other than oil and gas.” Id. at 3. Mr. Lamont reiterated, “it is up to Entergy to provide an incremental value in a power contract that would provide benefit to Vermont ratepayers.” Id. at 6.

There is evidence the favorable PPA requirement was communicated to Entergy by the General Assembly, as well:

A February 9, 2009 letter from then-Senator Shumlin and Representative Smith to Jay Thayer, ENVY, stated the General Assembly “lacks critical information in order to proceed” with “the issue of approval by the Vermont General Assembly of authority . . . to continue to operate.” Letter from Sen. Shumlin & Rep. Smith to Thayer, Feb. 9, 2009, Pls.’ Ex. 367 (Doc. 4-55). “It was our expectation that a power purchase agreement would be reached between the negotiating parties no later then [sic] December, 2008 and in advance of the legislature convening for the 2009 session.” Id. The letter continued that the General Assembly intended to consider “the terms of such a contract,” including “its length, the price to be paid for electricity products under the contract, and an analysis of its costs and benefits to our constituents.” Id. This information was “critical to the central issues of economics relative to the Plant that the legislature must consider.” Id. The letter concluded: “Accordingly, if ENVY and ENO are unable by Wednesday, February 18, 2009, to provide the General Assembly with a power purchase agreement between the parties, it will be nearly impossible for the legislature to make a judgment on the continued operation of the plant before we adjourn in May, 2009.” Id.

At trial, Jay Thayer testified that in the context of the PPA negotiations, conducted under a confidentiality agreement, he had discussions regarding the negotiations’ progress with

legislators. He left those discussions with the understanding they would want to know the price and economic details of any PPA. Tr. 403:14-25, 404:1.

Again, on July 28, 2009, then-Senator Shumlin and Representative Smith wrote to Mr. Thayer, stating “it will be exceedingly difficult for the Vermont General Assembly to act in 2010 on the question of continued operation of the Vermont Yankee Nuclear Power Station unless a power purchase agreement between Vermont utilities and Entergy is filed with the Vermont Public Service Board before November 1, 2009.” Letter from Sen. Shumlin & Rep. Smith to Thayer, July 28, 2009, Pls.’ Ex. 520. The letter noted state officials “established this firm deadline” to permit review “by the Public Service Board and then by the Vermont General Assembly.” Id. Furthermore, the “contract and its details are critical to the central issues of economic [sic] relative to the Vermont Yankee nuclear plant that the legislature must consider.”

Id.

This Court expressly declines to consider the views of legislators expressed in the legislative history of Acts 74 and 160²⁹ that a below-market power purchase agreement would be significant evidence of an economic benefit to the state, relevant to both the General Assembly’s

²⁹ One representative stated, “there’s going to have to be a deal in place that the Public Service Board is . . . going to be looking at, that’s going to be part of whether they decide a CPG is proper to go forward with. Because if the people of Vermont are not going to benefit from a sufficient amount of power at a good enough price or a long enough contract, there’s no reason to have this plant operate in our, in our region.” Apr. 20, 2006, House Natural Resources Comm. Hr’g on S.124, Pls.’ Ex. 155B (Track 1 00:24:23); Pls.’ Legis. Hist. App. at 52 (Doc. 144-1). An expert and former chair of the PSB, hired by legislative counsel to advise both houses, advised the Senate Finance Committee that “the leverage that would exist in the future for the Vermont utilities to exercise a favorable contract exists because of the PSB review and the General Assembly’s review. Otherwise, I think Vermont utilities are just like any other buyer and they’re just—they’re negotiating with Entergy on equal terms with every other utility in the region, every other buyer in the region.” June 1, 2005, Senate Finance Comm. Hr’g Test. of Richard Cowart, Pls.’ Ex. 103A (Track 1 00:43:10, 00:45:05).

approval and the PSB's consideration of continued operation, as there is no evidence these views were communicated to Entergy in the context of its pending petition for continued operation.

Here, there is evidence Vermont Yankee would be required to sell a portion of its output to Vermont utilities at below-market rates, rates that would not otherwise be available to the utilities if they were negotiating on the same footing as customers in other states, or the plant must suffer the consequences of closure. The New England Power decision makes clear that a state's requirement that a wholesale plant satisfy local demands and provide its residents an "economic benefit" not available to customers in other states runs afoul of the Commerce Clause, because it impermissibly burdens interstate commerce.

Because Entergy would be irreparably harmed, and its legal remedies, in the form of money damages, would be inadequate if Defendants denied a certificate of public good for continued operation for lack of a power purchase agreement that was "materially favorable" and "below market expectations," and because conditioning continued operation on the existence of a below-market power purchase agreement would be prohibited under the Commerce Clause, on Count III this Court will permanently enjoin Defendants from conditioning Vermont Yankee's continued operation on the existence of a below-market PPA with Vermont utilities.

V. EQUITABLE DEFENSES

Defendants have pursued four affirmative equitable defenses: waiver, equitable and judicial estoppel, laches, and unclean hands. See Answer ¶ 116 (Doc. 84). The party asserting an affirmative defense bears the burden of proof in establishing the defense. See, e.g., Taylor v. Sturgell, 553 U.S. 880, 907 (2008) (noting "traditional allocation" of burden of proof for

affirmative defenses is to the party asserting them). For the following reasons, the defenses³⁰ are unavailing.

Defendants assert Entergy expressly waived the right to bring a preemption claim in the 2002 MOU. Defs.' Pre-Trial Br. at 20-23 (Doc. 143); Defs.' Post-Trial Br. at 15-16 (Doc. 173). Defendants point to the 2002 MOU, which provided for "Board Approval of Operating License Renewal," where the signatories "expressly and irrevocably" agreed:

(a) that the Board has jurisdiction under current law to grant or deny approval of operation of the VYNPS beyond March 21, 2012 and (b) to waive any claim each may have that federal law preempts the jurisdiction of the Board to take the actions and impose the conditions agreed upon in this paragraph to renew, amend or extend the ENVY CPG and ENO CPG to allow operation of the VYNPS after March 21, 2012, or to decline to so renew, amend or extend.

2002 MOU at 6, ¶ 12, Pls.' Ex. 361 (Doc. 4-49).

Defendants fail to demonstrate Entergy expressly waived the preemption claims raised in this suit because the 2002 MOU waiver was very limited, waiving only a preemption claim challenging "the jurisdiction of the Board" to grant or deny a CPG for continued operation. Id. (emphasis added). Defendants assert interpretation of the 2002 MOU is governed by Vermont law. See id. at 7, ¶ 16(1).

Entergy's suit does not maintain that the resting of jurisdiction in the Board to grant or deny a CPG for continued operation is preempted. The 2002 MOU did not expressly waive exclusive federal jurisdiction over radiological safety and public health, or waive any and all preemption challenges to state law, or amount to a general promise not to sue.

³⁰ Federal law governs defenses to a federal claim. Howlett v. Rose, 496 U.S. 356, 375-76 (1990) ("The elements of, and the defenses to, a federal cause of action are defined by federal law."). The Court's conclusions regarding Defendants' equitable defenses would be the same even if Vermont law applied.

Even if the 2002 MOU had contained a broader waiver that encompassed the claims Entergy brings here, this Court doubts that, in the unique circumstances presented in this case, Defendants could “thereby obtain any ability to regulate in th[e] areas . . . Congress has reserved . . . to itself.” Me. Yankee Atomic Power Co. v. Bonsey, 107 F. Supp. 2d 47, 50 (D. Me. 2000). The federal government has “occupied the entire field of nuclear safety concerns except the limited powers expressly ceded to the states,” and only it may “regulate the radiological safety aspects involved in the construction and operation of a nuclear plant.” Pacific Gas, 461 U.S. at 205, 212.

Defendants cite to Bath Petroleum Storage, Inc. v. Sovas, 155 F. App’x 23 (2d Cir. 2005), for the general proposition that preemption claims are waivable. Defs.’ Post-Trial Br. at 15. There, a plaintiff company sought declaratory judgment that New York State’s enforcement action was preempted by Congress’ grant of authority to the Environmental Protection Agency in the Safe Drinking Water Act. Bath Petroleum Storage, Inc. v. Sovas, 309 F. Supp. 2d 357, 364 (N.D.N.Y. 2004). New York’s regulations required additional discharge and gas storage permits and sonar surveys the State argued fell outside of the federally regulated field. Id. at 364-65. The district court agreed the State’s laws fell outside the preempted field, because the state and federal statutes at issue were “intended to be implemented concurrently, [so] enforcement of one statute [could not] be said to be an obstacle to the other.” Id. at 372. After the district court’s ruling, the parties entered into a consent order in which Bath Petroleum agreed to comply with the state’s process for certain permits, resulting in the State’s dismissal of its administrative complaint and penalties. Bath Petroleum, 155 F. App’x at 24.

As a result of the parties' agreement, the Second Circuit determined the appeal was moot because there was no longer a live controversy. Id. As the consent order was entered to resolve the pending litigation after a district court decision against Bath Petroleum on the preemption issue, the Second Circuit noted, "Bath cannot seriously maintain that it entered into an agreement whereby it agreed to comply with all of DEC's permit policies as a settlement of its preemption dispute but also (implicitly) reserved its right to bring a preemption defense to implementation of those policies." Id. at 25.

This Court notes that Bath Petroleum involved the abandonment of a legal claim to resolve litigation, after a district court had ruled the claim was meritless, and it is not clear the ruling in that case would govern the very unique circumstances in this case, and require enforcement of a broad express waiver of preemption claims, if that were the situation presented here. This Court need not and declines to decide the issue, for the Court holds the 2002 MOU's express waiver was carefully limited, and Plaintiffs have not expressly waived the right to bring the preemption or other claims brought in this suit.

Defendants also argue Entergy has waived its claim to challenge Act 74 by its conduct in lobbying for the enactment. The Court notes that the bill Entergy proposed for Act 74 referred only to the Board's approval and was not the version ultimately enacted; it did not propose the provision this Court has held is preempted.

Defendants also argue Entergy is both equitably and judicially estopped from raising a preemption claim. "The doctrine of equitable estoppel is properly invoked where the enforcement of the rights of one party would work an injustice upon the other party due to the latter's justifiable reliance upon the former's words or conduct." Kosakow v. New Rochelle

Radiology Assocs., 274 F.3d 706, 725 (2d Cir. 2001). Equitable estoppel bars a party from raising an argument if that party “made a definite misrepresentation of fact” upon which another reasonably relied to his detriment. See Rich v. Assoc. Brands, Inc., 379 F. App’x 78, 81 (2d Cir. 2010) (quoting Kavowras v. N.Y. Times Co., 328 F.3d 50, 56 (2d Cir. 2003)).

For judicial estoppel, “[w]here a party assumes a certain position in a legal proceeding, and succeeds in maintaining that position, he may not thereafter, simply because his interests have changed, assume a contrary position, especially if it be to the prejudice of the party who has acquiesced in the [former] position.” New Hampshire v. Maine, 532 U.S. 742, 749 (2001). Judicial estoppel applies if a party would derive an unfair advantage by asserting a position “clearly inconsistent” with a prior adopted position. See In re Adelpia Recovery Trust, 634 F.3d 678, 695-96 (2d Cir. 2011).

With respect to equitable estoppel, Defendants have not identified any specific misrepresentation of fact, nor detrimental reliance on it. Defendants assert Entergy represented to the PSB it waived preemption and was committed to seeking approval from the state for continued operation. Defs.’ Pre-Trial Br. at 24. Plaintiffs’ statements in 2002 and thereafter recognizing their waiver of a preemption challenge to the Board’s jurisdiction to grant or deny a CPG for continued operation were accurate, not false, when made. Accordingly, Defendants have not demonstrated equitable estoppel should be invoked to bar Entergy’s preemption claim.

Defendants assert judicial estoppel bars Entergy’s preemption claim because Entergy “explicit[ly] represent[ed] to multiple government entities that it would not ‘walk away from the commitments it has made to the Board and the Department’” in the 2002 MOU. Defs.’ Pre-Trial Br. at 24. Defendants again point to the 2002 MOU upon which the Board relied in approving

Entergy's purchase of VY, and to more recent litigation between Entergy and the federal government regarding payments to the DOE and Vermont for spent nuclear fuel.

Again, Entergy's representations in these proceedings are all consistent with the commitments it made in the 2002 MOU, which referred only to the Board's jurisdiction to grant or deny a CPG for continued operation, and nothing more. Here, the Vermont legislature has made an intervening change in state law – replacing a process which, at the time Entergy made its substantial investment, provided fair and transparent practices under Vermont law in seeking renewal of a CPG. In the Court of Federal Claims litigation, Entergy Nuclear Vt. Yankee, LLC v. United States, 95 Fed. Cl. 160, 190 (2010), the court found Entergy made “reasonable and prudent” decisions in acquiescing to state demands in seeking dry cask storage, given Entergy's relationship with the state. Id. at 189-90. Defendants have not demonstrated judicial estoppel should bar Entergy's preemption claim.

Laches bars a claim if a party failed to assert it for an unreasonable period of time and the delay prejudiced the other party. See Veltri v. Bldg. Serv. 32B-J Pension Fund, 393 F.3d 318, 326 (2d Cir. 2004). Defendants maintain Entergy's preemption claims were ripe at the latest in 2006. Defs.' Pre-Trial Br. at 22. Entergy responds it reasonably waited until after the NRC extended its license on March 21, 2011. Pls.' Post-Trial Br. at 3. Without it, whether or not Entergy received a Vermont CPG, Vermont Yankee could not continue to operate, and the suit may have been moot. Furthermore, Entergy was engaged in negotiations with Governor Shumlin as late as March 30, 2011. See Pls.' Mot. for Prelim. Inj. Reply Mem. at 15 (Doc. 46 at 20). Particularly here, where the State has made clear that litigation by Entergy would have induced the State to deny other CPGs sought by Plaintiffs, it was not unreasonable for Plaintiffs

to forego litigation until now. Furthermore, Defendants have not shown any prejudice by the delay. Defendants assert Entergy profited from the Acts it now challenges. That Entergy has made normal business profits before bringing suit is an irrelevant consideration. The Court holds any purported delay was reasonable. Earlier litigation may have unnecessarily wasted the parties' and the Court's resources.

Finally, Defendants assert Entergy comes to the Court with unclean hands. Defs.' Pre-Trial Br. at 22. Defendants have offered no evidence Entergy acted inequitably or in bad faith, and for the reasons discussed above, the Court holds this argument is unpersuasive. Defendants have not carried their burden of demonstrating an equitable affirmative defense bars Entergy's claims.

VI. CONCLUSION

Having found the facts described in this opinion, and given the conclusions of law that followed, see Fed. R. Civ. P. 52(a)(1), this Court orders the following:

A. Declaratory Judgment

For the reasons stated supra in Sections II, III.A-B, this Court declares:

1. Act 160, which enacted sections 248(e)(2), 248(m) and 254 in title 30 of the Vermont Statutes, is preempted by the Atomic Energy Act; and
2. A single provision within section 6522(c)(4) of title 10 of the Vermont Statutes, enacted as part of Act 74, stating "Storage of spent nuclear fuel derived from the operation of Vermont Yankee after March 21, 2012 shall require the approval of the general assembly under this chapter," is preempted by the Atomic Energy Act.

For the reasons stated supra in Section III.C:

The preemption challenge to Act 189 is moot.

For the reasons stated supra in Section IV:

The Court declines to hold any state action under the challenged enactments is preempted under the Federal Power Act.

B. Permanent Injunctive Relief

Plaintiffs have demonstrated they would be irreparably harmed by Vermont Yankee's closure under preempted laws if Defendants enforced Act 160, or the preempted provision in Act 74, or if Defendants conditioned approval of a petition for continued operation on the existence of a below-market power purchase agreement with Vermont utilities. Recovery of Plaintiffs' pecuniary loss is barred under the Eleventh Amendment. The balance of hardships tips in favor of an equitable remedy because Plaintiffs' irreparable losses by operation of the invalidated laws are greater than Defendants' burdens in addressing the question of continued operation under laws not enacted for preempted purposes. Finally, the public interest would not be disserved by the issuance of the following permanent injunctions. See eBay Inc. v. MercExchange, LLC, 547 U.S. 388, 391 (2006).

Mindful that relief must be "narrowly tailored to fit specific legal violations," City of N.Y. v. Mickalis Pawn Shop, LLC, 645 F.3d 114, 144 (2d Cir. 2011), the Court orders, for the reasons described in this opinion, see Fed. R. Civ. P. 65(d), the following permanent injunctive relief:

1. Defendants are permanently enjoined, as preempted under the Atomic Energy Act, from enforcing Act 160 by bringing an enforcement action, or taking other action, to compel Vermont Yankee to shut down after March 21, 2012 because it failed to obtain legislative approval (under the provisions of Act 160) for a Certificate of Public Good for continued operation, as requested by Plaintiffs' pending petition in Public Service Board Docket No. 7440, or in any subsequent petition.

2. Defendants are permanently enjoined, as preempted under the Atomic Energy Act, from enforcing the single provision within section 6522(c)(4) of title 10, enacted as part of Act 74, stating “Storage of spent nuclear fuel derived from the operation of Vermont Yankee after March 21, 2012 shall require the approval of the general assembly under this chapter,” by bringing an enforcement action, or taking other action, to compel Vermont Yankee to shut down or to prevent storage of spent nuclear fuel after March 21, 2012 because it failed to obtain legislative approval (under the same preempted provision) for a Certificate of Public Good for storage of spent fuel, as requested by Plaintiffs’ pending petition in Public Service Board Docket No. 7440, or in any subsequent petition.

3. Defendants are permanently enjoined, as prohibited by the dormant Commerce Clause, from conditioning the issuance of a Certificate of Public Good for continued operation on the existence of a below-wholesale-market power purchase agreement between Plaintiffs and Vermont utilities, or requiring Vermont Yankee to sell power to Vermont utilities at rates below those available to wholesale customers in other states.

SO ORDERED.

Dated at Brattleboro, in the District of Vermont, this 19th day of January, 2012.

/s/ J. Garvan Murtha
Honorable J. Garvan Murtha
United States District Judge

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