

South Texas Project Electric Generating Station P.O. Box 289 Wadsworth, Texas 77483

September 21, 2009 NOC-AE-09002461 10 CFR 26.9 10 CFR 26.205 STI: 32534413

U. S. Nuclear Regulatory Commission Attention: Document Control Desk One White Flint North 11555 Rockville Pike Rockville, MD 20852-2738

South Texas Project
Units 1 and 2
Docket Nos. STN 50-498, STN 50-499
Request for Exemption
From Certain Requirements of the Fitness for Duty Rule for Managing Fatigue

Reference: Letter from Charles T. Bowman, STPNOC, to NRC Document Control Desk dated August 26, 2009, "Draft Request for Exemption From Certain Requirements of the Fitness for Duty Rule for Managing Fatigue" (NOC-AE-09002448).

This letter provides a request for exemption from certain requirements of the Fitness for Duty Rule for Managing Fatigue. Specifically, the letter requests exemption from certain specified requirements of Part 26 during declarations of severe weather conditions. During severe weather conditions (i.e. tropical storm or hurricane force winds), adherence to all work hour controls requirements winds could impede a licensee's ability to use whatever staff resources may be necessary to respond to a plant emergency and ensure that the plant reaches and maintains a safe and secure status.

The referenced letter was submitted as a draft exemption request for the Nuclear Regulatory Commission (NRC) staff to review and provide feedback regarding acceptability. This letter addresses feedback from the NRC.

Pursuant to 10 CFR26.9, the STP Nuclear Operating Company (STPNOC) requests Nuclear Regulatory Commission approval of an exemption from the requirements of 10 CFR 26.205(c) and (d) for meeting work hour controls during declarations of severe weather conditions involving tropical storm or hurricane force winds. This exemption is similar to the exception from meeting the requirements of 10 CFR 26.205(c) and (d) during declared emergencies, as defined in the licensee's Emergency Plan.

H021

Parts 26.205(c) and (d) establish requirements for work hours scheduling and work hour controls for individuals (covered workers) subject to these controls. Entry into a severe weather situation involving tropical storm or hurricane force winds can impose conditions similar to entry into the Emergency Plan where the imposition of work hour controls on vital personnel could impede the ability to focus on plant safety and security and may be detrimental to the health and safety of the public.

The Fitness for Duty Rule for Managing Fatigue, Subpart I to 10 CFR 26 that includes Sections 26.205(c) and (d), is required to be implemented by October 1, 2009. The South Texas Project (STP) facility is most vulnerable to tropical storms and hurricanes from June to November. Consequently, STPNOC requests that the NRC review this draft request for acceptability at the earliest feasible date.

As demonstrated in the attachment to this letter, the requested exemption:

- Is authorized by law;
- Will not endanger life or property or the common defense and security; and
- Is otherwise in the public interest.

This exemption from the Fitness for Duty Rule for Managing Fatigue is necessary until the Rule can be changed so that the exemption is no longer needed. When the Rule is changed and the exemption is no longer needed, STPNOC will submit a letter to the NRC stating that the exemption is no longer needed. This commitment is provided in Attachment 2 to the Enclosure to this letter. There are no other licensee commitments in this letter.

The request for exemption from the requirements of 10 CFR 26.205(c) and (d) from meeting work hour controls during declarations of severe weather conditions involving tropical storm or hurricane force winds is enclosed.

If there are any questions regarding this request, please contact Ken Taplett at (361) 972-8416 or me at (361) 972-7454.

Charles T. Bowman

General Manager, Oversight

Charles 1. Barren

kjt

Enclosure: Request for Exemption from the Requirements of 10 CFR 26.205(c) and (d) for

Meeting Work Hour Controls During Declarations of Severe Weather Conditions

Involving Tropical Storm or Hurricane Force Winds

cc:

(paper copy)

Regional Administrator, Region IV U. S. Nuclear Regulatory Commission 612 East Lamar Blvd, Suite 400 Arlington, Texas 76011-4125

Mohan C. Thadani Senior Project Manager U.S. Nuclear Regulatory Commission One White Flint North (MS 8B1A) 11555 Rockville Pike Rockville, MD 20852

Senior Resident Inspector
U. S. Nuclear Regulatory Commission
P. O. Box 289, Mail Code: MN116
Wadsworth, TX 77483

C. M. Canady
City of Austin
Electric Utility Department
721 Barton Springs Road
Austin, TX 78704

(electronic copy)

A. H. Gutterman, Esquire Morgan, Lewis & Bockius LLP

Mohan C. Thadani U. S. Nuclear Regulatory Commission

Kevin Howell Catherine Callaway Jim von Suskil NRG South Texas LP

Ed Alarcon
J. J. Nesrsta
R. K. Temple
Kevin Pollo
City Public Service

Jon C. Wood Cox Smith Matthews

C. Mele City of Austin

Richard A. Ratliff
Texas Department of State Health Services

Alice Rogers
Texas Department of State Health Services

### **Enclosure**

Request for Exemption from the Requirements of 10 CFR 26.205(c) and (d) for Meeting Work Hour Controls during Declarations of Severe Weather Conditions Involving Tropical Storm or Hurricane Force Winds

#### Attachments:

- 1. 10 CFR 26.205(c) and (d)
- 2. Licensee Commitment

# Request for Exemption from the Requirements of 10 CFR 26.205(c) and (d) for Meeting Work Hour Controls During Declarations of Severe Weather Conditions Involving Tropical Storm or Hurricane Force Winds

#### 1.0 Purpose

This enclosure provides supporting justification pursuant to 10 CFR 26.9 for an exemption from the requirements of 10 CFR 26.205(c) and (d) from meeting work hour controls during declarations of severe weather conditions involving tropical storm or hurricane force winds.

Specifically, the exemption would only apply to severe weather conditions where tropical storm or hurricane force winds are predicted onsite requiring the sequestering of the South Texas Project (STP) storm crew. STP Nuclear Operating Company (STPNOC) would not need to meet the requirements of 10 CFR 26.205(c) and (d) from the time that storm crew sequestering entry conditions are met and until exit conditions are satisfied. The specific entry and exit conditions are specified in Section 3.0 of this enclosure. The exemption would only apply to individuals on the storm crew who perform duties identified in Parts 26.4(a)(1) through (a)(5). When storm crew sequestering exit conditions are met, full compliance with 10 CFR 26.205(c) and (d) will be required.

#### 2.0 Background

Parts 26.205(c) and (d) to 10 CFR establish requirements for work hour scheduling and work hour controls for any individual who performs duties identified in Parts 26.4(a)(1) through (a)(5). The individuals performing these duties are referred to as "covered workers." Part 26.205(c) requires licensees to schedule the work hours of covered workers with the objective of preventing impairment from fatigue due to the duration, frequency, or sequencing of successive shifts. Part 26.205(d) provides for specific work hour controls as follows:

- Work hour limits over specified periods of time;
- Specified break periods; and
- Minimum days off averaged over a shift schedule.

Separate days off requirements are established for non-outage versus outage periods.

The complete text of Parts 26.205(c) and (d) to 10 CFR is provided in Attachment 1 to this enclosure.

Part 26.207(d) states that licensees need not meet the requirements of Parts 26.205(c) and (d) during declared emergencies, as defined in the licensee's emergency plan.

#### 3.0 Discussion

STP Units 1 and 2 are located approximately 12 miles north of the Gulf of Mexico and can be impacted by tropical storms and hurricanes. The STP plan (i.e. Hurricane Plan) for coping with tropical storms and hurricanes is an approved plant procedure. The Hurricane Plan provides specific guidance for crew staffing levels and for the process of sequestering the storm crews. The Hurricane Plan includes provisions for augmented storm crew manning at the facility including the Emergency Response Organization (ERO) to ensure the safe operation of the STP units during storm conditions. The goal of the Hurricane Plan is to release the designated storm crew before the storm to prepare their homes and families for the approaching storm. During this time, non-storm crew members are preparing the site for the storm. The storm crew then reports back to the site typically 12 to 24 hours in advance of the storm. However, a fast moving storm or a storm that unpredictably changes direction may not allow storm crew members time off prior to sequestering. In either case, each storm crew member is provided a minimum of at least a ten hour break from performing duties for the licensee before assuming the shift. The ten hour break could be on site in a sequestered status. At this time, the remaining STP personnel that are not part of the storm crew are released from the site and are directed to avoid the path of the storm. Site preparation activities in advance of the storm are equally important for ensuring the safe operation of the facility.

The STP Hurricane Plan provides direction for activation of the storm crew. The storm crew is activated upon the direction of the Emergency Operations Facility (EOF) Director. This individual is a member of the site's Senior Management Team and is qualified as an Emergency Director during a declared emergency, as defined in the STP Emergency Plan. The storm crew consists of enough individuals to man two 12-hour shifts of workers consisting of personnel from operations, maintenance, health physics, chemistry and security to maintain the safe and secure operation of the facility. These crews are augmented by ERO personnel based on the severity category of the storm. The Hurricane Plan provides for bunking facilities in the power block that allows restorative sleep for the off-crew.

After the storm has passed, it is difficult to predict when relief personnel could return to the site based on the degree of surrounding infrastructure damage caused by the storm and the different locations that personnel chose to evacuate to avoid the storm. Typically, access to the area following storm damage is controlled by local government officials. The goal is to provide relief as soon as circumstances allow. When enough personnel are available to support meeting the requirements of Part 26.205(c) and (d), full compliance with the work hour rule can be met. The EOF Director is in the best position to make this decision.

Based on the circumstances, STP is primarily concerned with the ability to meet rule requirements specified in Parts 26.205(d)(2)(ii) and 26.205(d)(3). Part 26.205(d)(2)(ii) requires that licensees ensure that covered individuals have, at a minimum, a 34-hour break in any 9-day period. Part 26.205(d)(3) requires that licensees ensure that covered individuals have, at a minimum, the number of days off specified. This is commonly referred to as the required minimum days off averaged over a shift cycle. Although efforts will be made to give storm crews time off prior to sequestering the crews, this may not always be achieved based on the unpredictability of storm development and movement. The only remedy provided by the Fatigue Management Rule, if these requirements can not be met, is granting a waiver under Part 26.207. The requirements for granting waivers are very specific and manpower intensive.

The NRC recognizes that there are special circumstances where the requirements of Parts 26.205(c) and (d) can not be met. Regarding plant emergencies, the NRC stated the following when publishing the Final Fitness for Duty Rule:

Section 26.207(d) [Plant emergencies] adds the potential to temporarily waive the requirements of § 26.205(c) and (d) during declared emergencies, as defined in the licensee's emergency plan." ..... "Plant emergencies are extraordinary circumstances that may be most effectively addressed through staff augmentation that can only be practically achieved through the use of work hours in excess of the limits of § 26.205(c) and (d). The objective of the temporary exemption is to ensure that the control of work hours and management of worker fatigue do not impede a licensee's ability to use whatever staff resources may be necessary to respond to a plant emergency and ensure that the plant reaches and maintains a safe and secure status. At the conclusion of the declared emergency, the rule would require licensees to again comply with the work hour controls.

<sup>&</sup>lt;sup>1</sup> Federal Register, Volume 73, Number 62, Page 17148, March 31, 2008.

The STP Emergency Plan requires the following declarations of emergencies in response to potentially destructive winds.

#### Classification

#### **Emergency Action Level**

#### **Unusual Event**

Shutdown of the facility required due to an actual or predicted natural phenomenon in accordance with plant procedure. For a hurricane, the units are required to be shutdown to hot standby at least two hours prior to hurricane force winds (sustained 73 miles per hour) arriving on site. Plant management is allowed to deviate from this requirement for grid conditions where the untimely shutdown may increase the likelihood of a loss of offsite power. The STP units must be in hot standby prior to the arrival onsite of sustained winds exceeding 96 miles per hour.

#### Alert

High wind causing visible structure damage to vital plant structures (e.g. Reactor Containment Building, Essential Cooling Water Intake Structure, Mechanical/Electrical Auxiliary Building, Isolation Valve Cubicle, Fuel Handling Building, and Diesel Generator Building).

The STP Emergency Plan termination criteria from a declared emergency are as follows depending upon the applicable condition:

#### A. From Recovery

• Repairs identified during the recovery phase are complete and the plant is ready to return to normal operations.

#### B. From Alert or Unusual Event

- The emergency condition no longer exists and the plant is ready to return to normal operations; or
- The emergency condition no longer exists, repair activities are minor, and the plant is in a stable shutdown mode.

After the storm has passed, the EOF Director is responsible for initiating the recovery. The Hurricane Recovery Plan, an approved procedure separate from the Hurricane Plan, is initiated, if required. The plan is designed to maintain a safe and stable condition at the plant while developing a long range recovery strategy. The Hurricane Recovery Plan established the following termination criteria:

- A. The Onsite portion of the recovery phase may be terminated when any of the following items are met:
  - The plant is ready to return to normal operations, OR
  - Repair activities are minor, the reactor is subcritical, and the plant is in a stable shutdown mode.
- B. The Offsite portion of the recovery phase may be terminated when the following is met:
  - All Offsite-related Emergency Plan requirements are met or compensatory measures are in affect and approved by the NRC.

The criteria are similar to the termination criteria from a declared emergency with the exception that there are offsite recovery phase criteria in recognition that a hurricane can cause severe damage to the infrastructure surrounding the site.

For purposes of this exemption request, the following definitions apply:

ENTRY CONDITION: This is the start time when any individual on site who performs duties identified in Parts 26.4(a)(1) through (a)(5) of 10CFR will not have to meet the requirements of 10CFR26.205(c) and (d). This occurs when the site enters the STP Hurricane Plan and the EOF Director determines that travel conditions to the site will potentially become hazardous such that storm crew manning will be required based on verifiable weather conditions. Verifiable weather conditions are defined as when the site is located within the National Hurricane Center 5-day cone of probability for predicted winds of Tropical Storm or Hurricane force impact.

EXIT CONDITION: This is the time when STPNOC must fully comply with the requirements of 10CFR26.205(c) and (d) following severe weather involving tropical storm or hurricane force winds. This date and time is determined by the EOF Director when sufficient personnel who perform duties identified in Parts 26.4(a)(1) through (a)(5) of 10CFR are available to meet the requirements of 10CFR26.205(c) and (d).

EOF DIRECTOR: The senior manager designated by the STP Hurricane Plan who is qualified as an Emergency Director in the site Emergency Plan.

The entry condition is a clearly defined condition based on the predicted forecast by the National Weather Service.

The exit condition is clearly defined as the condition when sufficient personnel are available to meet the work hour requirements. The time that this condition occurs can not be based on such conditions as (1) a period of time after the storm has passed, (2) the plant is ready to restart, (3)

or roads and surrounding infrastructure support a return to the area by relief personnel. The condition to achieve is that sufficient personnel are available to meet the work hour requirements. The station will be making every effort to re-establish this condition working through many possible variables. The EOF Director is in the best position to make this determination.

During the period that STP is requesting to be exempt from Parts 26.205(c) and (d), STP may meet the conditions for entering the Emergency Plan. Since Part 26.207(d) already states that licensees need not meet the requirements of Parts 26.205(c) and (d) during declared emergencies, there is no need for exemption for storm crew members during the period of the declared emergency. However, this exemption should be applied to the period established by the entry and exit conditions defined above regardless whether the Emergency Plan is entered or not.

Activation of the storm crew could occur more than once a year and could last over several days. Nevertheless in the last five years, the storm crew at STP has only been activated 4 times. The longest a storm crew was activated was for 2 to 3 days. For those activations, hurricane force winds did not arrive on site so that the Emergency Plan was not entered.

#### 4.0 Analysis

The impact of severe weather involving tropical storm or hurricane force winds on nuclear power plant operations is difficult to predict. The unpredictability of the path and speed of advance of the storm could result in a short-notice manning of the storm crew without the ability to adhere to work hour controls. The plant may meet the criteria for declaring an emergency, as defined in the licensee's emergency plan, or may not meet the criteria. In either case, emergency preparedness would require the implementation of the site Hurricane Plan and the manning of the storm crew. After the storm has passed, offsite infrastructure damage may occur that would complicate and delay the ability of providing relief crews to storm crew personnel maintained onsite.

The impact on personnel manning for implementation of the site Hurricane Plan is similar to entering the Emergency Plan Plant staff resources are necessary to respond to a tropical storm or hurricane threat that could escalate to a declared plant emergency. In addition, manning for a tropical storm or hurricane threat is complicated by the inability to readily move relief crews on and off site during the tropical storm or hurricane threat or after the passing of the storm depending on surrounding infrastructure damage. Implementation of the Hurricane Plan is an extraordinary circumstance that is most effectively addressed through staff augmentation that can only be practically achieved through the use of work hours in excess of the limits of § 26.205(c) and (d). The control of work hours should not impede the ability to ensure that the plant reaches and maintains a safe and secure status.

The exemption would only apply to severe weather conditions where tropical storm or hurricane force winds are predicted onsite requiring the sequestering of the STP storm crew. STP would

not need to meet the requirements of 10 CFR 26.205(c) and (d) from the time entry conditions are met as defined in Section 3 above until the time the exit conditions are met defined in Section 3 above.

The senior management official at STP acting in the capacity similar to the Emergency Director, as defined in the STP Emergency Plan, is designated as the EOF Director in the STP Hurricane Plan. This individual is qualified as an Emergency Director in the ERO.

Although an exemption from meeting all the requirements of 10 CFR 26.205(c) and (d) during storm crew activation is requested, opportunities for restorative sleep will be maintained. The Hurricane Plan provides for bunking facilities in the power block for the off-crew. Hence, it is expected that crews will be allowed a 12-hour break between successive work periods. Sufficient numbers of management and supervision are available on the storm crew to provide additional oversight for monitoring the effects of fatigue to ensure that the safety and security of the facility are maintained. In addition, it is anticipated that the work hour limits of Part 26.205(d)(1) will be maintained. Meeting rule requirements specified in Parts 26.205(d)(2)(ii) and 26.205(d)(3) is considered the primary challenge. Nevertheless, the storm crew may be faced with unforeseen challenges where it is prudent to request that STP be exempt from meeting all the requirements of 10 CFR 26.205(c) and (d) during storm crew activation to ensure that the plant reaches and maintains a safe and secure status.

The adequacy of the current Hurricane Plan procedure was reviewed. The following aspects were analyzed.

- Does the procedure provide guidance for staffing and sequestering the storm crews?
  - Yes. The Hurricane Plan provides guidance on the typical storm crew roster. The checklist provides an action for the EOF Director to determine when to release the storm crew so that they can prepare their homes and families for the approaching storm and to specify when the storm crew should report back to the site.
- Does the procedure address shifts and rest opportunities?
  - Yes. The procedure provides for two 12-hour shifts of personnel plus an augmented Emergency Response Organization. The procedure delineates the location of bunking facilities within the power block for restorative rest for the off-shift crew.
- Does the procedure provide for rest of the storm crew prior to sequestering the crew?
  - Yes. If the movement of the storm allows, the storm crews are allowed time off to prepare their homes and families for the approaching storm. Each storm crew member is provided a minimum of at least a ten hour break from performing duties for the licensee prior to going on shift. This break may be on site while in a sequestered status. Sufficient

numbers of management and supervision are part of the augmented storm crew to provide fatigue monitoring.

Other options rather than requesting an exemption from the Fatigue Management Rule were considered.

#### 1. Waivers

The Fatigue Management Rule allows licensees to grant waivers of the work hour controls. To grant a waiver, an operations shift manager determines that the waiver is necessary to mitigate or prevent a condition adverse to safety, or a security shift manager determines that the waiver is necessary to maintain site security, or site senior-level manager with requisite signature authority makes either determination. A supervisor assesses the individual face-to-face and determines that there is reasonable assurance that the individual will be able to safely and competently perform assigned duties during the additional work period for which the waiver will be granted. The supervisor must receive specific training and the bases for individual waivers must be documented. The face-to-face supervisor assessment may not be performed more than 4 hours before the individual begins performing any work under the waiver. There is no specified time for how long a waiver is effective, but from the requirements it is clear it is intended for a specific work activity, and not intended for large groups of personnel performing a number of activities.

It is estimated that the completion of a single waiver would require approximately twenty minutes. If a waiver is performed every 24 hours and considering that approximately 150 waivers would be required (see discussion on Option 3 below), approximately 50 man-hours would be required every 24 hours to complete this process. In addition, the process would be perfunctory because minimum manning requirements for ensuring the safety and security of the facility would necessitate a conclusion to approve the waiver. This is an impractical method to meet the Rule. Management focus on fatigue monitoring, without the distraction of processing waivers, is a more effective method.

The storm crew could be activated for a number of days. From the above requirements for granting a waiver, use of waivers is an impractical option for meeting the Fatigue Management Rule for controlling work hours because a large number of covered workers are impacted by the severe weather condition. The waiver option, in these circumstances, would impede the ability to focus on plant safety and security and may be detrimental to the health and safety of the public.

#### 2. Allow for day off for storm crew personnel during sequestering

The strategy of allowing members of the storm crew to take a day off while sequestered to the site during storm crew activation was considered. Essentially, an individual would not be

assigned any duties for the licensee during that day to facilitate meeting the requirements of Part 26.205(d)(2)(ii) and 26.205(d)(3). This option would only be available to a few members of our storm crew. For example, as stated in the following paragraph, Operations and Security would not be able to take advantage of this. Also, the option could be increasingly limited based on the severity of the storm and the response required.

#### 3. Increase storm crew manning

The typical storm crew at STP is manned as follows:

Operations	52 personnel	
Security	78 personnel	
Maintenance	18 personnel	
Health Physics	15 personnel	
Chemistry	8 personnel	
ERO & Support	75 personnel	

The storm crew including the ERO is already a large population of individuals. Bunking and sanitary facilities are limited on site to accommodate this population of people and provide the opportunity for restorative sleep. Operations and Security are limiting groups. One additional crew for these two organizations would require approximately 60 additional personnel to be sequestered on site. Simply adding additional personnel to the storm crew to meet work hour controls is not practical. The additional people would still require the use of either Option 1 or Option 2. In addition, exposing additional personnel to the dangers of dealing with a tropical storm or hurricane as well as creating hardships on additional families to accommodate the rule is not reasonable.

#### 4. Other regulatory processes

Rulemaking is a possible resolution path. Rulemaking will not meet the more immediate needs of STP. With the tropical storm season in progress, this request for an exemption is needed in the short term to provide the STP facility with the flexibility for managing a tropical storm or hurricane threat and personnel fatigue. STPNOC is engaged with industry stakeholders in addressing this issue on a generic basis.

#### 5.0 Precedence

There is no precedent for this kind of an exemption request because the Fitness for Duty Rule for Managing Fatigue is a new rule that is required to be implemented by October 1, 2009. Although a number of licensees have sequestered crews during tropical storm and hurricane conditions, the standard technical specifications for work hour controls did not impose the more restrictive requirements of the new Rule that are the subject of this exemption request.

NUREG-1471, "Effect of Hurricane Andrew on the Turkey Point Nuclear Generating Station form August 20 – 30, 1992," March 1993 was reviewed. This event resulted in the invocation of the provisions of 10 CFR 50.54(x) that allows senior licensed personnel to take reasonable action that departs from a license condition or technical specification in an emergency when this action is immediately needed to protect the plant and the public safety and when no action consistent with license conditions and technical specifications that can give adequate and equivalent protection is immediately apparent. This provision was invoked by Turkey Point to relocate fire watch and security personnel for their personal safety during the hurricane. The report did not indicate that regulatory relief was required to extend work hours beyond limits.

#### 6.0 <u>Justification of Exemption</u>

10 CFR 26.9, "Specific exemptions," states that the Nuclear Regulatory Commission may grant exemptions from the requirements of this part provided:

- The exemption is authorized by law;
- The exemption will not endanger life or property or the common defense and security; and
- The exemption is otherwise in the public interest.

The exemption would only apply to severe weather conditions where tropical storm or hurricane force winds are predicted onsite requiring the sequestering of the STP storm crew. STPNOC would not need to meet the requirements of 10 CFR 26.205(c) and (d) from the time that storm crew sequestering entry conditions are met and until exit conditions are satisfied. The exemption would only apply to individuals on the storm crew who perform duties identified in Parts 26.4(a)(1) through (a)(5) of 10CFR. When storm crew sequestering exit conditions are met, full compliance with 10 CFR 26.205(c) and (d) will be required.

The criteria are satisfied as described below:

#### 1. This exemption is authorized by law.

The NRC has the authority under the Atomic Energy Act of 1954, as amended, to grant exemptions from its regulations if doing so would not violate the requirements of law. This exemption is authorized by law as is required by 10 CFR 26.9. The provisions of 10 CFR 26 were adopted at the discretion of the Commission consistent with its statutory authority. No statute required the NRC to adopt the specific provisions from which STPNOC seeks an exemption. Rather, the NRC may determine that alternative means are adequate to provide reasonable assurance of safety.

# 2. This exemption will not endanger life or property or the common defense and security.

The Fatigue Management Rule allows for licensees not meeting the requirements of Parts 26.205(c) and (d) during declared emergencies, as defined in the licensee's emergency plan. This exemption expands that allowance for severe weather conditions involving tropical storm or hurricane force winds that may or may not result in the declaration of an emergency. Although work hour controls would not need to be met during storm crew activation, sufficient manning is available to provide for restorative sleep of the shift crews. Additionally, sufficient numbers of management and supervision are available on the storm crew to provide additional oversight for monitoring the effects of fatigue ensuring the safety and security of the facility. Therefore, this exemption will not endanger life or property or the common defense and security.

#### 3. This exemption is otherwise in the public interest.

This exemption request will only expand an exception already provided in the Fatigue Management Rule during declared emergencies to circumstances where severe weather conditions due to tropical storm or hurricane force winds require the manning of facility storm crews. The exemption would seldom be needed, but in a unique set of circumstances is necessary to ensure that the control of work hours and management of worker fatigue does not impede the ability to use whatever staff resources may be necessary to respond to the severe weather threat and ensure that the plant reaches and maintains a safe and secure status. Therefore, the focus will be on nuclear safety and security and thus in the interest of public health and safety.

#### 7.0 Environmental Assessment

A review has determined that the proposed exemption would affect requirements with respect to installation or use of a facility component located within the restricted area, as defined in

10 CFR 20. However, the proposed Exemption does not involve (i) a significant hazards consideration, (ii) a significant change in the types or a significant increase in the amounts of any effluents that may be released offsite, or (iii) a significant increase in individual or cumulative occupational radiation exposure. Accordingly, the proposed exemption meets the eligibility criterion for categorical exclusion set forth in 10 CFR 51.22(c)(9). Therefore, pursuant to 10 CFR 51.22(b), no environmental impact statement or environmental assessment need be prepared in connection with the proposed exemption.

#### 8.0 Conclusion

The requested exemption from meeting the requirements of 10 CFR 26.205(c) and (d) during storm crew activation in response to a tropical storm or hurricane threatening the site is justified to ensure that work hour controls do not impede a licensee's ability to use whatever staff resources may be necessary to respond to a severe weather threat and ensure that the plant reaches and maintains a safe and secure status. Entry and exit into the condition where the exemption will apply will be determined by a station senior manager qualified as Emergency Director in the site Emergency Plan. Management and Supervision will provide additional oversight of personnel for signs of fatigue to ensure that safety and security of the facility is maintained. Upon de-activation of the storm crew, STP would again comply with the work hour controls.

As required by 10 CFR 26.9, the requested exemption is authorized by law, will not endanger life or property or the common defense and security, and is otherwise in the public interest. There are no significant environmental impacts associated with the proposed action.

# Attachment 1

10 CFR 26.205(c) and (d)

#### § 26.205 Work hours

- (c) Work hours scheduling. Licensees shall schedule the work hours of individuals who are subject to this section consistent with the objective of preventing impairment from fatigue due to the duration, frequency, or sequencing of successive shifts.
- (d) Work hour controls. Licensees shall control the work hours of individuals who are subject to this section.
  - (1) Except as permitted in § 26.207, licensees shall ensure that any individual's work hours do not exceed the following limits:
    - (i) 16 work hours in any 24-hour period;
    - (ii) 26 work hours in any 48-hour period; and
    - (iii) 72 work hours in any 7-day period.
  - (2) Licensees shall ensure that individuals have, at a minimum, the rest breaks specified in this paragraph. For the purposes of this subpart, a break is defined as an interval of time that falls between successive work periods, during which the individual does not perform any duties for the licensee other than one period of shift turnover at either the beginning or end of a shift but not both. Except as permitted in § 26.207, licensees shall ensure that individuals have, at a minimum—
    - (i) A 10-hour break between successive work periods or an 8-hour break between successive work periods when a break of less than 10 hours is necessary to accommodate a crew's scheduled transition between work schedules or shifts; and
    - (ii) A 34-hour break in any 9-day period.
  - (3) Licensees shall ensure that individuals have, at a minimum, the number of days off specified in this paragraph. For the purposes of this subpart, a day off is defined as a calendar day during which an individual does not start a work shift. For the purposes of calculating the average number of days off required in this paragraph, the duration of the shift cycle may not exceed 6 weeks.
    - (i) Individuals who are working 8-hour shift schedules shall have at least 1 day off per week, averaged over the shift cycle;
    - (ii) Individuals who are working 10-hour shift schedules shall have at least 2 days off per week, averaged over the shift cycle;

- (iii) Individuals who are working 12-hour shift schedules while performing the duties described in § 26.4(a)(1) through (a)(3) shall have at least 2.5 days off per week, averaged over the shift cycle;
- (iv) Individuals who are working 12-hour shift schedules while performing the duties described in § 26.4(a)(4) shall have at least 2 days off per week, averaged over the shift cycle; and
- (v) Individuals who are working 12-hour shift schedules while performing the duties described in § 26.4(a)(5) shall have at least 3 days off per week, averaged over the shift cycle.
- (4) During the first 60 days of a unit outage, licensees need not meet the requirements of paragraph (d)(3) of this section for individuals specified in § 26.4(a)(1) through (a)(4), while those individuals are working on outage activities. However, the licensee shall ensure that the individuals specified in § 26.4(a)(1) through (a)(3) have at least 3 days off in each successive (i.e., non-rolling) 15-day period and that the individuals specified in § 26.4(a)(4) have at least 1 day off in any 7-day period;
- (5) During the first 60 days of a unit outage, security system outage, or increased threat condition, licensees shall control the hours worked by individuals specified in § 26.4(a)(5) as follows:
  - (i) During the first 60 days of a unit outage or a planned security system outage, licensees need not meet the requirements of paragraph (d)(3) of this section. However, licensees shall ensure that these individuals have at least 4 days off in each successive (i.e., non-rolling) 15-day period; and
  - (ii) During the first 60 days of an unplanned security system outage or increased threat condition, licensees need not meet the requirements of either paragraph (d)(3) or (d)(5)(i) of this section.
- (6) The 60-day periods in paragraphs (d)(4) and (d)(5) of this section may be extended for each individual in 7-day increments for each non-overlapping 7-day period the individual has worked not more than 48 hours during the unit or security system outage or increased threat condition, as applicable.

# **Attachment 2**

**Licensee Commitment** 

#### **Commitment**

The following table identifies the actions in this document to which the STP Nuclear Operating Company has committed. Statements in this submittal with the exception of those in the table below are provided for information purposes and are not considered commitments. Please direct questions regarding this commitment to Ken Taplett at (361) 972-8416.

Commitment	Expected Completion Date	CR Action No.
When the Fitness for Duty Rule for Managing		
Fatigue is changed and an exemption from the	December 30, 2011	09-10811-4
requirements of 10 CFR 26.205(c) and (d) for		
meeting work hour controls during declarations of	•	
severe weather conditions involving tropical storm		
or hurricane force winds is no longer needed,		
STPNOC will submit a letter to the NRC stating that the exemption is no longer needed.		