

May 30, 2014

Texas Commission on Environmental Quality
Office of Low Level Radioactive Waste Disposal
333 Guadalupe St. #3-240
Austin, TX 78701

Zion Nuclear Power Station, Units 1 and 2
Facility Operating License Nos. DPR-39 and DPR-48

Subject: Revision to Import Application 2-0060-00

The *ZionSolutions* (ZS) project involves the decommissioning of the Zion Nuclear Power Station in Zion, IL. A portion of this effort involves the remote segmentation of the reactor internals. This irradiated hardware comprises the materials being disposed at the Waste Control Specialists (WCS) facility in Andrews County, Texas. The segmentation process involves employment of several unique, built for purpose cutting machines that were deployed into the reactor cavity and operated remotely under water.

The segmentation of the reactor internals within the Unit 2 Containment is now complete. The project now has actual data (Unit 2) to allow estimates of the activity of the packages generated from segmenting the internals from Unit 1. To this avail, the project must now ask for an increase in the activity requested previously in order to allow disposal. This increase will allow the continued disposal of Class B and Class C wastes on a relatively unimpeded basis. The data used for the initial estimates of activity used the most recent data at the time and were developed from some very early data provided from the neutron activation analysis. Due to some unique flux distributions during operation we have identified some areas of the internals that are more activated than initially estimated. This poses no impact on the waste classification, specifically no waste has jumped class. The only impact requires revisions to the two import applications the ZS has with the TCEQ currently.

The information following this letter is resultant of the re-characterization of the radiological activity in all of the remaining packages to be disposed at the burial site managed by WCS.

I greatly appreciate your understanding and apologize for any difficulty this causes the Commission. Thank you for your continued support of the *ZionSolutions* Decommissioning project. Should you have any questions regarding this submittal, please contact Mr. Michael Wiskerchen at (224) 789-4047.

Respectfully,



Michael Wiskerchen
Waste Operations Manager
ZionSolutions, LLC

TLLRWDC #2-0060-00

**TEXAS LOW-LEVEL RADIOACTIVE WASTE
DISPOSAL COMPACT COMMISSION**

**Agreement for Importation of Nonparty Low-Level Radioactive Waste
For Disposal in the Texas Low-Level Radioactive Waste Disposal Compact Facility**

This Agreement for Importation of Nonparty Low-Level Radioactive Waste ("Agreement") is dated the 13th day of March, 2014, by and between ZionSolutions ("Generator") and the Texas Low-Level Radioactive Waste Disposal Compact Commission ("Commission") (collectively the "Parties").

RECITALS

WHEREAS Texas is the host state for the Texas Low-Level Radioactive Waste Disposal Compact, an interstate compact approved by Congress in 1998 (Public Law 105-236) and compiled at Section 403.006, Texas Health and Safety Code ("Compact"), which requires the host state to develop a facility for the disposal of low-level radioactive waste generated within the Compact's party states (currently Texas and Vermont); and

WHEREAS in compliance with Texas law, the Texas Commission on Environmental Quality ("TCEQ") has leased land to and issued a license to Waste Control Specialists LLC ("Compact Facility Operator") to construct and operate a Compact Waste Disposal Facility ("Compact Facility") in Andrews County, Texas for the disposal of low-level radioactive waste for the Compact; and

WHEREAS the Texas Legislature has authorized the Compact Facility Operator to accept for disposal at the Compact Facility low-level radioactive waste from waste brokers and generators located outside of the Compact party states subject to approval by the TCEQ of the

waste characteristics and waste forms as set forth in the Compact Facility license and to the extent the acceptance of such imported waste does not diminish the disposal volume or Curie capacity available to Compact party states; and

WHEREAS Section 3.05(6) of the Compact authorizes the Commission to enter into an agreement with any person, state, regional body, or group of states for the importation of low-level radioactive waste into the Compact Facility for management or disposal subject to such conditions and restrictions to be included in the agreement as the Commission deems advisable and provided that the agreement receives a majority vote of the Commission; and

WHEREAS the Commission has processed and considered Generator's Application for Importation in accordance with Commission Rule 675.23 (31 Texas Administrative Code §675.23) and a majority of the members of the Commission approved the Application and voted to enter into this Agreement.

NOW, THEREFORE, Generator and the Commission hereby enter into the following Agreement:

AGREEMENT

ARTICLE I. REPRESENTATIONS AND WARRANTIES

- A. Generator represents and warrants that it has disclosed fully in its Application the existence of any unresolved violations pending against the Generator with any other regulatory agency with jurisdiction to regulate radioactive material.
- B. Generator represents and warrants that it has disclosed accurately in its Application the existence of any unresolved violation(s), complaint(s), unpaid fee(s), or past due report(s) that it has with the Commission.

- C. Generator represents and warrants that it has disclosed in its Application the existence of any unresolved violation(s), unpaid fee(s), or past due report(s) that it has with any other regulatory body with regard to radioactive waste, including, without limitation, the TCEQ.
- D. Generator specifically acknowledges and agrees that a misrepresentation with respect to an item listed in A, B, or C above may result in the immediate revocation of this Agreement.
- E. Generator represents and warrants that no waste of international origin shall ever be included in the materials to be shipped to the Compact Facility for disposal. Generator agrees that the inclusion of waste of international origin in a shipment may result in immediate suspension or revocation of this Agreement.
- F. Generator represents and warrants that it will notify the Commission immediately of any allegation of the violation of any law, rule, or regulation related to the shipment of any form of radioactive waste. Generator represents and warrants that it will report quarterly (on a calendar year basis) to the Commission any confirmed violation of any law, rule, or regulation in any jurisdiction related to the shipment of any form of radioactive waste. Generator agrees that a failure to report quarterly to the Commission any confirmed violation by the Generator of any law, rule, or regulation related to the shipment of any form of radioactive waste may result in the immediate suspension of this Agreement.
- G. Generator represents and warrants its agreement that the Commission may, at any time and on reasonable notice to Generator, audit or cause to be audited Generator's

compliance with this Agreement. Any portion of the audit involving business records shall be conducted during normal business hours. Generator agrees that a refusal to allow the Commission to audit or cause to be audited Generator's compliance with this Agreement after Generator has been provided reasonable notice may result in immediate suspension of this Agreement.

- H. Generator represents and warrants that it has sufficient financial capacity to perform its obligations under this Agreement and to comply with all relevant state and federal laws, rules, and regulations.

ARTICLE II. TERMS AND CONDITIONS OF IMPORT AUTHORIZATION

Pursuant to Section 3.05(6) of the Compact, the Commission hereby authorizes the Generator to import to the Compact Facility for disposal nonparty low-level radioactive waste, in the form and amounts described in Item J below ("Generator's Nonparty Compact Waste"), subject to the terms and conditions set forth below and in Article I of this Agreement, all of which are agreed to by Generator.

- A. This Agreement shall remain in effect according to its terms from September 1, 2014 through August 31, 2016 unless, prior to an importation, it is amended by agreement of the Parties, or is revoked, or suspended by the Commission. Generator agrees to provide to the Commission, within 30 days after the end of the Facility operating year ending on August 31, 2015, a report of the actual cubic feet and Curies disposed of by Generator during the preceding Facility operating year.

- B. Generator agrees to be bound by Section 8.03 of the Compact and shall be liable for its own acts, omissions, conduct, and relationships in accordance with applicable law.
- C. Generator agrees that, after having given notice of its intent to Generator, the Commission may revoke, suspend, or amend this Agreement, on its own motion with respect to future shipments, including by adding or deleting requirements. The Generator will be given a reasonable time to review, respond, or make any changes necessary to comply with any additional requirements prior to the date the revocation, suspension, or amendments take effect. If the Commission and the Generator are unable to reach an agreement on changes to be made, the Commission may terminate this Agreement. Even if the Commission terminates this Agreement, Generator must nevertheless satisfy any outstanding obligations related to shipments previously made pursuant to this Agreement.
- D. Generator agrees that a misrepresentation with respect to any of Items A, B, or C of Article I of this Agreement may result in immediate revocation of this Agreement. Generator also agrees that a failure to comply with Items F and G of Article I of this Agreement may result in immediate suspension of this Agreement. Such revocation or suspension shall be effective on the date of the service of notice of such revocation or suspension to Generator by certified mail. The Agreement may be reinstated with or without amendments at the discretion of the Commission after consideration of Generator's response.

- E. The Parties agree that the Commission may, in response to a written application from Generator, cancel, suspend, or amend this Agreement, with respect to future shipments, including by adding or deleting requirements. If the Parties are unable to agree on amendments proposed by Generator, the Commission may terminate this Agreement. Even if the Commission terminates this Agreement, Generator must still satisfy any outstanding obligations related to shipments previously made pursuant to this Agreement.
- F. If the Commission acts with respect to Items C, D, or E immediately above, in addition to providing notice to Generator of such acts, the Commission agrees that it also will serve notice of such acts to the Compact Facility Operator and to the TCEQ.
- G. This Agreement is not assignable or transferable to any other person.
- H. This Agreement relates only to importation of waste for disposal in the Compact Facility, as the term "disposal" is defined in Section 2.01(4) of the Compact and provided for in Section 3.05(6) of the Compact. This Agreement is not to be construed as approval of importation of waste for management, as that term is defined in Section 2.01(11) of the Compact and provided for in Section 3.05(6) of the Compact.
- I. Generator agrees to comply with the rules related to commingling adopted by TCEQ in coordination with the Commission pursuant to Section 401.207(k), Texas Health and Safety Code, to the extent such rules apply.
- J. Description of Generator's Nonparty Compact Waste approved for importation:
- (a) Waste Volume (Cubic Feet): 4,100
- (b) Waste Radioactivity in Curies: ~~54,400~~ ^{MW} 129,000 5/30/14

(c) Place of origination (State or U.S. Territory) of waste: IL

(d) Waste description: Irradiated Hardware

(e) Waste classification (Class A, Class B, or Class C): Classes B and C

(f) Waste form: Stable

(g) Radionuclides:

(1) C-14:	1.0472E+04 6.96E+04	mCi millicuries (mCi)
(2) Tc-99:	1.1220E+04 2.08E+05	µCi microcuries (µCi)
(3) I-129	5.372E+09 (LLD)	nanocuries (nCi)
(4) Depleted Uranium:	N/A	microcuries (µCi)
(5) Concentration:	N/A	

(h) Sources of Generation: Reactor Operations 1971-1998

(i) Sealed Source: No

ZIONSOLUTIONS

BY: 

Michael Wiskerchen, Manager
Waste Operations

3/27/14 5/30/14
Date

TEXAS LOW-LEVEL RADIOACTIVE WASTE DISPOSAL COMPACT COMMISSION

BY: 

Robert C. Wilson, Chairman

3/26/2014
Date

TEXAS LOW-LEVEL RADIOACTIVE WASTE DISPOSAL COMPACT COMMISSION

APPLICATION FOR IMPORTATION OF NONPARTY LOW-LEVEL RADIOACTIVE WASTE

(NOTE: PURSUANT TO SECTION 401.207(J), TEXAS HEALTH AND SAFETY CODE, THIS APPLICATION MUST BE COMPLETED BY APPROPRIATE REPRESENTATIVES OF THE DEPARTMENT OF DEFENSE OR THE GENERATOR OF THE WASTE UNLESS THE GENERATOR IS A SMALL GENERATOR AS DEFINED IN SECTION 675.23(0) OF THIS RULE, IN WHICH CASE THE APPLICATION MAY BE SUBMITTED BY AN APPROPRIATELY LICENSED BROKER)

1. Applicant Information:

Entity Name	<u>ZionSolutions</u>
Cell Phone	<u>(224) 656-4575</u>
Website address	<u>www.energysolutions.com</u> or <u>www.zionsolutionscompany.com</u>
Contact Person Phone	<u>Michael Wiskerchen</u>
Email	<u>mpwiskerchen@energysolutions.com</u>
Physical Address	<u>101 Shiloh Blvd, Zion IL 60099</u>
	<u></u>
Mailing Address	<u>101 Shiloh Blvd, Zion, IL 60099</u>

Is Applicant:

Generator
 A Broker who is a: Licensed Waste Processor
 Licensed Waste Collector
 Department of Defense

(Notes: (1) An appropriately licensed Broker may act on behalf of a Small Generator only if each such generator is identified and written authorization from each such generator is provided as an attachment hereto. (2) While DoD Regulation 4715.6-R designates the Department of the Army as Executive Agent for disposal of low-level radioactive waste, the Commission will require that any agreement that it enters into in this regard be signed by both the Department of the Army as Executive Agent and the branch of the military that has generated the waste.)

Generator Type:

- Industrial
- Academic/Research
- Medical
- Utility
- Government

Is Applicant the entity responsible for the waste shipment? Yes No

If no, please include the name and contact information for the entity responsible for the waste shipment.

Is Waste from a "Small Generator"? Yes No

2. **Term/Duration from Date of Approval:** ~ 2 years

3. **Waste proposed for importation.**

Waste Volume (Cubic Feet) 4100
Waste Radioactivity in Curies ^{11/20/14} 54400- 129000
Place of origination (State) of waste: Zion, IL
Waste description: Irradiated Hardware

Waste classification (Class A, Class B, or Class C): Waste Class B and Waste Class C

Waste form Stable Unstable

Does waste contain any of the following radionuclides, check box(es) and complete blank(s):

<input checked="" type="checkbox"/>	C-14	^{11/20/14} <u>1.0472E+04</u>	<u>6.96E+04</u>	<u>mCi</u>	millicuries (mCi)
<input checked="" type="checkbox"/>	Tc-99	^{11/20/14} <u>1.1220E+04</u>	<u>2.08E+05</u>	<u>µCi</u>	microcuries (µCi)
<input checked="" type="checkbox"/>	1-129	<u>5.37E+09 (LLD)</u>			nanocuries (nCi)
<input type="checkbox"/>	Depleted Uranium				microcuries (µCi)
<input type="checkbox"/>	Concentration				(provide units)
<input type="checkbox"/>	Source of generation	<u>Reactor Operations 1971-1998</u>			

4. **Is the proposed waste a sealed source?**

No Yes | Please Explain: _____

5. Does Broker and/or Generator(s) have any unresolved violation(s), complaint(s), unpaid fee(s), or past due report(s) with the Texas Low-Level Radioactive Waste Disposal Compact Commission?

No Yes | Please Explain: _____

6. Does Broker and/or Generator(s) have any unresolved violation(s), complaint(s), unpaid fee(s), or past due report(s) pending with any other regulatory agency with jurisdiction to regulate radioactive material including, without limitation, the TCEQ?

No Yes | Please Explain: _____

7. Certifications. Applicant hereby certifies the following.

a. The information provided herein is complete, accurate and correct.

b. The low-level radioactive waste for which this Application is submitted will be packaged and shipped in accordance with applicable state and federal regulations and is acceptable for disposal at the Compact Facility.

c. The person submitting this Application is authorized by Applicant to commit Applicant to each and every obligation and condition set forth herein and in the Agreement for Importation of Nonparty Compact Waste. A copy of a written document containing such authorization must be attached to this Application.

d. Applicant has delivered to the Compact Facility operator a copy of this Application and the Agreement for Importation of Nonparty Compact Waste (along with any supplements or amendment thereto).

8. Authorized Signatory:

Mike Wiskerchen

Print or type name

Signature

Waste Operations Manager

Title

1/24/2014

Date

5/30/14

ATTACHMENTS: (Attachments should include all applicable licenses, authorizations, and other materials needed or useful to fully explain the application.) ANNEX A TO RULE 675.23

TEXAS LOW-LEVEL RADIOACTIVE WASTE DISPOSAL

COMPACT COMMISSION

**Agreement for Importation of Nonparty Low-Level Radioactive Waste
into Texas Low-Level Radioactive Waste Disposal Compact for Disposal**

This Agreement for Importation of Nonparty Low-Level Radioactive Waste (“Agreement”) is dated January 24, 2014, by and between [Generator] (“Generator”) and the Texas Low-Level Radioactive Waste Disposal Compact Commission (“Commission”) (collectively the “Parties”).

I. RECITALS

WHEREAS Texas is the host state for the Texas Low-Level Radioactive Waste Disposal Compact (“Compact”), which requires the state to develop a facility for the disposal of low-level radioactive waste generated within the Compact’s party states; and

WHEREAS in compliance with the Compact and with state law, the Texas Commission on Environmental Quality (“TCEQ”) issued a license to Waste Control Specialists LLC (“Compact Facility Operator”) to construct and operate a Compact Waste Disposal Facility (“Compact Facility”) in Andrews County, Texas for the disposal of low-level radioactive waste for the Compact; and

WHEREAS the Texas Legislature has authorized the Compact Facility Operator to accept for disposal at the Compact Facility low-level radioactive waste from waste generators located outside of the Compact party states in accordance with the Compact Facility license and to the extent the acceptance of such imported waste does not diminish the disposal volume or curie capacity available to Compact party states; and

WHEREAS Chapter 403, Section 3.05(6) of the Texas Health and Safety Code authorizes the Commission to enter into an agreement with any person, state, regional body, or group of states for the importation of low-level radioactive waste into the Compact for management or disposal, provided that the agreement receives a majority vote of the Commission; and

WHEREAS the Texas Legislature has established additional terms and conditions in Chapter 401 of the Texas Health & Safety Code that if satisfied ensure that the importation of low-level radioactive waste will be in the State’s public interest; and

WHEREAS Generator has filed an Application for Importation of Nonparty Low-Level Radioactive Waste (“Application”) with the Commission; and

WHEREAS the Commission has processed and considered Generator's Application in accordance with applicable requirements, and a majority of the members of the Commission approved the Application and voted to enter into this Agreement; and

WHEREAS in voting to approve Generator's Application and to enter into this Agreement, the Commission considered all relevant statutory and regulatory considerations, including, but not limited to: (a) the volume, type, physical form, and total activity (radionuclide-specific activity, if needed) of the waste proposed for importation as identified in the Application; (b) the policy and purpose of the Compact; (c) the existence of unresolved violations pending against Generator with any other regulatory agency with jurisdiction to regulate radioactive material, and any comments by the regulatory agency with which Generator has unresolved violations; (d) any unresolved violation, complaint, unpaid fee, or past due report that Generator has with the Commission; (e) whether, by acceptance of this waste for disposal, the Compact Facility will remain below the applicable annual and total volume and curie capacity disposal limits set forth in Sections 401.207(e), (e-1) (if applicable), and (f)(1) of the Texas Health and Safety Code; and (f) other factors that the Commission has deemed relevant to carry out the policy and purpose of the Compact and Chapters 401 and 403 of the Texas Health and Safety Code.

II. Representations and Acknowledgements

WHEREAS The Generator represents and acknowledges the following:

- A. The generator has disclosed in its Application for Importation the existence of unresolved violations pending against the applicant with any other regulatory agency with jurisdiction to regulate radioactive material.
- B. The generator has disclosed in its Application for Importation the existence of any unresolved violation(s), complaint(s), unpaid fee(s), or past due report(s) that the applicant has with the Commission.
- C. The generator has disclosed in its Application for Importation the existence of any unresolved violation(s), complaint(s), unpaid fee(s), or past due reports that the applicant has with any other regulatory body, including, without limitation, the TCEQ.
- D. The generator acknowledges that a misrepresentation with respect to an item listed in A, B, or C may result in the cancellation of the agreement.
- E. The generator acknowledges the obligation to report immediately to the Commission any allegation of the violation of any law, rule or regulation related to the storage, shipment or treatment of any form of radioactive material.
- F. The generator acknowledges the right of the Commission to audit or cause to be audited compliance with the agreement.
- G. The generator affirms that no waste of international origin shall ever be included in the materials to be imported to the Compact facility.

III. AGREEMENT

NOW, THEREFORE, in the exercise of its authority under Chapter 403 of the Texas Health and Safety Code, the Commission hereby authorizes the importation of Generator's nonparty low-level radioactive waste, in the form and amounts described below ("Generator's Nonparty Compact Waste"), subject to the following terms and conditions.

- A. This Agreement shall remain in effect from April 27, 2014 through May 31, 2015 unless amended by agreement of the Parties, or revoked by the Commission prior to importation.
- B. Generator agrees to comply with Chapter 403, Section 8.03 of the Texas Health and Safety Code and shall be liable for its own acts, omissions, conduct, and relationships in accordance with applicable law.
- C. The Commission may, on its own motion or in response to a petition by the Generator for amendment of this Agreement for which prior written notice has been given to Generator and the Compact Facility Operator, revoke this Agreement, or add or delete requirements or limitations to this Agreement, provided that the Commission provides a reasonable time to allow the Generator and the Compact Facility Operator to make the changes necessary to comply with any additional requirements imposed by the Commission.
- D. This Agreement is not assignable or transferable to any other person.
- E. This Agreement is subject to receipt by the Compact Facility Operator of written certification from the TCEQ, prior to the acceptance of Generator's Nonparty Compact Waste, that the waste to be imported is authorized for disposal under the Compact Facility licensee.
- F. The applicant agrees to comply to the extent applicable with the rules related to commingling adopted by TCEQ in coordination with the Commission pursuant to Section 401.207(k), Texas Health and Safety Code
- G. The waste is described below:

Waste Volume (Cubic Feet)	4100
Waste Radioactivity in Curies	54400 129000
Place of origination (State) of waste:	Zion, IL
Waste description:	Irradiated Hardware

Waste classification (Class A, Class B, or Class C):

Waste Class B and Waste Class C

Waste form

Stable


Unstable

Does waste contain any of the following radionuclides, check box(es) and complete blank(s):

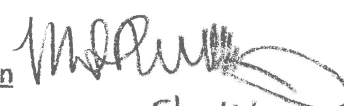
<input checked="" type="checkbox"/>	C-14	91M 5/30/14	1.0472E+04	6.96 E+04	mCi	millicuries (mCi)
<input checked="" type="checkbox"/>	Tc-99	1100 5/30/14	1.1220E+04	2.08 E+05	mCi	microcuries (uCi)
<input checked="" type="checkbox"/>	1-129		5.372E+09 (LLD)			nanocuries (nCi)
<input type="checkbox"/>	Depleted Uranium					microcuries (uCi)
<input type="checkbox"/>	Concentration					(provide units)
<input type="checkbox"/>	Source of generation					

[GENERATOR]

BY:



Michael Wiskerchen



5/30/14

Name

Waste Operations Manager

Title

TEXAS LOW-LEVEL RADIOACTIVE WASTE DISPOSAL COMPACT COMMISSION

BY:

Name

Title