

ARKANSAS PUBLIC SERVICE COMMISSION

Original Sheet No. 52.1 Schedule Sheet 1 of 36

Replacing: Sheet No.

Entergy Arkansas, Inc.

Name of Company

Kind of Service: Electric

Class of Service: As Applicable

Docket No.: 16-027-R

Order No.: 17

Effective: 11/17/17

Part III. Rate Schedule No. 52

Title: Net-Metering Service (N-M)

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TABLE OF CONTENTS

Tariff Provisions	52.1
Preliminary Interconnection Site Review Request	52.4
Standard Information	52.4
Terms and Conditions	52.5
Standard Interconnection Agreement for Net-Metering Facilities	52.7
Standard Information	52.7
Interconnection Agreement Terms and Conditions	52.8
Disclaimer	52.16
Safety and Performance Standards for Net Metering Facilities	52.17

52.0. NET-METERING

52.1. AVAILABILITY

52.1.1. To any residential or any other customer who takes service under standard rate schedule(s) General Purpose Residential Service (RS), Optional Residential Time-Of-Use (RT), Residential Energy Management Time-Of-Use (REMT), Small General Service (SGS), Nonresidential General Farm Service (GFS), Agricultural Water Pumping Service (AP) Optional Monthly Rate (B), Large General Service (LGS), Large General Service Time-Of-Use (GST), Large Power Service (LPS) or Large Power Service Time-Of-Use (PST) who is an owner of a Net- Metering Facility and has obtained a signed Standard Interconnection Agreement for Net-Metering Facilities with Entergy Arkansas, Inc. ("EAI" or the "Company"). The generating capacity of Net-Metering Facilities may not exceed the greater of: 1) twenty-five kilowatts (25 kW) or 2) one hundred percent (100%) of the Net-Metering Customer's highest monthly usage in the previous twelve (12) months for Residential Use. The generating capacity of Net-Metering Facilities may not exceed three hundred kilowatts (300 kW) for non-residential use unless otherwise allowed by the Commission. Net-Metering is intended primarily to offset part or all of the customer's energy use.

The provisions of the customer's standard rate schedule are modified as specified herein.

52.1.2. Net-Metering Customers taking service under the provisions of this tariff may not simultaneously take service under the provisions of any other alternative source generation or co-generation tariff except as provided in the Net-Metering Rules.

52.2. MONTHLY BILLING

52.2.1. The Company shall separately meter, bill, and credit each Net-Metering Facility even if one (1) or more Net-Metering Facilities are under common ownership.

ARKANSAS PUBLIC SERVICE COMMISSION

Original Sheet No. 52.2 Schedule Sheet 2 of 36

Replacing: Sheet No.

Entergy Arkansas, Inc.

Name of Company

Kind of Service: Electric

Class of Service: As Applicable

Docket No.: 16-027-R

Order No.: 17

Effective: 11/17/17

Part III. Rate Schedule No. 52

Title: Net-Metering Service (N-M)

PSC File Mark Only

- 52.2.2.** On a monthly basis, the Net-Metering Customer shall be billed the charges applicable under the currently effective standard rate schedule and any appropriate rider schedules. Under Net-Metering, only the kilowatt hour (kWh) units of a Net-Metering Customer's bill are netted.
- 52.2.3.** If the kWhs supplied by the Company exceed the kWhs generated by the Net-Metering Facility and fed back to the Company during the Billing Period, the Net-Metering Customer shall be billed for the net billable kWhs supplied by the Company in accordance with the rates and charges under the Net-Metering Customer's standard rate schedule.
- 52.2.4.** If the kWhs generated by the Net-Metering Facility and fed back to the Company during the Billing Period exceed the kWhs supplied by the Company to the Net-Metering Customer during the applicable Billing Period, the Company shall credit the Net-Metering Customer with any accumulated Net Excess Generation in the next applicable Billing Period.
- 52.2.5.** Net Excess Generation shall first be credited to the Net-Metering Customer's meter to which the Net-Metering Facility is physically attached (Generation Meter).
- 52.2.6.** After application of 52.2.5. and upon request of the Net-Metering Customer pursuant to 52.2.8., any remaining Net Excess Generation shall be credited to one or more of the Net-Metering Customer's meters (Additional Meters) in the rank order provided by the Net-Metering Customer.
- 52.2.7.** Net Excess Generation shall be credited as described in 52.2.5. and 52.2.6. during subsequent Billing Periods; the Net Excess Generation Credits remaining in a Net-Metering Customer's account at the close of a billing cycle shall not expire and shall be carried forward to subsequent billing cycles indefinitely. For Net Excess Generation Credits older than twenty-four (24) months, a Net-Metering Customer may elect to have the Company purchase the Net Excess Generation Credits in the Net-Metering Customer's account at the Company's estimated annual average cost rate for wholesale energy if the sum to be paid to the Net-Metering Customer is at least one hundred dollars (\$100). The Company shall purchase at the Company's estimated annual average Avoided Cost rate for wholesale energy any Net Excess Generation Credits remaining in a Net-Metering Customer's account when the Net-Metering Customer: 1) ceases to be a customer of the Company; 2) ceases to operate the Net-Metering Facility; or transfers the Net-Metering Facility to another person.

When purchasing Net Excess Generation Credits from a Net-Metering Customer, the Company shall calculate the payment based on its annual average avoided energy costs in the applicable Regional Transmission Organization for the current year.

ARKANSAS PUBLIC SERVICE COMMISSION

Original Sheet No. 52.3 Schedule Sheet 3 of 36

Replacing: Sheet No.

Entergy Arkansas, Inc.

Name of Company

Kind of Service: Electric

Class of Service: As Applicable

Docket No.: 16-027-R

Order No.: 17

Effective: 11/17/17

Part III. Rate Schedule No. 52

Title: Net-Metering Service (N-M)

PSC File Mark Only

52.2.8. Upon request from a Net-Metering Customer, the Company must apply Net Excess Generation to the Net-Metering Customer's Additional Meters provided that:

- (a) The Net-Metering Customer must give at least 30 days' notice to the Company.
- (b) The Additional Meter(s) must be identified at the time of the request. Additional Meter(s) shall be under common ownership within the Company's service area; shall be used to measure the Net-Metering Customer's requirements for electricity; may be in a different class of service than the Generation Meter; shall be assigned to one, and only one, Generation Meter; shall not be a Generation Meter; and shall not be associated with unmeasured service.
- (c) In the event that more than one of the Net-Metering Customer's meters is identified, the Net-Metering Customer must designate the rank order for the Additional Meters to which excess kWhs are to be applied. The Net-Metering Customer cannot designate the rank order more than once during the Annual Billing Cycle.

52.2.9. Any Renewable Energy Credit created as the result of electricity supplied by a Net-Metering Customer is the property of the Net-Metering Customer that generated the Renewable Energy Credit.

ARKANSAS PUBLIC SERVICE COMMISSION

Original Sheet No. 52.4 Schedule Sheet 4 of 36

Replacing: Sheet No. _____

Entergy Arkansas, Inc.
Name of Company

Kind of Service: Electric Class of Service: As Applicable

Part III. Rate Schedule No. 52

Title: Net-Metering Service (N-M)

Docket No.: 16-027-R
Order No.: 17
Effective: 11/17/17

PSC File Mark Only

PRELIMINARY INTERCONNECTION SITE REVIEW REQUEST

I. STANDARD INFORMATION

Section 1. Customer Information

Name: _____

Contact Person: _____

Mailing Address: _____

City: _____ State: _____ Zip Code: _____

Facility Location (if different from above): _____

Daytime Phone: _____ Evening Phone: _____

E-Mail Address: _____ Fax: _____

If the requested point of interconnection is the same as an existing electric service, provide the electric service account number: _____

Additional Customer Accounts (from electric bill) to be credited with Net Excess Generation: _____

Annual Energy Requirements (kWh) in the previous twelve (12) months for the account physically attached to the Net-Metering Facility and for any additional accounts listed (in the absence of historical data reasonable estimates for the class and character of service may be made): _____

Section 2. Generation Facility Information

System Type: Solar Wind Hydro Geothermal Biomass Fuel Cell Micro Turbine (circle one)

Generator Rating (kW): _____ AC or DC (circle one)

Expected Capacity Factor: _____

Expected annual production of electrical energy (kWh) of the facility calculated using industry recognized simulation model (PVWatts, etc): _____

ARKANSAS PUBLIC SERVICE COMMISSION

Original Sheet No. 52.5 Schedule Sheet 5 of 36

Replacing: Sheet No. _____

Entergy Arkansas, Inc.
Name of Company

Kind of Service: Electric

Class of Service: As Applicable

Docket No.: 16-027-R

Order No.: 17

Effective: 11/17/17

Part III. Rate Schedule No. 52

Title: Net-Metering Service (N-M)

PSC File Mark Only

Section 3. Interconnection Information

Attach a detailed electrical diagram showing the configuration of all generating facility equipment, including protection and control schemes.

Requested Point of Interconnection: _____

Customer-Site Load (kW) at Net-Metering Facility location (if none, so state): _____

Interconnection Request: Single Phase: _____ Three Phase: _____

Section 4. Signature

I hereby certify that, to the best of my knowledge, all the information provided in this Preliminary Interconnection Site Review is true and correct.

Signature: _____ Date: _____

II. TERMS AND CONDITIONS

Section 1. Requirements for Request

For the purpose of requesting that the Company conduct a preliminary interconnection site review for a proposed Net-Metering Facility pursuant to the requirement of Rule 2.05.B.4, or as otherwise requested by the customer, the customer shall notify the Company by submitting a completed Preliminary Interconnection Site Review Request. The customer shall submit a separate Preliminary Interconnection Site Review Request for each point of interconnection if information about multiple points of interconnection is requested. Part 1, Standard Information, Sections 1 through 4 of the Preliminary Interconnection Site Review Request must be completed for the notification to be valid. If mailed, the date of notification shall be the third day following the mailing of the Preliminary Interconnection Site Review Request. The Company shall provide a copy of the Preliminary Interconnection Site Review Request to the customer upon request.

ARKANSAS PUBLIC SERVICE COMMISSION

Original Sheet No. 52.6 Schedule Sheet 6 of 36

Replacing: Sheet No.

Entergy Arkansas, Inc.
Name of Company

Kind of Service: Electric

Class of Service: As Applicable

Docket No.: 16-027-R

Order No.: 17

Effective: 11/17/17

Part III. Rate Schedule No. 52

Title: Net-Metering Service (N-M)

PSC File Mark Only

Section 2. Utility Review

Following submission of the Preliminary Interconnection Site Review Request by the customer the Company shall review the plans of the facility interconnection and provide the results of its review to the customer, in writing, within 30 calendar days. If the customer requests that multiple interconnection site reviews be conducted the Company shall make reasonable efforts to provide the customer with the results of the review within 30 calendar days. If the Company cannot meet the deadline it will provide the customer with an estimated date by which it will complete the review. Any items that would prevent Parallel Operation due to violation of safety standards and/or power generation limits shall be explained along with a description of the modifications necessary to remedy the violations.

The preliminary interconnection site review is non-binding and need only include existing data and does not require the Company to conduct a study or other analysis of the proposed interconnection site in the event that data is not readily available. The Company shall notify the customer if additional site screening may be required prior to interconnection of the facility. The customer shall be responsible for the actual costs for conducting the preliminary interconnection site review and any subsequent costs associated with site screening that may be required.

Section 3. Application to Exceed 300 kW Net-Metering Facility Size Limit

This Preliminary Interconnection Site Review Request and the results of the Company's review of the facility interconnection shall be filed with the Commission with the customer's application to exceed the 300 kW facility size limit pursuant to Net Metering Rule 2.05.B.4.

Section 4. Standard Interconnection Agreement

The preliminary interconnection site review does not relieve the customer of the requirement to execute a Standard Interconnection Agreement prior to interconnection of the facility.

ARKANSAS PUBLIC SERVICE COMMISSION

Original Sheet No. 52.7 Schedule Sheet 7 of 36

Replacing: Sheet No. _____

Entergy Arkansas, Inc.
Name of Company

Kind of Service: Electric Class of Service: As Applicable

Part III. Rate Schedule No. 52

Title: Net-Metering Service (N-M)

Docket No.: 16-027-R
Order No.: 17
Effective: 11/17/17

PSC File Mark Only

STANDARD INTERCONNECTION AGREEMENT FOR NET-METERING FACILITIES

I. STANDARD INFORMATION

Section 1. Customer Information

Name: _____
Mailing Address: _____
City: _____ State: _____ Zip Code: _____
Facility Location (if different from above): _____
Daytime Phone: _____ Evening Phone: _____
Utility Customer Account Number (from electric bill) to which the Net-Metering Facility is physically attached: _____

Section 2. Generation Facility Information

System Type: Solar Wind Hydro Geothermal Biomass Fuel Cell Micro turbine (circle one)
Generator Rating (kW): _____ AC or DC (circle one)
Describe Location of Accessible and Lockable Disconnect (If required): _____

Inverter Manufacturer: _____ Inverter Model: _____
Inverter Location: _____ Inverter Power Rating: _____
Expected Capacity Factor: _____
Expected annual production of electrical energy (kWh) calculated using industry recognized simulation model (PVWatts, etc.): _____

Section 3. Installation Information

Attach a detailed electrical diagram of the Net-Metering Facility.
Installed by: _____
Qualifications/Credentials: _____
Mailing Address: _____
City: _____ State: _____ Zip Code: _____
Daytime Phone: _____ Installation Date: _____

ARKANSAS PUBLIC SERVICE COMMISSION

Original Sheet No. 52.8 Schedule Sheet 8 of 36

Replacing: Sheet No. _____

Entergy Arkansas, Inc.
Name of Company

Kind of Service: Electric Class of Service: As Applicable

Part III. Rate Schedule No. 52

Title: Net-Metering Service (N-M)

Docket No.: 16-027-R
Order No.: 17
Effective: 11/17/17

PSC File Mark Only

Section 4. Certification

The system has been installed in compliance with the local Building/Electrical Code of _____ (City/County)

Signed (Inspector): _____ Date: _____

(In lieu of signature of inspector, a copy of the final inspection certificate may be attached.)

The system has been installed to my satisfaction and I have been given system warranty information and an operation manual, and have been instructed in the operation of the system.

Signed (Owner): _____ Date: _____

Section 5. E-mail Addresses for parties

Customer's e-mail address: _____

Utility's e-mail address: _____ (To be provided by utility.)

Section 6. Utility Verification and Approval

Facility Interconnection Approved: _____ Date: _____

Metering Facility Verification by: _____ Verification Date: _____

II. INTERCONNECTION AGREEMENT TERMS AND CONDITIONS

This Interconnection Agreement for Net-Metering Facilities ("Agreement") is made and entered into this _____ day of _____, 20____, by Entergy Arkansas, Inc. ("EAI" or the "Company") and _____ ("Customer"), a _____ (specify whether corporation or other), each hereinafter sometimes referred to individually as "Party" or collectively as the "Parties". In consideration of the mutual covenants set forth herein, the Parties agree as follows:

ARKANSAS PUBLIC SERVICE COMMISSION

Original Sheet No. 52.9 Schedule Sheet 9 of 36

Replacing: Sheet No.

Entergy Arkansas, Inc.
Name of Company

Kind of Service: Electric

Class of Service: As Applicable

Docket No.: 16-027-R

Order No.: 17

Effective: 11/17/17

Part III. Rate Schedule No. 52

Title: Net-Metering Service (N-M)

PSC File Mark Only

Section 1. The Net-Metering Facility

The Net-Metering Facility meets the requirements of Ark. Code Ann. § 23-18-603(6) and the Arkansas Public Service Commission's *Net-Metering Rules*.

Section 2. Governing Provisions

The Parties shall be subject to the provisions of Ark. Code Ann. § 23-18-604 and the terms and conditions set forth in this Agreement, the Commission's *Net-Metering Rules*, the Commission's *General Service Rules*, and the Company's applicable tariffs.

Section 3. Interruption or Reduction of Deliveries

The Company shall not be obligated to accept and may require Customer to interrupt or reduce deliveries when necessary in order to construct, install, repair, replace, remove, investigate, or inspect any of its equipment or part of its system; or if it reasonably determines that curtailment, interruption, or reduction is necessary because of emergencies, forced outages, force majeure, or compliance with prudent electrical practices. Whenever possible, the Company shall give the Customer reasonable notice of the possibility that interruption or reduction of deliveries may be required. Notwithstanding any other provision of this Agreement, if at any time the Company reasonably determines that either the facility may endanger the Company's personnel or other persons or property, or the continued operation of the Customer's facility may endanger the integrity or safety of the Company's electric system, the Company shall have the right to disconnect and lock out the Customer's facility from the Company's electric system. The Customer's facility shall remain disconnected until such time as the Company is reasonably satisfied that the conditions referenced in this Section have been corrected.

Section 4. Interconnection

Customer shall deliver the as-available energy to the Company at the Company's meter.

The Company shall furnish and install a standard kilowatt hour meter. Customer shall provide and install a meter socket for the Company's meter and any related interconnection equipment per the Company's technical requirements, including

ARKANSAS PUBLIC SERVICE COMMISSION

Original Sheet No. 52.10 Schedule Sheet 10 of 36

Replacing: Sheet No.

Entergy Arkansas, Inc.

Name of Company

Kind of Service: Electric

Class of Service: As Applicable

Docket No.: 16-027-R

Order No.: 17

Effective: 11/17/17

Part III. Rate Schedule No. 52

Title: Net-Metering Service (N-M)

PSC File Mark Only

safety and performance standards.

The customer shall submit a Standard Interconnection Agreement to the Company at least thirty (30) days prior to the date the customer intends to interconnect the Net-Metering Facilities to the Company's facilities. Part I, Standard Information, Sections 1 through 4 of the Standard Interconnection Agreement must be completed be valid. The customer shall have all equipment necessary to complete the interconnection prior to such notification. If mailed, the date of notification shall be the third day following the mailing of the Standard Interconnection Agreement. The Company shall provide a copy of the Standard Interconnection Agreement to the customer upon request.

Following submission of the Standard Interconnection Agreement by the customer, the Company shall review the plans of the facility and provide the results of its review to the customer, in writing, within 30 calendar days. Any items that would prevent Parallel Operation due to violation of applicable safety standards and/or power generation limits shall be explained along with a description of the modifications necessary to remedy the violations.

If the Company's existing facilities are not adequate to interconnect with the Net-Metering Facility, the Customer shall pay the cost of additional or reconfigured facilities prior to the installation or reconfiguration of the facilities.

To prevent a Net-Metering Customer from back-feeding a de-energized line, the customer shall install a manual disconnect switch with lockout capability that is accessible to utility personnel at all hours. This requirement for a manual disconnect switch will be waived if the following three conditions are met: 1) The inverter equipment must be designed to shut down or disconnect and cannot be manually overridden by the customer upon loss of utility service; 2) The inverter must be warranted by the manufacturer to shut down or disconnect upon loss of utility service; and 3) The inverter must be properly installed and operated, and inspected and/or tested by utility personnel.

ARKANSAS PUBLIC SERVICE COMMISSION

Original Sheet No. 52.11 Schedule Sheet 11 of 36

Replacing: Sheet No.

Entergy Arkansas, Inc.

Name of Company

Kind of Service: Electric

Class of Service: As Applicable

Docket No.: 16-027-R

Order No.: 17

Effective: 11/17/17

Part III. Rate Schedule No. 52

Title: Net-Metering Service (N-M)

PSC File Mark Only

Customer, at his own expense, shall meet all safety and performance standards established by local and national electrical codes including the National Electrical Code (NEC), the Institute of Electrical and Electronics Engineers (IEEE), the National Electrical Safety Code (NESC), and Underwriters Laboratories (UL).

Customer, at his own expense, shall meet all safety and performance standards adopted by the Company and filed with and approved by the Commission that are necessary to assure safe and reliable operation of the Net Metering Facility to the utility's system.

Customer shall not commence Parallel Operation of the Net-Metering Facility until the Net Metering Facility has been inspected and approved by the Company. Such approval shall not be unreasonably withheld or delayed. Notwithstanding the foregoing, the Company's approval to operate the Customer's Net-Metering Facility in parallel with the Company's electrical system should not be construed as an endorsement, confirmation, warranty, guarantee, or representation concerning the safety, operating characteristics, durability, or reliability of the Customer's Net-Metering Facility.

Section 5. Modifications or Changes to the Net-Metering Facility Described in Part 1, Section 2

Prior to being made, the Customer shall notify the Company of, and the Company shall evaluate, any modifications or changes to the Net-Metering Facility described in Part 1, Standard Information, Section 2 of the Standard Interconnection Agreement for Net-Metering Facilities. The notice provided by the Customer shall provide detailed information describing the modifications or changes to the Company in writing, including a revised Standard Interconnection Agreement for Net-Metering Facilities that clearly identifies the changes to be made. The Company shall review the proposed changes to the facility and provide the results of its evaluation to the Customer, in writing, within thirty (30) calendar days of receipt of the Customer's proposal. Any items that would prevent Parallel Operation due to violation of applicable safety standards and/or power generation limits shall be explained along with a description of the modifications necessary to remedy the violations.

ARKANSAS PUBLIC SERVICE COMMISSION

Original Sheet No. 52.12 Schedule Sheet 12 of 36

Replacing: Sheet No.

Entergy Arkansas, Inc.

Name of Company

Kind of Service: Electric

Class of Service: As Applicable

Docket No.: 16-027-R

Order No.: 17

Effective: 11/17/17

Part III. Rate Schedule No. 52

Title: Net-Metering Service (N-M)

PSC File Mark Only

If the Customer makes such modification without the Company's prior written authorization and the execution of a new Standard Interconnection Agreement, the Company shall have the right to suspend Net-Metering service pursuant to the procedures in Section 6 of the Commission's General Service Rules.

A Net-Metering Facility shall not be modified or changed to generate electrical energy in excess of the amount necessary to offset all of the Net-Metering Customer requirements for electricity.

Section 6. Maintenance and Permits

The customer shall obtain any governmental authorizations and permits required for the construction and operation of the Net-Metering Facility and interconnection facilities. The Customer shall maintain the Net-Metering Facility and interconnection facilities in a safe and reliable manner and in conformance with all applicable laws and regulations.

Section 7. Access to Premises

The Company may enter the Customer's premises to inspect the Customer's protective devices and read or test the meter. The Company may disconnect the interconnection facilities without notice if the Company reasonably believes a hazardous condition exists and such immediate action is necessary to protect persons, or the Company's facilities, or property of others from damage or interference caused by the Customer's facilities, or lack of properly operating protective devices.

Section 8. Indemnity and Liability

The following is Applicable to Agreements between the Company and to all Customers except the State of Arkansas and any entities thereof, local governments and federal agencies:

Each Party shall indemnify the other Party, its directors, officers, agents, and employees against all loss, damages, expense and liability to third persons for injury to or death of persons or injury to property caused by the indemnifying party's engineering, design, construction, ownership, maintenance or operations of, or the making of replacements, additions or betterment to, or by failure of, any

ARKANSAS PUBLIC SERVICE COMMISSION

Original Sheet No. 52.13 Schedule Sheet 13 of 36

Replacing: Sheet No.

Entergy Arkansas, Inc.

Name of Company

Kind of Service: Electric

Class of Service: As Applicable

Docket No.: 16-027-R

Order No.: 17

Effective: 11/17/17

Part III. Rate Schedule No. 52

Title: Net-Metering Service (N-M)

PSC File Mark Only

of such Party's works or facilities used in connection with this Agreement by reason of omission or negligence, whether active or passive. The indemnifying Party shall, on the other Party's request, defend any suit asserting a claim covered by this indemnity. The indemnifying Party shall pay all costs that may be incurred by the other Party in enforcing this indemnity. It is the intent of the Parties hereto that, where negligence is determined to be contributory, principles of comparative negligence will be followed and each Party shall bear the proportionate cost of any loss, damage, expense and liability attributable to that Party's negligence. Nothing in this paragraph shall be applicable to the Parties in any agreement entered into with the State of Arkansas or any entities thereof, or with local governmental entities or federal agencies. Furthermore, nothing in this Agreement shall be construed to waive the sovereign immunity of the State of Arkansas or any entities thereof. The Arkansas State Claims Commission has exclusive jurisdiction over claims against the state.

Nothing in this Agreement shall be construed to create any duty to, any standard of care with reference to or any liability to any person not a Party to this Agreement. Neither the Company, its officers, agents or employees shall be liable for any claims, demands, costs, losses, causes of action, or any other liability of any nature or kind, arising out of the engineering, design, construction, ownership, maintenance or operation of, or the making of replacements, additions or betterment to, or by failure of, the Customer's facilities by the Customer or any other person or entity.

Section 9. Notices

The Net-Metering Customer shall notify the Company of any changes in the information provided herein.

All written notices shall be directed as follows:

Attention:

Mr. Bernard Neumeier
ENTERGY ARKANSAS, INC.
#9 Entergy Court
Little Rock, Arkansas 72211

ARKANSAS PUBLIC SERVICE COMMISSION

Original Sheet No. 52.14 Schedule Sheet 14 of 36

Replacing: Sheet No.

Entergy Arkansas, Inc.
Name of Company

Kind of Service: Electric Class of Service: As Applicable

Part III. Rate Schedule No. 52

Title: Net-Metering Service (N-M)

Docket No.: 16-027-R
Order No.: 17
Effective: 11/17/17

PSC File Mark Only

Attention:
[Customer]
Name: _____
Address: _____
City: _____

Customer notices to the Company shall refer to the Customer's electric service account number set forth in Section 1 of this Agreement.

Section 10. Term of Agreement

The term of this Agreement shall be the same as the term of the otherwise applicable standard rate schedule. This Agreement shall remain in effect until modified or terminated in accordance with its terms or applicable regulations or laws.

Section 11. Assignment

This Agreement and all provisions hereof shall inure to and be binding upon the respective Parties hereto, their personal representatives, heirs, successors, and assigns. The Customer shall not assign this Agreement or any part hereof without the prior written consent of the Company, and such unauthorized assignment may result in termination of this Agreement.

Section 12. Net-Metering Customer Certification

I hereby certify that all of the information provided in this Agreement is true and correct, to the best of my knowledge, and that I have read and understand the Terms and Conditions of this Agreement.

Signature: _____ Date: _____

ARKANSAS PUBLIC SERVICE COMMISSION

Original Sheet No. 52.15 Schedule Sheet 15 of 36

Replacing: Sheet No.

Entergy Arkansas, Inc.
Name of Company

Kind of Service: Electric Class of Service: As Applicable

Part III. Rate Schedule No. 52

Title: Net-Metering Service (N-M)

Docket No.: 16-027-R
Order No.: 17
Effective: 11/17/17

PSC File Mark Only

IN WITNESS WHEREOF, the Parties have caused this Agreement to be executed by their duly authorized representatives.

Dated this _____ day of _____, 20__.

Customer:

By: _____

Title: _____

Mailing Address:

E-mail Address:

Electric Utility:

Entergy Arkansas, Inc.

By: _____

Title: _____

Mailing Address:

E-mail Address:

ARKANSAS PUBLIC SERVICE COMMISSION

Original Sheet No. 52.16 Schedule Sheet 16 of 36

Replacing: Sheet No.

Entergy Arkansas, Inc.
Name of Company

Kind of Service: Electric Class of Service: As Applicable

Part III. Rate Schedule No. 52

Title: Net-Metering Service (N-M)

Docket No.: 16-027-R
Order No.: 17
Effective: 11/17/17

PSC File Mark Only

STANDARD INTERCONNECTION AGREEMENT FOR NET-METERING FACILITIES

Disclaimer

POSSIBLE FUTURE RULES OR RATE CHANGES, OR BOTH AFFECTING YOUR NET-METERING FACILITY

The following is a supplement to the Interconnection Agreement you signed with Entergy Arkansas, Inc. ("EAI" or the "Company").

1. Electricity rates, basic charges, and service fees, set by the Company and approved by the Arkansas Public Service Commission (Commission), are subject to change.
2. I understand that I will be responsible for paying any future increases to my electricity rates, basic charges, or service fees from the Company.
3. My Net-Metering System is subject to the current rates of the Company, and the rules and regulations of the Commission. The Company may change its rates in the future with approval of the Commission or the Commission may alter its rules and regulations, or both may happen. If either or both occurs, my system will be subject to those changes.

By signing below, you acknowledge that you have read and understand the above disclaimer.

Name (printed)

Signature

Date

ARKANSAS PUBLIC SERVICE COMMISSION

Original Sheet No. 52.17 Schedule Sheet 17 of 36

Replacing: Sheet No.

Entergy Arkansas, Inc.
Name of Company

Kind of Service: Electric

Class of Service: As Applicable

Docket No.: 16-027-R

Order No.: 17

Effective: 11/17/17

Part III. Rate Schedule No. 52

Title: **Net-Metering Service (N-M)**

PSC File Mark Only

52.3. SAFETY AND PERFORMANCE STANDARDS FOR NET METERING FACILITIES

52.3.1 Table of Contents

Sheet

1.0 INTRODUCTION	52.19
1.1 PURPOSE	52.19
1.2 SCOPE	52.19
2.0 DEFINITIONS	52.19
3.0 DETAILS	52.22
3.1 AVAILABLE VOLTAGE SYSTEMS	52.22
3.2 REASONS FOR DISCONNECTION FROM THE DISTRIBUTION DELIVERY SYSTEM	52.22
3.3 PRE-INTERCONNECTION STUDIES FOR INTERCONNECTION OF RENEWABLE ENERGY FACILITIES UNDER NET METERING RULES	52.23
3.4 SYSTEM CHANGES	52.23
3.4.1 Company Changes to Distribution Delivery System	52.23
3.4.2 Net Metering Customer Changes to Interconnection	52.23
3.5 ALLOWABLE TIE POINTS	52.23
3.6 ENERGY FLOW DURING EMERGENCIES	52.24
3.7 TYPES OF ALLOWED GENERATORS	52.24
3.7.1 Limits on Three-Phase Generators	52.24
3.7.2 Limits on Single-Phase Generators	52.24
3.8 EXPLICIT CRITERIA FOR PARALLEL OPERATIONS	52.24
3.8.1 Safety	52.24
3.8.2 Impact of Interconnection	52.25
3.9 GENERAL INTERCONNECTION REQUIREMENTS	52.25
3.9.1 Net Metering Customer's Equipment and Interconnection Standards	52.25
3.9.2 Rating of Net Metering Customer's Equipment	52.25
3.9.3 Protection of Net Metering Customer's Equipment	52.26
3.9.4 Required Drawings	52.26
3.9.5 Changes to Company Facilities	52.26
3.9.6 Reactive Power Requirements	52.26
3.9.7 Power Factor	52.26
3.9.8 Voltage Surges or Sags	52.26
3.9.9 Voltage Flicker	52.27
3.9.10 Frequency	52.27
3.9.11 Harmonics	52.27
3.10 INSPECTION PRIOR TO OPERATIONS AND ADDITIONAL REQUIREMENTS	52.27
3.11 RESPONSIBILITY FOR NET METERING CUSTOMER'S OPERATIONS	52.28
3.12 RESPONSIBILITY FOR NET METERING CUSTOMER'S ANNUAL MAINTENANCE	52.28

ARKANSAS PUBLIC SERVICE COMMISSION

Original Sheet No. 52.18 Schedule Sheet 18 of 36

Replacing: Sheet No.

Entergy Arkansas, Inc.
Name of Company

Kind of Service: Electric Class of Service: As Applicable

Docket No.: 16-027-R
Order No.: 17
Effective: 11/17/17

Part III. Rate Schedule No. 52

Title: Net-Metering Service (N-M)

PSC File Mark Only

3.13	PROTECTION/INTERFACE REQUIREMENTS	52.28
3.13.1	<i>Changes to Company Fault Interruption Equipment</i>	52.28
3.13.2	<i>Tests of the Net Metering Customer's Equipment</i>	52.28
3.13.3	<i>Specifying Protective Equipment</i>	52.29
3.13.3.1	<i>Service Interruption Equipment</i>	52.29
3.13.3.2	<i>Fault Interrupting Device</i>	52.30
3.13.3.3	<i>Equipment to Block Energizing Dead Circuits</i>	52.30
3.13.3.4	<i>Control, Protection and Safety Equipment Requirements For Specific Technologies</i>	52.30
3.13.3.4.1	<i>Synchronous Generators</i>	52.30
3.13.3.4.2	<i>Induction Generators and Inverter Systems</i>	52.31
3.14	SUSCEPTIBILITY TO TRANSMISSION FAULTS	52.31
3.15	SYNCHRONIZING REQUIREMENTS	52.31
3.16	METERING REQUIREMENTS	52.31
3.17	STANDARD INTERCONNECTION AGREEMENT REQUIREMENTS	52.32
4.0	REFERENCES	52.32
5.0	ATTACHMENTS	52.33
5.1	FLICKER CHART	52.33
5.2	NET METERING TECHNICAL REQUIREMENTS COMPLIANCE CHECKLIST	52.34
5.3	PROCESS FLOWCHART	52.36

ARKANSAS PUBLIC SERVICE COMMISSION

Original Sheet No. 52.19 Schedule Sheet 19 of 36

Replacing: Sheet No.

Entergy Arkansas, Inc.

Name of Company

Kind of Service: Electric

Class of Service: As Applicable

Docket No.: 16-027-R

Order No.: 17

Effective: 11/17/17

Part III. Rate Schedule No. 52

Title: Net-Metering Service (N-M)

PSC File Mark Only

1.0 Introduction

1.1 Purpose

The purpose of these safety and performance standards for renewable energy facilities is to describe the requirements and procedures for safe and effective interconnection and operation of renewable energy facilities under the Arkansas Public Service Commission (APSC or Commission) Net Metering Rules (the Rules).

A Net Metering Customer may operate a renewable energy facility at 60 Hertz (Hz), single- or three-phase at voltages up to and including 34.5 kV in parallel with the Company's distribution delivery system pursuant to an interconnection agreement, provided that the equipment meets or exceeds the requirements of this standard.

This standard describes typical interconnection requirements. Some installations, however, may require more extensive interconnection facilities, and will be addressed on a case by case basis. This is most likely to be required when several Net Metering Customers desire to connect renewable energy facilities to the same transformer or on the same distribution feeder.

1.2 Scope

The Rules provide that renewable energy facilities, sized according to the Rules, may be installed within the Company's service area on the Net Metering Customer's side of the meter. These facilities will be connected to the distribution delivery system when the distribution delivery system is operating under normal conditions. Some or all of the Net Metering Customer's load may be supplied with energy by the renewable energy facility. Under the Net Metering Rules, the Company's facilities will be available to handle the Net Metering Customer's entire load as needed.

The Rules provide for a maximum size of renewable energy facilities depending on the Net Metering Customer's revenue class. Residential applications are limited to a maximum of 25 kW and non-residential applications are limited to a maximum of 300 kW.

The provisions contained in this document are the minimum requirements for safe and effective interconnection and operation of renewable energy facilities operating in parallel with the Company's distribution delivery system pursuant to the Rules.

2.0 Definitions

Abnormal operating conditions – A situation in which the Company is operating the distribution delivery system in a manner inconsistent with normal configuration or under conditions that do not normally exist. Examples of abnormal operating conditions are: (1) times of high usage on the Company's system when Customers are requested to conserve energy or, (2) times when the Company must switch distribution feeder circuits out of use for repairs and switch other alternate feeders into use to deliver energy to Customers.

Company - Entergy Arkansas Inc. (EAI)

Customer - Any entity interconnected to the Company's distribution delivery system who takes electric service under one of EAI's rate schedules.

ARKANSAS PUBLIC SERVICE COMMISSION

Original Sheet No. 52.20 Schedule Sheet 20 of 36

Replacing: Sheet No.

Entergy Arkansas, Inc.

Name of Company

Kind of Service: Electric

Class of Service: As Applicable

Docket No.: 16-027-R

Order No.: 17

Effective: 11/17/17

Part III. Rate Schedule No. 52

Title: Net-Metering Service (N-M)

PSC File Mark Only

Displaced load - The Net Metering Customer's entire electrical requirement or a portion of it that, except for the output of the Net Metering Customer's renewable energy facilities, would have been served by the Company.

Distribution delivery system - The Company's wires, equipment, and facilities having a voltage of 34.5 kV or below to which the Net Metering Customer's renewable energy facility is interconnected.

Interconnection - The physical connection of renewable energy facilities and the net metering facilities to the distribution delivery system in accordance with the requirements of this standard so that parallel operation can occur.

Interconnection agreement - The Standard Interconnection Agreement for Net Metering Facilities approved by the Commission in EAI Policy Schedule 13.16.

Interconnection facilities - All facilities installed solely to interconnect the Net Metering Customer's system with that of the Company to facilitate the exchange of power between the Net Metering Customer's renewable energy facilities and the Company's power system including, but not limited to, connection, transmission, distribution, engineering, transformation, switching, metering, and safety equipment. Interconnection facilities shall include any additions and/or modifications to the Company's system deemed by the Company to be necessary.

Network service - Two or more primary distribution feeder sources electrically connected on the secondary (or low voltage) side to form one power source for one or more customers. This configuration is designed to maintain service to the customers even after the loss of one of these primary distribution feeder sources.

Net Metering Customer - Any customer with a renewable energy facility that takes service under EAI's net metering tariff.

Net Metering Facility - The hardware and software installed to measure the energy flow both into and out of the Net Metering Customer's facilities for the purpose of determining the usage for billing, if any.

Parallel operation - The operation of renewable energy facilities by a Net Metering Customer while the Net Metering Customer's facilities are physically and electrically interconnected to the Company's distribution delivery system.

Point of common coupling (PCC) - The point where transfer of any electric power between the customer's facilities and the Company's distribution delivery system takes place, normally at the point of attachment.

Pre-interconnection study - A study or studies that may be conducted by the Company in response to its receipt of a completed interconnection agreement. Pre-interconnection studies may include, but are not limited to:

ARKANSAS PUBLIC SERVICE COMMISSION

Original Sheet No. 52.21 Schedule Sheet 21 of 36

Replacing: Sheet No.

Entergy Arkansas, Inc.

Name of Company

Kind of Service: Electric

Class of Service: As Applicable

Docket No.: 16-027-R

Order No.: 17

Effective: 11/17/17

Part III. Rate Schedule No. 52

Title: Net-Metering Service (N-M)

PSC File Mark Only

- (d) **Service study** - An on-site analysis used to determine the interconnection requirements and the system voltage for providing parallel service to a Net Metering Customer with a renewable energy facility. All net metering facilities will require this study.
- (e) **Coordination study** - An engineering analysis that determines whether the presence of the renewable energy facility would interfere with the protective fusing and relaying on the distribution delivery system. It includes an analysis of the renewable energy facilities' contribution to power flow, available fault current, capacitor bank impact, and effects of voltage under normal and worst case situations. Typically, this would be required when more than one Net Metering Customer is or desires to be attached to the same distribution transformer or feeder circuit.
- (f) **Distribution delivery system impact study** - An engineering study that models the distribution delivery system with the proposed renewable energy facilities in place. The modeling must determine whether the distribution delivery system will be able to support the proposed renewable energy facility without reliability problems or interruptions in service to other customers. The study must also include a transient analysis to determine the potential for stability problems. If the model and transient studies indicate that power can flow back to the substation and consequently onto the transmission grid, then similar assessments will be required for the transmission system. This type of study would be required when several Net Metering Customers have renewable energy facilities interconnected on the same feeder circuit and the total output of all interconnected renewable energy facilities on that feeder is 50% or more of the feeder circuit's base load.
- (g) **Secondary network study** - An engineering analysis to specifically determine whether a renewable energy facility can be safely added to a secondary network. Typically, this study would be required when a Net Metering Customer's renewable energy facility is proposed for interconnection to a secondary network.

Protective function - A system that uses hardware (including switching devices), relay protection schemes and software that prevents unsafe operating conditions from occurring before, during, and after the interconnection of the renewable energy facility with the distribution delivery system. This system will be designed to isolate the Net Metering Customer's renewable energy facility or to disconnect it from the distribution delivery system under abnormal operating conditions or outages.

Quality of service - An operating state of the distribution delivery system that provides usable power to a customer. This state of usable power includes the parameters specified for power factor (Section 3.9.7), voltage surges and sags (Section 3.9.8), voltage flicker (Section 3.9.9), frequency (Section 3.9.10) and harmonics (Section 3.9.11).

Renewable energy facility - A system of hardware and software by which electric energy is generated using sun, wind, water, or biomass products as the source and as allowed to be interconnected to the Company's distribution system under the Rules.

ARKANSAS PUBLIC SERVICE COMMISSION

Original Sheet No. 52.22 Schedule Sheet 22 of 36

Replacing: Sheet No.

Entergy Arkansas, Inc.

Name of Company

Kind of Service: Electric

Class of Service: As Applicable

Docket No.: 16-027-R

Order No.: 17

Effective: 11/17/17

Part III. Rate Schedule No. 52

Title: Net-Metering Service (N-M)

PSC File Mark Only

Stabilized - The distribution delivery system is considered stabilized when, following a disturbance, the system returns to the normal range of voltage and frequency for a duration of five (5) minutes.

Standard of care - A term defining the level of awareness to maintain workplace and public safety in the design, installation and operation of facilities which generate power.

System protection facilities - The equipment required to protect the Company's system and its other customers' facilities from unsafe operating conditions occurring at the Net Metering Customer's renewable energy facilities. The protection requirements shall be met at the PCC, although the devices and functions providing the protective functions can be located elsewhere.

Unsafe operating conditions - A situation that if left uncorrected would result in: (1) harm to any personnel or damage to any equipment, (2) unacceptable system stability or, (3) operation outside established parameters affecting the quality of service to other customers connected to the distribution delivery system.

3.0 Details

3.1 Available Voltage Systems

The Company's primary distribution delivery systems available for parallel generation operations are of grounded wye or closed delta configurations. Generally, all secondary voltage levels from 120/240 V to 34.5 kV single-phase or three-phase (except open-delta and open-wye) are available for interconnection. Open-delta and open-wye secondary voltage configurations require special evaluation prior to interconnection. The voltage level available for connecting the renewable energy facility in parallel with the system depends on the desired location on the Company's distribution delivery system and the size of the Net Metering Customer's renewable energy facility.

3.2 Reasons for Disconnection from the Distribution Delivery System

The Company may disconnect the Net Metering Customer's renewable energy facility from the distribution delivery system under the following conditions:

- (1) Upon expiration or termination of the interconnection agreement;
- (2) Non-compliance of the Net Metering Customer's facility with any of the requirements in this document;
- (3) System emergency -
 - The Company may temporarily disconnect a Net Metering Customer's facility without prior written notice in cases where continued interconnection will endanger persons or property;
 - During the forced outage of the distribution delivery system, the Company shall have the right to temporarily disconnect a Net Metering Customer's facility to make immediate repairs on the distribution delivery system;

ARKANSAS PUBLIC SERVICE COMMISSION

Original Sheet No. 52.23 Schedule Sheet 23 of 36

Replacing: Sheet No.

Entergy Arkansas, Inc.

Name of Company

Kind of Service: Electric

Class of Service: As Applicable

Docket No.: 16-027-R

Order No.: 17

Effective: 11/17/17

Part III. Rate Schedule No. 52

Title: Net-Metering Service (N-M)

PSC File Mark Only

- (4) During routine maintenance, repairs, and modifications to the Company's distribution system;
- (5) Lack of approved interconnection agreement -
In order to interconnect the Net Metering Customer's renewable energy facility to the Company's distribution delivery system a Net Metering Customer must first submit to the Company an executed Standard Interconnection Agreement for Net Metering. The Company may refuse to connect or may disconnect the Net Metering Customer's facility if such agreement has not been received and approved.

When possible, the Company will provide the Net Metering Customer with reasonable notice of disconnection and will reconnect the Net Metering Customer as quickly as reasonably practical.

3.3 Pre-Interconnection Studies for Interconnection of Renewable Energy Facilities Under Net Metering Rules

The Company shall conduct one or more pre-interconnection studies prior to interconnection of renewable energy facilities under the Rules.

Secondary network systems are designed such that they do not allow reverse current flow. This and other aspects of secondary network systems create technical difficulties that may make interconnection more costly to implement. The ability of the Company to connect a Net Metering Customer's renewable energy facility in parallel with the system may be limited if a Net Metering Customer who is served from a secondary network system requests interconnection. The Company may conduct pre-interconnection and network studies to determine to what extent the renewable energy facility may be safely added to the network or may be accommodated in some other fashion.

3.4 System Changes

3.4.1 Company Changes to Distribution Delivery System

The distribution delivery system is a dynamic and changing system. If the Company changes the distribution voltage, the Net Metering Customer will be responsible for paying for all modifications to the Net Metering Customer's facilities required for reconnecting to the Company's reconfigured distribution delivery system. The Company will notify the Net Metering Customer of reconfiguration programs.

3.4.2 Net Metering Customer Changes to Interconnection

The Net Metering Customer shall notify the Company to obtain prior approval for any proposed modifications to the interconnecting scheme.

3.5 Allowable Tie Points

Normally, only one tie point between the Net Metering Customer's facilities and the Company's distribution delivery system will be allowed.

ARKANSAS PUBLIC SERVICE COMMISSION

Original Sheet No. 52.24 Schedule Sheet 24 of 36

Replacing: Sheet No.

Entergy Arkansas, Inc.

Name of Company

Kind of Service: Electric

Class of Service: As Applicable

Docket No.: 16-027-R

Order No.: 17

Effective: 11/17/17

Part III. Rate Schedule No. 52

Title: Net-Metering Service (N-M)

PSC File Mark Only

3.6 Energy Flow during Emergencies

Power flow from or to a Net Metering Customer's facilities during periods of system emergencies may be discontinued according to the APSC's rules, and the Company's Tariff, rates, riders or contract with the Net Metering Customer.

3.7 Types of Allowed Generators

Single- or three-phase alternating current generating units may be operated in parallel with the distribution delivery system when used as part of a renewable energy facility. They may be synchronous generators, induction generators, or inverter-controlled systems. The total connected capacity shall not exceed 25 kW for residential installations and 300 kW for non-residential installations. Direct-current generation shall not be connected to the Company's alternating-current distribution delivery system.

3.7.1 Limits on Three-Phase Generators

If three-phase service is not available in the area or if Company facilities must be upgraded or otherwise modified in order to enable the Net Metering Customer to connect to these facilities, the Net Metering Customer must pay for the additional cost for such service or improvements as determined by the Company. The Company reserves the right to refuse three-phase service under certain circumstances per the Company's extension policy.

3.7.2 Limits on Single-Phase Generators

Where necessary, to avoid the potential for renewable energy facilities to affect the service to other customers, the Company may limit the capacity and operating characteristics of single-phase generators in a manner consistent with its existing limitations for single-phase motors. A single-phase renewable energy facility shall be limited to a capacity of 25 kW or less.

3.8 Explicit Criteria for Parallel Operations

A Net Metering Customer shall be permitted to interconnect and operate a renewable energy facility in parallel with the Company's distribution delivery systems provided that all of the following criteria are met throughout the life of the interconnection.

3.8.1 Safety

In general, the Net Metering Customer's renewable energy facility will be held to the same standard of care as the Company is required to maintain. The safety of the general public and the personnel and equipment of the Company shall in no way be reduced or impaired as a result of the interconnection. Also, two installation criteria must be met:

- (1) The Net Metering Customer's renewable energy facility shall be equipped with protective functions designed to prevent the renewable energy facility from being connected to a de-energized circuit owned by the Company. The design of some systems provides this function without adding equipment at the PCC. Each system not providing additional devices at the PCC must be shown to be capable of these functions.

ARKANSAS PUBLIC SERVICE COMMISSION

Original Sheet No. 52.25 Schedule Sheet 25 of 36

Replacing: Sheet No.

Entergy Arkansas, Inc.

Name of Company

Kind of Service: Electric

Class of Service: As Applicable

Docket No.: 16-027-R

Order No.: 17

Effective: 11/17/17

Part III. Rate Schedule No. 52

Title: Net-Metering Service (N-M)

PSC File Mark Only

- (2) The Net Metering Customer's renewable energy facility shall be equipped with the necessary protective functions designed to prevent connection or parallel operation of the Net Metering Customer's facility with the distribution delivery system unless the distribution delivery system service voltage and frequency are of normal magnitude.

3.8.2 Impact of Interconnection

The quality, reliability and the availability of delivery service to the Company's other customers shall not be diminished or impaired as a result of the interconnection.

3.9 General Interconnection Requirements

The Net Metering Customer's renewable energy facility shall meet the technical requirements as prescribed in this section.

3.9.1 Net Metering Customer's Equipment and Interconnection Standards

The Net Metering Customer's renewable energy facility, net metering facilities and interconnection installation must meet all applicable national, state, and local construction and safety codes.

The Net Metering Customer shall be responsible for the design, installation, operation and maintenance of all equipment and facilities installed or that will be installed on the Net Metering Customer's side of the PCC specified by the parties involved. Such design shall meet the latest standards of Institute of Electrical and Electronic Engineers, National Electric Manufacturers Association, American National Standards Institute, National Electric Code, other national codes and any local codes pertaining to the design and construction of electrical facilities in effect at the time of installation. The facility shall be subject to the requirements of all authorities having jurisdiction and shall comply with all applicable codes and ordinances. A disconnect switch which has a visible opening and is accessible to and lockable by Company personnel at all times and without notice shall be furnished by the customer to the Company's specifications unless waived by Rule 3.01.B of the Commission's Net Metering Rules.

3.9.2 Rating of Net Metering Customer's Equipment

The equipment selected by the Net Metering Customer shall be rated for continuous parallel operation with the Company's system.

Renewable energy facilities that are designed to be used as stand-by or emergency power facilities shall not be interconnected to the Company's distribution delivery system for parallel operations under the Rules. Such an emergency power facility must not be interconnected to the Company's system. The customer's facilities shall be disconnected from the Company's system prior to the customer's use of stand-by or emergency facilities.

ARKANSAS PUBLIC SERVICE COMMISSION

Original Sheet No. 52.26 Schedule Sheet 26 of 36

Replacing: Sheet No.

Entergy Arkansas, Inc.

Name of Company

Kind of Service: Electric

Class of Service: As Applicable

Docket No.: 16-027-R

Order No.: 17

Effective: 11/17/17

Part III. Rate Schedule No. 52

Title: Net-Metering Service (N-M)

PSC File Mark Only

Net Metering systems that are intended to provide the customer with power during periods when the Company's facilities are unavailable shall be equipped with a transfer switch to prevent energizing a non-energized Company circuit consistent with Sections 3.13.3.3 and 3.8.1 of this policy.

3.9.3 Protection of Net Metering Customer's Equipment

The Net Metering Customer will be responsible for protecting its facilities in such a manner that distribution delivery system outages, short circuits or other disturbances, including zero sequence currents and ferroresonant over-voltages, do not damage the Net Metering Customer's facilities.

The Net Metering Customer's protective equipment shall be installed to prevent the renewable energy facility from causing unnecessary tripping of the distribution delivery system breakers that would affect the distribution delivery system's ability to provide reliable service to other customers.

3.9.4 Required Drawings

Adequate drawings of the Net Metering Customer's proposed renewable energy facility, which will include a one line diagram and proposed relay systems, must be submitted to the Company for review during the planning stage. Additional drawings may be required on a case by case basis.

3.9.5 Changes to Company Facilities

The total cost of any additional equipment that must be installed by the Company on its distribution delivery system to allow parallel operation must be paid for by the Net Metering Customer, including the transformers and any facilities which must be added due to increased fault current or special operating conditions.

3.9.6 Reactive Power Requirements

The Net Metering Customer's renewable energy facility shall normally be responsible for supplying the facility's own reactive power as required by the load to which it supplies power.

3.9.7 Power Factor

The power factor of the renewable energy facility at the PCC shall be according to the appropriate rate schedule for this installation. The presence of the renewable energy facility shall not cause the power factor to be lower than it was prior to installation and operation of the renewable energy facility.

3.9.8 Voltage Surges or Sags

The Net Metering Customer will operate its renewable energy facility in such a manner that the voltage levels on the distribution delivery system are in the same range (+5.0

ARKANSAS PUBLIC SERVICE COMMISSION

Original Sheet No. 52.27 Schedule Sheet 27 of 36

Replacing: Sheet No.

Entergy Arkansas, Inc.

Name of Company

Kind of Service: Electric

Class of Service: As Applicable

Docket No.: 16-027-R

Order No.: 17

Effective: 11/17/17

Part III. Rate Schedule No. 52

Title: Net-Metering Service (N-M)

PSC File Mark Only

% or -5% from nominal voltage) as if the facilities were not connected to the Company's system. The Net Metering Customer shall be responsible for any damages to the Net Metering Customer's facilities, and shall be liable for any damages to the Company's facilities or the facilities of other customers due to any under voltage or over voltage contribution from the renewable energy facility.

3.9.9 Voltage Flicker

The renewable energy facility shall not create objectionable flicker for the Company's other customers. As a guide to identifying objectionable flicker the "Border Line of Irritation" curve is included in Section 5.1. The creation of objectionable flicker shall result in disconnection by the Company until such time that all objectionable flicker problems are corrected.

3.9.10 Frequency

When the operating frequency of the Net Metering Customer's Net Metering Facility deviates from the 60 Hz base, the Net Metering Customer shall automatically disconnect the Net Metering Facility from the distribution delivery system in accordance with the table below.

<u>Generator Size</u>	<u>Frequency Range (Hz)</u>	<u>Seconds from start of event</u>
30 kW or less	Greater than 60.5 Hz	0.16
30 kW or less	Less than 59.3 Hz	0.16
Greater than 30 kW	Greater than 60.5 Hz	0.16
Greater than 30 kW	Less than 59.8 Hz to 57 Hz	Adjustable 0.16 to 300 ⁽¹⁾
Greater than 30 kW	Less than 57 Hz	0.16

⁽¹⁾ Consult the Company

The Company may require the Net Metering Customer to wait up to five (5) minutes to reconnect Net Metering Facility after the distribution delivery system voltage and frequency have returned to normal range and the system has been stabilized. Consult the Company for details. (IEEE 1547 4.2.6)

3.9.11 Harmonics

In accordance with IEEE 519 the total harmonic distortion (THD) voltage shall not exceed 5.0% of the fundamental 60 Hz frequency nor 3.0% of the fundamental frequency for any individual harmonic when measured at the PCC.

3.10 Inspection Prior to Operations and Additional Requirements

The Company reserves the right to impose any herein described but unmet requirements and to make subsequent final inspection before the renewable energy facility operates to verify that all such unmet requirements have been satisfied. However, the Company has no actual or implied responsibility in this regard. The Net Metering Customer shall be responsible for making

ARKANSAS PUBLIC SERVICE COMMISSION

Original Sheet No. 52.28 Schedule Sheet 28 of 36

Replacing: Sheet No.

Entergy Arkansas, Inc.

Name of Company

Kind of Service: Electric

Class of Service: As Applicable

Docket No.: 16-027-R

Order No.: 17

Effective: 11/17/17

Part III. Rate Schedule No. 52

Title: Net-Metering Service (N-M)

PSC File Mark Only

necessary changes, at the Net Metering Customer's expense, to the facility should such changes be required.

Inspection by the Company of the Net Metering Customer's equipment and interconnection facilities shall not constitute a determination by the Company of the continuing suitability of such equipment and interconnection. An inspection by the Company shall in no way constitute a warranty or representation by the Company against future negligence, misuse, faulty repairs, or subsequently developing defects, and the Company assumes no responsibility or liability therefor.

3.11 Responsibility for Net Metering Customer's Operations

The Company is not responsible for proper operations of the Net Metering Customer's renewable energy facility upon and after interconnection to the Company's distribution delivery system.

3.12 Responsibility for Net Metering Customer's Annual Maintenance

Annual maintenance of the Net Metering Customer's facility is the Net Metering Customer's sole responsibility. The Net Metering Customer shall maintain records of such maintenance activities, which the Company may review at reasonable times. Such maintenance records shall be made available for the Company's inspection upon request. The Company reserves the right to inspect the records, but has no responsibilities for maintenance either actual or implied.

3.13 Protection/Interface Requirements

Protecting both the Net Metering Customer's facilities and the Company's system are of great importance. Proper protective systems shall be established in the design phase and confirmed prior to start-up of the Net Metering Customer's renewable energy facility. An interconnection between the Company and the Net Metering Customer will not be allowed prior to the proper coordination of protective devices. The Net Metering Customer shall be responsible for providing to the Company the necessary documentation certifying that maintenance and testing have been satisfactorily performed.

3.13.1 Changes to Company Fault Interruption Equipment

Renewable energy facilities that are installed on the Company's distribution delivery system will provide additional fault current to the distribution delivery system. Thus, it is possible that the added facilities will necessitate the modification of the existing fault interrupting devices on the distribution feeder. The Net Metering Customer will be responsible for paying the cost of these changes to the Company's system.

It is also possible that the added facilities will increase the available fault current on the distribution delivery system beyond the interrupting capability of the existing devices on the distribution delivery system. The Net Metering Customer may be required to limit the fault current contribution from the renewable energy facility. Should the Company also be required to make changes, the Net Metering Customer shall pay the cost of the required changes. The issues will be examined on a case-by-case basis.

ARKANSAS PUBLIC SERVICE COMMISSION

Original Sheet No. 52.29 Schedule Sheet 29 of 36

Replacing: Sheet No.

Entergy Arkansas, Inc.

Name of Company

Kind of Service: Electric

Class of Service: As Applicable

Docket No.: 16-027-R

Order No.: 17

Effective: 11/17/17

Part III. Rate Schedule No. 52

Title: Net-Metering Service (N-M)

PSC File Mark Only

3.13.2 Tests of the Net Metering Customer's Equipment

The Company reserves the right, but has no responsibility either actual or implied, to observe the Net Metering Customer's tests and/or inspection of any of the Net Metering Customer's protective equipment that is essential to the interconnection, including relays, circuit breakers, protective devices and related equipment. Inspection may include simulated test tripping of the Net Metering Customer's interconnection breakers by the protective relays to verify all protective set points and relay/breaker trip timing prior to interconnection to the Company system.

Inspection by the Company of the Net Metering Customer's equipment and interconnection facilities shall not constitute a determination by the Company of the continuing suitability of such equipment and interconnection. An inspection by the Company shall in no way constitute a warranty or representation by the Company against future negligence, misuse, faulty repairs, or subsequently developing defects, and the Company assumes no responsibility or liability therefor.

The Net Metering Customer shall provide the Company with notice at least two weeks before the initial energizing and start-up testing of the Net Metering Customer's facilities so that the Company may witness the testing of any equipment and protective systems associated with the interconnection.

If upon connecting to the Company's system a system emergency develops, safety issues arise, or the quality of service to other Net Metering Customers is affected, the Company may then require additional inspections or tests of the Net Metering Customer's protective equipment. The Company may then require additional inspections or tests of the Net Metering Customer's protective equipment in accordance with then current IEEE 1547 and IEEE 1427.1.

3.13.3 Specifying Protective Equipment

The Company will have the right to specify certain protective devices, including relays and circuit breakers that the Net Metering Customer must install. The Company will specify all relay settings on the inter-tie. Settings of interconnection protective devices on the Net Metering Customer's system will be specified by the Net Metering Customer, but will be checked, coordinated with, and reviewed by the Company before application and after subsequent modification.

3.13.3.1 Service Interruption Equipment

The Net Metering Customer shall provide an automatic method of disconnecting the renewable energy facility from the distribution delivery system when either of the following conditions occurs. The renewable energy facility shall be automatically disconnected from the Company's distribution delivery system if (1) a sustained voltage deviation in excess of +5.0 % or -10% from nominal voltage persists for more than 30 seconds, or (2) a deviation in excess of +10% or -30% from nominal voltage persists for more than ten cycles. The Net Metering Customer may reconnect no sooner than five (5) minutes after the distribution

ARKANSAS PUBLIC SERVICE COMMISSION

Original Sheet No. 52.30 Schedule Sheet 30 of 36

Replacing: Sheet No.

Entergy Arkansas, Inc.

Name of Company

Kind of Service: Electric

Class of Service: As Applicable

Docket No.: 16-027-R

Order No.: 17

Effective: 11/17/17

Part III. Rate Schedule No. 52

Title: Net-Metering Service (N-M)

PSC File Mark Only

delivery system voltage and frequency have returned to normal range and the system has been stabilized. The design of some systems provides this function without adding equipment at the PCC. Each system not providing additional devices at the PCC must be shown to be capable of these functions.

3.13.3.2 Fault Interrupting Device

The Net Metering Customer shall install a fault-interrupting device between the Company and the renewable energy facility. Circuit breakers or other interrupting devices shall be capable of interrupting maximum available fault current at the PCC. The Company will approve such fault-interrupting device, which is likely to vary in design depending on location, available fault current, and size of the Net Metering Customer's facility.

Since most short circuits on overhead lines are of a temporary nature, it is the Company's normal practice to automatically reclose the substation circuit breaker on overhead lines after an automatic trip. Instantaneous reclosing (10-15 cycles) of circuit breakers and line reclosers may also be used. The Net Metering Customer shall be responsible for automatically disconnecting its facilities from the Company's distribution system prior to the automatic or instantaneous reclosing of a Company's substation circuit breaker or line recloser. The Net Metering Customer's disconnecting device shall not automatically or manually reclose sooner than five (5) minutes after the return of the Company's service voltage to normal magnitude and phase sequence following a recloser operation.

For renewable energy facilities using an inverter system, no other fault-interrupting device is required. The inverter interrupts the fault.

3.13.3.3 Equipment to Block Energizing Dead Circuits

Under no condition will the Net Metering Customer be permitted to energize a non-energized Company distribution circuit. The Net Metering Customer shall install equipment to effectively block the renewable energy facility from energizing a non-energized Company circuit. The design of some systems provides this function without adding equipment at the PCC. Each system not providing additional devices at the PCC must be shown to be capable of these functions.

3.13.3.4 Control, Protection and Safety Equipment Requirements For Specific Technologies

Various technologies require unique control, protection, and safety equipment to be installed. The specifications in this section list those requirements unique to the technologies.

ARKANSAS PUBLIC SERVICE COMMISSION

Original Sheet No. 52.31 Schedule Sheet 31 of 36

Replacing: Sheet No.

Entergy Arkansas, Inc.

Name of Company

Kind of Service: Electric

Class of Service: As Applicable

Docket No.: 16-027-R

Order No.: 17

Effective: 11/17/17

Part III. Rate Schedule No. 52

Title: Net-Metering Service (N-M)

PSC File Mark Only

3.13.3.4.1 Synchronous Generators

For a Net Metering Customer's synchronous generator, circuit breakers shall be three-phase devices with electronic or electro-mechanical control. The Net Metering Customer is solely responsible for properly synchronizing its generator with the Company's distribution delivery system. The excitation system response ratio shall be 0.5 or greater. The generator's excitation system(s) shall conform, as near as reasonably achievable, to the field voltage versus time criteria specified in American National Standards Institute Standard C50.13-1989 in order to permit adequate field forcing during transient conditions.

3.13.3.4.2 Induction Generators and Inverter Systems

Induction generation may be connected and brought up to synchronous speed (as an induction motor) if it can be demonstrated that the initial voltage drop measured on the distribution delivery system side of the PCC is within the allowable visible flicker standard in Section 5.1. Otherwise, the Net Metering Customer may be required to install hardware or employ other techniques to bring voltage fluctuations to acceptable levels.

Self-commutated inverters whether of the utility-interactive type or stand-alone type shall be used in parallel with the distribution delivery system only with synchronizing equipment. Line-commutated inverters do not require synchronizing equipment.

3.14 Susceptibility to Transmission Faults

Faults, single-phasing events or other abnormal operating conditions occurring on the Company's transmission system could affect a Net Metering Customer's facilities connected to the Company's distribution delivery system. It is the Net Metering Customer's responsibility to protect the Net Metering Customer's facilities from these conditions.

3.15 Synchronizing Requirements

The Net Metering Customer shall be solely responsible for synchronizing and properly connecting and disconnecting its electrical system relative to parallel operation with the Company's system. The Net Metering Customer shall provide an automatic synchronizing scheme to prevent the closing of its circuit breaker when the two electrical systems are out of synchronism.

The Net Metering Customer's renewable energy facility shall be automatically disconnected if its frequency should deviate more than +0.5 Hz or -0.7 Hz from the 60 Hz base. (See Section 3.9.10 Frequency.)

The synchronizing system of the Net Metering Customer must allow the Net Metering Customer's facilities to be operated in parallel only when the Company's distribution system is energized from the Company's system at the PCC.

ARKANSAS PUBLIC SERVICE COMMISSION

Original Sheet No. 52.32 Schedule Sheet 32 of 36

Replacing: Sheet No.

Entergy Arkansas, Inc.

Name of Company

Kind of Service: Electric

Class of Service: As Applicable

Docket No.: 16-027-R

Order No.: 17

Effective: 11/17/17

Part III. Rate Schedule No. 52

Title: Net-Metering Service (N-M)

PSC File Mark Only

3.16 Metering Requirements

The metering equipment is usually installed on the Net Metering Customer's premises (on Net Metering Customer owned building, pole or structure) as part of the service entrance equipment. Therefore provisions must be made for it in the Net Metering Customer's installation. Based on the applicable rate schedule and the Company's standard practices, the Net Metering Customer will provide the meter socket and the Company will supply the appropriate meter, standard for the type of service, that will measure the bi-directional energy flow. If the application requires other than the standard meter for the type of service, the additional metering requirements will be installed at the customer's expense.

The Net Metering Customer will be required to provide the Company with information regarding the total connected load. The Net Metering Customer may be required to provide and / or install the meter socket, metering transformer enclosure, and adequate attachments or devices for attaching Company's metering facilities to the building. For additional information see the Company's Customer Installation Standards for Electric Service.

3.17 Standard Interconnection Agreement Requirements

A written agreement will be required between the Company and the Net Metering Customer specifying the liability provisions, indemnities, terms of payment of cost to modify distribution delivery system (if not paid in advance), and other items affecting service under this document. This agreement will explain in detail the authority or responsibilities of the parties involved. **An interconnection between the Company's distribution delivery system and a Net Metering Customer's renewable energy facility will not be allowed prior to the execution of a written Standard Interconnection Agreement for Net Metering Facilities.**

4.0 References

IEEE Guide for Protective Relaying of Utility-Consumer Interconnection C37.95 (Latest revision)
IEEE Recommended Practices and Requirements for Harmonic Control in Electric Power Systems, 519-1992
IEEE Recommended Practice for Electric Power Distribution for Industrial Plants, 141-1993
IEEE Standard for Interconnecting Distributed Resources with Electric Power Systems 1547
IEEE Standard Conformance for Test Procedures for Interconnecting Distributed Resources with Electric Power Systems 1547.1

ARKANSAS PUBLIC SERVICE COMMISSION

Original Sheet No. 52.33 Schedule Sheet 33 of 36

Replacing: Sheet No.

Entergy Arkansas, Inc.
Name of Company

Kind of Service: Electric Class of Service: As Applicable

Part III. Rate Schedule No. 52

Title: **Net-Metering Service (N-M)**

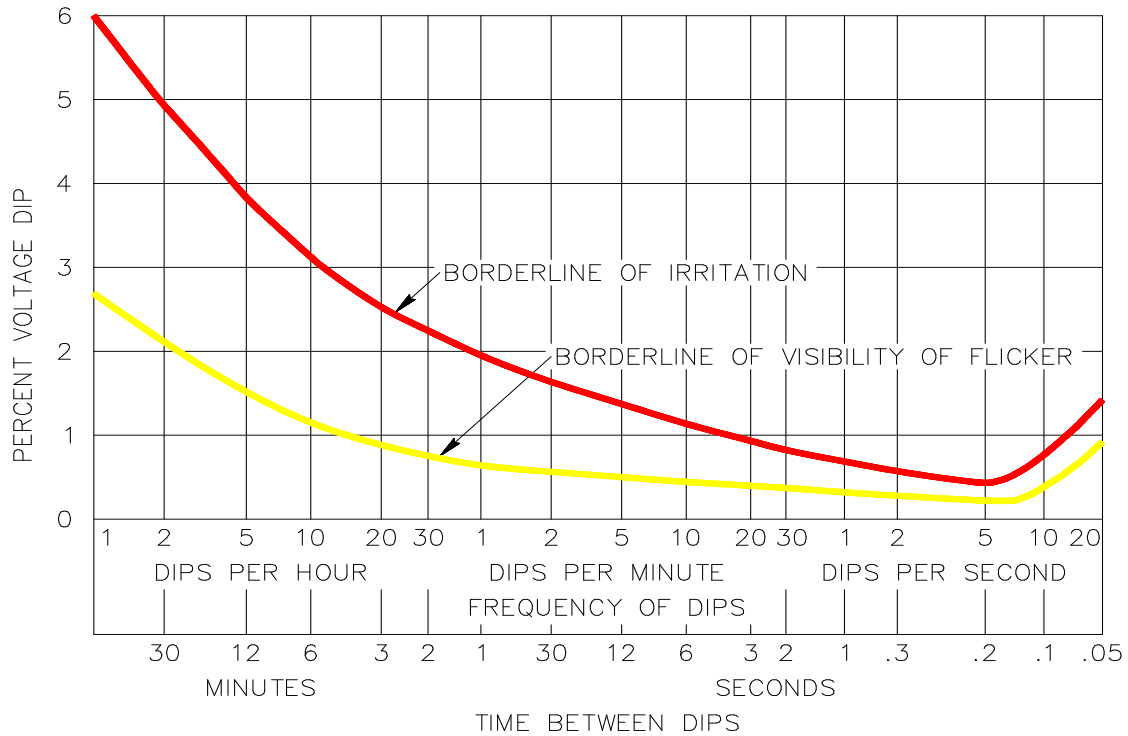
Docket No.: 16-027-R
Order No.: 17
Effective: 11/17/17

PSC File Mark Only

5.0 Attachments

- 5.1 Flicker Chart
- 5.2 Net Metering Technical Requirements Compliance Checklist
- 5.3 Process Flowchart

5.1 Flicker Chart



Flicker Curve. Source: IEEE Std. 141-1993

ARKANSAS PUBLIC SERVICE COMMISSION

Original Sheet No. 52.34 Schedule Sheet 34 of 36

Replacing: Sheet No.

Entergy Arkansas, Inc.
Name of Company

Kind of Service: Electric Class of Service: As Applicable

Part III. Rate Schedule No. 52

Title: Net-Metering Service (N-M)

Docket No.: 16-027-R
Order No.: 17
Effective: 11/17/17

PSC File Mark Only

5.2 Net Metering Technical Requirements Compliance Checklist

This checklist is a summary of the requirements that can be found in detail in this document (Section numbers are provided after each requirement.) Two objectives must be met to arrive at compliance by the proposed installation:

1. **Safety:** The Net Metering Customer's renewable energy facility will be held to the same standard of care, as the Company is required to maintain. In addition, the safety of the general public and the personnel and equipment of the Company shall in no way be reduced or impaired as a result of the interconnection.
2. **Customer Impact:** The quality, reliability and the availability of service to the Company's other customers shall not be diminished or impaired as a result of the interconnection.

This checklist is part of the Application and shall be completed by the Net Metering Customer and reviewed by Company's Design Engineering personnel or jurisdictional designee. The Customer's equipment vendor may be of assistance in completing the Application.

Customer Name
Date
Location
Renewable Source
Type of Process
ENTERGY REQUIREMENTS – Required for all Residential and Non-Residential Applicants.
1. Accessible and Lockable Disconnect: (3.9.1)
<u>Description of proposed compliance</u>
<u>Comment</u>
2. Disconnect inter-tie within 10 cycles of a service interruption or fault. (3.13.3.1 & 3.13.3.2)
<u>Description of proposed compliance</u>
<u>Comment</u>
3. Block generator from energizing dead circuits. (3.13.3.3)
<u>Description of proposed compliance</u>
<u>Comment</u>

ARKANSAS PUBLIC SERVICE COMMISSION

Original Sheet No. 52.35 Schedule Sheet 35 of 36

Replacing: Sheet No.

Entergy Arkansas, Inc.
Name of Company

Kind of Service: Electric Class of Service: As Applicable

Part III. Rate Schedule No. 52

Title: Net-Metering Service (N-M)

Docket No.: 16-027-R
Order No.: 17
Effective: 11/17/17

PSC File Mark Only

Net Metering Interconnection Application Page 4 of 4 Must be completed by all Non-Residential Applicants

Customer Name

Date

4. Supply reactive power. (3.9.6)

Description of Proposed Compliance:

Comment:

5. Identify power factor. (3.9.7)

Description of Proposed Compliance:

Comment:

6. Limit voltage surges and sags. (3.9.8)

Description of Proposed Compliance:

Comment:

7. Limit voltage flicker. (3.9.9)

Description of Proposed Compliance:

Comment:

8. Limit harmonic voltage and current. (3.9.11)

Description of Proposed Compliance:

Comment:

9. Specify protective devices and settings. (3.13.3.4)

Description of Proposed Compliance:

Comment:

10. Automatic Synchronization with Company System within 1/2 cycle or disconnect. (3.9.10 & 3.15)

Description of Proposed Compliance:

Comment:

ARKANSAS PUBLIC SERVICE COMMISSION

Original Sheet No. 52.36 Schedule Sheet 36 of 36

Replacing: Sheet No.

Entergy Arkansas, Inc.
Name of Company

Kind of Service: Electric Class of Service: As Applicable

Part III. Rate Schedule No. 52

Title: Net-Metering Service (N-M)

Docket No.: 16-027-R
Order No.: 17
Effective: 11/17/17

PSC File Mark Only

5.3 Process Flowchart

