

FILED
April 4, 2024
**INDIANA UTILITY
REGULATORY COMMISSION**

**On Behalf of Petitioner,
DUKE ENERGY INDIANA, LLC**

**VERIFIED DIRECT TESTIMONY OF
MARIA T. DIAZ**

Petitioner's Exhibit 6

April 4, 2024

**DIRECT TESTIMONY OF MARIA T. DIAZ
DIRECTOR, RATES AND REGULATORY PLANNING
ON BEHALF OF DUKE ENERGY INDIANA, LLC
BEFORE THE INDIANA UTILITY REGULATORY COMMISSION**

1

I. INTRODUCTION

2

Q. PLEASE STATE YOUR NAME AND BUSINESS ADDRESS.

3

A. My name is Maria T. Diaz, and my business address is 1000 East Main Street,

4

Plainfield, Indiana 46168.

5

Q. BY WHOM ARE YOU EMPLOYED AND IN WHAT CAPACITY?

6

A. I am employed by Duke Energy Indiana, LLC (“Duke Energy Indiana” or

7

“Company”) as Director, Rates and Regulatory Planning. Duke Energy Indiana is

8

a wholly owned, indirect subsidiary of Duke Energy Corporation.

9

Q. PLEASE DESCRIBE YOUR DUTIES AS DIRECTOR, RATES AND

10

REGULATORY PLANNING.

11

A. I have responsibility for certain regulated rate matters involving Duke Energy

12

Indiana, including cost of service studies, rate administration, and rate tracker

13

filings. I also administer rate issues for the Company’s jointly owned facilities.

14

Q. PLEASE STATE YOUR EDUCATIONAL AND PROFESSIONAL

15

BACKGROUND.

16

A. I am a graduate of the University of Indianapolis, holding a Bachelor of Arts

17

Degree in Accounting. I also have a Master’s in Business Administration from

18

Butler University. I am a Certified Public Accountant in the State of Indiana. I

19

was hired by the Company in 1997 as Supervisor of Fuels, Joint Ownership, and

20

Trading Accounting. In 2000, I became Manager of Energy Trading Accounting.

DUKE ENERGY INDIANA 2024 BASE RATE CASE
DIRECT TESTIMONY OF MARIA T. DIAZ

1 During 2005, I held the position of SEC Reporting Manager. Following the
2 April 3, 2006 merger of Cinergy and Duke Energy, I assumed my current rates
3 position with the Company.

4 **Q. WHAT IS THE PURPOSE OF YOUR TESTIMONY IN THIS**
5 **PROCEEDING?**

6 A. My testimony in this proceeding presents the Company's jurisdictional separation
7 study and retail cost of service study. I also explain the cost allocation of the
8 special contracts within the cost of service study. Petitioner's Confidential
9 Attachments 6-A (MTD) through 6-D (MTD) relate to the jurisdictional study,
10 Petitioner's Confidential Attachments 6-E (MTD) through 6-G (MTD) pertain to
11 the retail cost of service study. I also sponsor the related workpapers which satisfy
12 the related Minimum Standard Filing Requirements under 170 IAC-1-5-15. Those
13 confidential workpapers are filed under Confidential Workpaper 1-MTD (12 CP),
14 Confidential Workpaper 2-MTD (4 CP), Confidential Workpaper 3-MTD (12 CP
15 with minimum system), Confidential Workpaper 4-MTD (12 CP for Step 1 rate
16 adjustment) with the jurisdictional separation study pages within these
17 attachments labeled "JS" and the cost of service study pages labeled "COSS", and
18 Confidential Workpaper 5-MTD (12 CP with equal rate of return).

19 **II. OVERVIEW**

20 **Q. WHAT IS A JURISDICTIONAL SEPARATION STUDY?**

21 A. A jurisdictional separation study is a study to allocate assets, revenues, and
22 expenses to customers that are not subject to this Commission's jurisdiction in

DUKE ENERGY INDIANA 2024 BASE RATE CASE
DIRECT TESTIMONY OF MARIA T. DIAZ

1 this proceeding. In this filing, the jurisdictional separation study removes the
2 Company's non-jurisdictional customers from the total Company amounts. After
3 this is done, the remaining assets, revenues, and expenses, are all related to the
4 provision of retail electric service and are the subject of this filing.

5 **Q. PLEASE PROVIDE AN OVERVIEW OF THE SEPARATION STUDY.**

6 A. The separation study is the process of allocating rate base and net operating
7 income for services provided to a customer who receives steam from Duke
8 Energy Indiana and to Duke Energy Indiana's long-term native load wholesale
9 customers. The remaining rate base and net operating income is for service to
10 Duke Energy Indiana's jurisdictional retail customers. The broad components of
11 net operating income include operating revenues, operation and maintenance
12 expenses, depreciation and amortization, taxes other than income taxes and
13 income taxes. The following table summarizes the separation study.

DUKE ENERGY INDIANA 2024 BASE RATE CASE
DIRECT TESTIMONY OF MARIA T. DIAZ

1

Table 1: Jurisdictional Separation Study

(millions)	2025 Forecast with Pro Formas and Adjustments	Steam Service	Long-Term Wholesale Contracts	Jurisdictional, Retail
Rate Base	\$ 12,763.0	\$ 10.5	\$ 270.4	\$ 12,482.1
Operating Revenues	\$ 3,159.3	\$ 12.5	\$ 129.9	\$ 3,017.0
Operation and Maintenance Expense	\$ 1,603.0	\$ 6.5	\$ 75.8	\$ 1,520.7
Depreciation and Amortization	\$ 1,006.1	\$ 4.2	\$ 34.7	\$ 967.2
Taxes Other Than Income Taxes	\$ 76.7	\$ 0.1	\$ 1.7	\$ 74.9
Income Taxes	\$ 49.2	\$ 0.3	\$ 2.8	\$ 46.1
Total Operating Expenses	\$ 2,735.0	\$ 11.1	\$ 115.0	\$ 2,608.9
Net Operating Income	\$ 424.3	\$ 1.4	\$ 14.9	\$ 408.1

2 **Q. WHAT IS THE PURPOSE OF A RETAIL COST OF SERVICE STUDY?**

3 A. The purpose of the retail cost of service study is to determine the cost to serve
4 each rate class. Once the retail assets, revenues, and expenses are identified by the
5 jurisdictional separation study, a retail cost of service study allocates the rate base
6 and expenses to the various rate classes. This study develops the proposed
7 revenue levels for each retail rate schedule that is used in the rate design process
8 as described in Company witness Mr. Flick, Petitioner's Exhibit 7.

DUKE ENERGY INDIANA 2024 BASE RATE CASE
DIRECT TESTIMONY OF MARIA T. DIAZ

1 Q. PLEASE CONTINUE WITH AN OVERVIEW OF THE RETAIL COST OF
2 SERVICE STUDY.

3 A. The revenue requirement for each rate tariff is functionalized and classified
4 among production, transmission, distribution, demand, energy, customer, *etc.* This
5 detailed level of revenue requirement is then used for rate design. There are many
6 different allocation factors. For example, there are production demand, energy,
7 distribution, and number of customers.

8 Q. WHAT IS THE SUBSIDY/EXCESS WITHIN THE RETAIL COST OF
9 SERVICE STUDY, AND DID DUKE ENERGY INDIANA REDUCE IT IN
10 ITS DEVELOPMENT OF THE RATE INCREASE BY CLASS?

11 A. Subsidy/excess refers to the rate of return variability among the various rate
12 groups from the cost of service study for existing rates. In general, the rate of
13 return for residential customers is lower than the retail average rate of return and
14 the rate of return for industrial customers is above the retail average rate of return.
15 One of the causes of this is that the 2025 forecasted residential sales used in this
16 base rate case have increased since the 2020 base rate case while 2025 forecasted
17 industrial sales have decreased since the 2020 base rate case. The proposed rates
18 are based on a subsidy/excess reduction of 5% which resulted in a residential
19 proposed increase of 19%. Further reduction to the subsidy/excess would result in
20 a larger residential proposed increase. The rate making process includes
21 ratemaking constructs that result in utility service that is affordable as discussed

1 by Company witness Mr. Pinegar and the subsidy/excess will be evaluated for
2 potential reductions in future rate cases.

3 **III. BACKGROUND**

4 **Q. HAS THE COMPANY NORMALLY PREPARED JURISDICTIONAL**
5 **SEPARATION AND COST OF SERVICE STUDIES FOR ITS RATE**
6 **PROCEEDINGS?**

7 A. Yes, the Company has submitted jurisdictional separation studies and retail cost
8 of service studies in each electric rate proceeding before this Commission.

9 **Q. ARE YOU FAMILIAR WITH THE COST BASIS UPON WHICH**
10 **JURISDICTIONAL SEPARATION STUDIES AND COST OF SERVICE**
11 **STUDIES WERE PREPARED?**

12 A. Yes, in all of these proceedings, the studies were developed on the basis of
13 embedded or accounting costs.

14 **Q. HAVE YOU PREPARED, OR HAD PREPARED UNDER YOUR**
15 **SUPERVISION, A JURISDICTIONAL SEPARATION STUDY AND A**
16 **RETAIL COST OF SERVICE STUDY FOR THE COMPANY FOR THE**
17 **TWELVE CONSECUTIVE MONTHS ENDED DECEMBER 31, 2025, THE**
18 **FORECASTED TEST PERIOD IN THIS PROCEEDING?**

19 A. Yes, the studies were prepared on an embedded or an accounting cost basis, as
20 applied to the forecasted test period of January 1, 2025 to December 31, 2025,
21 and are attached as Petitioner's Confidential Attachments 6-D (MTD) Page 1 and
22 6-G (MTD), Page 1 and 2.

DUKE ENERGY INDIANA 2024 BASE RATE CASE
DIRECT TESTIMONY OF MARIA T. DIAZ

1 Q. WHAT SOFTWARE APPLICATION WAS USED TO PREPARE THE
2 JURISDICTIONAL SEPARATION AND COST OF SERVICE STUDIES?

3 A. Duke Energy Indiana used its own Excel-based model to create and store the
4 information that supports this base rate case proceeding in one workbook. This
5 model was updated to meet Duke Energy Indiana's requirements for this retail
6 rate case filing. Some of the key features of the workbook include: (1) input
7 amounts that collect data from various sources, such as the output from the
8 revenue requirements model; (2) input percentages sourced from Company
9 records; (3) formulas which demonstrate the calculations performed and linking
10 of the data between the worksheets in the workbook; (4) results by function for
11 total Company; (5) allocation results for the Jurisdictional Separation study; (6)
12 allocation results for the cost of service Study; and (7) reporting by rate schedule
13 used in the rate design process.

14 Q. PLEASE BRIEFLY EXPLAIN THE GENERAL DESIGN AND
15 TERMINOLOGY USED IN THE WORKSHEET TABS CONTAINED IN
16 THE EXCEL-BASED MODEL TO PRODUCE THE STUDIES.

17 A. The following structure was used:
18 *Function*, which assigns data into function categories (Production, Transmission,
19 Distribution, and Customer) and sub-functions. The function data populates the
20 *Separation* step, wherein the data is separated between a Steam Customer and all
21 other Electric customers. The electric data populates the *Jurisdiction Separation*
22 step, wherein the data is separated between Retail and Wholesale. The Retail data

DUKE ENERGY INDIANA 2024 BASE RATE CASE
DIRECT TESTIMONY OF MARIA T. DIAZ

1 feeds and populates the *Retail Rate Codes*, wherein the data is separated by each
2 rate schedule and grouped into customer classes for rate design processing. I
3 describe these steps in more detail later in my testimony.

4 **Q. PLEASE BRIEFLY EXPLAIN YOUR UNDERSTANDING OF THE**
5 **COMMISSION'S ORDER IN CAUSE NO. 45253 RELATING TO**
6 **COINCIDENT PEAK ("CP") ALLOCATION METHODOLOGY.**

7 A. The Company supported the 4 CP methodology for production plant and
8 transmission plant in the proceeding and provided a variation utilizing a 12 CP
9 methodology for comparison purposes in accordance with the Commission Order
10 in Cause No. 42873, ("Duke Merger Proceeding"). In the Order in Cause No.
11 45253, the Company received approval for the setting of retail electric base rates
12 and charges using a 4 CP methodology.

13 **Q. WHICH CP ALLOCATION METHODOLOGY IS THE COMPANY**
14 **SUPPORTING IN THIS RETAIL PROCEEDING?**

15 A. In its retail cost of service study, the Company performed allocations for
16 production plant using 12 CP methodology to its rate schedules. The Company
17 also performed allocations for transmission plant to synchronize with the
18 production methodology, such that the 12 CP for production plant was used with
19 the 12 CP for transmission plant to support the rate increase across the customer
20 classes. Although Cause No. 45253 did not extend the requirement to submit a
21 future retail rate case using alternative CP allocation methods, the Company filed

DUKE ENERGY INDIANA 2024 BASE RATE CASE
DIRECT TESTIMONY OF MARIA T. DIAZ

1 a 4 CP production and transmission scenario in this proceeding for informational
2 purposes in Confidential Workpaper 2-MTD.

3 **Q. WHAT RATE MITIGATION OCCURRED IN THIS RETAIL**
4 **PROCEEDING TO THE LIGHTING CLASSES?**

5 A. Company witness Mr. Flick discusses that the Company is proposing to cap the
6 rate increases to three lighting groups and reallocated the excess above the cap to
7 the other rate classes. The excess was distributed to the remaining rate classes
8 based on their share of proposed rate base. This mitigation was administered by
9 Mr. Flick in the development of proposed rates after I had provided him the 12 CP
10 cost of service study in Confidential Workpaper 1-MTD.

11 **Q. BEFORE PREPARING THE JURISDICTIONAL SEPARATION AND**
12 **COST OF SERVICE STUDIES, WHAT STEPS WERE PERFORMED?**

13 A. The process of functionalization and classification was performed. This is the
14 same methodology utilized by the Company in previous rate cases.

15 **Q. PLEASE DESCRIBE THE FUNCTIONALIZATION AND**
16 **CLASSIFICATION PROCESS.**

17 A. Functionalization is the process by which assets, costs and other operating
18 revenues are separated according to the major electric system functions of
19 production, transmission, distribution, and customer costs. In general, the
20 functionalized assets and costs as reported in the FERC Uniform System of
21 Accounts are used, but certain accounts, such as general and intangible plant are
22 not initially assigned to the major functions but functionalized according to other

DUKE ENERGY INDIANA 2024 BASE RATE CASE
DIRECT TESTIMONY OF MARIA T. DIAZ

1 related costs so that they can be properly classified and allocated. A similar
2 example to general plant is administrative and general costs that are allocated
3 based on salaries and wages to the major functions. Other operating revenues are
4 functionalized based on the nature of the revenues included in the regulatory
5 ledger account.

6 Production refers to all production facilities including steam generation,
7 hydraulic generation, and other production necessary to integrate that generation
8 into the power supply system and deliver it to the bulk transmission system.

9 Transmission refers to costs associated with the high voltage system
10 utilized for the transmission of power to interconnected customers and includes
11 transmission substations and lines necessary to integrate the Company's sources
12 of power, whether owned or purchased, into the power supply system. The
13 investment in the transmission system for instance, was distinguished in more
14 detail as noted in the chart below.

15 Distribution refers to the facilities required to connect the ultimate
16 customer to the transmission system and was also distinguished in the detail noted
17 in the chart below.

18 The customer function includes the costs associated with providing meter
19 reading, billing, and customer services.

20 In the Excel-based model, within the major functions described, the
21 Company assigned a function allocator by each regulatory ledger account. Each
22 function allocator (expressed as a percent based on internal data requests,

DUKE ENERGY INDIANA 2024 BASE RATE CASE
DIRECT TESTIMONY OF MARIA T. DIAZ

1 Company records, or direct assignment) spread forecasted amounts to detailed
 2 sub-functions. The detailed sub-functions were grouped to enable the rate design
 3 and reporting used in the cost of service study. Below is a summary of the
 4 groupings provided to Mr. Flick:

Table 2

Function	Sub-Function Grouping for Rate Design/Reporting
Production	Production Demand Production Energy
Transmission	Transmission Step-ups Transmission Bulk Transmission Common Transmission – Distribution Use Transmission Sole Use Other Transmission Sole Use Specific Property
Distribution	Distribution Substations Distribution Substation Specific Property Distribution Line Transformers Distribution Primary Lines Distribution Secondary Lines Distribution Customer Installations Distribution Services Distribution Street Lighting Distribution Outdoor Lighting Meters
Customer Service	Customer Accounts Customer Service Information Sales Expense

6 Classification also occurred wherein the functionalized costs are
 7 designated as being demand, energy, or customer related. Demand and customer
 8 related costs are costs that are incurred regardless of the level of energy sales and

DUKE ENERGY INDIANA 2024 BASE RATE CASE
DIRECT TESTIMONY OF MARIA T. DIAZ

1 that vary with the demand imposed by the customer and related to the number of
 2 customers served. Examples of such costs are production, transmission, and the
 3 major portion of the distribution plant and related expenses. Variable costs are
 4 those which vary with the level of energy produced and the number of kilowatt
 5 hours used by the customer. Fuel expense is an example of this type of cost.
 6 Meters are an example of a cost whose level is affected by the number of
 7 customers served.

8 Below is a summary of the classification:

9 **Table 3**

Function	Classification
Production	Demand, Energy
Transmission	Demand
Distribution	Demand, Customer
Customer Service	Customer

10 **Q. PLEASE DESCRIBE THE ALLOCATION OF SUPERVISION AND**
 11 **ENGINEERING EXPENSES (“S&E”) FOR THE OPERATING**
 12 **EXPENSES.**

13 **A.** The S&E from the forecast were allocated to the associated expenses that such
 14 S&E supported at the FERC account level. This was done for test period amounts
 15 and pro-forma adjustments wherein the S&E amounts were zeroed and the
 16 amounts were reassigned to the associated expenses the S&E were supporting
 17 based on the proportion of the associated expenses.

DUKE ENERGY INDIANA 2024 BASE RATE CASE
DIRECT TESTIMONY OF MARIA T. DIAZ

1 Q. HOW DOES THE S&E PROCESS RELATE TO THE
2 FUNCTIONALIZATION AND CLASSIFICATION YOU DESCRIBED
3 EARLIER?

4 A. The ending expense amounts that result after the S&E process advance for
5 functionalization and classification in the jurisdictional separation study included
6 in Confidential Workpaper 1-MTD. Confidential Workpaper JS-8-MTD
7 illustrates the operation and maintenance balances by production transmission,
8 and distribution and lists the allocators applied to determine functional and
9 classified expense amounts by account. Confidential Workpaper JS-8-MTD also
10 shows the allocation of administrative and general expenses to functional
11 categories based on a salaries and wages allocator sourced from Confidential
12 Workpaper 6-MTD. Confidential Workpaper JS-7-MTD includes the other
13 operating revenues balances and lists the allocators applied to determine the
14 functional and classified revenue amounts by account. Income Taxes were also
15 functionalized on Confidential Workpaper JS-9-MTD based on the nature of the
16 tax account.

17 Q. WHAT WORKPAPER WAS PREPARED TO ILLUSTRATE THE
18 FUNCTIONAL ALLOCATORS FOR RATE BASE?

19 A. Confidential Workpaper JS-6-MTD included in Confidential Workpaper 1-MTD
20 was prepared for rate base. This workpaper shows the allocators applied to
21 production, transmission, and distribution rate base accounts after the walk-up of
22 the balances performed by Company witness Ms. Lilly. Confidential Workpaper

DUKE ENERGY INDIANA 2024 BASE RATE CASE
DIRECT TESTIMONY OF MARIA T. DIAZ

1 JS-6-MTD, shows the application of the salaries and wages allocator per
2 Confidential Workpaper 7-MTD to general and intangible rate base and prepaid
3 pension. Inventories and regulatory assets were reviewed and summarized to
4 enable the selection of allocators.

5 After the functionalization and classification process, the forecasted
6 amounts advance to the jurisdictional separation study for further cost allocation
7 and form the basis on which to allocate the remaining amounts to the Company's
8 classes of customers in the cost of service study.

9 **IV. JURISDICTIONAL SEPARATION STUDY**

10 **Q. WHAT IS THE PROCESS USED IN PREPARING THE**
11 **JURISDICTIONAL SEPARATION STUDY?**

12 A. The Company's forecast, which is supported by Duke Energy Indiana witness Mr.
13 Rutledge is the starting point of information for the functionalization process
14 previously described. Furthermore, the Company's forecast is the starting point
15 for the jurisdictional separation study to which *proformas* and ratemaking
16 adjustments proposed by the Company's witnesses in this case were prepared.
17 Then, the following step that occurs is the segregation of the Company's
18 customers into three main categories: (i) one customer who purchases high
19 pressure steam from the Company's Cayuga Generating Station, (ii) wholesale
20 electric customers who purchase firm power from the Company and resell it to
21 their ultimate customers or their members, and (iii) retail electric customers who
22 purchase power from the Company as ultimate consumers.

1 Q. IS THE COST TO PROVIDE THE STEAM SERVICE YOU PREVIOUSLY
2 MENTIONED IDENTIFIED SEPARATELY IN THE JURISDICTIONAL
3 SEPARATION STUDY?

4 A. Yes, it is. The steam customer who purchases high-pressure steam from Duke
5 Energy Indiana's Cayuga Generating Station is identified as an individual
6 customer. This portion of the jurisdictional study is referred to as the "steam
7 study."

8 Q. PLEASE IDENTIFY THE DOCUMENTS THAT HAVE BEEN MARKED
9 AS PETITIONER'S CONFIDENTIAL ATTACHMENTS 6-D (MTD) AND
10 CONFIDENTIAL ATTACHMENT 6-C (MTD).

11 A. Petitioner's Confidential Attachment 6-D (MTD) is a summary of the steam study
12 sourced from Confidential Workpaper JS-10 included in Confidential Workpaper
13 1-MTD. The Confidential 6-D Attachment summarizes the allocation of the
14 Cayuga Generating Station plant investment, inventories, regulatory assets, and
15 prepaid pension asset to Steam Service and Electric Service. The Confidential 6-D
16 Attachment also summarizes the allocation of the Cayuga Generating Station
17 operation and maintenance expenses, including administrative and general
18 expenses, depreciation and amortization, and taxes other than income taxes to
19 Steam Service and Electric Utility. The allocations were made using the assigned
20 peak demand responsibility, developed on Page 1 of Confidential Attachment 6-C
21 (MTD), assigned equivalent net generation (demand basis), developed on Page 2
22 of Confidential Attachment 6-C (MTD), assigned megawatt-hour responsibility,

DUKE ENERGY INDIANA 2024 BASE RATE CASE
DIRECT TESTIMONY OF MARIA T. DIAZ

1 developed on Page 3 of Confidential Attachment 6-C (MTD), assigned equivalent
2 net generation (megawatt-hour basis), developed on Page 4 of Confidential
3 Attachment 6-C (MTD). The assignment at the separation (steam) target occurred
4 via creation of the allocator factors or percentages which were assigned by
5 regulatory ledger account. The percentages were developed based on internal data
6 request responses, Company records, or direct assignment. Confidential
7 Workpapers JS-11 through -14-MTD from Confidential Workpaper 1-MTD is the
8 listing of the regulatory general ledger accounts and the respective allocator used
9 per each account at the steam study step.

10 **Q. WHAT IS THE NEXT STEP IN PREPARING THE JURISDICTIONAL**
11 **SEPARATION STUDY?**

12 A. The next step is the development of the demand and energy allocators for the
13 Company's non-jurisdictional customers mentioned earlier.

14 **Q. PLEASE EXPLAIN THE WHOLESALE CUSTOMERS' AGREEMENTS**
15 **THAT WERE CARVED OUT AS A SEPARATE CATEGORY.**

16 A. The Company provides electric service through the generation and sale of
17 electricity to native load wholesale customers. The Company has provided these
18 wholesale electric customers with their full electric load requirements or with
19 supplemental load requirements when the customer has other sources of
20 electricity. The native load wholesale electric service reported as a separate
21 category in this proceeding is provided under long-term power production
22 contracts using market-based pricing under Duke Energy Indiana's market-based

DUKE ENERGY INDIANA 2024 BASE RATE CASE
DIRECT TESTIMONY OF MARIA T. DIAZ

1 authority. The native load wholesale contracts include both energy and demand
2 charges. Contractual amounts owed are trued-up annually based on incurred
3 production costs in accordance with costs reported in the FERC Form No. 1, the
4 Company's supporting accounting records, and the specific customer's actual
5 peak demand and usage.

6 **Q. WHO REGULATES DUKE ENERGY INDIANA'S CONTRACTS FOR**
7 **WHOLESALE ELECTRIC SERVICE?**

8 A. The Federal Energy Regulatory Commission ("FERC") has jurisdiction over
9 Duke Energy Indiana's agreements with its wholesale customers.

10 **Q. PLEASE EXPLAIN HOW THE WHOLESALE CUSTOMERS WERE**
11 **ACCOUNTED FOR IN THE JURISDICTIONAL SEPARATION STUDY.**

12 A. The long-term power production contracts are considered firm, native load sales;
13 as such, production costs and related production expenses were allocated to these
14 wholesale customers in the study. There are two wholesale contracts that expire at
15 the end of the forward-looking test period and are not being renewed. Duke
16 Energy Indiana developed the allocations to retail customers by excluding the
17 terminated wholesale contracts to determine a representative ongoing level for the
18 wholesale service beyond 2025 for the Step 2 rate adjustment. The Direct
19 Testimonies of Company witnesses Ms. Sieferman and Ms. Graft, explain the
20 associated *proformas* to remove the dollar amounts associated with the expiring
21 wholesale contracts included in Attachment 26-C as Schedule REV5 and
22 Schedule COGS6, respectively. Company witness Mr. Swez describes the

1 Company's capacity position and the impacts the expiration of the wholesale
2 contracts have on this position.

3 **Q. PLEASE IDENTIFY THE DOCUMENTS THAT HAVE BEEN MARKED**
4 **FOR PURPOSES OF IDENTIFICATION AS CONFIDENTIAL**
5 **ATTACHMENTS 6-A (MTD) AND 6-B (MTD).**

6 A. Confidential Attachment 6-A (MTD) is a two-page summary that shows the
7 summarization of the wholesale production demand allocators used in the
8 jurisdictional separation study. Per the Company's 2023 Fall load forecast, the
9 production system peak day and time and the corresponding coincident demands
10 by retail, wholesale, and company use for the test period were provided as
11 reflected on Confidential Workpaper 8-MTD. Page 1 and 2 of Confidential
12 Attachment 6-A (MTD) develop the wholesale customer group's twelve-month
13 average coincident peak electricity demands and percentage of the production
14 system ("wholesale (production) demand allocator"). The load forecast reported
15 the demands measured at the generating facilities.

16 Per the Company's load forecast, the megawatt-hour ("MWH") usage by
17 retail, wholesale, and Company use for the 2025 test period was provided as
18 reflected on Confidential Workpaper 9-MTD. Page 1 and 2 of Confidential
19 Attachment 6-B (MTD) develops the wholesale customer group's twelve-month
20 MWH and percentage of the production system ("wholesale (production) energy
21 allocator"). The load forecast reported the usage measured at the generating

DUKE ENERGY INDIANA 2024 BASE RATE CASE
DIRECT TESTIMONY OF MARIA T. DIAZ

1 facilities. Confidential Workpapers 8 and 9-MTD detail customer-specific
2 demands and usage by each wholesale customer.

3 In summary, Confidential Attachments 6-A (MTD) and 6-B (MTD)
4 developed the system peak demand (and usage) and the applicable wholesale
5 customers' share of the system peak (and usage), with the remainder being the
6 retail portion of Duke Energy Indiana's total system demand (and usage), which
7 represents the retail customers' portion of the maximum electricity load and usage
8 imposed on Duke Energy Indiana's electric system. The wholesale demands and
9 usage for the forecasted 2025 period approximated 5%.

10 **Q. HOW WERE THE WHOLESALE PRODUCTION DEMAND AND**
11 **ENERGY ALLOCATORS USED IN THE JURISDICTIONAL**
12 **SEPARATION STUDY?**

13 A. The allocators or percentages were applied to the functionalized amounts in the
14 test period, which were production-related, and which amounts were not already
15 determined to be 100% retail or 100% wholesale, based on the specific regulatory
16 ledger account. Specifically, after the carve-out for steam service, the production-
17 demand allocator was applied to total electric service, production-demand
18 regulatory ledger amounts, and the production-energy allocator was applied to
19 total electric service production-energy regulatory ledger amounts to determine
20 the wholesale carve-outs in the jurisdictional separation study.

21 **Q. WHAT OTHER ALLOCATORS WERE USED IN THE**
22 **JURISDICTIONAL STUDY?**

DUKE ENERGY INDIANA 2024 BASE RATE CASE
DIRECT TESTIMONY OF MARIA T. DIAZ

1 A. There was the 100% assignment to retail or 100% assignment to wholesale,
2 depending on the regulatory ledger account. For example, sales for resale were
3 assigned as 100% wholesale, while retail sales were assigned 100% retail.

4 **Q. PLEASE EXPLAIN OTHER COST ALLOCATION CONSIDERATIONS**
5 **AT THE JURISDICTIONAL SEPARATION STUDY STEP.**

6 A. The other cost allocation consideration was to allocate the fixed or demand-
7 related costs based on demand allocation factors, the variable or energy-related
8 costs based on the energy allocation factors.

9 **Q. HOW WERE OTHER WHOLESALE REVENUES ADDRESSED IN THE**
10 **JURISDICTIONAL STUDY?**

11 A. The Company receives revenues from two wholesale customers for usage of Duke
12 Energy Indiana's local facilities (*i.e.* distribution substations) as well as receives
13 revenues from the Midcontinent Independent System Operator, Inc. ("MISO") for
14 usage of Duke Energy Indiana's transmission system, such revenues were
15 included in the development of the forecast for this proceeding. The forecasted
16 revenues were assigned 100% to retail as the forecasted costs to supply the
17 wholesale distribution and transmission services were assigned 100% to retail.

18 **Q. PLEASE EXPLAIN THE TRANSMISSION-RELATED OWNERSHIP**
19 **ARRANGEMENT CURRENTLY IN EFFECT AND APPLICABILITY TO**
20 **WHOLESALE PARTNERS AND HOW WAS SUCH ARRANGEMENT**
21 **ADDRESSED IN THIS PROCEEDING?**

DUKE ENERGY INDIANA 2024 BASE RATE CASE
DIRECT TESTIMONY OF MARIA T. DIAZ

1 A. Duke Energy Indiana, Wabash Valley Power Alliance (“WVPA”), and Indiana
2 Municipal Power Agency (“IMPA”) continue their arrangement under the
3 Transmission and Local Facilities Ownership, Operation, and Maintenance
4 Agreement (“T&LF Agreement”), whereby the parties own the Joint
5 Transmission System (“JTS”) in Indiana and have rights to the JTS. The T&LF
6 Agreement provides for the parties to jointly own transmission plant, based on the
7 loads of the parties, rather than Duke Energy Indiana owning 100% of the
8 facilities and WVPA and IMPA paying for the facilities through rates. Even
9 though each party owns specific pieces of property, such ownership provides each
10 party with an individual ownership interest, as tenants-in-common, in all rights to
11 use, output, and capacity of the JTS. The T&LF Agreement further provides for a
12 reconciliation each calendar year to compare each party’s actual ownership in the
13 joint transmission system to its proportionate share requirements based on loads
14 for such calendar year. Any party or parties who are under their proportionate
15 share shall compensate the party or parties who are over their proportionate share
16 by paying fixed charges based on terms of the T&LF Agreement. The parties to
17 the T&LF Agreement who are the primary users of specific local facilities
18 generally are also owners of the facilities. In the case of joint use of a facility by
19 the parties, the owning party receives compensation through payment of charges
20 based on the parties’ loads imposed on such specific facility. Because WVPA and
21 IMPA own transmission and local facilities and pay for their allocated share of
22 operating and maintenance expenses through provisions of the T&LF Agreement,

DUKE ENERGY INDIANA 2024 BASE RATE CASE
DIRECT TESTIMONY OF MARIA T. DIAZ

1 Duke Energy Indiana's share of its investment in such facilities and related
2 operation and maintenance expenses including administrative and general costs,
3 and including the results of the reconciliation feature, are allocable to retail
4 customers in the jurisdictional separation study. Duke Energy Indiana's forecasted
5 JTS revenues were assigned 100% to retail, as the forecasted costs for Duke
6 Energy Indiana's share of JTS transmission services were assigned 100% to retail.

7 **Q. WHAT OTHER GENERATION STATION OWNERSHIP**
8 **ARRANGEMENTS ARE CURRENTLY IN EFFECT AND APPLICABLE**
9 **RELATING TO WHOLESALE PARTNERS AND HOW WERE SUCH**
10 **ARRANGEMENTS ADDRESSED IN THE PROCEEDING?**

11 A. Duke Energy Indiana, WVPA, and IMPA continue their arrangement in Gibson
12 Unit 5 whereby the parties are entitled to their respective shares of generating
13 capacity and output of Unit 5 equal to their respective ownership interests. Duke
14 Energy Indiana specifically owns 50.05% of Gibson Unit 5. Similarly, Duke
15 Energy Indiana owns 62.5% of Vermillion Generating Station with WVPA
16 owning the remainder. Capital costs and operation and maintenance costs are
17 divided based on ownership interests. Thus, the net plant in -service and the
18 associated operations and maintenance expenses, including administrative and
19 general costs, allocated to Duke Energy Indiana in the forecast for this proceeding
20 excludes WVPA's and IMPA's shares for Gibson Unit 5 and WVPA's share of
21 Vermillion station.

DUKE ENERGY INDIANA 2024 BASE RATE CASE
DIRECT TESTIMONY OF MARIA T. DIAZ

1 Q. WHAT IS THE NEXT STEP IN COMPLETION OF THE
2 JURISDICTIONAL SEPARATION STUDY?

3 A. After the allocator assignments are completed by each regulatory ledger account,
4 the next step is to compute the allocation calculation that allocates the plant costs
5 and expenses to the power production customers and the one steam customer. The
6 purpose behind this allocation is to separate out the customers and associated
7 costs that are not part of this proceeding. Thus, the customers that were treated as
8 wholesale and the one steam customer are considered non-jurisdictional for
9 purposes of this proceeding, while the retail electric customers and other retail
10 assignments are the jurisdictional customers and activity for purposes of this
11 proceeding.

12 Q. WHAT METHODOLOGY WAS USED TO ALLOCATE PRODUCTION
13 AND PRODUCTION RELATED PLANT COSTS AND EXPENSES IN
14 THE JURISDICTIONAL SEPARATION STUDY?

15 A. The 12 CP method was used for these allocations in Confidential Attachment 6-D
16 (MTD) Page 2 and 3.

17 Q. HAS DUKE ENERGY INDIANA UTILIZED THIS 12 CP
18 METHODOLOGY IN PREVIOUS RATE FILINGS?

19 A. Yes. As I previously mentioned, Duke Energy Indiana has used the 12 CP method
20 in at least 14 filings with the Commission since 1971. The Company also adopted
21 this approach for setting of rates in the wholesale resale market. Duke Energy
22 Indiana's historical wholesale formula production rates described previously are

DUKE ENERGY INDIANA 2024 BASE RATE CASE
DIRECT TESTIMONY OF MARIA T. DIAZ

1 priced annually on a 12 CP per the production peaks reported in the FERC Form
2 1. Similarly, review of the wholesale demands for the forecasted test period show
3 demands that lie within a narrow range of outcomes; *i.e.*, the annual load shape is
4 not spiky.

5 **Q. PLEASE CONTINUE DISCUSSING ATTACHMENT 6-D (MTD) AS IT**
6 **RELATES TO WHOLESALE.**

7 A. Page 1 of Confidential Attachment 6-D (MTD) identifies the wholesale portion of
8 the jurisdictional study separately in the wholesale column. Page 2 of the
9 Attachment shows the results of the allocation to wholesale of the following
10 production related assets: plant investment, inventories, and prepaid pension asset
11 to determine rate base. Next, Page 3 of the Attachment presents the results of the
12 allocation of production-related operations and maintenance (including
13 administrative and general expenses), depreciation and amortization, and taxes
14 other than income taxes. Confidential Workpapers JS-11 through -14-MTD from
15 Confidential Workpaper 1-MTD are the listing of regulatory general ledger
16 accounts and the respective allocator used per each account at the wholesale step
17 to derive the allocated amounts.

18 **Q. PLEASE CONTINUE DISCUSSING PETITIONER'S CONFIDENTIAL**
19 **ATTACHMENT 6-D (MTD) AS IT RELATES TO INCOME TAXES**
20 **ALLOCATED ACROSS THE STUDIES.**

21 A. Page 4 of the Attachment shows the results of the allocation of both Federal and
22 State deferred income taxes and the investment tax credit to determine income tax

1 expense. The allocation of current Federal and State income tax provisions and
2 the calculated current Federal and State taxes are shown in Confidential
3 Workpaper JS-14-MTD and summarized on Page 5 and 6 of the Attachment.

4 **V. RETAIL COST OF SERVICE STUDY**

5 **Q. ONCE THE JURISDICTIONAL SEPARATION STUDY IS COMPLETE,**
6 **WHAT IS THE NEXT STEP?**

7 A. After completion of the jurisdictional separation study, the Company can
8 complete the cost of service study for its retail customers using the total retail
9 customer amounts from the jurisdictional separation study.

10 **Q. PLEASE IDENTIFY THE DOCUMENT THAT HAS BEEN MARKED**
11 **FOR PURPOSES OF IDENTIFICATION AS CONFIDENTIAL**
12 **ATTACHMENT 6-E (MTD).**

13 A. Confidential Attachment 6-E (MTD) is a summary of the major allocation factors
14 by rate group for Duke Energy Indiana's retail electric customers, using historical
15 studies to develop the factors. The development of these major factors is the first
16 step in the completion of the retail cost of service study. The five major allocation
17 factors shown are:

- 18 (1) Allocated Share of System Peak – average of the 12 highest coincident
19 peaks (in kilowatts) at the generating station;
- 20 (2) Megawatt-hour (MWH) Plant Output Adjusted for Duke Energy Indiana
21 use at the generating station;
- 22 (3) Non-coincident Peak Demands (in kilowatts) at the customer's meter.

DUKE ENERGY INDIANA 2024 BASE RATE CASE
DIRECT TESTIMONY OF MARIA T. DIAZ

1 (4) Diversified Class Demand (in kilowatts) at the input to the Primary
2 Distribution System; and

3 (5) Delivery point number of customers.

4 **Q. PLEASE EXPLAIN WHAT THE TERMS “COINCIDENT PEAK**
5 **DEMAND,” “DIVERSIFIED CLASS DEMAND,” AND “NON-**
6 **COINCIDENT PEAK DEMAND” REPRESENT.**

7 A. The “coincident peak demand” is the electricity demand of the various customer
8 classes and rate groups at the time of the Duke Energy Indiana demand for a
9 given month. The “diversified class demand” is the peak electricity demand of the
10 class on the distribution system, regardless of when Duke Energy Indiana’s
11 electricity demand for the month occurs. Thus, the “diversified class demand”
12 accounts for the different load characteristics and the diversity of class demands
13 on the distribution system. The “non-coincident peak demand” is the highest peak
14 electricity demand for customers in a given period, regardless of the time of
15 occurrence.

16 **Q. PLEASE EXPLAIN HOW THE MWH ALLOCATOR WAS DEVELOPED.**

17 A. The first step is the accumulation of kilowatt-hours by month for each rate group
18 based on the billing system data. The rate group information is further broken
19 down by voltage level, secondary (under 600 volts), primary (600 volts to 34,500
20 volts), and transmission (over 34,500 volts) based on service voltage and then by
21 metered voltage. The transmission service customers are also broken down
22 between bulk (138,000 volts or higher) and common (69,000 volts). Next, the

DUKE ENERGY INDIANA 2024 BASE RATE CASE
DIRECT TESTIMONY OF MARIA T. DIAZ

1 metered kilowatt-hour data for the twelve-month period ended August 31, 2023,
2 was used to develop the kilowatt-hour requirement at the generating station by
3 rate group.

4 **Q. PLEASE EXPLAIN THE DIFFERENCE BETWEEN THE BULK**
5 **TRANSMISSION SYSTEM AND THE COMMON TRANSMISSION**
6 **SYSTEM.**

7 A. The bulk transmission system is comprised of transmission facilities with the
8 voltage of 138,000 volts or higher, whereas the common transmission system is
9 comprised of transmission facilities with a voltage of 69,000 volts. The
10 transmission facilities are discussed in more detail by Duke Energy Indiana
11 witness Mr. Abbott.

12 **Q. HOW WAS THE “ALLOCATED SHARE OF SYSTEM PEAK,”**
13 **“MAXIMUM NON-COINCIDENT DEMANDS,” AND “DIVERSIFIED**
14 **CLASS DEMAND” OBTAINED?**

15 A. The kilowatt data is broken down in the same groups as the kilowatt-hour data
16 previously discussed. The respective demands by type above were supplied as
17 follows:

18 (1) The demands for all customer classes and rate groups that have interval
19 meters per the customer's service agreement level were obtained from the
20 Duke Energy Indiana load research department. In lieu of statistically
21 designed samples, the statistics are based on interval metered data for the
22 majority of the population. With the implementation of advanced metering

DUKE ENERGY INDIANA 2024 BASE RATE CASE
DIRECT TESTIMONY OF MARIA T. DIAZ

1 infrastructure (“AMI”), the Company obtained interval metered data for
2 approximately 99% of the data available for the customers and estimated
3 1% of the unavailable metered data to capture the full population.

4 (2) The twelve-month period ended August 31, 2023 was the population used.

5 **Q. PLEASE DESCRIBE YOUR UNDERSTANDING OF THE 12 CP**
6 **DEMANDS FOR THIS RETAIL RATE CASE, AND THE RELEVANCE**
7 **OF THE FERC ALLOCATION GUIDELINES FOR PRODUCTION AND**
8 **TRANSMISSION-DEMAND RELATED COSTS.**

9 A. The 12 CP peak period average used was the coincident peak in each of the 12
10 months ended August 31, 2023, based on the Company’s production peaks. From
11 the historical data applicable to this rate case, load research supplied the retail
12 demands by detailed rate code as included in the cost of service study for the
13 twelve-month period ended August 31, 2023.

14 As a frame of reference, the FERC primarily relies on three system
15 demand tests when determining which coincident peak method is supported by
16 the record. FERC applies established thresholds to the results of these tests to
17 assess whether a customer’s allocation of the demand costs should be based on a
18 12 CP or another methodology.

19 The first test, the “Low to Annual Peak” test, calculates the relationship of
20 the lowest monthly peak as a percentage of the annual peak. Under the Low to
21 Annual Peak test, a range of sixty-six (66%) or higher supports the use of a 12 CP
22 method. Duke Energy Indiana did not pass this first 12 CP test for the historical

DUKE ENERGY INDIANA 2024 BASE RATE CASE
DIRECT TESTIMONY OF MARIA T. DIAZ

1 period as it achieved a 59%. The second test is the “Average to Annual Peak” test,
2 which computes the average of the twelve-monthly peaks as percentage of the
3 annual peak. Under the Average to Annual Peak test, a range of eighty-one (81%)
4 or higher supports the use of the 12 CP method. Duke Energy’s Indiana’s monthly
5 load characteristics for the twelve-month period ended August 31, 2023 of 80.8%
6 was very close to passing this second 12 CP test. The third test is the “On and Off
7 Peak” test, which compares the average of the system peaks during the peak
8 period, as a percentage of the annual peak, to the average of the system peaks
9 during the off-peak months, as a percentage of the annual peak. Under the On and
10 Off-Peak test, a 19% or less difference between these two figures supports the use
11 of the 12 CP method (using the highest 4 CP months as the peaks and the 8 CP
12 months as the valleys in the calculation). Duke Energy Indiana’s load
13 characteristics for the twelve-month period ended August 31, 2023, resulted in
14 20.5%, also close to passing this third 12 CP test.

15 There is not a steadfast rule for determining which demand allocation is
16 appropriate. The FERC tests are a consideration along with other decision points.

17 **Q. GIVEN THE RESULTS OF THE FERC TESTS, WHY DID THE**
18 **COMPANY PROCEED WITH THE 12 CP ALLOCATION**
19 **METHODOLOGY?**

20 A. The Company selected 12 CP in this proceeding to reflect one of the five pillars
21 established in Indiana’s Energy Policy Framework, Affordability. Affordability is
22 a critical metric for Duke Energy Indiana and will continue to be important for the

DUKE ENERGY INDIANA 2024 BASE RATE CASE
DIRECT TESTIMONY OF MARIA T. DIAZ

1 Company as it focuses on attracting and maintaining customers in its service
2 territory. Had the 4 CP methodology been selected, the residential rate increase
3 would have exceeded 20% as shown in Confidential Workpaper COSS-16-MTD
4 of the 4 CP series of workpapers included in Confidential Workpaper 2-MTD, or
5 a 1.5% difference relative to the 12 CP methodology. The 4 CP study was
6 prepared in the same manner as the 12 CP study, with the difference between
7 these two scenarios due to the allocation of 4 CP for production and transmission
8 plant instead of 12 CP.

9 **Q. WHAT IS IMPACTING THE DIFFERENCE IN THE CP DEMANDS**
10 **ACROSS THE CLASSES?**

11 A. The twelve-month period ended August 31, 2023 was impacted by extreme
12 weather (Winter Storm Elliott), which occurred in December of 2022. By using a
13 12 CP average, the impact of extreme weather is not as impactful to demand
14 allocation results compared to if the average of the 4 highest CPs had been
15 selected that included the month of extreme weather. Because the forecast
16 provided by Company witness Mr. Rutledge assumes normal weather, the
17 selection of multiple actual months using the 12 CP methodology for setting the
18 demand allocators is reasonable.

19 **Q. WHAT OTHER CONSIDERATIONS SUPPORTED THE SELECTION OF**
20 **A 12 CP ALLOCATION FOR PRODUCTION AND TRANSMISSION?**

21 A. In the Order in Cause No. 45253, the Commission stated that MISO establishes
22 capacity requirements based on peak demand and reserve criteria. One of the key

DUKE ENERGY INDIANA 2024 BASE RATE CASE
DIRECT TESTIMONY OF MARIA T. DIAZ

1 functions of MISO is that there is enough available generation to meet peak
2 demand at all times. In the Fall of 2022, MISO began determining adequacy of
3 resources on a seasonal (summer, fall, winter, spring), rather than an annual basis.
4 This multi-season construct influenced Duke Energy Indiana's selection of a 12
5 CP for production in this retail rate case. Further, for transmission, Duke Energy
6 Indiana installs its facilities to maintain its reliability constant throughout the year
7 such that 4 CP peak demands are not of any greater importance than any of the
8 other monthly coincident peak demands, also supporting the use of a 12 CP for
9 the transmission function.

10 In summary, the Company adopted the practical approach of a 12 CP
11 demand allocation for production and transmission after the consideration of
12 affordability in this case. The Company does not seek to significantly impact one
13 class of retail customers' rate increases such as weather-sensitive residential
14 customer classes, while unduly benefitting other classes of customers due to the
15 occurrence of extreme weather in a single peak period impacting the calculation
16 of the demands which are limited to only four peak hours of demand. Instead, the
17 Company aims for gradualism of the rate changes across the classes in its rate
18 cases, and the use of the 12 CP demand allocation for production and transmission
19 accomplishes that objective for this retail rate case.

DUKE ENERGY INDIANA 2024 BASE RATE CASE
DIRECT TESTIMONY OF MARIA T. DIAZ

1 Q. PLEASE EXPLAIN HOW THE DELIVERY POINT NUMBER OF
2 CUSTOMERS WAS DEVELOPED.

3 A. The delivery point number of customers was sourced from the Company's billing
4 system with adjustments for the average number of customers, using a twelve-
5 month period ended August 31, 2023.

6 Q. PLEASE EXPLAIN THE APPROACH UTILIZED IN THE COMPANY'S
7 COST OF SERVICE STUDY FOR DETERMINING THE COMPANY'S
8 COST OF SERVICE FOR ITS RETAIL ELECTRIC SALES.

9 A. The study is completed using equitable and reasonable allocation methodologies.
10 The methods for allocation used in this proceeding were not changed from the
11 methods used in Duke Energy Indiana's last retail base rate case except for the 12
12 CP method change previously explained for production and transmission.

13 The allocation of investment, operating expenses, and taxes to the retail
14 customer classes and rate groups produces Duke Energy Indiana's retail revenue
15 requirement. There are four (4) major classifications of functionalized costs and
16 allocation factors:

17 (1) Demand-related production and transmission costs that are
18 allocated based on the customers' coincident peak demands – their
19 electricity demand that occurs at the time of the Duke Energy
20 Indiana demand, as adjusted to the busbar of the generating plant
21 using updated loss factors supplied by engineering.

DUKE ENERGY INDIANA 2024 BASE RATE CASE
DIRECT TESTIMONY OF MARIA T. DIAZ

1 (2) Energy-related production costs that are allocated based on the
2 customers' energy requirements, as adjusted to the busbar level of
3 the generating plant using updated loss factors supplied by Duke
4 Energy Indiana's engineering department.

5 (3) Facility-related distribution costs that are allocated based on the
6 customers' diversified class electricity demand, non-coincident
7 peak electricity demands, or directly assigned to a customer.

8 (4) Connection-related costs that are allocated based on non-
9 coincident peak demands, the number of customers, or on delivery
10 point number of customers.

11 **Q. PLEASE PROVIDE EXAMPLES OF EACH OF THE FOUR (4)**
12 **CLASSIFIED COSTS AT THE RETAIL COST OF SERVICE STUDY**
13 **LEVEL.**

14 A. An example of demand-related costs would be the investment in the transmission
15 system and the corresponding operation and maintenance expenses. The sizing of
16 such facilities is determined by the expected load of Duke Energy Indiana's
17 customers on the facility; it is not related to the energy requirement or the number
18 of customers.

19 As mentioned previously, fuel expense and fuel inventories are common
20 examples of energy-related costs. These items are dependent upon the amount of
21 energy consumed, not the customers' demands or the number of customers.

DUKE ENERGY INDIANA 2024 BASE RATE CASE
DIRECT TESTIMONY OF MARIA T. DIAZ

1 An example of a facility-related cost would be the investment and
2 expenses for distribution substations. Duke Energy Indiana's substations are
3 designed to meet the expected Duke Energy Indiana load, and thus, are allocated
4 based on the customers' diversified class electricity demand.

5 An example of a connection-related cost would include investment and
6 expenses for electric meters and customer accounts. These items are related to the
7 number of customers or to the customers' non-coincident peak electricity demand;
8 the facilities are sized for the individual peak electricity loads. The Company also
9 filed a 12 CP cost of service study scenario that identified a portion of the costs
10 for distribution lines and poles based on the minimum system study completed by
11 Witness Rimal that are customer-related. The results of this scenario, Confidential
12 Workpaper 3-MTD, was provided to rate design for evaluation of setting rates for
13 customer charges as discussed in the testimony of Company witness Mr. Flick.

14 **Q. DOES DUKE ENERGY INDIANA'S FORECAST REFLECT THE**
15 **ALLOCATION OF THE VARIOUS ACCOUNTS TO THE FOUR (4)**
16 **MAIN CATEGORIES OF CLASSIFIED COSTS?**

17 A. The accounts in the forecast were the starting point for the classification but when
18 certain accounts are related to more than one of the classifications, specific
19 analysis, studies, and judgment are used to separate the individual components.

20 An example of such separation is the breakdown of power production
21 operation and maintenance between demand and energy components. The demand
22 and energy components of Duke Energy Indiana's total power production

DUKE ENERGY INDIANA 2024 BASE RATE CASE
DIRECT TESTIMONY OF MARIA T. DIAZ

1 expenses were determined based on the historical twelve-month period ended
2 August 31, 2023. A review of the total operation and maintenance expenses was
3 performed by classifying the labor related portion of these expenses as demand
4 related and the rest energy related as shown in Confidential Workpaper-10-MTD.
5 From that analysis, the percentages were input into the regulatory ledger model by
6 forecasted account, and the model calculated the demand and energy account
7 balances for further processing in the cost of service study.

8 Another example is the separation of distribution line investment between
9 primary and secondary lines performed by the Duke Energy Indiana customer
10 delivery department. A listing of the type of equipment contained in the plant
11 records was analyzed and the property units were split by primary and secondary
12 voltages.

13 **Q. DID THE COMPANY DIRECT ASSIGN COSTS TO SPECIFIC RATE**
14 **CLASSES?**

15 A. Yes, facilities and equipment constructed and used by a specific customer were
16 direct assigned and allocated to a single class, or even a single customer if the
17 single customer has its own rate code (*i.e.* specific property). An example of such
18 a facility is a distribution substation that is dedicated exclusively to serving a
19 specific customer. The other types of specific property are transmission radial tap
20 lines and distribution substations.

DUKE ENERGY INDIANA 2024 BASE RATE CASE
DIRECT TESTIMONY OF MARIA T. DIAZ

1 Q. HOW WAS SPECIFIC PROPERTY IDENTIFIED AND ADMINISTERED
2 IN THE RETAIL COST OF SERVICE STUDY?

3 A. The Company's billing system was used to compile a specific property listing,
4 which identified retail customers served directly at a transmission voltage or from
5 a dedicated substation at a primary voltage. The specific property listing was
6 provided to the Company's large business account representatives for review,
7 verification, and updating. Corresponding single-line schematics since the last
8 rate case in Cause No. 45253 were also reviewed to ensure the configuration of
9 the facility or equipment was for a specific customer and not a networked facility
10 or line. After the specific property was identified and the cost developed using the
11 fixed asset system which also included developing a walk-up of fixed assets as of
12 August 31, 2023 through the end of the forecasted test year as described by
13 Company witness Ms. Lilly, the assignment of the specific property to the specific
14 customer or single class was accomplished by use of specific property allocators.
15 Confidential Workpaper 11-MTD shows the specific property listings used for
16 cost assignment.

17 Q. WHAT IS THE NEXT STEP IN THE COMPLETION OF THE RETAIL
18 COST OF SERVICE STUDY?

19 A. Once the allocation factors are complete, the actual allocation of plant investment
20 and expenses can be performed. The allocation factors are applied to the rate base
21 investment and expenses derived from the jurisdictional separation study
22 discussed previously. The allocation factors are listed in Confidential Workpaper

DUKE ENERGY INDIANA 2024 BASE RATE CASE
DIRECT TESTIMONY OF MARIA T. DIAZ

1 COSS-1-MTD, which shows the name of the allocation factor and the percentages
2 assigned by rate code.

3 **Q. PLEASE IDENTIFY THE DOCUMENT MARKED FOR PURPOSES OF**
4 **IDENTIFICATION AS CONFIDENTIAL ATTACHMENT 6-F (MTD)**
5 **PAGE 1.**

6 A. Confidential Attachment 6-F (MTD) Page 1 is the resulting allocation of the *pro*
7 *forma* original cost depreciated plant as of December 31, 2025, to the retail
8 customers by rate group, sourced from Confidential Workpapers COSS-21
9 through -29- MTD included in Confidential Workpaper 1-MTD. This Attachment
10 shows the plant by major functional component. There were no material changes
11 in allocation methodologies from those approved in the last retail rate case for rate
12 base, other than the change to 12 CP for production and transmission as it
13 impacted the rate groups.

14 **Q. PLEASE IDENTIFY THE DOCUMENT THAT HAS BEEN MARKED**
15 **FOR PURPOSES OF IDENTIFICATION AS CONFIDENTIAL**
16 **ATTACHMENT 6-F (MTD) PAGES 2 AND 3.**

17 A. Pages 2 and 3 of Confidential Attachment 6-F (MTD) are the resulting allocation
18 of the *pro forma* operating expenses, excluding income taxes for the test period
19 ended December 31, 2025, to the retail customers by rate group. The Attachment
20 shows the functionalized components of operation and maintenance expense
21 inclusive of administrative and general expense and revenue credits, other taxes,
22 and depreciation expense. There were no material changes in allocation

DUKE ENERGY INDIANA 2024 BASE RATE CASE
DIRECT TESTIMONY OF MARIA T. DIAZ

1 methodologies from those approved in the last retail rate case for operating
2 expenses, other than the change to 12 CP for production and transmission as it
3 impacted the rate groups. Page 2 was sourced from Confidential Workpapers
4 COSS-21 through -29-MTD and Page 3 was sourced from Confidential
5 Workpaper COSS-4-MTD, included in Confidential Workpaper 1-MTD.

6 **Q. WHAT IS THE NEXT STEP IN THE COMPLETION OF THE RETAIL
7 COST OF SERVICE STUDY?**

8 A. The last step in the retail cost of service study involves the allocation of deferred
9 income taxes and investment tax credits (net). Following these allocations, the
10 current State and Federal income taxes is calculated. Net operating income is then
11 calculated by subtracting the operating expenses (including the State and Federal
12 income taxes), from the operating revenues received from each retail rate group.

13 **Q. PLEASE IDENTIFY THE DOCUMENT THAT HAS BEEN MARKED
14 FOR PURPOSES OF IDENTIFICATION AS CONFIDENTIAL
15 ATTACHMENT 6-G (MTD) PAGE 1.**

16 A. Confidential Attachment 6-G (MTD) Page 1 is the summary of the retail cost of
17 service study at present rates including *pro formas*. This schedule shows the
18 original cost depreciated rate base, electric operating revenues, total operating
19 expenses, net operating income, and rate of return by retail rate group.

20 **Q. REFERRING YOU TO CONFIDENTIAL ATTACHMENT 6-D (MTD)
21 PAGE 1, WHICH FIGURES WERE USED IN THE ANALYSIS OF THE
22 COMPANY'S COST OF SERVICE TO ITS RETAIL CUSTOMERS?**

DUKE ENERGY INDIANA 2024 BASE RATE CASE
DIRECT TESTIMONY OF MARIA T. DIAZ

1 A. The last column of Confidential Attachment 6-D (MTD) Page 1, labeled “Total
2 Retail Customers”, was used in the retail cost of service study, which is the
3 summarized version of Confidential Attachment 6-G (MTD) Page 1, as
4 previously identified.

5 **Q. PLEASE IDENTIFY THE DOCUMENT THAT HAS BEEN MARKED**
6 **FOR PURPOSES OF IDENTIFICATION AS CONFIDENTIAL**
7 **ATTACHMENT 6-G (MTD) PAGE 2.**

8 A. Confidential Attachment 6-G (MTD) Page 2, which is sourced from Confidential
9 Workpaper COSS-18-MTD included in Confidential Workpaper 1-MTD, shows:
10 (1) the results of the 12 CP retail cost of service study in labeled, Columns A
11 through F; (2) the Company’s proposal to more fully reflect its cost of service in
12 Columns G thru I; (3), the proposed rate increase in Column J; and (4) the
13 adjusted results of the retail cost of service study, after reflecting the proposed
14 subsidy/excess reduction (discussed below) in Columns K thru M, and the
15 resulting, net proposed rate increase percentages in Column O. The drivers for the
16 overall 16.2% proposed rate increase reflected on this schedule are discussed by
17 Company witness Ms. Graft.

18 **Q. PLEASE DISCUSS THE SUBSIDY/EXCESS REVENUES BETWEEN**
19 **RATE GROUPS AND HOW ITS PROPOSED MOVEMENT WAS USED**
20 **IN THIS PROCEEDING.**

DUKE ENERGY INDIANA 2024 BASE RATE CASE
DIRECT TESTIMONY OF MARIA T. DIAZ

1 A. A review of the four major rate groups shows the variation in current levels of
2 subsidy/excess revenues. The amounts below, are from Columns G and H (H
3 divided by G) of Petitioner's Confidential Attachment 6-G (MTD) Page 2:

4 Rate RS: 6.8% Subsidy
5 Rate CS: 11.4% Subsidy
6 Rate LLF: 0.06% Excess
7 Rate HLF: 14.6% Excess

8 The amount of subsidy/excess reduction was determined based on the Company's
9 strategic objective of affordability, as explained by Duke Energy Indiana witness
10 Mr. Pinegar. The concept of gradualism provides that the variability be reduced
11 across the rate groups so as to converge the rate groups closer to the average rate
12 of return while being cognizant of how the reduction in the subsidy/excess in a
13 given rate case impacts the proposed rate increase across the classes.

14 **VI. COST ALLOCATION TO SPECIAL CONTRACTS**

15 **Q. WHICH SPECIAL CONTRACTS WILL BE EFFECTIVE DURING THE**
16 **TEST PERIOD THAT REQUIRED SPECIAL HANDLING IN THE COST**
17 **OF SERVICE STUDY?**

18 A. Special Contract 01, (the subparts of the contract identified as Special Contract
19 01-A or "SP01-A" and Special Contract 01-B or "SP01-B") and Special Contract
20 03,) identified as Special Contract 03 or "SP03") required special handling in the
21 cost of service study. Also, in the revenue requirements model output is Special
22 Contract 02; the cost of service study reports Special Contract 02 as part of the

DUKE ENERGY INDIANA 2024 BASE RATE CASE
DIRECT TESTIMONY OF MARIA T. DIAZ

1 HLF group of customers for rate design purposes. Special Contract 04 will also be
2 effective during the test period.

3 **Q. WHAT COST ALLOCATION CRITERIA WAS USED FOR THE**
4 **SPECIAL CONTRACTS?**

5 A. The cost of service study either 1.) assigned costs based on the measurable and
6 predictable components of a customer's service; or 2.) if the nature of the
7 services and quantities were contractually categorized as non-firm, were
8 interruptible or, exhibited variability, costs to serve were not assigned and instead
9 a supportable level of revenues as revenue credits were established within the cost
10 of service study to offset other costs of service. For example, cost allocation to the
11 firm portions of Special Contract 02 and Special Contract 03 occurred in the cost
12 of service study; the non-firm portions were treated as a revenue credit and
13 functionalized as shown in Company witness Ms. Sieferman's Workpaper REV7.

14 **Q. WHAT ADDITIONAL ALLOCATION STEP OCCURRED FOR SPECIAL**
15 **CONTRACT 02?**

16 A. The pricing for the transmission portion of the contract is based on <BEGIN
17 **CONFIDENTIAL**> [REDACTED] <END CONFIDENTIAL> and the
18 transmission revenues were treated as revenue credits instead of cost assignment.

19 **Q. HOW WERE SP01-A AND SP01-B ADMINISTERED IN THE COST OF**
20 **SERVICE STUDY?**

21 A. The cost of service utilized the rate-making treatment that resulted from Special
22 Contract 01. SP01-A, which represents this customer's <BEGIN

DUKE ENERGY INDIANA 2024 BASE RATE CASE
DIRECT TESTIMONY OF MARIA T. DIAZ

1 **CONFIDENTIAL**> [REDACTED] <END

2 **CONFIDENTIAL**>, and SP01-B, which represents the <BEGIN

3 **CONFIDENTIAL**> [REDACTED] <END

4 **CONFIDENTIAL**>, received cost assignment.

5 In the Commission proceeding, the Company proposed to treat <BEGIN

6 **CONFIDENTIAL**> [REDACTED]

7 [REDACTED] <END CONFIDENTIAL>. Thus, the Company removed these

8 revenues included in the Company forecast to non-jurisdictional by *pro-formas*

9 supported by Company witness Ms. Sieferman in Schedule REV3. Company

10 witness Ms. Graft also removed the offsetting miscellaneous expenses as non-

11 jurisdictional, on Schedule COGS4. *Proformas* to remove the fuel revenues and

12 fuel costs above the <BEGIN CONFIDENTIAL> [REDACTED] <END

13 **CONFIDENTIAL**> are sponsored by Company witnesses Ms. Sieferman and

14 Ms. Graft in Schedule REV3 and Schedule COGS4, respectively of Attachment

15 26-C. There were regulatory adjustments prepared to reconcile to the forecast as

16 shown in the revenue requirement's Workpaper OPIN-1 (lines 11, 12, 13, 19, 26,

17 27,). The *proformas* and the regulatory adjustments served as inputs to the cost of

18 service study.

19 The special contract stated that Duke Energy Indiana <BEGIN

20 **CONFIDENTIAL**> [REDACTED]

21 [REDACTED] <END CONFIDENTIAL>. Thus, the

22 Company eliminated the subsidy to this customer in this retail rate case

DUKE ENERGY INDIANA 2024 BASE RATE CASE
DIRECT TESTIMONY OF MARIA T. DIAZ

1 proceeding and allocated the removal of the subsidy to other retail customers as
2 shown on Confidential Workpaper COSS-11-MTD included in Confidential
3 Workpaper-1-MTD.

4 **Q. HOW WAS SPECIAL CONTRACT 04 ADMINISTERED IN THE COST**
5 **OF SERVICE STUDY?**

6 A. The cost of service study utilized the rate-making treatment that resulted from
7 Special Contract 04. There was no production cost allocation for this special
8 contract in the cost of service study as Company resources are not used to supply
9 this customer.

10 The Company proposed to treat certain <BEGIN
11 **CONFIDENTIAL**> [REDACTED] <END
12 **CONFIDENTIAL**>. For this retail rate case proceeding, the Company removed
13 these revenues included in the Company forecast to non-jurisdictional, the results
14 of which are incorporated in Company witness Ms. Sieferman's Schedule REV4
15 from Attachment 26-C and fed the cost of service study.

16 The Company also removed the revenues (included in Company witness
17 Ms. Sieferman's Schedule REV4) and fuel costs (Company witness Ms. Graft's
18 Schedule COGS5) in Attachment 26-C, from the Company's forecast associated
19 with the construction period prior to the special contract taking effect, as these
20 activities are non-recurring, which fed the cost of service study. Forecast
21 adjustments on Workpaper OPIN-1 (lines 8, 28, and 29) were also prepared by

DUKE ENERGY INDIANA 2024 BASE RATE CASE
DIRECT TESTIMONY OF MARIA T. DIAZ

1 revenue requirements due to the presentation of the net margin as revenues in the
2 Company forecast.

3 **Q. PLEASE EXPLAIN THE COMPANY'S PROPOSAL FOR**
4 **TRANSMISSION REVENUES TO BE COLLECTED FROM THE**
5 **SPECIAL CONTRACT 04 CUSTOMER AND TRANSMISSION COST**
6 **ASSIGNMENT TO THE CUSTOMER.**

7 A. The Company also removed the transmission revenues (included in Company
8 witness Ms. Sieferman's Schedule REV4 in Attachment 26-C) assumed in the
9 Company's forecast for this special contract. Upon the special contract taking
10 effect, the Company will invoice the customer and collect certain transmission
11 revenues based on <BEGIN CONFIDENTIAL> [REDACTED] <END
12 CONFIDENTIAL>. The Company proposes to provide credits to retail
13 customers for these transmission revenues in future TDSIC rider filings until the
14 next rate case proceeding, wherein the Company will evaluate whether to
15 continue tracking through the TDSIC rider or alternatively, propose inclusion of a
16 representative credit in base rates. As such, there was no transmission cost
17 assignment to this customer in this retail rate case proceeding.

18 **Q. HOW WERE SPECIAL CONTRACT 04 REVENUE ADJUSTMENTS**
19 **ALLOCATED TO THE RATE CODES?**

20 A. The revenue adjustments, which fed the cost of service study, were spread to the
21 retail rate codes based on forecasted kilowatt-hours as presented on Company

DUKE ENERGY INDIANA 2024 BASE RATE CASE
DIRECT TESTIMONY OF MARIA T. DIAZ

1 witness Ms. Sieferman's Workpaper REV4 because this special contract was not
2 specifically classified in a particular rate group in the Company's forecast.

3 **VII. STEP 1 RATE ADJUSTMENT JURISDICTIONAL**
4 **SEPARATION AND COST OF SERVICE STUDIES**

5 **Q. PLEASE DESCRIBE THE ADDITIONAL ANALYSIS YOU COMPLETED**
6 **RELATED TO THE TWO-STEP RATE ADJUSTMENT.**

7 A. In addition to the test year jurisdictional separation study and cost of service
8 studies, additional workpapers were completed in support of the Company's
9 proposed two-step ratemaking process as it impacts the results of the
10 jurisdictional separation study and cost of service study (Confidential Workpaper
11 4-MTD). These additional workpapers were prepared in a manner that is
12 consistent with the test year studies. The differences between these additional
13 workpapers and the test year studies are due to the additional *proformas* provided
14 by Company witnesses Ms. Sieferman and Ms. Lilly which were used to create
15 the additional scenario. A calculation was also performed due to updating
16 wholesale allocation factors to recognize that the two wholesale contracts that
17 expire at the end of 2025 remain in place as of the cut-off period for Step 1,
18 requiring a credit to retail customers as part of Rider 67. A summary of this
19 calculation is shown in Confidential Workpaper 16-MTD.

20 **VIII. CONCLUSION**

21 **Q. WERE CONFIDENTIAL ATTACHMENTS 6-A (MTD) THROUGH 6-G**
22 **(MTD) PREPARED BY YOU OR AT YOUR DIRECTION?**

23 A. Yes, they were.

**DUKE ENERGY INDIANA 2024 BASE RATE CASE
DIRECT TESTIMONY OF MARIA T. DIAZ**

Q. DOES THIS CONCLUDE YOUR PREFILED DIRECT TESTIMONY?

1 **A.** Yes, it does.

VERIFICATION

I hereby verify under the penalties of perjury that the foregoing representations are true to the best of my knowledge, information and belief.

Signed: *Maria T. Diaz*
Maria T. Diaz

Dated: ___ April 4, 2024 ___

**Confidential Attachment 6-A (MTD) through Confidential
Attachment 6-G (MTD)**

[Confidential Attachments]