

September 15, 2016

VIA OVERNIGHT MAIL

Doreen Friis
Regulatory Affairs Officer/Clerk
Nova Scotia Utility and Review Board
3rd Floor
1601 Lower Water Street
P.O. Box 1692, Unit "M"
Halifax, Nova Scotia B3J 3S3

Re: *North American Electric Reliability Corporation*

Dear Ms. Friis:

The North American Electric Reliability Corporation hereby submits Notice of Filing of the North American Electric Reliability Corporation of its 2017 Business Plan and Budget and the 2017 Business Plans and Budgets of Regional Entities and of Proposed Assessments to Fund Budgets.

Please contact the undersigned if you have any questions concerning this filing.

Respectfully submitted,

/s/ Holly A. Hawkins

Holly A. Hawkins
*Associate General Counsel for the North
American Electric Reliability Corporation*

Enclosure

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**BEFORE THE
NOVA SCOTIA UTILITIES AND REVIEW BOARD
THE PROVINCE OF NOVA SCOTIA**

**NORTH AMERICAN ELECTRIC)
RELIABILITY CORPORATION)**

**NOTICE OF FILING OF THE
NORTH AMERICAN ELECTRIC RELIABILITY CORPORATION
OF ITS 2017 BUSINESS PLAN AND BUDGET AND
THE 2017 BUSINESS PLANS AND BUDGETS OF REGIONAL ENTITIES
AND OF PROPOSED ASSESSMENTS TO FUND BUDGETS**

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ATTACHMENTS

Attachment 1: Summary tables showing NERC’s proposed 2017 budget; the proposed 2017 budget for statutory activities of each Regional Entity; and the 2017 Canadian ERO statutory assessments of NERC and the Regional Entities.

Attachment 2: NERC’s Proposed 2017 Business Plan and Budget

Attachment 3: Northeast Power Coordinating Council, Inc. Proposed 2017 Business Plan and Budget

Attachment 4: Discussion of Comments Received During Development of NERC’s 2017 Business Plan and Budget.

Attachment 5: Calculation of Adjustments to the AESO 2017 NERC Assessment, the IESO 2017 NERC Assessment, the New Brunswick 2017 Assessment and the Québec 2017 NERC Assessment.

Attachment 6: Metrics Comparing Regional Entity Operations Based on the 2017 Budgets

Attachment 7: Metrics on NERC and Regional Entity Administrative (Indirect) Costs Based on the 2016 and 2017 Budgets

I. INTRODUCTION

The North American Electric Reliability Corporation (NERC) submits:

- (1) NERC's proposed Business Plan and Budget as the electric reliability organization (ERO), for the year ending December 31, 2017;
- (2) the proposed Business Plans and Budgets for the year ending December 31, 2017, and for the Northeast Power Coordinating Council, Inc. (NPCC); and
- (3) NERC's proposed allocation of the proposed ERO statutory assessment of NERC, the Regional Entities, and the Western Interconnection Regional Advisory Body (WIRAB) by country and among the Regional footprints, and the proposed assessments to the load-serving entities (LSE) within each Region to collect the allocated statutory funding requirements.

This filing includes the following attachments:

Attachment 1 is a set of summary tables showing (i) NERC's proposed 2017 budget by program, (ii) the proposed 2017 budget for statutory activities of each Regional Entity, and (iii) the aggregate ERO statutory assessment of NERC and the Regional Entities allocated to the U.S., for which approval is requested.

Attachment 2 contains NERC's detailed 2017 Business Plan and Budget and the allocation of assessments by Region and LSE to recover the resulting statutory funding requirements for 2017 (as well as the assessments to recover the statutory funding requirements of the Regional Entities and WIRAB).

Attachment 3 contains the detailed 2017 Business Plans and Budgets of NPCC.

Attachment 4 describes how comments submitted by interested entities on posted drafts of NERC's 2017 Business Plan and Budget during the budgeting process were addressed in developing the final 2017 Business Plan and Budget.

Attachment 5 contains the calculation of the adjustment to the Alberta Electric System Operator (AESO) 2017 NERC assessment, the adjustment to the Ontario Independent Electric System Operator (IESO) 2017 NERC assessment, the adjustment to the New Brunswick 2017 NERC assessment, and the adjustment to the Québec 2017 NERC assessment, for credits for certain NERC Compliance Program and Event Analysis and Situation Awareness Program costs.

Attachment 6 provides metrics, based on the 2017 budgets, comparing Regional Entity operations.

Attachment 7 contains metrics, based on the 2016 and 2017 budgets, on NERC and Regional Entity administrative (indirect) costs.

The filing contains the ERO's proposed entire annual budget for statutory and non-statutory activities for the ERO's fiscal year. NERC's 2017 fiscal year will begin January 1,

2017. The filing contains the entire annual budget of the relevant Regional Entity for statutory and non-statutory activities and include supporting materials, including the ERO's and the Regional Entity's complete business plan and organization chart, and explanation of the proposed collection of all dues, fees and charges and the proposed expenditure of funds collected.

II. NOTICES AND COMMUNICATIONS

Notices and communications concerning this filing may be addressed to:

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III. OVERVIEW OF PROPOSED BUDGETS AND FUNDING REQUIREMENTS

A. NERC's Proposed Business Plan, Budget and Funding Requirement

1. Organization of NERC's 2017 Business Plan and Budget

In this filing NERC provides notice of its 2017 Business Plan and Budget. NERC's 2017 Business Plan and Budget is organized based on its statutory program areas:

- Reliability Standards
- Compliance Monitoring and Enforcement and Organization Registration and Certification; this program is comprised of three departments:
 - Compliance Assurance
 - Compliance Analysis, Certification and Registration

- Compliance Enforcement
- Reliability Assessment and System Analysis (RASA)
- Performance Analysis
- Reliability Risk Management (RRM); this program is comprised of two departments:
 - Situation Awareness Department
 - Event Analysis Department
- Electricity Information Sharing and Analysis Center (E-ISAC), including the Cyber Risk Information Sharing Program (CRISP)
- Training, Education, and Operator Certification

Each of these program areas carries out or supports implementation of one or more of the statutory activities of the ERO as specified in §215 of the U.S. Federal Power Act (“FPA”) and the Federal Energy Regulatory Commission’s (“FERC”) regulations and orders.¹ Detailed explanations of the functions and activities performed by each of these programs is provided in the individual subsections of Section A of **Attachment 2** where the detailed plans, objectives and activities for each program or group in 2017, and its 2017 budget, are discussed.

NERC’s statutory, or “direct,” programs are supported by its Administrative Services, or “indirect,” programs: Technical Committees and Member Forums,² General and Administrative, Legal and Regulatory, Information Technology (IT), Human Resources (HR), and Finance and Accounting. The functions and activities of each Administrative Services program are described in the individual sections on each indirect program, and in Exhibit B, to **Attachment 2**.

¹ Exhibit B to the 2017 Business Plan and Budget (**Attachment 2**) describes how the major activities in the 2017 Business Plan and Budget meet the criteria for determining whether a reliability activity is eligible to be funded under FPA §215. FERC approved the FPA §215 criteria (with modifications to the criteria originally proposed by NERC) in *North American Electric Reliability Corporation, Order on Compliance*, 143 FERC ¶ 61,052 (2013) (*FPA §215 Criteria Order*).

² No activities are planned and no budget is requested for Technical Committees and Member Forums.

In its 2017 Business Plan and Budget, NERC has continued to provide a high level of granularity in the presentation of its planned activities and budgeted expenditures:

- Individual budgets and the related supporting information are presented for a total of ten statutory programs or departments.
- As it has done beginning with its 2013 Business Plan and Budget, in Section A of its 2017 Business Plan and Budget (**Attachment 2**), NERC has provided a discussion of each program's or department's current activities and its 2017 goals and deliverables, as well as additional detail concerning the staffing and Consultants and Contracts Expenses (if any) budgeted for the program or department.
- Also as it has done beginning with its 2013 Business Plan and Budget, in Exhibit C of the 2017 Business Plan and Budget (**Attachment 2**), NERC has provided information on the activities and projects within each of the statutory programs and groups and Administrative Services departments for which Consultants and Contracts expense is budgeted.
- In Exhibit D of the 2017 Business Plan and Budget (**Attachment 2**), NERC has provided information on its capital financing program through which NERC is financing the development cost of certain software applications and hardware projects and amortizing the recovery of the principal and interest payments through its budgets and assessments over several years, rather than including the entire cost of the projects in the current year assessments.
- In Exhibit E of the 2017 Business Plan and Budget (**Attachment 2**), NERC provides a discussion of its working capital and operating reserves requirements, in accordance with its Working Capital and Operating Reserve Policy that was adopted in 2012 and amended in 2013 and, most recently, in 2015.³ This discussion includes explanation of the proposed use of the Assessment Stabilization Reserve to reduce the proposed 2017 assessments to LSEs below the levels that would otherwise be required to support 2017 activities (this proposal is also discussed in §IV.C, below).
- In the General and Administrative section of its 2017 Business Plan and Budget (**Attachment 2**), NERC has separately identified the amounts budgeted for Board of Trustee compensation and expenses (costs of quarterly Board and Board committee meetings, Trustee Travel expenses, Trustee fees, and Trustee search fees). See page 71 of **Attachment 2**.⁴

³See *North American Electric Reliability Corporation, Order Conditionally Accepting Revisions to Working Capital and Operating Reserve Policy*, 151 FERC ¶ 61,225 (2015).

⁴ This presentation addresses agreed Recommendations 4 (with Board of Trustees meetings defined as a "major activity") and 30 in the Settlement Agreement for FERC's 2011 financial performance audit of NERC.

- In the IT department budget, NERC has provided detailed cost information on both Operating Expenses (budgeted as Office Costs), such as Telephone, Internet, Computer Supplies, Computer Maintenance and Service Agreements, and Software; and on budgeted capital expenditures for IT projects.
- In Table B-10 of its 2017 Business Plan and Budget (**Attachment 2**), NERC has provided budgeted 2017 amounts for miscellaneous expenses, employee rewards and recognition expenses, community responsibility and employee engagement expenses, and expenses for a year-end employee recognition event.⁵

The initial section of **Attachment 2**, About NERC, provides an overview of NERC's organization, membership and governance, scope of oversight responsibilities, delegated authorities to Regional Entities, the ERO Enterprise operating model,⁶ statutory and regulatory background, and source of funding.

The Introduction and Executive Summary summarizes NERC's total resource requirements for 2017 including total full-time equivalent employees (FTEs) in statutory programs and administrative functions, statutory expenses, and required ERO funding assessments. It shows the distribution of the total net energy for load (NEL) among the U.S., Canada and Mexico to be used for allocating the ERO funding requirement among the three countries. It also highlights NERC's strategic goals, objectives and performance metrics and its priorities and major activities for 2017 and the 2017 key business planning assumptions. (A detailed statement of the 2016-2019 Shared Business Plan and Budget Assumptions developed and used by NERC and the Regional Entities in developing their 2017 Business Plans and Budgets and 2018 and 2019 budget projections is provided in Exhibit A to **Attachment 2**.) Finally, it provides an overview of NERC's budget and funding requirements for 2017 by major areas of expenditures. Specifically, the Introduction and Executive Summary presents NERC's

⁵ This presentation addresses agreed Recommendation 22 from FERC's 2011 financial performance audit of NERC.

⁶ NERC uses the term "ERO Enterprise" to refer to NERC and the eight Regional Entities.

overall Statement of Activities and Fixed Asset Expenditures, showing information from the approved 2016 Budget, the 2016 Projection, and proposed 2017 Budget, and the variances between the 2016 Projection and 2016 Budget and between the 2017 Budget and 2016 Budget, for the major line item categories of Funding, Expenses and Fixed Assets expenditures and in total for NERC.⁷

NERC's 2017 strategic goals and objectives to carry out its statutory mission are based on the 2016-2019 *ERO Enterprise Strategic Plan*, approved by the NERC Board of Trustees in November, 2015, as described in the Introduction and Executive Summary of the 2017 Business Plan and Budget. The 2017 strategic goals and objectives and priorities and major activities are focused on the areas of (i) maintaining timely and risk-responsive reliability standards; (ii) conducting objective and risk-informed compliance monitoring, enforcement, and organization certification and registration activities, through an ERO Enterprise that is a strong enforcement authority that is independent, without conflicts of interest, objective, fair, and promotes a culture of reliability excellence; (iii) identifying and mitigating significant current risks to reliability; (iv) identifying and assessing emerging risks to reliability; and (v) operating the ERO Enterprise in an effective, efficient, and collaborative manner that improves transparency, consistency, quality, effectiveness, cost-effectiveness, and timeliness of results. The Introduction and Executive Summary of the 2017 Business Plan and Budget identifies the portions of NERC's budgeted 2017 resources that will be allocated to each of the strategic goals and objectives.

The Introduction and Executive Summary of the 2017 Business Plan and Budget describes the ongoing focus of NERC and the Regional Entities on controlling costs and on making improvements to systems and processes to improve the efficiency of operations,

⁷ The 2016 Projection is NERC's projection of 2016 year-end financial results.

including thorough coordination of development of ERO Enterprise IT investments by NERC and the Regional Entities. It then provides an overview of the resource requirements and other factors driving NERC's proposed 2017 Budget. NERC is proposing an overall 2017 budget of \$69,602,175, which is an increase of \$2,415,510 (3.6%) over the 2016 Budget. This comparison includes the 2016 and 2017 budgeted expenditures for the CRISP. As compared to the 2016 budget, the proposed 2017 budget reflects an increase of \$1,357,525 (3.6%) in Personnel Expenses; a decrease of \$247,400 (6.8%) in Meeting Expenses; and a decrease of \$102,825 (0.4%) in Operating Expenses. The table on page 17 of **Attachment 2** shows the change in the 2017 total budget (*i.e.*, including allocated Indirect Expenses⁸) from the 2016 total budget for each of NERC's statutory departments.

The CRISP expenditures included in NERC's 2017 budget, \$8,292,440, will be primarily funded (\$6,990,447 (84.3%)) by participating utilities.⁹ The remaining funding for CRISP will come from Assessments (\$1,275,681 (15.4%)), an allocation of Penalty Sanctions funding (\$26,243 (0.3%)), and Interest (\$70). Budgeted CRISP expenditures for 2017 are increased by \$319,977 (4.0%) from the 2016 budget. With CRISP expenditures excluded, NERC's 2017 budget represents an increase of \$2,095,533 (3.5%) from its 2016 budget. NERC's Business Plan and Budget provides detailed comparisons of the 2017 budget to the 2016 budget, both with and without CRISP. *See* pages 19-20 of **Attachment 2**.

As shown on page 18 of **Attachment 2**, the 2017 budget reflects an overall decrease of 2.5 FTEs in staffing from the 2016 budget, although there are increases or decreases in budgeted

⁸ Allocated Indirect Expenses are the amount of Administrative Services expenditures that have been allocated to each of the statutory programs, on the basis of relative numbers of FTEs in each statutory program.

⁹ Funding received from third parties for CRISP is placed in a separate account to be utilized solely to fund CRISP expenses.

FTEs for each program area or department, due in whole or in part to the full or partial reallocation of personnel and resources from one program area to another. The changes in budgeted FTEs by program area also reflects a reduction in the assumed vacancy rate (*i.e.*, the adjustment for such factors as personnel attrition and hiring or start date delays) from the vacancy rate used in the 2016 budget. Total budgeted staffing for the statutory programs is decreased by 0.7 FTE, and budgeted staffing for the administrative programs is decreased by 1.9 FTE, from the 2016 budget. Within individual programs and departments, the 2017 budgeted staffing is decreased by 3.9 FTEs in Compliance Assurance, decreased by 2.6 FTEs in Compliance Analysis, Certification and Registration, increased by 2.3 FTEs in RASA, increased by 2.5 FTEs in Performance Analysis, increased by 1.1 FTE in IT, and decreased by 1.6 FTE in Finance and Accounting, from the 2016 budget. The budgeted change in staffing for each of the other programs and departments is less than 1.0 FTE.

The Introduction and Executive Summary also provides an overview of increases and decreases in Consultants & Contracts Expenses, by program area, from the 2016 budget. (Consultants & Contracts Expense is a line item component of the budget for Operating Expenses.) The proposed 2017 budget provides for an overall increase in Consultants & Contracts expense of \$261,835 (2.0%) from the 2016 budget. Of the total 2017 budgeted Consultants & Contracts Expense of \$13,127,749, \$5,888,594 (44.9%) is attributable to CRISP.

The Introduction and Executive Summary identifies the major components of NERC's proposed 2017 capital budget. NERC is budgeting \$4,372,000 of capital expenditures for 2017, an increase of \$461,000 (11.8%) from the 2016 budget.

NERC's 2017 resource and funding requirements reflect a variety of steps that have been taken during the last four years to control costs and increase the efficiency of NERC's operations

and those of the overall ERO Enterprise. These steps include development of a coordinated long term ERO Enterprise information technology program for development and improvement of enterprise software tools for use by NERC and the Regional Entities (with one objective being the use of common IT tools and programs throughout the ERO Enterprise); focused efforts to control travel and meeting expenses and outside contractor, consultant and legal expenses; transitioning financial responsibility for certain reliability tools from NERC to industry; development of the body of reliability standards to a steady state (thereby enabling the ERO and industry to devote fewer resources to standards development and modification); development and implementation of more efficient, streamlined and risk-oriented compliance monitoring and enforcement methods, which have enabled staffing reductions or stabilization; and reallocations of personnel among departments in accordance with current reliability needs and priorities. NERC management evaluates resource needs and allocations on an ongoing basis to ensure proper alignment between resources and priorities set forth in the ERO Enterprise Strategic Plan, by the NERC Board of Trustees, by the Reliability Issues Steering Committee (RISC), from regulatory requirements, and from stakeholders.

NERC's proposed 2017 statutory assessment to LSEs is \$59,856,314, which is \$2,774,868, or 4.9%, higher than the 2016 statutory assessments. This increase takes into account NERC's budgeted non-assessment Funding sources in 2016 and 2017. The non-assessment Funding sources in the 2017 budget consist of \$1,100,000 of Penalty payments to be applied, with FERC approval, from the balance in NERC's Assessment Stabilization Reserve (\$339,000 reduction from the amount applied in the 2016 budget), \$6,990,447 of Third-Party Funding for CRISP (\$159,709 increase from the 2016 budget), \$1,921,900 of Testing Fees (\$53,928 increase from the 2016 budget), \$50,000 of revenues from Services & Software (same

amount as budgeted for 2016), \$230,000 in attendance fees for Workshops (same amount as budgeted for 2016), and \$3,000 in Interest income (same amount as budgeted for 2016). In the aggregate, the non-assessment Funding sources in the 2017 budget are \$125,363 lower than in the 2016 budget.

Finally, the Introduction and Executive Summary presents NERC's budget and assessment projections for 2018 and 2019, including information on the anticipated use of NERC's Assessment Stabilization Reserve to mitigate fluctuations in assessments over the 2016-2019 period. Section III.F of this filing, below, provides further discussion of the 2018-2019 budget projections.

Section A of **Attachment 2** is NERC's detailed 2017 Business Plan and Budget. It is designed to address the requirements of and applicable directives in FERC orders. Section A provides program scope and functional descriptions, descriptions of key efforts under way in the current year, 2016, the 2017 goals and deliverables, and explanations of increases or decreases in Personnel Expenses and Consultants & Contracts expense for 2017 over the 2016 budget, for each of NERC's statutory programs (and groups or departments for those statutory programs that are comprised of more than one group or department) and for the Administrative Services functions. Section A includes a table at the start of the subsection on each statutory program or department showing total FTEs, total direct expenses, total indirect expenses, other non-operating expenses, increase or decrease in Fixed Assets, and total budget for the statutory program (department) for the 2017 budget, with the comparable data from NERC's 2016 budget and the increase or decrease from the 2016 budget. For the Administrative Services functions,

this table shows, for each of the five Administrative Services functions,¹⁰ the 2016 budget amount, 2017 budget amount, and the change from the 2016 budget to the 2017 budget, as well as budgeted 2016 FTEs, budgeted 2017 FTEs, and the change in FTEs from the 2016 budget to the 2017 budget. A detailed Statement of Activities and Fixed Asset Expenditures is provided for each statutory program or department, and for the Administrative Services functions in the aggregate. The Statements of Activities show funding and expenditure information from the 2016 budget, the 2016 projection and the 2017 budget, as well as the variances from the 2016 budget to the 2016 projection and from the 2016 budget to the 2017 budget.

In the Statements of Activities for each program or department, Funding is shown from the NERC Assessments and, as applicable, from other anticipated sources (Penalty Sanctions, Testing Fees, fees from Services & Software, fees from Workshop attendance, Interest income, Third-Party Funding, and Miscellaneous Funding).¹¹ Expenses are shown by the major categories (and sub-categories) of Personnel Expenses (Salaries, Payroll Taxes, Benefits, Retirement Costs); Meeting Expenses (Meetings, Travel, Conference Calls); Operating Expenses (Consultants & Contracts, Office Rent, Office Costs, Professional Services, Miscellaneous, Depreciation); and Other Non-Operating Expenses. Finally, the Statements of Activities show Fixed Assets activity, comprised of Depreciation (an equal and offsetting amount to the Depreciation included in Operating Expenses¹²), Computer & Software CapEx, Furniture &

¹⁰ General and Administrative, Legal and Regulatory, IT, HR, and Finance and Accounting. A sixth Administrative Services function is Technical Committees and Member Forums; NERC does not budget any resources for this function, but some of the Regional Entities do.

¹¹ Some of these other sources of Funding are anticipated only for certain of the statutory programs. For example, Third-Party Funding is budgeted only for the E-ISAC, which is responsible for managing NERC's participation in CRISP. Income from Testing Fees is budgeted only for the Training, Education, and Operator Certification Program. Additionally, for the 2017 budget (and the 2016 budget), NERC has (had) no funding budgeted from Miscellaneous sources.

¹² As a result of this offset, the Funding requirement does not include funding for Depreciation.

Fixtures CapEx, Equipment CapEx, Leasehold Improvements, and the Allocation of Fixed Assets activity from the Administrative Services programs.

Section B of **Attachment 2** provides Supplemental Financial Information comprised of tables detailing the components of certain Funding and Expense categories and explanations of variances from the 2016 budget, including analysis of the Working Capital and Operating Reserve balance (Table B-1), Penalties (Table B-2), Outside Funding (Table B-3), Personnel Expenses (Table B-4), Meetings Expenses (Table B-5), Office Rent (Table B-7), Office Costs (Table B-8), Professional Services (Table B-9), Miscellaneous Expenses (Table B-10), Other Non-Operating Expenses (Table B-11), and Fixed Assets expenditures (Table B-12). As was the case in NERC's 2013 through 2016 Business Plans and Budgets, Table B-6, Consultants & Contracts Expenses, which was provided in NERC's Business Plans and Budgets for years prior to 2013, has been replaced with a more detailed presentation of Consultants & Contracts Expenses in Exhibit C to **Attachment 2**. Additionally, Table B-13 in the ERO Business Plan and Budget template is reserved for 2018-2019 Projections, but NERC has included its 2018-2019 budget projections in the Introduction and Executive Summary, as described above.

Section C, Non-Statutory Activity, of **Attachment 2** is reserved for presentation of business plan and budget information on non-statutory activities. This section is empty for NERC, because NERC does not engage in non-statutory activities, but in the business plans and budgets of those Regional Entities that have non-statutory activities, Section C includes business plan and budget information on their non-statutory activities.

Section D, Supplemental Financial Statements, of **Attachment 2** provides NERC's actual and projected Statements of Financial Position at December 31, 2015, 2016, and 2017. The data at December 31, 2015 is actual data per the independent financial audit of 2015 results; the data

at December 31, 2016 is based on NERC's Projection for 2016 year-end results; and the data at December 31, 2017 is based on the detailed 2017 budget.¹³ In addition, Section D provides NERC's 2017 Consolidated Statement of Activities, showing its 2017 budgeted line-item Funding sources, Expenses, and Fixed Asset activity, in total and by statutory program and the Administrative Services functions, as well as the direct expenses and indirect expenses for each statutory program.

Exhibit A – Common Assumptions to **Attachment 2** contains the 2016-2019 Shared Business Plan and Budget Assumptions developed and used by NERC and the Regional Entities in preparing their 2017 Business Plans and Budgets and their 2018-2019 budget projections.

Exhibit B – Application of NERC Section 215 Criteria to **Attachment 2** describes how the major activities included in the 2017 Business Plan and Budget for NERC's direct function programs and Administrative Services functions meet the NERC written criteria for eligibility for FPA §215 funding as approved by FERC in the *FPA §215 Criteria Order*.

Exhibit C – Contractor and Consulting Costs to **Attachment 2** contains a detailed list of NERC's budgeted 2017 Consultants & Contracts expenses, by program area and by major activity or project. Exhibit C also shows the 2016 budget amounts and the change in the 2017 budget from the 2016 budget (where applicable).

Exhibit D – Capital Financing to **Attachment 2** describes proposed borrowing and repayment activity under NERC's capital financing program for certain capital expenditures. Exhibit D shows the budgeted 2016 and 2017 and projected 2018 and 2019 borrowings under the capital financing program, the projected year-end outstanding debt balance at the end of each

¹³ The audited financial statements of NERC and each Regional Entity for 2015 were filed on June 6, 2016, in NERC's *Notice of Filing of Report of Comparisons of Budgeted to Actual Costs for 2015 (2015 Budget True-Up Report)*.

year, and the annual payments for debt service (principal and interest) for each year, based on the loan structure terms and projected interest rates. Expenditures, debt service payments, and year-end balances for 2014 and 2015 are also shown. Exhibit D also mentions NERC's interest in renewing the capital financing facility, which expires in 2016. At its August 11, 2016 meeting, the NERC Board approved the plan to renew the capital financing facility and authorized NERC management to finalize a renewal credit facility agreement with similar terms and conditions to those currently in place.

Exhibit E – Working Capital and Operating Reserve Amounts to **Attachment 2** provides the budgeted 2017 amounts for Working Capital and Operating Reserves pursuant to NERC's Working Capital and Operating Reserve Policy (WCOR Policy) adopted in 2012 and amended in 2013 and 2015.¹⁴ The WCOR Policy provides for the separate budgeting and tracking of working capital and operating reserves.¹⁵ Section IV.B below provides further discussion of the 2017 budgeted amounts for working capital and each category of operating reserves.

Exhibit F – E-ISAC Portal Improvements to **Attachment 2** provides information on the proposed capital project to improve and enhance the functionality of the E-ISAC portal.

Appendix 1 to **Attachment 2** contains NERC's organization chart.

Appendix 2 to **Attachment 2** contains the calculation of the NEL-based allocation factors for each LSE and designee and the allocation of the NERC, Regional Entity and WIRAB

¹⁴ FERC had approved proposed revisions to the WCOR Policy in an order issued June 18, 2015 (*North American Electric Reliability Corporation, Order Conditionally Accepting Revisions to Working Capital and Operating Reserve Policy*, 151 FERC ¶ 61,225 (2015)), and NERC was directed to make revisions to the WCOR Policy. The most recently amended version of the WCOR Policy was submitted on September 10, 2015. FERC accepted the amended version of the WCOR Policy in a letter order dated September 18, 2015.

¹⁵ The WCOR Policy also sets forth guidelines and authorities regarding access to Working Capital and Operating Reserve funds.

statutory assessments, by allocation method, to each LSE and designee, for 2017.¹⁶ Development of the assessments presented in the Appendices is discussed in more detail in §III.A.3 and III.D below.

The detailed information in the Introduction and Executive Summary and in Sections A and B and Exhibits A, B, C, D, E, and F of **Attachment 2** demonstrates that the programs included in NERC's 2017 Business Plan and Budget are necessary and appropriate to carry out NERC's responsibilities as the ERO and that the specific resource requirements budgeted meet the objectives for affordability, sustainability and efficiency and effectiveness of the ERO's expenditures. The discussion in the text and exhibits of **Attachment 2**, as well as in this narrative, demonstrates how the activities and expenditures included in NERC's 2017 Business Plan and Budget lend themselves to accomplishment of NERC's statutory responsibilities and objectives as the ERO.

2. Development of the 2017 Business Plans and Budgets

NERC prepared its 2017 Business Plan and Budget (and worked with the Regional Entities in the development of their business plans and budgets) through a rigorous process that provided ample opportunity for review and input by the Finance and Audit Committee (FAC) of the NERC Board, as well as by stakeholders. During the development process, successive versions of the 2017 NERC and Regional Entity business plans and budgets were discussed in meetings and conference calls of the FAC and of the full NERC Board, in each case with opportunities for stakeholders to make comments. Throughout the development of its 2017 Business Plan and Budget, NERC management also held a number of conference calls with a

¹⁶ The NEL-based allocation factors are calculated using NEL data for 2015, which is the most current actual NEL data available as of August 2016. As has been the case in allocating the NERC and Regional Entity statutory assessments by country and by Regional footprint and calculating the assessments to LSEs or their designees for prior years' budgets, the allocation and calculation of assessments for the 2017 Budget is based on actual NEL data for the second preceding calendar year, 2015.

Business Plan and Budget Input Group formed by the NERC Member Representatives Committee (MRC). The following list highlights important steps in the preparation of the NERC and Regional Entity 2017 Business Plans and Budgets

- On July 16, 2015, the NERC Board of Trustees requested policy input on the proposed 2016-2019 *ERO Enterprise Strategic Plan* and metrics.
- The November 4, 2015 MRC meeting included a review of the draft 2016-2019 *ERO Enterprise Strategic Plan* and metrics.
- On November 5, 2015, the NERC Board approved the 2016-2019 *ERO Enterprise Strategic Plan* and metrics.
- During the fourth quarter of 2015 and early first quarter of 2016, the ERO Executive Management Group (ERO EMG), comprised of NERC and Regional Entity chief executives or equivalents, and the ERO Finance Group (EROFG), comprised of senior Finance and Accounting management personnel of NERC and the Regional Entities, met to review strategic goals and objectives for 2017.
- During October, November and December, 2015, the EROFG worked to develop and finalize the common business plan and budget assumptions to be used in developing the 2017 business plans and budgets and the 2018-2019 budget projections.
- On January 12, 2016, an MRC Informational Session Webinar was conducted that included a discussion of the 2017 Business Plan and Budget development process and ERO Enterprise Strategic Plan redesign. A request to stakeholders for policy input on the 2017 Business Plan and Budget was also issued.
- During the first four months of 2016, NERC and the Regional Entities worked collaboratively in the development of their business plans and budgets.
- During February and March 2016, the NERC program areas provided input to the NERC Finance and Accounting department on their business plans and budget requirements for 2017.
- On April 6, 2016, another MRC Informational Session Webinar concerning the 2017 Business Plan and Budget was held.
- On April 14, 2016, a conference call was held with the MRC Business Plan and Budget Input Group to discuss the 2017 Business Plan and Budget.
- On April 19, 2016, a meeting was held with interested trade associations and the MRC Business Plan and Budget Input Group to discuss the NERC 2017 Business Plan and Budget.

- On April 19, 2016, the FAC and the Corporate Governance and Human Resources Committee (CGHRC) of the NERC Board met in closed session to review the personnel, benefits, contracts and other assumptions for the NERC 2017 Business Plan and Budget.
- The May 4, 2016 MRC meeting included review of policy input for the ERO Enterprise Strategic Planning Framework and an update on the 2017 Business Plan and Budget.
- The May 4, 2016 FAC meeting included a review of the preliminary NERC 2017 Business Plan and Budget.
- The May 5, 2016 NERC Board meeting included a review of policy input for the ERO Enterprise Strategic Planning Framework and for the NERC 2017 Business Plan and Budget
- On May 19, 2016, Draft #1 of the NERC 2017 Business Plan and Budget and a consolidated ERO Enterprise Business Plan and Budget overview were posted on the NERC Website for stakeholder review and comment. Notification of the posting (and of all subsequent postings) was sent by e-mail to a broad distribution list of interested persons and entities. Three sets of written stakeholder comments were received during the comment period that ended June 30, 2016.¹⁷ These comments were posted on NERC's website.¹⁸
- Also on May 19, 2016, drafts of the Regional Entities' 2017 Business Plans and Budgets, along with an overview document for each Regional Entity Business Plan and Budget, were posted on the NERC website. The Regional Entity budget drafts were prepared using a common template that was similar to the common template used for the 2011 through 2016 NERC and Regional Entity Business Plans and Budgets. NERC program managers reviewed the sections of the draft Regional Entity business plans and budgets relevant to the program manager's program area and, where necessary, provided feedback to their Regional Entity counterparts. Feedback from NERC's review of the initial drafts was used by the Regional Entities in developing revised drafts.
- WIRAB's draft 2017 Business Plan and Budget was also posted for comment on the NERC website on May 19, 2016.
- During May, 2016, the Regional Entities posted drafts of their 2017 Business Plans and Budgets on their respective websites for review and comment by their

¹⁷ Comments were submitted by (1) the Canadian Electricity Association, (2) the Ontario Independent Electricity System Operator, and (3) the Member Executive Committee of the Electricity Subsector Coordinating Council. On July 15, 2016, NERC posted on its website the aforementioned comments and a management response. The response is provided in **Attachment 4** to this filing.

¹⁸ <http://www.nerc.com/gov/bot/FINANCE/Pages/2017-NERC-Business-Plan-and-Budget.aspx>.

stakeholders, in accordance with each Regional Entity's public review process. (See §III.B below for further discussion of the stakeholder review opportunities provided by each Regional Entity for its 2017 Business Plan and Budget.)

- On May 25, 2016, representatives of NERC and of each of the Regional Entities met with FERC budget staff to provide an overview of the drafts of their respective 2017 Business Plans and Budgets.
- On May 26, 2016, a conference call with the FAC and NERC management was held, and a webinar was conducted, to review the Draft #1 NERC 2017 Business Plan and Budget and Regional Entity 2017 Business Plans and Budgets. In this session, the Regional Entities made presentations concerning their 2017 Business Plans and Budgets to the FAC.
- On June 17, 2016, NERC management met again with the MRC Business Plan and Budget Input Group to review the draft NERC 2017 Business Plan and Budget and to obtain informal input from the MRC Business Plan and Budget Input Group.
- At various dates from late May to late June 2016, the Boards or other governing bodies of the Regional Entities met to review and approve their respective proposed 2017 Business Plans and Budgets. The approved Regional Entity Business Plans and Budgets were submitted to NERC in early July.
- On July 6, 2016, a closed call was held with the FAC to review personnel, contracts, and other assumptions in the 2017 Business Plan and Budget.
- On July 12, 2016 (following the receipt of the written comments on the posted Draft #1 of the NERC 2017 Business Plan and Budget), NERC management again met with the MRC Business Plan and Budget Input Group and trade associations to discuss the comments received and to receive additional input. This meeting was conducted in a conference call format that allowed other MRC members and stakeholders to participate. Additionally, details of the proposed E-ISAC portal project were presented and related stakeholder comments were discussed.
- On July 15, 2016, a revised Draft #2 of the NERC 2017 Business Plan and Budget was posted on the NERC website. Any additional stakeholder comments were requested, with a due date of July 29, 2016. No comments were submitted on this Draft #2.
- Also on July 15, 2016, the final, approved versions of the Regional Entity 2017 Business Plans and Budgets were posted on the NERC website. (Several of the Regional Entity Business Plans and Budgets were subsequently revised and reposted to reflect minor corrections or updates.)
- On July 21, 2016, a conference call with the FAC and NERC management was held, and a webinar was conducted, to review the final draft of NERC's 2017 Business Plan and Budget, the final Regional Entity 2017 Business Plans and Budgets, and the

consolidated ERO Enterprise 2017 Business Plan and Budget.

- On August 3, 2016, the final version of the NERC 2017 Business Plan and Budget and the proposed NERC and Regional Entity 2017 assessments, were posted on the NERC website for the upcoming MRC, FAC and NERC Board meetings.
- At the August 10, 2016 open meeting of the FAC, NERC management presented the final draft of the 2017 Business Plan and Budget and solicited final comments and questions from the NERC Board and stakeholders. The FAC then recommended NERC Board approval of the 2017 Business Plans and Budgets and associated statutory assessments for NERC, the Regional Entities and WIRAB.
- During the August 10, 2016 meeting of the MRC, an additional opportunity was provided to stakeholders for input and questions regarding the final 2017 Business Plans and Budgets of NERC and the Regional Entities.
- At its August 11, 2016 meeting, the NERC Board approved the 2017 Business Plans and Budgets and the proposed 2017 statutory assessments for NERC, the Regional Entities and WIRAB.

In summary, the processes followed by NERC and the Regional Entities to develop the proposed 2017 Business Plans and Budgets were thorough, comprehensive, open and inclusive, involved significant input from NERC and Regional Entity management and financial and program area staffs, as well as iterative review and comment by the FAC, and provided numerous opportunities for stakeholder input and comment.

3. Summary of NERC's Proposed 2017 Budget and Funding Requirement

NERC's proposed 2017 total statutory Funding requirement is \$70,151,660. This total encompasses U.S., Canadian and Mexican activities. The proposed 2017 total statutory Funding requirement represents an increase of \$2,649,505 (3.9%) as compared to the 2016 total Funding requirement of \$67,502,155. The 2017 budget is comprised of \$66,921,632 of Expenses (including Depreciation) and a \$2,680,543 increase in Fixed Assets (Capital Expenditures of

\$4,372,000 less Depreciation of \$1,691,457¹⁹). The 2017 total statutory Funding requirement reflects a provision for Working Capital and Operating Reserve funding of \$530,402, as well as (due to NERC's capital financing plan) proceeds from financing activities of \$966,667 and debt service of \$985,750,²⁰ whereas the total Funding requirement in the 2016 Business Plan and Budget included a provision for Working Capital and Operating Reserve Funding of \$380,490.

As in past years, a portion of NERC's 2017 budget will be funded in part through Testing Fees charged to participants in certain NERC programs, including the System Operator Certification Program and the Continuing Education Program (budgeted at \$1,921,900, a \$53,928 (2.8%) increase from the 2016 budget); by attendance fees for Workshops (budgeted at \$230,000, the same amount as in the 2016 budget²¹); by revenues from Services & Software (budgeted at \$50,000, the same amount budgeted in the 2015 and 2016 budgets); and by Interest earned on bank balances and short-term investments (budgeted at \$3,000, the same amount budgeted in the 2015 and 2016 budgets). The Funding sources in the 2017 budget also include \$1,100,000 of Penalty Sanctions payments to be released, with FERC approval, from the Assessment Stabilization Reserve, which is \$339,000 less than the amount of Penalty payments included in Funding in the 2016 budget.²² Finally, funding for the 2017 budget includes

¹⁹ As noted earlier, an end result of this budget presentation is that Funding is not being requested for Depreciation expense.

²⁰ See §IV.B below and Table B-1 and Exhibit E in **Attachment 2**.

²¹ NERC strives to set Workshop fees to cover the costs of presenting the workshops, such as costs to rent meeting space (if necessary) and prepare printed materials. The number of Workshops planned also impacts the projected total Workshop fee revenues.

²² The NERC policy, *Accounting, Financial Statement and Budgetary Treatment of Penalties Imposed and Received for Violations of Reliability Standards*, and §1107.2 of the NERC Rules of Procedure (ROP), specify that Penalty payments received by NERC or a Regional Entity during the period from July 1 of the second year preceding the budget year through June 30 of the year preceding the budget year are used to offset assessments to LSEs in the U.S. for the budget year, unless an alternative treatment is approved by FERC (as allowed by ROP §1107.4). NERC received \$500,000 of Penalty payments in the period July 1, 2015 – June 30, 2016. NERC proposes to place this \$500,000 of Penalty payments into its

\$6,990,447 of Third-Party Funding, representing funding provided by participating utilities and other entities to support NERC’s participation in CRISP. This is an increase in the Third-Party Funding for CRISP of \$159,709 from the CRISP funding provided in the 2016 budget.

The budgeted non-assessment sources of Funding are projected to be \$10,295,347 in total. Additionally, the 2017 budget includes a net requirement of \$19,083 for debt repayment from the capital financing program. Application of these funding sources results in a 2016 net Funding requirement of \$59,856,314 to be funded by assessments to LSEs. Of this amount, \$54,326,337 (90.76%) is allocated to the U.S., \$5,353,026 (8.94%) is allocated to Canadian provinces (in the aggregate), and \$176,951 (0.30%) is allocated to Mexico. Based on the aggregate NEL of Canada for 2015 on which the allocation of assessments is based,²³ the proposed Canadian net funding requirement for NERC represents approximately \$0.0000103 (*i.e.*, 0.00103 cents) per end-user kilowatt-hour.

NERC’s 2017 Business Plan and Budget was developed and is organized based on its statutory programs and, where applicable, departments within each program (2016 budgeted amounts by program are shown for comparison):

<u>Program</u>	<u>2016 Budget</u>	<u>2017 Budget</u>
Reliability Standards	\$ 8,193,116	\$ 8,100,282
<u>Compliance Monitoring and Enforcement</u>		
Compliance Assurance	\$ 9,420,903	\$ 7,858,599
Compliance Analysis, Certification and Registration	\$ 4,632,871	\$ 3,646,289
Compliance Enforcement	\$ 5,293,298	\$ 5,800,647
Reliability Assessment and System Analysis	\$ 6,342,917	\$ 7,535,594

Assessment Stabilization Reserve, and to then use \$1,100,000 of Penalty payments accumulated in the Assessment Stabilization Reserve to reduce the 2017 assessments. *See* Table B-2 of **Attachment 2** and §IV.B and IV.C below.

²³ The NEL data for the U.S., Canada and Mexico, by Region and by LSE or designee, is provided in Appendix 2-A of **Attachment 2**.

Performance Analysis ²⁴	\$ 3,575,811	\$ 4,908,855
<u>Reliability Risk Management</u>		
Situation Awareness	\$ 3,692,197	\$ 4,032,862
Event Analysis	\$ 5,355,795	\$ 5,446,206
E-ISAC (including CRISP)	\$16,767,525	\$18,515,341
Training, Education and Operator Certification	<u>\$ 3,912,231</u>	<u>\$ 3,757,501</u>
	<u>\$67,186,665</u>	<u>\$69,602,175</u>

The budgeted amounts for each program incorporate a total budget for Administrative Services of \$31,414,834 (an increase of \$972,399 (3.2%) from the 2016 budget). The Administrative Services budgeted expenses and Fixed Assets additions have been allocated to the budgets for the direct function programs in proportion to the numbers of FTEs budgeted for each direct function program.

The discussion in §IV below, as well as the detailed discussion of the individual programs (or of individual departments or groups where the presentation is disaggregated to the department or group level within a program) in **Attachment 2**, demonstrates that each of NERC’s programs is necessary and appropriate to the execution of NERC’s responsibilities as the ERO. Section A of **Attachment 2** describes the activities encompassed in each program or department (Background and Scope), key activities under way in 2016, the 2017 Goals and Deliverables for the program or department, and the 2017 Resource Requirements for Personnel and Contractors and Consultants for the program or department. A Statement of Activities and Fixed Assets Expenditures showing the line item components of the 2017 budget (as well as, for comparison, the 2016 budget and the 2016 projection), is provided for each direct function program or department and for Administrative Services.

²⁴ In NERC’s 2016 Business Plan and Budget, the budgets for RASA and Performance Analysis were reported together under Reliability Assessment and Performance Analysis, with a budget of \$9,918,728.

NERC proposes an allocation of its 2017 net funding requirement (statutory assessment) of \$59,856,314 to the Regional footprints as follows²⁵:

Appendix 2 to **Attachment 2** contains tables showing (i) the development of the NEL-based allocation factors used to allocate the NERC and Regional Entity statutory assessments by country and among the Regional footprints (Appendix 2-A), and (ii) the allocation of the NERC and Regional Entity statutory assessments by country and by Region (Appendices 2-B, 2-C and 2-D). Appendix 2 shows the allocation of the NERC and Regional Entity assessments to the individual LSEs or designees within the footprint of each Regional Entity. These allocations are discussed in greater detail in §III.D below.²⁹ NERC’s only sources of funding for its planned

²⁵ As described in §III.D below, the aggregate NERC statutory assessment has been allocated to the Regional footprints on the basis of (i) 8-Region NEL and (ii) 8-Region NEL to allocate adjustments (credits) to certain Canadian entities for Compliance Monitoring and Enforcement Program (CMEP), Event Analysis and Situation Awareness costs to the remaining LSEs. The detailed allocations of the NERC statutory assessment by allocation methodology are shown in Appendix 2 to **Attachment 2**.

²⁶ The total allocation to MRO consists of \$3,217,546 allocated to the U.S. and \$656,669 allocated to Canadian provinces.

²⁷ The total allocation to NPCC consists of \$3,934,700 allocated to the U.S. and \$3,294,554 allocated to Canadian provinces.

²⁸ The total allocation to WECC consists of \$9,995,477 allocated to the U.S., \$1,401,802 allocated to Canadian provinces and \$176,951 allocated to Mexico.

²⁹ NERC will calculate and bill the assessments to certain entities, referred to as “designees,” based on NEL values that include the NEL for other LSEs served by the designee, or for which the designee is otherwise responsible for assessments. The calculation and billing of assessments to designees is not a departure from the principle that the ERO funding requirement should be recovered through assessments

programs and operations will be the assessments to users, owners, and operators of the bulk power system (BPS) in the U.S. provided for in 18 C.F.R. §39.4(e) and comparable collections from entities in Canada and Mexico, the other sources listed as “Funding” on its Statements of Activities and described above, including but not limited to Third-Party Funding for CRISP, and proceeds from the 2017 capital financing.³⁰

B. Regional Entity Proposed 2017 Business Plans and Budgets

Section 39.4(b) of FERC’s regulations requires that the ERO’s annual budget submission include “the entire annual budget for statutory and non-statutory activities for each Regional Entity, with supporting materials, including . . . each Regional Entity’s complete business plan and organization chart, explaining . . . the proposed expenditure of funds collected in sufficient detail to justify the requested funding collection and budget expenditures” Section 39.4(b) further states that the ERO’s annual budget submission “shall include the line item budgets for the activities of each Regional Entity that are delegated or assigned to each Regional Entity pursuant to §39.8.” This information for 2017 is provided in the Regional Entity Business Plan and Budget in **Attachments 3**.

to LSEs based on NEL, but rather is a matter of administrative convenience and efficiency (*e.g.*, a generation and transmission (G&T) cooperative and its member distribution cooperatives may find it more efficient for the assessment to be calculated and billed to the G&T cooperative rather than to the individual distribution cooperatives). The lists of LSEs and designees for which assessments will be calculated and billed have been provided to NERC by the Regional Entities. NERC has had no involvement in developing the lists of LSEs or in arrangements between LSEs and designees pursuant to which a designee agrees to accept responsibility for an assessment that would otherwise be calculated for and billed to the LSE and the LSE agrees to be financially responsible to reimburse the designee for the assessment. The assessments for the NPCC Region will be billed to ISO New England and the New York ISO (and to similar entities in Ontario, Québec, New Brunswick and Nova Scotia), each of which will be responsible for billing and collecting assessments from the LSEs within their respective footprints. The assessments for the Texas RE region will be billed to the Electric Reliability Council of Texas (ERCOT), which will bill and collect assessments from the LSEs in ERCOT.

³⁰ NERC’s 2017 Business Plan and Budget includes no non-statutory activities; therefore, NERC has not developed or presented specific accounting processes to separate the funding of its statutory and non-statutory activities and to assure that funding derived from §215 of the FPA will exclusively support statutory activities.

The Regional Entity budgets for statutory activities that are to be funded through NERC are the budgets for the functions and activities relating to development of reliability standards; compliance monitoring and enforcement and organization registration and certification; training, education and operator certification; reliability assessment and performance analysis (including necessary data gathering activities); and situation awareness and infrastructure security, encompassed by the delegation agreements, as well as each Regional Entity's budgeted costs for administrative services supporting these functions and activities. Funding the Regional Entities in accordance with their proposed Business Plans and Budgets will enable them to carry out the activities necessary in 2017 to meet their responsibilities under the delegation agreements.

In *Order No. 672*, FERC stated that “The ERO must determine, at a minimum, whether each Regional Entity’s proposed budget is adequate to carry out the functions delegated to it.”³¹ As described above in §III.A.2, NERC staff worked collaboratively with the Regional Entities to develop a set of shared business planning and budget assumptions for the Regional Entities’ 2017 Business Plans and Budgets, and provided input to the Regional Entities on the development of their business plan and budget submissions. Further, the Regional Entities prepared their 2017 Business Plans and Budgets using a common format. The use of the common format facilitates comparisons among the Regional Entities’ budgets. The Shared Business Plan and Budget Assumptions for 2016-2019 developed collaboratively by NERC and the Regional Entities, are provided in Exhibit A of **Attachment 2**. Additionally, in developing their 2017 Business Plans and Budgets, NERC and the Regional Entities continued to use the set of consistent accounting principles for presentation of the budgets, and the common definition of

³¹*Rules Concerning Certification of the Electric Reliability Organization; Procedures for the Establishment, Approval and Enforcement of Electric Reliability Standards*, Order No. 672, FERC Stats. & Regs. ¶ 31,204 (2006) (*Order No. 672*), at P 229.

administrative (indirect) costs, that were originally developed in connection with preparation of the 2010 Business Plans and Budgets.

As described in §III.A.2 above, NERC management and staff worked iteratively with the Regional Entities on the development of the Regional Entity 2017 Business Plans and Budgets. Drafts of each Regional Entity's 2017 Business Plan and Budget were submitted to NERC for posting on the NERC website on May 19, 2016 for stakeholder comment. NERC also reviewed and provided feedback on these drafts. The draft Regional Entity Business Plans and Budgets were also the subject of presentations and discussion at meetings of the NERC FAC.

Additionally, each Regional Entity posted one or more drafts of its 2017 Business Plan and Budget on its own website for comment by its stakeholders, and/or provided other opportunities for stakeholder input, as follows:

FRCC: FRCC posts its proposed budget to the FRCC website and sends a copy (along with all presentation materials that will be presented to the FRCC Board) to each Board Member, Corporate Compliance Finance and Audit Committee, Alternate Board Member, all Standing Committee Chairs, and all Voting Members from the Supplier, Non-Investor-Owned Utility Wholesale, Load Serving Entity, Generating Load Serving Entity, Investor Owned Utility, and General Sectors of the membership, approximately 45 days prior to the expected FRCC Board vote date. The recipients are encouraged to contact FRCC with any comments or questions, so they can be resolved prior to the Board meeting date. Ten days prior to the Board meeting at which the vote on the budget will take place, another distribution is made to the same recipients, and posted to the FRCC website with any changes from the first version. After approval is finalized, the process is repeated with a copy marked as Final with the Approval Date. The FRCC Board approved FRCC's 2017 Business Plan and Budget on June 30, 2016.

MRO: MRO posted its draft 2017 Business Plan and Budget for comments on May 19, 2016. MRO's 2017 Business Plan and Budget was presented in several meetings of the MRO Board and its stakeholders. On June 30, 2016, MRO's Board of Directors approved a resolution that approved the 2017 budget, approved MRO's reserves policy, and affirmed that the budget is sufficient to complete MRO's delegated responsibilities.

NPCC: On April 18, 2016, a preliminary 2017 total NPCC Expense Budget, along with the Business Plans and Budgets for both the Regional Entity and Criteria Services divisions, were presented to NPCC's Finance and Audit Committee (NPCC FAC) for review and discussion. On April 28, 2016, NPCC posted Draft #1 of its 2017 Business

Plan and Budget on its website for stakeholder review and comment. Draft #1 was presented to the NPCC Reliability Coordinating Committee for comment following this posting. NPCC did not receive any formal comments from either the posting or various presentations to the stakeholders on any of its draft 2017 Business Plans and Budgets during the posting period. There were a few comments received after the May 25 comment period close, but the comments were received in time to share them with the NPCC Board at its June 30 meeting. The New Brunswick Energy and Utilities Board (NBEUB) provided comments related to the description of the NBEUB as an independent, quasi-judicial board that regulates New Brunswick's electricity sector. The comments were incorporated into the 2017 NPCC Business Plan and Budget. The NPCC FAC unanimously endorsed the "Draft for Approval" as presented and on June 30, 2016, the "Draft for Approval" of the 2017 Business Plan and Budget was presented to the NPCC Board, and was unanimously approved. Subsequently on July 12, 2016, NERC provided a letter to NPCC requesting that an allocation of \$50,000 related to a potential future special assessment of the reliability impacts associated with the Clean Power Plan allocated to U.S.-only Balancing Authorities be removed as premature. Accordingly, NPCC changed the allocation of the \$50,000 expense to U.S.-only Balancing Authorities to \$0 and "To Be Determined" in the cost allocation table on page 61 of the final 2017 Business Plan and Budget. There was no change made to the aggregate budget. This assessment allocation change was reported to the NPCC Board at its August 3, 2016 meeting.

ReliabilityFirst: On April 25, 2016, the ReliabilityFirst Board of Directors approved the first draft of its 2017 Business Plan and Budget, after which it was posted to the ReliabilityFirst website for a 30-day industry review and comment period. ReliabilityFirst did not receive any comments. The final 2017 Business Plan and Budget was approved by the ReliabilityFirst Board on June 2, 2016.

SERC: The SERC Board approved the draft 2017 Business Plan and Budget at its April 2016 meeting, after which it was posted on the SERC Website for a 30-day comment period (*i.e.*, during the month of May). SERC received one comment from a registered entity on the draft 2017 Business Plan and Budget. The comment was reviewed by the SERC President and the Director of Finance. SERC reviewed the response with the Finance and Audit Committee and Board Executive Committee at their June 2016 meetings. The final version of the Business Plan and Budget was approved by the Board Executive Committee on June 23, 2016 and posted on July 5, 2016.

SPP RE: SPP RE presented a summary of the preliminary budget at the SPP RE Trustees public meeting on April 25, 2016. Prior to the meeting, the preliminary budget was posted on SPP RE's website on April 18, 2016 and the SPP RE April 2016 newsletter indicated that the budget would be posted for comments through May 30, 2016. The final SPP RE 2017 Business Plan and Budget was presented to the Trustees for approval at the June 13, 2016 public meeting. SPP RE posts all Board of Trustee materials on its public website prior to the meetings. SPP RE received no formal comments from stakeholders regarding the 2017 budget.

Texas RE: Texas RE's 2017 Business Plan and Budget was presented in multiple meetings of the Texas RE Board and member representatives committee. There were no written or oral challenges to the 2017 Business Plan and Budget. Texas RE posted the draft 2017 Business Plan and Budget on April 20, 2016. The Board of Directors approved Texas RE's 2017 Business Plan and Budget on May 24, 2016.

WECC: WECC's draft 2017 Business Plan and Budget was posted on its website on May 2, 2016 for a two-week comment period. The WECC Board of Directors and WECC Members were notified of the posting. Five sets of comments were received from stakeholders on the draft 2017 Business Plan and Budget. WECC posted a response to the comments on its website on June 1, 2016. WECC's Board approved WECC's 2017 Business Plan and Budget on June 16, 2016.

Throughout the process of NERC's review of the draft Regional Entity business plans and budgets, where appropriate, additional information was requested and other suggested changes were made. As needed, NERC and Regional Entity management and finance staffs convened meetings and conference calls to provide feedback and refine their respective business plans and budgets. NERC's review focused on:

1. Adequacy of the resources and activities to perform delegated functions;
2. Alignment of the Regional Entity's goals, objectives and major activities to the ERO Strategic Plan;
3. Description of efforts to improve efficiency and control costs;
4. Quality and completeness of the financial information presented, including:
 - a. Conformance with FERC budget reporting requirements and with the common presentation format,
 - b. Separation of statutory and non-statutory activities,
 - c. Supporting detail for projections, including explanations for significant changes from the entity's 2016 budget, and
 - d. Working capital and operating reserve budgets, policies and controls.

Through the processes described above and in §III.A.2, NERC has been able to satisfy itself that each Regional Entity's 2017 Business Plan and Budget provides necessary and

adequate resources to carry out the Regional Entity's delegated functions in 2017.³²

The Regional Entities submitted their final 2017 Business Plans and Budgets, approved by their respective governing bodies, to NERC in July 2016. These Business Plans and Budgets were submitted to the NERC FAC and Board and were reviewed at the FAC's meetings held on July 21 and August 10, 2016, and at the Board's August 11, 2016 meeting. The Regional Entities' 2017 Business Plans and Budgets were approved by the NERC Board at the August 11 meeting, for submission to the applicable governmental authorities.

The table below shows the budgets for statutory and (where applicable) non-statutory functions for each Regional Entity as presented in their respective 2017 Business Plans and Budgets.³³ For all Regional Entities, the total budget amount for statutory functions includes total Expenses and Fixed Asset activity. Because each Regional Entity has one or more other sources of income (*e.g.*, attendance fees for workshops and Penalty payments received from Registered Entities) that will be used to offset the costs of performing delegated functions, the requested ERO funding (assessments) for the Regional Entities is less than their budgets for statutory activities. The fourth column shows the total (*i.e.*, for all jurisdictions) net statutory assessment required for each Regional Entity, after taking into account other sources of income including application of Penalty payments. The net statutory assessment amounts include amounts (which for some Regional Entities are negative adjustments to the Funding requirement) to achieve the level of target Working Capital Reserve at December 31, 2017, determined to be appropriate by each Regional Entity.

³² In reviewing the Regional Entity Business Plans and Budgets, and in accordance with FERC's directive in the *ERO Certification Order*, NERC afforded the proposed Regional Entity Business Plans and Budgets no presumption of reasonableness due to having been approved by the Regional Entities' governing bodies. *See ERO Certification Order* at P 203.

³³ MRO, ReliabilityFirst and SERC do not plan to perform any non-statutory activities in 2017.

Regional Entity	Total Budget for Statutory Functions	Budget for Non-Statutory Functions	Total Net Statutory Assessment
FRCC	\$ 7,177,854	\$10,198,585	\$ 6,163,896
MRO	\$11,226,668	-----	\$10,494,345 ³⁴
NPCC	\$15,147,054	\$ 1,026,896	\$14,255,060 ³⁵
ReliabilityFirst	\$19,908,939	-----	\$19,560,881
SERC	\$17,482,403	-----	\$15,706,023
SPP RE	\$10,865,511	\$206,226,489 ³⁶	\$ 9,092,553
Texas RE	\$12,167,256	\$ 1,059,945	\$ 9,595,256
WECC	\$26,796,928	\$ 1,744,309	\$25,282,000 ³⁷

C. Western Interconnection Regional Advisory Board Funding Request

In its Order issued July 20, 2006, in Docket No. RR06-02-000 (*WIRAB Order*), FERC concluded that reasonable costs incurred by WIRAB for activities under §215(j) of the FPA can be funded through the ERO funding process.³⁸ As specified in P 35 of the *WIRAB Order*, WIRAB submitted to NERC a proposed 2017 Business Plan and Budget for §215(j) activities. NERC has reviewed WIRAB's submission and believes it complies with the requirements of P 35 of the *WIRAB Order*.

WIRAB's proposed 2017 budget for expenses is \$1,229,080, which is a \$141,194 (10.3%) decrease from its 2016 budget. As it did in preparing its 2015 and 2016 budgets, WIRAB anticipates monitoring the activities of, and potentially offering advice to, both WECC and Peak Reliability (Peak), as well as NERC. WIRAB also anticipates the need to continue to

³⁴ The statutory assessment for MRO of \$10,494,345 consists of \$8,717,286 allocated to the U.S. and \$1,777,059 allocated to Canadian provinces.

³⁵ The statutory assessment for NPCC of \$14,255,060 consists of \$8,894,696 allocated to the U.S. and \$5,360,364 allocated to Canadian provinces.

³⁶ The figure of \$206,226,489 is the total 2016 budget of Southwest Power Pool, Inc. (\$217,092,000) less the 2017 Budget of SPP RE for statutory activities of \$10,865,511. The overall annual budget of Southwest Power Pool, Inc. is prepared on a schedule that will not result in approval of its 2017 budget until October 2016. See §V.B.6 below.

³⁷ The statutory assessment for WECC of \$25,282,000 consists of \$22,015,983 allocated to the U.S., \$2,865,616 allocated to Canadian provinces and \$400,401 allocated to Mexico.

³⁸ *Order on Petition to Establish a Regional Advisory Body for the Western Interconnection*, Docket No. RR06-2-000, 116 FERC ¶61,061 (2006) (*WIRAB Order*), PP 33-37.

devote increased attention to physical and cyber security issues and protection of Critical Electricity Infrastructure Information; to implementation of recommendations resulting from FERC and NERC's investigations of the September 2011 Southwest outage event (and, more generally, to the promotion of best operational practices by registered entities in the region); and to assessing the availability of Essential Reliability Services in the Western Interconnection. Other topics on which WIRAB plans to focus during 2017 in its engagement with WECC and Peak include the reliability impacts of market reforms in the Western Interconnection; the reliability impacts of increased use of natural gas generation and the need for natural gas and electric industry coordination; the feasibility of adopting a new dynamic path transfer capability methodology; the impacts of large amounts of distributed generation resources; and the reliability implications of implementation of the U.S. Environmental Protection Agency's (EPA) Clean Power Plan and related U.S. EPA regulation of electric generating units.

WIRAB's budgeted staffing for 2017 is 5.50 FTEs, the same as in its 2016 budget. WIRAB's budgeted 2017 Personnel (Salaries) Expense is lower, by \$73,847 (13.7%), than in its 2016 budget, due in part to moving certain personnel-related costs from Salaries Expense to Indirect Expenses (overhead). WIRAB's 2017 budget includes \$150,000 for Consultants & Contracts Expense (the same amount as provided in its 2015 and 2016 budgets) to provide technical expertise to WIRAB on issues related to improved grid operating practices, Reliability Standards and compliance, to support WIRAB in providing technically sound advice to WECC and Peak under §215(j) of the FPA. WIRAB's 2017 budget for Meetings Expense (including Meetings, Travel and Conference Calls) is only slightly increased, by \$3,546 (2.2%), over its 2016 budget. These expenses enable WIRAB staff and representatives of the states and provinces to attend meetings of WECC and Peak. Additionally, WIRAB will hold two major in-person

meetings during 2017 that include participation of state and provincial agencies with electric power responsibilities in the Western interconnection.

WIRAB's proposed statutory assessment for 2017 is \$901,452, which is a decrease of \$338,546 (27.3%) from its 2016 assessment. The assessment decrease reflects a \$326,978 decremental adjustment for Working Capital Reserve, as compared to a \$129,726 decremental adjustment for Working Capital Reserve in the 2016 budget (*i.e.*, the adjustment for Working Capital Reserve reduces the WIRAB assessment by \$197,252 more than in the 2016 budget). The decremental adjustment to the assessment is based on a target Working Capital Reserve amount of \$100,000 at December 31, 2017, as approved by WIRAB's members, and a projected Working Capital Reserve at December 31, 2016 of \$426,978.

WIRAB's overall statutory funding (assessment) request of \$901,452 for 2017 consists of \$759,556 allocated to the U.S., \$128,716 allocated to Canadian provinces, and \$13,180 allocated to Mexico, all based on 2015 NEL.

D. Allocation of Statutory Assessments by Country, Regional Entity Footprint and LSE

The total ERO statutory funding requirement for 2017, net of other NERC and Regional Entity income sources, to be funded by assessments is \$170,907,780 consisting of \$59,856,314 for funding of NERC's programs and \$111,051,466 for funding of Regional Entity statutory activities and the WIRAB. NERC has allocated its statutory assessment of \$59,856,314 to the LSEs within each Regional footprint primarily on the basis of NEL, as described below.³⁹

First, a total of \$1,693,333 of adjustments (credits) to the allocations to the AESO, the

³⁹See Appendix 2-A of **Attachment 2** for the 2015 NEL data by Regional Entity and calculation of the country allocation factors for each Region. MRO, NPCC and WECC are the only Regional Entities whose footprints encompass Canadian provinces (and for WECC, Mexico). As noted earlier, the year 2015 is the most recent calendar year for which NEL data is available.

IESO, New Brunswick and Québec for certain CMEP, Event Analysis and Situation Awareness (SAFNR⁴⁰) costs and the true-up of 2015 costs was allocated using 8-Region NEL. In accordance with NERC's *Expanded Policy on Allocation of Certain Compliance and Enforcement Costs*, adjustments were made in the calculations of the assessments to the AESO, the IESO, New Brunswick and Québec, to provide credits for certain activity costs. These adjustments recognize that entities in certain of these provinces (Ontario, Alberta and New Brunswick) expend resources to perform compliance and enforcement activities in those provinces that otherwise would be performed by NERC or a Regional Entity, and that the compliance and enforcement resources NERC needs for Alberta and Québec are reduced due to the very small number of entities subject to compliance and enforcement activities in those provinces.⁴¹ These adjustments also recognize that (1) certain compliance costs related to maintenance of the CMEP database are budgeted in the Information Technology program; and (2) certain NERC activities, including the SAFNR program, either overlap with Canadian regulatory programs or, as in the case of SAFNR, are not used by these Canadian provinces, and therefore these provinces were not allocated a share of these costs. In addition, these adjustments included a true-up of credits provided in 2015, based upon actual costs incurred in 2015. The credit amounts were allocated to all other LSEs (Balancing Authorities) on the basis of NEL.

Attachment 5 shows the calculations of these adjustments to the allocations to the AESO, the IESO, New Brunswick and Québec. The allocation of the \$1,693,333 of adjustments (credits) to the allocations to the AESO, the IESO, New Brunswick and Québec is reflected in

⁴⁰ SAFNR = Situation Awareness – FERC, NERC and the Regions.

⁴¹ FERC accepted NERC's *Expanded Policy on Allocation of Certain Compliance and Enforcement Costs* in the *July 16, 2009 Budget Compliance Order*, at P 42, finding that the Expanded Policy "provides reasonable guidelines for cost allocation in specific circumstances described in the document."

Appendix 2-C of **Attachment 2**.

Second, an allocation of \$1,100,000 of Penalty payments from the Assessment Stabilization Reserve was made to all U.S. LSEs. Because the Penalty payments are collected solely from U.S. Registered Entities, the Penalty payments are allocated solely to offset statutory assessments to U.S. LSEs.

Third, an allocation based on the 8-Region NEL was used to allocate \$60,956,314 of the NERC statutory assessment. The NEL-based allocations to the eight Regional footprints are shown in Appendix 2-C of **Attachment 2**.

NEL has also been used to allocate the Regional Entity assessments, with these exceptions: First, 23.28% of NPCC's Compliance Monitoring and Enforcement and Organization Registration and Certification (CORC) Program costs, representing CORC program fundamentals, has been allocated among the six Balancing Authority Areas in NPCC on the basis of NEL; 51.98% of the CORC costs has been allocated between the U.S. and Canadian Balancing Authority Areas in NPCC using a compliance audit-based methodology; and the remaining 24.74% of the CORC costs has been allocated between the U.S. and Canadian Balancing Authority Areas using an enforcement activity-based methodology. As directed in the *July 16, 2009 Budget Compliance Order*, PP 38-41, the portion of NPCC CORC costs allocated to the U.S. using the compliance audit-based methodology and the portion of NPCC CORC costs allocated to the U.S. using the enforcement activity-based methodology has then been re-allocated between the New England and New York Balancing Authority Areas based on NEL.⁴²

Second, WECC's allocation of its assessment to the AESO for the Province of Alberta has been reduced by \$969,620, representing WECC CMEP costs that are duplicative of programs

⁴² The allocation of NPCC CORC Program costs is described in greater detail at pages 59-61 of the NPCC 2017 Business Plan and Budget, **Attachment 3**.

of the AESO. The AESO credit amount was allocated to the remainder of the LSEs (Balancing Authorities) in the WECC Region on the basis of NEL.⁴³

After allocating the appropriate portions of the NERC, Regional Entity and WIRAB funding requirements to Canadian provinces and Mexico (taking into account the NEL-based allocations, the adjustments to the NERC allocations to the AESO, the IESO, New Brunswick and Québec, the adjustments to the NPCC allocations to Canadian provinces, and the adjustment to the WECC assessment to the AESO), the total ERO statutory assessment for 2017 allocable to Canadian LSEs is \$15,484,781, comprised of:

NERC Assessment:	\$5,353,026
Regional Entity Assessments:	\$10,131,755 (includes the WIRAB assessment)

The funding requirement of each Regional Entity for statutory activities is allocated 100% to that Region. The funding requirement for the WIRAB is allocated 100% to the WECC Region. The following table shows the allocation to each Region of the total 2017 ERO statutory assessment of \$15,484,781 for the Canadian statutory activities of NERC and the Regional Entities (including WIRAB). The table also shows the statutory assessments per kWh based on the 2015 Canadian NEL of each Region.

Regional Entity	NERC Assessment	Regional Entity Assessment	Total Canadian Assessment	Assessment per kWh (2015 NEL)
MRO	\$ 656,669	\$ 1,777,059	\$ 2,433,728	\$0.0000516
NPCC	\$ 3,294,554	\$ 5,360,364	\$ 8,654,918	\$0.0000250
WECC	\$ 1,401,802	\$ 2,994,332 ⁴⁴	\$ 4,396,135	\$0.0000354
Total	\$ 5,353,026	\$ 10,131,755	\$ 15,484,781	\$0.0000299

⁴³ See Appendix C of the WECC 2017 Business Plan and Budget, which shows the calculation of the \$969,620 adjustment to the WECC assessment to the AESO. The adjustment to the WECC assessment to the AESO is provided for in a memorandum of understanding entered into effective July 15, 2010 among NERC, WECC and the AESO.

⁴⁴ The number for WECC includes the portion of the WIRAB assessment allocated to the U.S.

NERC obtained from each Regional Entity a listing of the LSEs or their designees in the Region and a breakdown of the Region's 2015 NEL by LSE or designee.⁴⁵ NERC used this information to allocate the total ERO statutory assessment allocated to each Region among the LSEs, their designees or the other entities to be billed the assessments within that Region.⁴⁶ The amount of the NERC and Regional Entity statutory assessments allocated to each LSE or designee or other entity to be billed in each Region is shown in Appendix 2-B of **Attachment 2**.⁴⁷

As provided for in Exhibit E to the delegation agreement with each Regional Entity, NERC will directly invoice the approved assessments to LSEs or designees, or to the other entities to be billed, in all Regions except WECC.⁴⁸ WECC will invoice LSEs or Balancing Authorities or their designees within the WECC footprint, collect the assessments and remit the funds collected for the NERC, WECC and WIRAB assessments to NERC.

E. Provision for Working Capital Reserve

In the development of their 2017 Business Plans and Budgets and proposed assessment amounts to LSEs, NERC and the Regional Entities have taken into account the need to maintain appropriate amounts of working capital and operating reserves. NERC's WCOR Policy,

⁴⁵ For the NPCC Region, assessments are allocated on the basis of NEL in each Balancing Authority Area (New York, New England, Ontario, Québec, Nova Scotia and New Brunswick).

⁴⁶ Certain LSEs in MRO and WECC serve end users only in Canada or Mexico and not in the U.S. These LSEs were not allocated any portion of the ERO funding requirement allocated to U.S. end users, but were allocated appropriate portions, based on NEL (except as noted above), of the ERO funding requirement allocated to Canadian provinces or Mexico, as applicable.

⁴⁷ For reasons of administrative convenience, billing and payment by LSEs of annual assessments less than \$100 will not be required.

⁴⁸ As indicated above, the assessments in the NPCC Region will be billed to a single entity for each of the six Balancing Authority Areas within NPCC; and the assessments in the Texas RE region will be billed to ERCOT. (NERC also directly bills La Régie de l'énergie du Québec, which is not a LSE, for the CMEP costs allocated to Québec, and directly bills the total assessment in New Brunswick to the New Brunswick Energy and Utilities Board as the LSE in New Brunswick.)

originally developed in 2012 and revised in 2013 and again in 2015,⁴⁹ provides for budgeting and accounting for separate working capital and several categories of operating reserves with specified purposes, including an Assessment Stabilization Reserve. It also sets forth guidelines and authorities for accessing Working Capital and Operating Reserves and for use of funds for activities in excess of budgeted amounts. The amounts that NERC has budgeted for 2017 in the various reserves categories under its WCOR Policy, and the impacts on NERC's 2017 proposed statutory assessments, are discussed in §IV.B below and in Exhibit E to **Attachment 2**. The remainder of the discussion in this §III.E describes the development of the Regional Entities' Working Capital Reserve amounts and associated adjustments to assessments for 2017.

The process takes into account each Regional Entity's actual and projected Working Capital Reserves at December 31, 2015 and December 31, 2016, respectively, resulting from its accumulated prior years' surpluses and deficits, and results in an incremental or decremental adjustment to each Regional Entity's proposed 2017 statutory assessment amount, in order to arrive at its target Working Capital Reserve at December 31, 2017. Table B-1, Reserve Balance (Working Capital Reserve Balance), in Section B of each Regional Entity's 2017 Business Plan and Budget, shows the calculation of the increment or decrement to the Regional Entity's requested 2017 assessment to achieve the Regional Entity's desired Working Capital Reserve at December 31, 2017. The calculations shown on Table B-1 take into account: (1) the Regional Entity's actual Working Capital Reserve at December 31, 2015, (2) assessment Funding, projected other Funding, and projected Expenses and Capital Expenditures for 2016, resulting in (3) a projected Working Capital Reserve at December 31, 2016, (4) the desired (target) Working Capital Reserve at December 31, 2017, (5) the budgeted Expenses and Capital Expenditures, and

⁴⁹ See footnote 16 above.

projected other funding sources (including Penalties collected from Registered Entities during the 12 months ended June 30, 2016), for 2016, resulting in (6) the increment or decrement to the Regional Entity's requested 2017 assessments to achieve the target Working Capital Reserve at December 31, 2017.

As shown on Table B-1 in each Regional Entity's 2017 Business Plan and Budget, each Regional Entity (except SPP RE; *see* §V.B.6 below) has established a target Working Capital Reserve for 2017. The basis for each entity's Working Capital Reserve for 2017 is stated on its Table B-1 or explained elsewhere in the text of its 2017 Business Plan and Budget. Further discussion of the target Working Capital Reserve amount, and of the calculation of the adjustment (increase or decrease) to each Regional Entity's proposed 2017 statutory assessment to achieve its target Working Capital Reserve, is provided in the discussions of the individual Regional Entity 2017 Business Plans and Budgets in §V.B below.

As of the end of the second quarter of 2016, NERC and the Regional Entities are projecting year-end 2016 balances in Working Capital and Operating Reserves that are collectively \$33.2 million, which is \$10 million (42.7%) over the aggregate ending balances that were projected in their 2016 Business Plans and Budgets. This difference is primarily due to higher beginning balances (\$8 million).

The projected year-end 2016 balances of Working Capital and Operating Reserves for NERC and the Regional Entities included in their 2017 Business Plans and Budgets total \$31.4 million, which is \$2.2 million (6.7%) less than the aggregate projected year-end 2016 balances projected at the end of the second quarter of 2016. The difference between the two sets of projected year-end balances is related to the timing difference in the preparation of the projections. The projections included in the 2017 Business Plans and Budgets were prepared

earlier than the second quarter variance reports, based upon information available at the time, and were approved by the respective Boards prior to preparation of second quarter 2016 variance reports. NERC and the Regional Entities have planned to decrease reserves by \$7.2 million in the aggregate in their 2017 Business Plans and Budgets. Funds in excess of projected 2017 beginning Working Capital and Operating Reserve Balances will be subject to applicable Regional Entity controls over the expenditure of such funds and will be taken into account in developing 2018 funding requirements.

F. Budget Projections for 2018 and 2019

As it did its Business Plans and Budgets for each of the years 2008 through 2016, NERC is providing preliminary budget projections for the two years following the budget year (*i.e.*, 2018 and 2019).⁵⁰ This information is provided on pages 20-23 of **Attachment 2**.⁵¹ These budget projections show that NERC's 2018 total budget is projected to be approximately \$1.719 million, or 2.5%, above the 2017 total budget. For 2019, NERC's total budget is projected to be approximately \$1.791 million, or 2.5%, higher than the amount projected for 2018. The significant assumptions underlying these projections include: (i) no increases in total FTEs over budgeted 2017 FTEs; (ii) Personnel and Benefits costs per FTE are consistent with the 2017 budget assumptions; (iii) Operating Expenses (including Consultant & Contract Expense) are slightly higher in the projection years due to increases for maintenance costs associated with software applications supporting ERO Enterprise operations, and ongoing implementation of improved budgeting and financial reporting tools; (iv) debt service repayment obligations in connection with NERC's capital financing program consistent with the projected capital forecast

⁵⁰ The 2017 Business Plan and Budget of each Regional Entity also includes budget projections for 2018 and 2019.

⁵¹ The NERC Board has not approved the 2018-2019 projections as official budgets, and NERC is not seeking approval of these budget projections by the applicable governmental authorities.

for Enterprise IT applications; and (v) no increase in expenditures related to CRISP except for Personnel and Benefits expense increases consistent with the general assumption (item (ii) above) for these costs.

IV. DISCUSSION OF NERC BUSINESS PLAN AND BUDGET

A. 2017 Business Plan and Budget by Program

This section summarizes NERC's proposed 2017 Business Plan and Budget by statutory program and Administrative Services department. The proposed 2017 staffing and expenditure budgets for the individual NERC departments and programs are described in the subsections below. However, several factors impact the budgets for all programs and departments.

First, in the 2017 budget, the budgeted number of FTEs is slightly reduced from the 2016 budget. Budgeted FTE staffing for 2017 is 2.5 FTEs lower than in the 2016 budget, including a reduction of 0.7 FTE in the staffing for the statutory direct programs and 1.9 FTE in the administrative departments. Additionally, some staff have been (in 2016) or will be redeployed internally from one program or department to one or more other programs or departments which now have higher priority resource needs.

Second, in developing their budgeted staffing (FTEs) and related Personnel Expenses for 2017, all NERC programs and departments have applied a 6.0% vacancy rate reduction to FTEs to account for attrition and hiring delays. The vacancy rate adjustment reflects that actual staffing is typically less than budgeted staffing due to factors such as employees leaving NERC for other jobs and new positions being filled at a later date than was assumed in the preparation of the budget. The vacancy rate adjustment used for budgeting purposes is reviewed each year, based on historical attrition and the time it takes to recruit and onboard new staff, and is adjusted if appropriate. In the 2016 NERC budget, a 7.8% vacancy rate adjustment was used; in the 2015 budget, a vacancy rate adjustment of 6% was used. The decrease in the vacancy rate adjustment

factor used in the 2017 budget as compared to the 2016 budget causes slight increases (offset in some cases by a reduction in the number of budgeted positions (headcount)) in the budgeted 2017 FTE and Personnel Expenses for each program and department (which may be fully or partially offset by other factors for the individual programs and departments).

Third, in the development of Personnel Expense in the 2017 budget, market-based compensation and salary adjustments were assumed, based on guidelines established by the NERC CGHRC, market information provided by a nationally recognized compensation and benefits consulting firm, and other available data. An updated market compensation study was completed in late 2015 under the oversight of the CGHRC and was utilized in developing the budgeted compensation and salary adjustments for purposes of the 2017 budget.

Fourth, budgeted Benefits Expense is increased for all programs (all other things equal) due to anticipated market increases in medical and dental plan cost from the 2016 budget, based on information provided by NERC's benefits consultants.

Fifth, budgeted Meetings Expense and Travel Expense are relatively flat in the 2017 budget from the 2016 budget (decrease of \$25,000 (0.8%)), reflecting the significant actions NERC has taken over the past several years to reduce these expenses, including by working with Regional Entities to share meeting space where possible, to help reduce Meetings costs.

Sixth, budgeted Conference Calls Expense is reduced by \$222,400 (69.5%) from the 2016 Budget based on the execution of a contract for this service with a new provider in 2016. The reduction in costs under the new contract offsets an increase in maintenance costs associated with a new lease for audio-visual equipment and associated service and maintenance agreements (budgeted in Office Costs).

Although the overall budgeted staffing for NERC's statutory direct programs is virtually

the same (0.7 FTE decrease) as in the 2016 budget, there have been (as noted above) some reallocations of positions among the NERC programs to better align resources with needs, so that some statutory direct programs or departments are budgeted for increased staffing, and others for reduced staffing, as compared to the 2016 budget. The budgeted expenses and Fixed Assets expenditures for the Administrative Services programs (Indirect Expenses) are allocated to the statutory direct programs on the basis of the ratio of the budgeted FTEs in each statutory program to the total budgeted statutory program FTEs. The changes in the numbers of FTEs budgeted for each statutory direct program for 2017 as compared to the 2016 budget therefore impact the allocation of the Administrative Services costs among the statutory direct programs.

1. Reliability Standards Program

The Reliability Standards Program carries out the ERO's responsibility to develop, adopt, obtain approval of, and modify as and when appropriate, mandatory Reliability Standards for the reliable planning, operation and critical infrastructure protection of the North American Bulk Electric System (BES). The major activities of the Reliability Standards Program include (1) providing project management and leadership to the Reliability Standard development process to deliver high-quality, continent-wide Reliability Standards, including standard development outreach activities, assistance to and facilitation of Standard Drafting Teams' activities, drafting support, and ensuring that the quality of documents produced are appropriate for approval by industry and the NERC Board; (2) facilitating continent-wide industry engagement in the standard development processes; and (3) conducting balloting, disseminating information, and supporting regulatory filings on proposed standards. The Reliability Standards Program staff also supports Regional Entities' regional reliability standards development processes by providing technical advice, final quality review of Regional standards, presentation to the NERC Board, and submission to applicable regulatory authorities in the U.S. and Canada for adoption.

The key activities of the Reliability Standards Program underway in 2016 are described at pages 25-26 of **Attachment 2**, and include focusing on the selection of standard projects undertaken; addressing FERC directives and responding to FERC orders on Reliability Standards; performing enhanced periodic reviews of the existing Reliability Standards; and facilitating smooth transitions to new Reliability Standards, through working in conjunction with the Compliance Monitoring and Enforcement and Organization Certification and Registration, RASA, and Performance Analysis programs to develop guidelines, webinars, and other activities to support auditor and industry training for the new standards. The Reliability Standards program works in conjunction with the NERC Standards Committee, the RISC, and the Reliability Risk Management Process (RRMP) to develop annually the rolling three-year Reliability Standards Development Plan.

The 2017 goals and deliverables for the Reliability Standards Program are described at page 26 of **Attachment 2**, and reflect that the transformation of the NERC Reliability Standards to steady state⁵² is nearing completion, including addressing the majority of FERC directives and the recommendations of the Paragraph 81 initiative⁵³ and the Independent Expert Review Panel for retiring specified requirements of Reliability Standards. The Reliability Standards program will continue to address any new standards directives issued by FERC, as well as any reliability risks identified by the RISC or the RRMP for which a Reliability Standard is part of the solution.

NERC has budgeted 17.16 FTEs for the Reliability Standards Program for 2017, which is

⁵² NERC defines “steady state” in this context to mean a stable set of clear, concise, high-quality and technically sound Reliability Standards that are results based, including retirement of requirements that do little to promote reliability.

⁵³ The Paragraph 81 initiative was the result of FERC’s invitation, in a March 2012 order, to identify specific Reliability Standards or requirements that need to be revised or retired based on lack of meaningful benefit to BPS reliability. *North American Electric Reliability Corporation, Order Accepting with Conditions the Electric Reliability Organization’s Petition Requesting Approval of New Enforcement Mechanisms and Requiring Compliance Filing*, 138 FERC ¶ 61,193 (2012), at P81.

a decrease of 0.82 FTE from the 2016 budget and reflects the expectation that workload in the standards area will remain stable from 2016 to 2017. The 2017 budgeted direct expenses for this program are \$3,861,666, which is a decrease of \$27,102 (0.7%) from the 2016 budget. Budgeted 2017 Personnel Expenses are increased from the 2016 budget by \$56,958 (1.9%), although budgeted Payroll Taxes and Benefits Expense are both decreased from the 2016 budget. Meetings Expense and Travel Expense are budgeted at the same amounts as in the 2016 budget, while the budget for Conference Calls Expense is decreased by 92,435 (69.5%). The reduction in budgeted Conference Calls Expense is consistent with the overall reduction in this expense item due to the execution of a contract with a new service provider in 2016. As was the case in the 2014, 2015 and 2016 budgets, no Consultant & Contracts expense is budgeted for this program for 2017. The allocation of Administrative Services expenses to this program is \$4,180,279 (a decrease of \$53,741 from the 2016 budget), the Allocation of Fixed Assets from the Administrative Services programs is \$290,058, and no Fixed Asset additions are included in the 2017 budget for the Reliability Standards Program.

2. Compliance Monitoring and Enforcement and Organization Registration and Certification Program

The Compliance Monitoring and Enforcement and Organization Registration and Certification Program carries out NERC's responsibility to monitor, enforce and ensure registered entity compliance with mandatory Reliability Standards. This program is comprised of three operational groups: Compliance Assurance (addressing compliance monitoring), Compliance Analysis, Certification and Registration (addressing Assurance, Organization Certification and Organization Registration), and Compliance Enforcement.

a. Compliance Assurance

Compliance Assurance addresses the Regional Entities' implementation of the

compliance monitoring section of the CMEP. Compliance Assurance works collaboratively with the Regional Entities to ensure effective implementation of risk-based compliance monitoring under the CMEP across the ERO Enterprise, including the development by Regional Entities of customized compliance oversight plans (COPs) for each registered entity. Compliance Assurance's responsibilities include but are not limited to the following major activities and functions: (i) oversight of the quality implementation of the risk-based compliance monitoring program; (ii) development of the annual CMEP Implementation Plan; (iii) oversight of the use of necessary compliance-related processes, procedures, IT platforms, tools, and templates; (iv) development and delivery of education and training for ERO Enterprise staff; (v) Version 5 Critical Infrastructure Protection (CIP) standards activities related to education programs that support industry compliance and integration of risk assessment and internal controls; (vi) training and outreach activities related to effective implementation of the Physical Security Reliability Standard (CIP-014-1); (vii) coordination with the Reliability Standards program for standard development to assist in the smooth transition for standards from development to enforceability; (viii) support for Regional Entity and industry committees, working groups and task forces; and (ix) industry training for every Reliability Standard approved by FERC.

The specific goals and deliverables of Compliance Assurance for 2017 are described at page 30 of **Attachment 2** and include: (i) continuing to implement and mature the risk-based compliance monitoring program, fully developing customized COPs for registered entities; (ii) working closely with Compliance Enforcement, IT, and the Regional Entities, to improve the existing Compliance, Reporting, Analysis Tracking System (CRATS) and other compliance tools to support risk-based activities; (iii) supporting continued successful implementation of the Version 5 CIP standards and subsequent enhancements; (iv) continuing to monitor and support

implementation of the Physical Security Standard; (v) initiating a training program to support implementation of common audit procedures for each Reliability Standard; and (vi) continuing to integrate the standards and compliance functions for stakeholder implementation, including through common sets of Reliability Standards Audit Worksheets, measures, or successors, for all Reliability Standards.

The budgeted staffing for Compliance Assurance for 2017 is 15.51 FTEs, which is a decrease of 3.85 FTEs from the 2016 budget and reflects the reallocation of personnel to other program areas during 2016 to support initiatives for successful implementation and oversight of the risk-based CMEP. As a result, budgeted 2017 Personnel Expenses are decreased by \$674,828 (17.1%) from the 2016 budget. Budgeted Consultants & Contracts Expense is reduced by \$150,000 (75.0%) from the 2016 budget, to \$50,000. Budgeted 2017 Office Costs are increased by \$96,419 (215%) from the 2016 budget, primarily for costs for a new software audit tool.

The budgeted total direct expenses for Compliance Assurance for 2017 are \$3,816,924, which is a decrease of \$742,309 (16.3 %) from the 2016 budget, with the primary drivers of the decrease being the reduced staffing and related Personnel Expenses and the reduced Consultants & Contracts Expense. The allocation of Administrative Services expenses to Compliance Assurance is \$3,779,431 (a reduction of \$780,283, reflecting the reduced staffing in Compliance Assurance), Fixed Assets additions allocated to Compliance Assurance are \$262,244, and no Fixed Asset additions or Depreciation are budgeted for Compliance Assurance for 2017.

b. Compliance Analysis, Certification and Registration

The Compliance Analysis, Certification and Registration group is responsible for a range of requirements and activities embodied in Section 500 and Appendices 5A and 5B of the NERC Rules of Procedure. Specific activities include: (1) identification and registration of BES users, owners and operators who are responsible for compliance with Reliability Standards; (2)

certification of the competency of Reliability Coordinators, Balancing Authorities, and Transmission Operators to perform their reliability functions; (3) reliability assurance activities, including conducting activities to assure that certain actions have been taken as reported in response to NERC Alerts or guidance to industry, oversight of Regional Entity implementation of registration, compliance, certification, investigation, and complaint programs and processes, conducting compliance investigations and participating in Regional Entity-led investigations, working with Regional Entities to confirm that events and disturbances are evaluated against relevant Reliability Standards, and addressing formal complaints alleging violations of Reliability Standards.

The 2017 goals and deliverables for the Compliance Analysis, Certification and Registration group are described at page 33 of **Attachment 2** and include continuing to mature the NERC-led Panel to review entities for deregistration or applicability to a reduced number of standards; implementing registration program improvements identified during 2016, and conducting training as necessary; and implementing certification program improvements identified during 2016, and conducting training as necessary.

The budgeted staffing for Compliance Analysis, Certification and Registration for 2017 is 7.52 FTEs, which is a decrease of 2.62 FTE from the 2016 budget, reflecting a reduced workload for this group. Budgeted 2016 Personnel Expenses for this group is decreased by \$347,598 (18.8%) from the 2016 budget, reflecting the reduced staffing. No Consultants & Contracts Expense is budgeted for 2017, a reduction from \$50,000 budgeted in 2016.

The budgeted total direct expenses for Compliance Analysis, Certification and Registration for 2017 are \$1,686,689, which is a decrease of \$400,094 (19.2%) from the 2016 budget, with the primary drivers of the decrease being the reduced Personnel Expenses and the

reduced (to zero) Consultants & Contracts Expense. The allocation of Administrative Services expenses to Compliance Analysis, Certification and Registration is \$1,832,451 (a reduction of \$555,499 from the 2016 budget, reflecting the reduced FTE staffing); Fixed Assets allocated to Compliance Analysis, Certification and Registration are \$127,149; and no Fixed Asset additions or Depreciation are budgeted for Compliance Analysis, Certification and Registration for 2017.

c. Compliance Enforcement

Compliance Enforcement is responsible for overseeing enforcement processes, the application of penalties or sanctions, and activities to mitigate and prevent recurrence of noncompliance with Reliability Standards. Compliance Enforcement works collaboratively with the Regional Entities to ensure consistent and effective implementation of the risk-based CMEP, and focuses on ensuring that the ERO Enterprise dedicates resources to matters that pose the greatest risk to reliability. Ensuring successful implementation of the risk-based CMEP is the priority of Compliance Enforcement's oversight plan. Compliance Enforcement (i) monitors and provides oversight over the Regional Entities' enforcement processes and the outcomes of those processes to ensure due process, identify best practices, and promote consistency; (ii) collects and analyzes compliance enforcement data and trends to identify emerging risks and inform the development of enforcement policy and processes; (iii) files notices of penalties and other submittals associated with violations discovered through Regional Entity compliance monitoring and enforcement activities or through NERC-led investigations and audits; (iv) collaborates with other NERC departments including Reliability Standards, Compliance Assurance, Event Analysis, and Regional Entity Coordination (a function within the General and Administrative Department); and (v) delivers training of ERO Enterprise staff and registered entities and supports other outreach efforts. During 2016, Compliance Enforcement is continuing to conduct

outreach activities that focus on self-logging, compliance exceptions, risk elements, Version 5 CIP standards, Inherent Risk Assessments, internal controls, and Reliability Standards approved by FERC in 2016; and to provide training to Regional Entity staffs on the most important elements of risk-based enforcement. Compliance Enforcement's activities are further described at pages 35-41 of **Attachment 2**.

The 2017 goals and deliverables for Compliance Enforcement are described on page 41 of **Attachment 2**, and are focused on refining and improving the risk-based CMEP processes; implementing in a transparent manner the ERO Enterprise enforcement philosophy that is risk-focused and drives desired behaviors by registered entities; expanding the information feedback loop from Compliance Enforcement to Reliability Standards and other program areas; and working with Compliance Assurance, IT, and Regional Entity staff regarding improvements in the existing CRATS and other compliance tools to support risk-based CMEP activities.

The budgeted staffing for Compliance Enforcement for 2017 is 13.16 FTEs, which is an increase of 0.94 FTE from the 2016 Budget and reflects implementation of an internship program. Budgeted 2017 Personnel Expenses are \$147,851 (6.9%) higher than in the 2016 budget. As in the budgets for each of the years 2012 through 2016, no Consultants & Contracts Expense is budgeted for Compliance Enforcement for 2017. Compliance Enforcement is also supported by funding in the IT Department budget for the maintenance of existing software tools and development of plans for future tools for compliance assessment, registration, certification, and enforcement activities.

The budgeted total direct expenses for Compliance Enforcement for 2017 are \$2,371,347, an increase of \$145,409 (6.5%) from the 2016 budget. The allocation of Administrative Services expenses to Compliance Enforcement is \$3,206,790, the allocation of

Fixed Asset additions to Compliance Enforcement is \$222,510, and no Fixed Asset additions are budgeted for Compliance Enforcement for 2017.

3. Reliability Assessment and System Analysis Program

The RASA Program (formerly referred to as Reliability Assessment and Performance Analysis, or RAPA) carries out the ERO's statutory responsibility to conduct assessments of the reliability and adequacy of the BES in North America to provide insight and guidance about reliability risks. RASA's activities provide a foundation for the development of new, or modification of existing, Reliability Standards, or other initiatives that enhance overall reliability. The majority of RASA's activities directly address risk priorities established by the RISC. RASA focuses on developing a technical framework and understanding of the emerging reliability risks facing the industry and providing guidance and insights to enhance reliability.

The RASA Program is responsible for preparing independent assessments of the overall reliability and adequacy of the BES and associated reliability risks that could impact the short-term, mid-term and long-term (ten-year) planning horizons, and other reliability issues requiring an in-depth analysis; supporting development and improvement of long-term sustainable interconnection-based power flow, dynamic, and load models that exhibit the accuracy and fidelity reflecting actual BES reliability performance and dynamic conditions; conducting interconnection-wide analysis of steady-state and dynamic conditions, including frequency, Essential Reliability Services, stability, and oscillatory behavior aspects; advancing the industry's and the ERO's understanding of power system characteristics and behaviors by gathering larger Phasor Measurement Unit (PMU) datasets for advanced data analytics and modeling improvements; providing assurance oversight that the BES elements necessary for reliable operation are identified, thereby requiring the BES elements to follow applicable Reliability Standards; and establishing reliability leadership and consistent, technically sound

guidance and recommendations to position the industry and policymakers to enhance reliability through effective outreach and communications.

RASA works closely with other industry organizations, including the Electric Power Research Institute (EPRI), the U.S. Department of Energy (DOE), the Institute of Electrical and Electronic Engineers (IEEE), the Institute of Nuclear Power Operations (INPO), the North American Transmission Forum (NATF), the North American Generation Forum (NAGF), the Canadian Electricity Organization (CEA), the Interstate Natural Gas Association of America (INGAA), and the Natural Gas Supply Association (NGSA). Areas of collaboration with these organizations include geomagnetic disturbances, vegetation management, integration of variable generation, and interdependency of gas and electric systems.

The major activities of the RASA Program underway in 2016 are described at pages 44-46 of **Attachment 2**. These activities are focused on reliability assessment and system analysis. Reliability assessment activities include performing the NERC Long-Term Reliability Assessment and the Summer and Winter Reliability Assessments, as well as Short-Term and Special Reliability Assessments on emerging or high priority/high risk issues that warrant an independent assessment from the ERO, such as development of effective Essential Reliability Services. System analysis activities include PMU measurement, use and analysis improvements; Frequency Response Analysis, Interconnection Frequency Response Obligation (IFRO) analysis, and forward-looking reliability assessments; Interconnection-wide model building designation and criteria administration; analysis of TPL Footnote 12; load and distributed energy resource modeling; simulation and forensic analysis of major events; supporting Reliability Standards; and processing BES Exception requests and Self-Determined Notifications.

The 2017 goals and deliverables for the RASA Program are summarized at pages 46-47 of **Attachment 2**. They include: (1) implementing advanced reliability assessment and system analysis methods to address the changing nature of the grid, and issue reliability assessment reports, guidelines and recommendations to address high priority evolving performance trends and emerging risks to reliability; (2) conducting special assessments on high-priority risks identified by the RISC, including changing resource mix, maintaining Essential Reliability Services, increased penetration of distributed energy resources, increasing dependency on natural gas generation, and inter-area and local system oscillations and their potential impact on interconnection reliability; (3) providing the basis to industry to meet requirements of standard BAL-003-1, including the BAL-003 filing with the applicable governmental authorities, determination of IFRO and Balancing Authority Frequency Reporting Obligation values, as well as interconnection-wide studies of frequency response; (4) supporting standards development by providing subject matter expertise; (5) supporting the NERC Planning Committee and the subcommittees, working groups and task forces serving NERC standing committees, including supporting development of technical reference documents and Reliability Guidelines per the Planning Committee annual work plan; (6) supporting major event investigations, analyses, and reporting of findings, recommendations and lessons learned; (7) providing feedback to interconnection-wide model building groups on improvements to system model quality and fidelity; and (8) assisting in development of approaches to registration, providing input to the development of CMEP risk elements, and leading and supporting the BES Definition Exception process.

The budgeted staffing for the RASA Program for 2017 is 14.10 FTEs, which is an

increase of 2.35 FTEs from the 2016 budget.⁵⁴ Staffing is being increased in order to address resource demands associated with ongoing reliability assessment performance analysis and system analysis activities. Budgeted 2017 Personnel Expense is increased by \$534,398 (22.6%) over the 2016 budget. Budgeted 2017 Meetings Expense is decreased by \$47,010 (14.0%) from the 2016 budget. The RASA Program is budgeting \$525,000 for Consultants & Contracts Expense for 2017, which is a decrease of \$50,000 (8.7%) from the 2016 budget. The budgeted consultant and contractor resources will support research concerning reliability effects of geomagnetic disturbances and provide other reliability consulting support related to the U.S. EPA Clean Power Plan, essential reliability services and other probabilistic analysis.

The total budgeted direct expense for the RASA Program for 2017 is \$3,986,965, which represents an increase of \$208,370 (5.5%) from the 2016 budget. The RASA Program is budgeting \$50,000 of revenue from Services & Software and \$15,000 of revenue from Workshop attendance fees in 2017, the same amounts as budgeted for 2016. The allocation of Administrative Services expenses to this program is \$3,435,846, the allocation of Fixed Asset additions to this program is \$238,403, and there are no Fixed Asset additions budgeted for RASA in 2017.

4. Performance Analysis⁵⁵

The Performance Analysis group provides analysis and guidance about reliability risks and areas of concern based on analysis of historic system performance, including with respect to

⁵⁴ In NERC's 2016 Business Plan and Budget, the RAPA budget included costs for resources and activities now separately conducted and budgeted in the RASA and Performance Analysis programs. Comparisons to the 2016 RASA budget are based on the 2016 RAPA budget excluding activities, resources and costs now conducted and budgeted in the Performance Analysis Program (discussed in the next subsection of this filing).

⁵⁵ Activities of the Performance Analysis group were formerly conducted within the RAPA program; however, Performance Analysis is internally managed under the Reliability Risk Management department.

system, equipment, entity and organizational performance, that may indicate a need to develop remediation strategies, action plans, or data used to revise or retire Reliability Standards or consider new Reliability Standards. Performance Analysis focuses on developing a technical framework and understanding the reliability risks facing the industry.

Performance Analysis collects transmission outage, generator performance, demand response, and protection and control systems misoperations data in a common format using various industry databases. This data is used to develop and report grid metrics that analyze outage frequency, duration, causes, and other factors related to transmission and generator performance and automatic power system protection and control effectiveness. Trends, findings and recommendations from Performance Analysis serve as technical input to Reliability Standards development and to standards project prioritization, compliance process improvements, event analyses, reliability assessments, and critical infrastructure protection efforts. In 2017, Performance Analysis will add wind generator data to the data that is collected. The analyses and results collected and produced by Performance Analysis are reported in the annual State of Reliability Report, which provides guidance and recommendations for enhanced BPS reliability. In 2017, the State of Reliability Report will begin to reflect post-seasonal reliability review, insights from analysis of the Transmission Availability Data System (TADS), Generator Availability Data System (GADS), and Demand Response Availability Data System (DADS), as well as integration of event analysis and misoperations information. Performance Analysis works closely with other organizations, including EPRI, DOE, IEEE, INPO, NATF, NAGF, and CEA, on a number of fronts, including the TADS, GADS and DADS.

The 2017 goals and deliverables of the Performance Analysis group are described at pages 50-51 of **Attachment 2**, and include the following: (1) issuing the annual State of

Reliability Report, as well as guidelines, recommendations, and alerts as needed, including verification and validation of data and information through the Regional Entities and technical committees; (2) overseeing and evaluating reliability trends that identify reliability risks, by analyzing data contained in TADS, GADS and DADS as well as reliability metrics and protection and control systems misoperations data; (3) supporting Reliability Standards development by providing subject matter expertise; (4) providing support and leadership to subcommittees, working groups, and task forces serving the NERC standing committees; (5) assisting in the development of approaches to registration and providing input to NERC staff in support of development of CMEP risk elements; (6) conducting major event investigations and analyses and reporting major findings, recommendations, and lessons learned that will improve reliability; and (7) providing insights on emerging system protection issues, and handing-off any issues with future implications to RASA.

The budgeted staffing for the Performance Analysis program for 2017 is 9.40 FTEs, which is an increase of 2.49 FTEs from the 2016 budget, and reflects the allocation of additional personnel to Performance Analysis during 2016 to address increased resource needs associated with ongoing reliability assessment, performance analysis, and system analysis activities.⁵⁶ Budgeted 2017 Personnel Expenses are increased by \$557,212 (47.4%) over the 2016 budget, reflecting the increased staffing. Budgeted 2017 Consultants & Contracts Expense for Performance Analysis is \$528,082, which is a \$19,043 (3.7%) increase from the 2016 budget. Consulting and contractor support for Performance Analysis is for the TADS, GADS and DADS

⁵⁶ As noted earlier, in NERC's 2016 Business Plan and Budget, the RAPA budget included costs for resources and activities now separately conducted and budgeted in the RASA and Performance Analysis programs. Comparisons to the 2016 Performance Analysis budget are based on the 2016 RAPA budget excluding activities, resources and costs now conducted and budgeted in the RASA Program (discussed in the immediately preceding subsection of this filing).

and the Spare Equipment Database. Budgeted 2017 Office Costs are increased from \$23,732 in the 2016 budget to \$74,843, primarily for new software analytics tools.

The total budgeted direct expense for the Performance Analysis group for 2017 is \$2,459,356, an increase of \$621,111 (33.8%) from the 2016 budget. The allocation of Administrative Services expenses to Performance Analysis is \$2,290,564, the allocation of Fixed Assets additions to this program is \$158,936, and there are no Fixed Asset additions budgeted for Performance Analysis for 2017.

5. Reliability Risk Management

The Reliability Risk Management (RRM) group carries out NERC's responsibility to perform assessments (including real-time or near-real-time continual awareness, analysis of significant events, and longer-term broad performance assessments) of the reliability and adequacy of the BES, as well as identifying potential issues relating to system, equipment, entity and human performance that may indicate a possible need to develop or implement targeted interventions such as new or modified standards. The RRM group covers six primary functions: (i) BES awareness, (ii) event analysis and determination of root and contributing causes, (iii) assessment of human performance challenges affecting BES reliability and identification of improvement opportunities, (iv) continent-wide analysis and reporting of BES performance; (v) support of the NERC Operating Committee; and (vi) support of the NERC Critical Infrastructure Protection Committee. RRM has two departments, Situation Awareness and Event Analysis. The 2017 budgets for Situation Awareness and Event Analysis are discussed separately below.

a. Situation Awareness

The Situation Awareness Department works with the Regional Entities to monitor BES conditions, significant occurrences and emerging risks, and threats across the Reliability

Coordinator regions. Situation Awareness also supports development and publication of Alerts and awareness products and facilitates information sharing among industry, Regional Entities and government during crisis situations and major system disturbances.

During 2017, Situation Awareness is involved with enhancement, replacement, streamlining, or modification, as applicable, of a number of reliability tools: (1) operation and maintenance of the SAFNR Version 2 software application; (2) operation and maintenance of the current secure NERC Alerts tool while planning for a streamlined NERC Alert process and platform integrated with related ongoing NERC, E-ISAC and ERO Enterprise IT initiatives; (3) refresh of the Reliability Coordinator Information System (RCIS) application for operability and maintainability; and (4) continuing to set conditions to bring limited Synchrophasor data into NERC for wide-area situational awareness and event triage applications.

The 2017 goals and deliverables for Situation Awareness are described on page 54 of **Attachment 2** and include ensuring that the ERO is aware of all BES events above a threshold of impact; enabling the sharing of data and information to facilitate wide-area situation awareness; during crisis situations, facilitating the exchange of information among industry, Regional Entities, and U.S. and Canadian governments; keeping the industry informed of emerging reliability threats and risks to the BES, including any expected actions; conducting the annual NERC Monitoring and Situation Awareness Conference and Human Performance Conference; and administering the NERC Alerts process as specified in NERC ROP §810.

The 2017 budgeted staffing for Situation Awareness is 5.64 FTEs, which is virtually the same as (0.11 FTE increase) the 2016 budget and reflects the reduction in the vacancy rate adjustment. Budgeted 2017 Personnel Expenses are increased by \$175,488 (17.4%) from the 2016 budget. The budgeted Personnel Expenses are increased for Situation Awareness, and

decreased for Event Analysis (as described in the next subsection), despite small changes in staffing in those department, due to changes in the mix of managers and non-managers between the two departments.

The 2017 Consultants & Contracts budget for Situation Awareness of \$1,295,850 is an increase of \$84,375 (7.0%) from the 2016 budget. The budgeted 2017 Consultants & Contracts Expense includes increased costs for reliability tools (\$619,150, an increase of \$42,850); continued use of the Secure Alerting System (\$96,000, a \$45,000 decrease), which as noted above is being phased out; increased costs for SAFNR – Version 2 (\$505,700, an increase of \$67,500); and costs for the communications network that replaces NERCnet (\$75,000, an increase of \$19,025).

The total budgeted direct expense for Situation Awareness for 2017 is \$2,570,828, which is an increase of \$259,953 (11.2%) from the 2016 budget. The allocation of Administrative Services expenses to this program is \$1,374,338, the allocation of Fixed Asset additions to this program is \$95,361, and no Fixed Asset additions are budgeted for this program for 2017.

b. Event Analysis

The Event Analysis Department performs assessments of the reliability and adequacy of the BES, including identifying potential issues related to system, equipment, entity and human performance that may indicate a need to develop remediation strategies, action plans, or data used to revise Reliability Standards or consider new Reliability Standards. Event Analysis analyzes and determines the cause of system events, assures tracking of corrective actions to prevent recurrence, and provides lessons learned to the industry. Event Analysis analyzes all reportable events for sequence of events, root cause, risk to reliability, and mitigation, and provides lessons learned, emerging trends, risk analysis and expected actions to the industry.

Additionally, Event Analysis focuses on identifying human-error risks and precursor factors that allow human error to impact system reliability; educates industry regarding risks, precursors, and mitigation methods; supports compliance and standards training initiatives; and supports trending and analysis to identify emerging reliability risks to the BES.

The 2017 goals and deliverables for Event Analysis are described at page 58 of **Attachment 2**, and include: (1) working with Regional Entities to obtain and review information on qualifying events and disturbances in order to advance awareness of these events, facilitating analysis of root and contributing causes, risks to reliability, wide-area assessments, and remediation efforts, and disseminating information about events in a timely manner; (2) ensuring that all reportable events are analyzed for sequence of events, root cause, risk to reliability and mitigation; (3) continuing to refine risk-based methodologies to support better identification of reliability risks, including the use of more sophisticated cause codes; (4) conducting training to inform industry and the ERO of lessons learned, root cause analysis, trends, human performance, and extreme weather preparedness and recommendations; (5) developing reliability recommendations and alerts as needed and tracking industry accountability for critical reliability recommendations; (6) ensuring that industry is well informed of system events, emerging trends, risk analysis, lessons learned and expected actions; and (7) conducting major event analysis and reporting of major findings and recommendations that will improve reliability. Additionally, Event Analysis will support several of the top priority reliability risk projects described in the Performance Analysis section, above.

The 2017 budgeted staffing for Event Analysis is 11.28 FTEs, which is an increase of 0.22 FTE from the 2016 budget, and reflects the lower vacancy rate adjustment used in the 2017 budget. Budgeted 2017 Personnel Expenses are decreased by \$5,614 (0.3%) from the 2016. No

Consultants & Contracts Expense is budgeted for Event Analysis for 2017 (versus \$56,000 in the 2016 budget), as 2016 projects requiring consultant and contractor support will have been completed.

The total budgeted direct expense for Event Analysis for 2017 is \$2,592,388, which is a decrease of \$57,677 (2.2%), reflecting decreased Personnel, Meetings, and Consultants & Contracts Expenses from the 2016 budget. The allocation of Administrative Services expenses to Event Analysis is \$2,748,677, the allocation of Fixed Asset additions to Event Analysis is \$190,723, and no Fixed Asset additions are budgeted for Event Analysis for 2017.

6. Electricity Information Sharing and Analysis Center (E-ISAC)

The E-ISAC reduces cyber and physical risk to the Electricity Subsector across North America by providing insights, leadership and coordination as a trusted, timely, actionable resource of grid risk information and analysis to enhance reliability. The E-ISAC facilitates Electricity Subsector and cross-sector coordination regarding physical security and cyber security events affecting the BES. Additionally, E-ISAC performs the management role for the CRISP, a public-private partnership whose purpose is to facilitate the sharing of cyber threat information and develop situation awareness tools that enhance the Electricity Subsector's ability to identify, prioritize, and coordinate the protection of its critical infrastructure. CRISP provides critical infrastructure owners and operators the capability to voluntarily share cyber threat data, analyze this data, and receive machine-to-machine mitigation measures.

The E-ISAC supports an annual grid security conference and a biennial Grid Security Exercise. A biennial Grid Security Exercise was conducted in 2015 and not in 2016, and therefore a Grid Security Exercise is planned, and the associated costs budgeted, for 2017.

The budgeted 2017 staffing for the E-ISAC is 19.74 FTEs, which is an increase of 0.84

FTE from the 2016 budget and is the result of the reallocation of personnel resources from several other departments to E-ISAC during 2016. Budgeted 2017 Personnel Expenses are increased by \$88,711 (2.1%) over the 2016 budget, with the main component of the increase being an increase in Benefits Expense. Budgeted 2017 total Meeting Expense is decreased by \$15,290 (3.0%) from the 2016 budget, with the entire decrease occurring in Conference Calls Expense. The budgeted 2017 expense for Consultants & Contracts for E-ISAC is \$6,788,429, which is an increase of \$236,500 (3.6%) from the 2016 budget. Consultants & Contracts Expense is increased by \$383,000 is for the 2017 Grid Security Exercise (as noted above, the biennial Grid Security Exercise was not conducted in 2016, therefore no Consultant & Contracts Expense for this activity was included in the 2016 budget). There is no increase in budgeted Consultants & Contracts Expense for CRISP (budgeted Consultants & Contracts Expense for CRISP is \$5,888,594), and budgeted Consultants and Contracts Expense for other initiatives and activities in the E-ISAC is reduced by \$146,500, resulting in the net increase of \$236,500. During 2017, NERC will continue to subcontract to Pacific Northwest National Laboratory the majority of the resource requirements and associated costs to operate and maintain CRISP.

Budgeted 2017 Office Costs for E-ISAC are increased by \$39,610 (10.1%) over the 2016 Budget, primarily due to higher software maintenance costs. Finally, \$175,000 is included in the E-ISAC budget for Professional Services (same amount as in the 2016 budget) for professional services support and insurance for CRISP.

The budgeted direct expense for 2017 for the E-ISAC is \$12,276,689, which is an increase of \$311,340 (2.6%) from the 2016 budget. The allocation of Administrative Services expenses to the E-ISAC is \$4,810,185, the allocation of Fixed Assets to the E-ISAC is \$333,765, and \$1,100,000 of Fixed Asset additions are budgeted for the E-ISAC for 2017, for Computer &

Software Capital Expenditures, an increase of \$1,000,000 over the 2016 budget. The \$1,000,000 of additional Fixed Asset expenditures is budgeted for enhancements to the E-ISAC portal, with \$250,000 of this expenditure allocated to CRISP.

The E-ISAC budget for 2017 includes \$6,990,447 of Third-Party Funding (an increase of \$159,709 from the 2016 budget), which represents the funding being provided by participating utilities and other entities, pursuant to the master services agreement for CRISP, to support NERC's participation and activities as program manager for CRISP. The Third-Party Funding is equal to approximately 84% of the CRISP budget. Third-Party Funding for CRISP is deposited in a separate account. Any underrun in the CRISP budget which is allocated to and funded by CRISP participants will be applied as a credit against future CRISP participant funding requirements, pursuant to the terms of the CRISP agreements.

7. Training, Education, and Operator Certification Program

The Training, Education, and Operator Certification Program provides oversight and coordination of the delivery of training programs that support the ERO's statutory responsibilities, by providing training and education to NERC and Regional Entity staff, including compliance auditors, relating to their job responsibilities, and to industry participants on the requirements of Reliability Standards, the standards development process, and the compliance monitoring and enforcement process. The Training, Education, and Operator Certification Program also supports NERC's System Operator Certification and Continuing Education Programs, which ensure that personnel operating the BES have the skills, training and qualifications needed to operate the system reliably. NERC maintains the credentials required to work in system control centers across North America for over 6,000 system operators. The System Operator Certification Program is governed by the Personnel Certification Governance

Committee (PCGC), an industry group of operations experts, trainers, and supervisors. Certification exams are created by the Exam Working Group (EWG), an industry group of operations subject matter experts. Once an operator achieves certification by passing the examination, the operator's certification is maintained by completing NERC-approved continuing education courses and activities. The NERC Personnel Subcommittee, comprised of industry training experts, provides oversight of the Continuing Education Program.

The major activities of the Training, Education, and Operator Certification Program for 2016 are described at pages 65-66 of **Attachment 2** and include providing education for industry and ERO personnel in the following areas: risk-based compliance monitoring and enforcement; standards and compliance; registration and certification; event analysis, cause analysis, and lessons learned; reliability assessment and system analysis; continuing education for system operators; and new system operator certification exams for the credentials of Reliability Coordinator, Transmission Operator, Balancing and Interchange Operator, and Balancing, Interchange and Transmission Operator.

The 2017 goals and deliverables of the Training, Education, and Operator Certification Program are described at pages 66-67 of **Attachment 2**. A primary objective, in response to stakeholder and Regional Entity feedback, is to further expand and focus training and education opportunities for NERC, Regional Entity and registered entity personnel, including on topics for registered entities such as objectives of Reliability Standards, standards compliance, emerging cyber-related issues that could affect BES reliability; and topics for ERO personnel such as consistent audit and investigation techniques and standards compliance reviews, including risk-based compliance monitoring and enforcement and other improvements in compliance and enforcement practices. Training will continue to be offered in auditor skills to promote

continued development of auditing expertise. Other training will focus on knowledge and skills development in a number of areas, including development and implementation of clear and technically sound Reliability Standards; lessons learned and trends from events; identified themes from trending and common cause analysis; effective compliance cultures with practices, procedures and controls to address reliability risks; effective root, apparent, and common cause analysis methods; quality improvement of registered entity self-reporting and self-certification; entity registration processes, issues, and alternatives; human performance fundamentals; and developing and incorporating a systematic approach to ongoing training. Training and education opportunities will be provided through workshops hosted by NERC and the Regional Entities, webinars, training courses, and vendor-provided training modules and other offerings. The Training, Education, and Operator Certification Program will provide coordination and synchronization for shared NERC and ERO training responsibilities.

Additionally, as part of the System Operator Certification exam development cycle, the results of the Job Task Analysis conducted in 2015 will be the baseline for the next set of certification exams. Deliverables for the System Operator Certification Program in 2017 will be completing analysis of the exam Item Bank and implementation of Linear On The Fly testing for all exams. The System Operator Certification Program will continue to work with industry stakeholders and the certification examination development vendor to create certification exams that will promote the reliability of the North American BPS.

Finally, in 2017, the Continuing Education program will evaluate and revise the current program criteria in the Continuing Education Program Manual. This evaluation will consider the growth and maturity of industry training programs as well as ongoing research on adult learning, to ensure that the Continuing Education program continues to foster improvement in

training and promote quality in training programs.

The budgeted staffing for the Training, Education, and Operator Certification Program for 2017 is 7.05 FTEs, which is a decrease of 0.33 FTE from the 2016 budget, and is due to a slight reduction in the FTEs supporting the System Operator Certification Program. Budgeted 2017 Personnel Expense is virtually the same (\$1,227 increase) as the 2016 budget. Budgeted total Meeting Expense for 2017 is decreased by \$50,368 (36.6%) from the 2016 budget, with decreases of \$25,000 for Meetings and \$25,368 for Conference Calls Expense. The budgeted Consultants & Contracts Expense for 2017 of \$580,600 is a decrease of \$95,200 (14.1%) from the 2016 budget, with the principal areas of reduction being in consultant and contractor support for database development (\$24,000 decrease) and the SOCCED Database Improvement Project (\$100,000 decrease) in the System Operator Certification Program. Of the total 2017 budgeted Consultants & Contracts Expense of \$580,600, \$360,800 is for training and education (including continuing education) activities and \$219,800 is for System Operator Certification activities.

The direct expense budgeted for the Training, Education, and Operator Certification Program for 2017 is \$1,992,295, which is a decrease of \$139,791 (6.8%) from the 2016 budget. The allocation of Administrative Services expenses to this Program is \$1,717,923 (a slight decrease (\$19,111) from the 2016 budget, reflecting the reduction in budgeted staffing), the allocation of Fixed Assets to this program is \$119,202, and no Fixed Asset additions are budgeted for this program in 2017.

The System Operator Certification Program generates revenues from fees charged for system operator certification examinations, which are intended to recover the costs (including an allocation of indirect expenses) of the Program. In addition, fees charged to continuing education providers offset costs associated with the review of courses taken by certified

operators to maintain their certification. The 2017 budget includes projected revenues from Testing Fees totaling \$1,921,900, which is an increase of \$53,928 (2.9%) from the 2016 budget.

Under NERC's Working Capital and Operating Reserve Policy, a separate Operating Reserve account is established for any revenues realized by the System Operator Certification Program in excess of expenses incurred for the Program, to be used solely for operator certification needs as determined by NERC management and the PCGC. NERC has established a target Operating Reserve for this program of \$714,118 at December 31, 2017, and has projected a \$683,716 Operating Reserve balance for the System Operator Certification Program at December 31, 2016. Therefore, for 2017, revenues of the System Operator Certification Program will provide \$30,402 for the Operator Certification Operating Reserve.

8. Administrative Services

The Administrative Services departments support the NERC statutory programs. Administrative Services comprises the following functions: (i) Technical Committees and Members' Forums (which has no budgeted resources for 2017); (ii) General and Administrative (which includes senior executive and administration and Board functions); (iii) Legal and Regulatory; (iv) Information Technology; (v) Human Resources; and (vi) Finance and Accounting. Descriptions of the responsibilities of each of the functions included in Administrative Services are provided in the text at pages 70-81 of **Attachment 2**.

The total amount budgeted for expenses and Fixed Assets in Administrative Services for 2017 (before provision for Working Capital and Operating Reserves) is \$31,414,834, which is an increase of \$972,399 (3.2%) over the 2016 budget. The total budgeted staffing for the Administrative Services departments for 2017 is 69.33 FTEs, which is a decrease of 1.91 FTEs from the 2016 budget. Budgeted Personnel Expenses for 2017 for Administrative Services are

increased by \$823,720 (5.8%) from the 2016 budget. Budgeted total Meetings Expense (Meetings, Travel, and Conference Calls) is reduced by \$8,994 (0.9%) from the 2016 budget, with a decrease in Conference Calls Expense of \$43,994, due primarily to the contract with a new provider as described earlier, more than offsetting a \$35,000 increase in budgeted Meetings Expense from the 2016 budget.

Consultants & Contracts Expense budgeted in Administrative Services for 2017 is \$3,359,787, which is an increase of \$323,116 (10.6%) over the 2016 budget. The principal areas of increase are increases for IT, totaling \$218,116, for ERO Application Development and Support (increase of \$273,116) and ERO Data Analysis (increase of \$100,000), partially offset by a decrease of \$155,000 in Consultants & Contracts support for Applications Enhancements, Consulting and Help Desk Support (total budgeted Consultants & Contracts Expense for IT is \$2,312,787); an increase for HR of \$25,000 for Training and Development (total budgeted Consultants & Contracts Expense for HR is \$575,000); and an increase of \$160,000 for Finance and Accounting for Internal Controls and Outside Auditor Consulting Support and other finance and accounting consulting support (total budgeted Consultants & Contracts Expense for Finance and Accounting is \$457,000). These increases are partially offset by a decrease of \$80,000 in budgeted Consultants & Contracts Expense in General & Administrative, reflecting that an ERO Effectiveness Survey conducted with outside assistance in 2016 will not be repeated in 2017.

Budgeted Office Rent for 2017 (budgeted entirely in General & Administrative for all NERC programs and functions) is \$3,117,009, which is an increase of \$62,722 (2.1%) from the 2016 budget. Budgeted rent expense is decreasing by \$116,143 from the 2016 budget due to the termination of the lease for NERC's former Washington, D.C., office; however, budgeted maintenance costs at NERC's offices (budgeted in the Office Rent line item) are increasing by

\$178,866 from the 2016 budget, due to increases per the terms of the leases as well as increases in property taxes and other costs not covered under the terms of the leases. Budgeted Office Costs for Administrative Services 2017 are increased by \$355,274 (12.2%) over the 2016 budget, primarily due to increased costs for Computer Maintenance & Service Agreements in IT.

Budgeted 2017 Professional Services Expense for Administrative Services is \$2,293,135, which is a decrease of \$41,165 (1.8%) from the 2016 budget, primarily due to a reduction of \$175,000 in budgeted Outside Legal Expense. The budgeted amount for Independent Trustee fees is increased by \$99,646 (8.8%) from the 2016 budget. The increased Independent Trustee compensation is supported by a compensation study performed by an independent compensation consultant, and was approved by the NERC Board at its August 13, 2015 meeting based on the recommendation of the CGHRC of the Board.⁵⁷ Based on its review of the compensation study and other industry information, as well as the increasing workload for NERC Trustees and overall budgetary constraints, the Board, at the August 13, 2015 meeting, determined to: (1) maintain an annual retainer structure (rather than per-event or time-based payments), as consistent with industry best practices; (2) phase in a new annual retainer amount for Trustees of \$112,500 in installments over a three-year period (2016-2018); (3) make no change to the current annual retainer amount for Board committee chairs and for the Board member serving on the Electricity Subsector Coordinating Council; (4) phase in a new target annual retainer for the Board Chair of \$160,000 in installments over a three-year period (2016-2018); and (5) make no change to the current annual retainer amount for the Board Vice Chair. The increase in Independent Trustee fees in the 2017 budget represents the second step of the three-year phase-in

⁵⁷ A copy of the compensation study, performed by the Towers Watson consulting firm (*Board of Trustee Remuneration Review*, July 2015) was provided as Attachment 16 to NERC's 2016 Business Plan and Budget Filing in Docket RR15-16-000 (2016 Business Plan and Budget Filing).

of the increased annual retainer amounts for Trustees and for the Board Chair (items (2) and (4) listed above). In accordance with Paragraph 12(a) of the Settlement Agreement for FERC's 2011 financial performance audit of NERC, which requires the NERC Board to review Trustee compensation on an annual basis,⁵⁸ the CGHRC, at its April 27, 2016 meeting, reviewed the Trustee compensation plan, including the three-year phase-in schedule, that had been approved by the Board in August 2015 based on the comprehensive compensation study conducted by Towers Watson. The CGHRC concluded that for purposes of the 2017 Business Plan and Budget, there is no need to depart from the approved Trustee compensation plan and phase-in schedule.⁵⁹ At its August 11, 2016 meeting, the NERC Board adopted this recommendation.

The other components of budgeted Board of Trustees expenses for 2017 (Trustee meetings and travel expenses and Trustee search fees) are the same as in the 2016 budget. The table on page 71 of **Attachment 2** details budgeted Board expenses for 2016 and 2017.

Additionally, the budgeted amount for Outside Services, included in Professional Services, is increased by \$14,554 (8.9%) over the 2016 Budget, due to increases in the costs for various employee benefits management systems (budgeted in HR).

The 2017 Administrative Services budget includes \$37,000 of Miscellaneous Expense (detailed in Table B-10 of **Attachment 2**) and \$106,725 of Other Non-Operating Expenses (detailed in Table B-11). The Other Non-Operating Expenses cover NERC's property tax obligations on the value of property and equipment in NERC's Atlanta office and data center (\$50,000), and Interest expense for 2017 under NERC's capital financing plan (\$56,725), which is discussed in §IV.D below. The 2017 budgeted amount for interest expense is a decrease of

⁵⁸ Annual review of Trustee compensation is also required by the CGHRC's mandate and by NERC's Governance Guidelines.

⁵⁹ <http://www.nerc.com/gov/bot/GOV/Board%20of%20Trustees%20Governance%202013/CGHRC%20-%20April%2027%202016%20Conference%20Call%20Minutes.pdf>.

\$3,275 from the 2016 budget, and is calculated based on the expected draws on NERC's capital financing loan (*see* Exhibit D – Capital Financing in **Attachment 2**).

The 2017 Administrative Services budget includes \$1,472,000 of Computer & Software Capital Expenditures (a decrease of \$875,000 from the 2016 budget) and \$1,800,000 of Equipment Capital Expenditures (an increase of \$336,000 from the 2016 budget). The Computer & Software Capital Expenditures are described further under IT, below. The increase in Equipment Capital Expenditures is primarily for security devices.

All Administrative Services expenses and Fixed Asset additions are allocated to the statutory programs on the basis of proportional numbers of budgeted FTEs in the statutory programs.

The following paragraphs provide further information on the 2017 activities and budgeted expenditures and staffing for the individual Administrative Services functions.

Technical Committees and Members' Forums – While NERC management and staff will continue to interact with and support numerous reliability-related industry forums during 2017, including the NATF and the NAGF, the 2017 budget does not include any specific projected expense or funding for any forum activities.

General and Administrative – The General and Administrative function is responsible for administration and general management of NERC. Expenses budgeted in this area include Office Rent; Personnel Expense and related costs of the Chief Executive Officer (CEO), the Chief Reliability Officer, and the CEO's executive assistant; communications, external affairs and governmental relations; and costs related to the Board. Budgeted staffing for this function for 2017 is 16.92 FTEs, which is a decrease of 0.60 FTE from the 2016 budget and reflects reallocations of personnel occurring during 2016, with no additional personnel budgeted for

2017 beyond current staffing. Budgeted Consultants & Contracts Expense is reduced by \$80,000 due to elimination of costs for a one-time ERO effectiveness survey conducted in 2016. The total 2017 budgeted Expenses plus Fixed Assets for General and Administrative is \$10,205,977, which is an increase of \$324,666 (3.3%) over the 2016 budget.

Legal and Regulatory – The Legal and Regulatory function provides legal and regulatory support to the organization, including to Compliance Analysis, Certification and Registration, Reliability Risk Management, RASA, Performance Analysis, and Reliability Standards. In addition, Legal and Regulatory is responsible for providing a wide range of legal support to the organization in corporate, commercial, contractual, employment, insurance, real estate, intellectual property, tax and other legal matters. Budgeted staffing for 2017 for Legal and Regulatory is 11.28 FTEs, a decrease of 0.94 FTE from the 2016 budget. The total 2017 budgeted Expenses plus Fixed Assets for Legal and Regulatory is \$3,292,379, which is a decrease of \$173,587 (5.0%) from the 2016 budget.

Information Technology – NERC's IT department is responsible for supporting the development and maintenance of ERO Enterprise applications, data analysis and ongoing internal operations. IT's budgeted activities fall into four categories: (1) development of new functionality and enhancements to applications used by the ERO Enterprise; (2) maintenance of infrastructure and support for applications used by the ERO Enterprise and by registered entities; (3) development of new functionality that enhances or improves the internal NERC infrastructure (e.g., document management, telephony, and audio-visual); and (4) maintenance and support of the NERC internal office infrastructure, such as servers, software, network equipment, data and telecommunications circuits, data storage, office administrative applications, and user hardware. Ongoing operations include continued implementation of an improved entity registration

application; maintenance and enhancements for the compliance data base (CRATS/webCDMS); maintenance and enhancements for various existing applications and databases, such as BESnet, RCIS, the Standards Balloting System, and Reliability Assessment Data System; quarterly penetration and vulnerability testing for all NERC networks and systems; the NERC security program, which is the subject of ongoing enhancements based on internal audit recommendations; implementation of the document management program and intranet and extranet development and enhancements; and continuing enhancements to the NERC public website. During 2017, as in 2016, major areas of focus will be development and implementation of a common entity registration system to be used across the ERO Enterprise, development of the ERO Enterprise document management program, ongoing maintenance of and enhancements to CRATS, and replacement of audio-visual equipment in NERC's conference rooms.⁶⁰

The 2017 budgeted Expenses plus Fixed Assets for the IT Department is \$12,480,846, which is an increase of \$324,171 (2.7%) over the 2016 budget. The 2017 budgeted staffing for IT is 23.27 FTEs, an increase of 1.14 FTEs over the 2016 budget, reflecting the reallocation of personnel from other departments to provide increased project management oversight over NERC and ERO Enterprise software application development and implementation.

Budgeted 2017 Consultants & Contracts Expense for IT is \$2,312,787, an increase of \$218,116 (10.4%) over the 2016 budget. The major areas of increase and decrease in the 2017 budget were described earlier in this §IV.A.8 and are shown on Exhibit C – Contractor and Consulting Costs in **Attachment 2**.

Office Costs budgeted in IT for 2017 total \$2,595,408, which is an increase of \$356,213

⁶⁰ The planned development of an ERO Enterprise document management program was described in NERC's *Request for Approval of an Expenditure Greater than \$500,000 from Operating Reserves*, filed with FERC on May 14, 2015 in Docket No. RR14-6-002.

(15.9%) over the 2016 budget. Costs budgeted in this expense item include telephone expenses, Internet, computer supplies and maintenance (including computers, computer supplies, maintenance and service agreements, and software), subscriptions and publications, dues, and express shipping costs for shipping of computers and computer supplies. The principal increase in Office Costs in the 2017 budget is \$340,793 for computer Maintenance and Service Agreements, due primarily to increased maintenance costs for new data center hardware installed in 2015 and 2016, new network storage devices, and maintenance costs for new audio-visual equipment. All other components of Office Costs are unchanged or have only minor changes from the 2016 budget. Additional description of the costs budgeted in these expense categories is provided at page 78 of **Attachment 2**.

The 2017 IT budget includes total Capital Expenditures of \$3,272,000, versus \$3,911,000 in the 2016 budget. The IT Capital Expenditures budget includes expenditures for development of ERO Enterprise applications (\$700,000, a decrease of \$800,000 from the 2016 budget) and the document management program (\$335,000, a decrease of \$130,000 from the 2016 budget). The Capital Expenditures budget also includes expenditures for other IT hardware such as storage, servers and laptops (\$991,000, versus \$955,000 in the 2016 budget); other equipment (\$885,000, versus \$535,000 in the 2016 budget, primarily for security devices, as mentioned earlier); disaster recovery hardware (\$150,000, versus \$200,000 in the 2016 budget); and software licenses (\$211,000, versus \$256,000 in the 2016 budget).

Human Resources – HR manages all of NERC’s human resources functions, including staffing, benefits administration, employee relations, performance and compensation management, and training and development. HR’s activities include management and staff training and development, use of compensation consultants to provide employment market data,

stakeholder surveys including surveys of Board and committee effectiveness, succession planning, and automation of HR products and services. The total budgeted Expenses and Fixed Assets for HR for 2017 is \$1,608,583, which is an increase of \$98,406 (6.5%) from the 2016 budget. The increased budget amount includes an increase of \$25,000 (to \$350,000) in Consultants & Contracts expense over the 2016 budget for additional staff training and development, as well as \$100,000 for compensation consulting services, \$50,000 for employee, industry and Board surveys, and \$75,000 for HR consulting services (no change from the 2016 budget for these items). The 2017 budgeted staffing for HR, 2.82 FTEs, is virtually unchanged (0.05 FTE increase) from the 2016 budget, and reflects the lower vacancy rate adjustment.

Finance and Accounting – Finance and Accounting manages all of NERC’s finance and accounting functions, including employee payroll, retirement plans, travel and expense reporting, monthly financial reporting, sales and use taxes, meeting and events planning and services, insurance, internal audit, and facilities management. Finance and Accounting has primary responsibility for development of the annual business plan and budget, and for NERC’s internal controls and ERO risk management function. The total budgeted Expenses and Fixed Assets for 2017 for Finance and Accounting is \$3,827,050, which is an increase of \$398,743 (11.6%) from the 2016 budget. Consultant & Contracts Expense of \$457,000 is budgeted for Finance and Accounting, an increase of \$160,000 over the 2016 budget, with \$300,000 budgeted for internal controls and outside auditor consulting support and \$157,000 budgeted for finance and accounting consulting support. The increase of \$160,000 over the 2016 budget is primarily due to an increase in outside professional support for auditors to support various risk management and internal control and audit initiatives. The 2017 budget for Finance and Accounting also incorporates increases in Professional Services Expense for accounting and auditing fees and

commercial insurance. The 2017 budgeted staffing for Finance and Accounting is 15.04 FTEs, which is a decrease of 1.56 FTE from the 2016 budget and is due to reallocation of resources to other departments during 2016.

B. Working Capital and Operating Reserves

NERC's Working Capital and Operating Reserve Policy, adopted by the NERC Board in 2012 and amended in 2013 and in 2015, provides for separation of Working Capital from Operating Reserves, establishes criteria and authorities for funding and access to Working Capital and Operating Reserves and transfers of funds between the reserve accounts, establishes controls and authorities regarding the reallocation of budgeted funds to other uses, and establishes transparent reporting requirements. The 2015 amendments to the WCOR Policy, which NERC filed on September 10, 2105 and FERC approved in Docket RR15-8-000,⁶¹ established the categories of Operating Reserves maintained by NERC: Future Obligations Reserve, Operating Contingency Reserve, System Operator Certification Program Reserve, CRISP Reserve, and Assessment Stabilization Reserve. Table B-1 and Exhibit E in **Attachment 2** show and explain the amounts of Working Capital and Operating Reserves proposed to be budgeted, and reflected in the setting of NERC's assessments, for 2017.

The amounts budgeted for 2017 for each Working Capital and Operating Reserve category (target balances at December 31, 2017) are as follows:

Working Capital: \$0.

NERC maintains a \$4,000,000 line of credit with a major financial institution, and based on its cash flow projections and the timing by which the NERC assessments are billed and paid, does not anticipate a need to access working capital in 2016 to meet monthly cash flow needs.

Operating Reserves: \$7,759,102.

Future Obligations Reserve: \$2,646,709

⁶¹ See footnote 16 above.

The target level for the Future Obligations Reserve at December 31, 2016, as presented in NERC's 2016 Business Plan and Budget, was \$3,158,074; therefore, the target level for this reserve is being reduced by \$511,365.

Operating Contingency Reserve: \$2,227,275

The WCOR Policy specifies that except as otherwise approved by the NERC Board, the budgeted Operating Contingency Reserve level is to be between 3.5% - 7.0% of NERC's total expenses and Fixed Assets budget excluding the budgets for the System Operator Certification Program and CRISP, which have their own reserves. Based on the budgeted 2017 expenses and Fixed Assets, the target amount for the Operating Contingency Reserve at December 31, 2017 is slightly below the low end of this range, but has been approved by the Board.

System Operator Certification Program Reserve: \$714,118.

The projected December 31, 2016 reserve balance of the System Operator Certification Program is \$683,716; therefore, in 2017, \$30,402 of program revenues will be used to increase the reserve.

CRISP: \$500,000

The CRISP Operating Reserve is used solely for certain contingencies in connection with CRISP. The target level is equal to the original CRISP reserve, established in 2015, which was funded by the participating utilities in CRISP.

Assessment Stabilization Reserve: \$1,671,000

NERC proposes, with FERC approval, to (1) deposit the \$500,000 of Penalty revenues received during the period July 1, 2015 – June 30, 2016, into the Assessment Stabilization Reserve, and (2) utilize \$1,100,000 of funds in the Assessment Stabilization Reserve to reduce 2017 assessments. These actions will leave a balance of \$1,671,000 in the Assessment Stabilization Reserve at December 31, 2017 for use to offset and stabilize assessments in future years' budgets.⁶²

Total Desired Working Capital and Operating Reserve at 12/31/2017: \$7,759,102.

Based on the beginning Working Capital and Operating Reserve balances at December 31, 2015, the projected funding and expenditures for 2016, the budgeted funding and expenditures for 2017, and the desired Working Capital and Operating Reserve balances at

⁶² The projected balance of \$1,671,000 in the Assessment Stabilization Reserve at December 31, 2017, does not include a Penalty payment of \$500,000 that NERC is scheduled to receive in May 2017 under the terms of an existing settlement agreement. (The \$500,000 Penalty payment received in the July 1, 2015-June 30, 2016 period was also pursuant to the settlement agreement.) NERC anticipates requesting FERC approval to deposit the May 2017 Penalty payment in the Assessment Stabilization Reserve.

December 31, 2017, Table B-1 on page 83 of **Attachment 2** shows the calculation of the resulting adjustment (increase) to NERC's 2017 statutory assessment of \$530,402. As shown on Table B-1, there are additional adjustments to the 2017 assessment calculation for (1) proceeds (non-current) from financing activities (\$966,667), and (2) debt service (\$985,750), as discussed in §IV.D below. To the extent NERC's actual year-end 2016 Working Capital and Operating Reserves balances are higher than the projected amounts shown on Table B-1, the excess funds will be included in the Operating Contingency Reserve account, System Operator Certification Program Reserve account, or CRISP Reserve account, as applicable, and subject to the limitations and authorities regarding their use as set forth in the WCOR Policy.

C. Proposed Assessment Stabilization Reserve Transactions

The NERC policy, *Accounting, Financial Statement and Budgetary Treatment of Penalties Imposed and Received for Violations of Reliability Standards*, and §1107.2 of the NERC ROP, specify that Penalty payments received by NERC or a Regional Entity during the period from July 1 of the second year preceding the budget year through June 30 of the year preceding the budget year are used to offset assessments to LSEs in the U.S. for the budget year, unless an alternative treatment is approved by FERC. For the period July 1, 2015 through June 30, 2016, NERC received \$500,000 of Penalty collections. As described in §IV.B above, NERC proposes to deposit the \$500,000 of Penalty collections into the Assessment Stabilization Reserve created by the amended WCOR Policy that FERC approved in Docket No. RR15-8-000. NERC also proposes to use \$1,100,000 of accumulated Penalty sanctions revenues in the Assessment Stabilization Reserve to reduce 2017 assessments, as shown on Table B-1 of **Attachment 2**. Therefore, in accordance with ¶19 of FERC's June 18, 2015 Order in Docket No. RR15-8-000, and pursuant to §1107.4 of the NERC ROP, NERC requested in its 2017 Budget filing to FERC an exception to §1107.2 of the ROP to permit it to place \$500,000 of

Penalty collections received during the 12 months ended June 30, 2016 into the Assessment Stabilization Reserve. NERC also requested in that filing FERC approval to use \$1,100,000 of accumulated Penalty collections in the Assessment Stabilization Reserve to reduce 2017 assessments.

D. Capital Expenditures Financing

As described in Exhibit D to NERC's 2014 Business Plan and Budget, NERC is financing the development costs of certain software applications and IT hardware and amortizing these investments over a multi-year period. As described in Exhibit D to **Attachment 2** of this 2017 Business Plan and Budget filing, NERC successfully closed its capital financing program on January 10, 2014, establishing a \$7,500,000 non-revolving credit facility. NERC made draws on the revolving line of credit in 2014, 2015 and 2016. The outstanding debt balance at December 31, 2016 is projected to be \$2,769,686. NERC is in discussions with the lender to renew the credit facility for 2017, at terms and conditions similar to the current facility. At its August 11, 2016 meeting, the NERC Board approved renewing the credit facility and authorized management to finalize the renewal by year-end 2016, based on terms and conditions similar to those currently in effect.

For 2017, NERC's proposed capital expenditures budget is \$4,372,000, of which NERC is proposing to finance \$1,450,000. The capital expenditures in the 2017 budget are listed on page 126 of **Attachment 2**, in Exhibit D, and include \$700,000 for ERO Application Development; \$1,000,000 for enhancements to the E-ISAC portal; \$335,000 for development of the ERO Enterprise Document Management Program; \$991,000 for Hardware such as data storage, servers and laptops; \$885,000 for other equipment such as security devices and audio-visual equipment; \$150,000 for disaster recovery hardware; and \$311,000 for Software licenses.

The table included in Exhibit D (page 127) of **Attachment 2** shows the actual or projected year-end outstanding debt balances and the annual payments for debt service for 2014, 2015, 2016, 2017, 2018 and 2019 under the capital financing program. These projections assume an average interest rate of 3.5% over the life of the financing, which is consistent with the interest rate assumptions under the program in the prior years' budgets. NERC is continuing to use a 3.5% interest rate assumption given the potential for interest rate increases in 2017. The actual interest rate and interest expense will be reflected in the quarterly budget-to-actual variance reports that NERC posts on its website, reviews in open session with the NERC FAC and files with FERC. Any savings in interest expense compared to the budgeted expense will be captured and reported as a contribution to NERC's Operating Reserves, the expenditures from which are subject to the terms of the WCOR Policy.

V. REGIONAL ENTITY BUSINESS PLANS AND BUDGETS

A. Consistency Among Regional Entity Budgets

In developing the 2017 Regional Entity Business Plans and Budgets, NERC and the Regional Entities continued the substantial efforts they devoted to achieving consistency of format and presentation of information in the Business Plans and Budgets for the years 2008 through 2016. NERC and the Regional Entities: (i) used a common and consistent format for the 2017 Business Plan and Budget documents, (ii) continued to use the consistent accounting methodologies that were developed in connection with the 2010 Business Plans and Budgets, (iii) continued to use the common definition of administrative (indirect) costs that was originally developed in connection with the 2010 Business Plans and Budgets, and (iv) again developed and used extensive Shared Business Plan and Budget Assumptions for their 2017 Business Plans and Budgets. The Shared Business Plan and Budget Assumptions are provided in Exhibit A to the NERC 2017 Business Plan and Budget (**Attachment 2**) and are cross-referenced in the

individual Regional Entity Business Plans and Budgets.⁶³ Additionally, each Regional Entity has highlighted entity-specific assumptions in its Business Plan and Budget.

In preparing their 2014 Business Plans and Budgets, the Regional Entities developed and applied adjustments to Personnel Expenses for labor “float” or “attrition.” Use of this factor was intended to reflect the fact that, historically, the Regional Entities (and NERC) have often been unable to achieve or maintain budgeted staffing levels throughout the year due to (i) unanticipated departures of individual employees (*e.g.*, employees leave to take positions with other employers), and (ii) inability to fill budgeted positions within the time periods anticipated in preparing the budget (*e.g.*, it is assumed that a new position can be filled by the start of the second quarter but in fact it is not filled until the start of the third quarter). As a result, actual Personnel Expenses have often been less than budgeted. To recognize this experience, in their 2014 Budgets, the Regional Entities applied labor float factors to either or both their budgeted staffing numbers (FTEs) or their budgeted Personnel Expenses. Each Regional Entity developed its own labor float or labor attrition factor based on its experience. In the preparation of the 2015, 2016 and 2017 Business Plans and Budgets, however, some Regional Entities elected not to use a labor float factor adjustment, while other Regional Entities have continued to apply this adjustment (now referred to as a “vacancy rate” adjustment). The 2017 Business Plans and Budgets of the Regional Entities that have continued to use a vacancy rate adjustment discuss the specific adjustment that each Regional Entity used. The Regional Entities that use a vacancy rate adjustment have continued to refine and revise the specific values used over time, based on experience, including in the development of their 2017 Business Plans and Budgets.

⁶³ The Shared Business Plan and Budget Assumptions have been developed for the 2016-2019 period, and therefore are applicable to the NERC and Regional Entity 2018 and 2019 budget projections as well as to their 2017 Business Plans and Budgets.

As discussed in previous years' Regional Entity Business Plans and Budgets, the Regional Entities have jointly retained a coordinator, employed by SERC, to manage joint Regional Entity projects, including development of common IT applications that are being conducted under the auspices of the Regional Entity Management Group. The development and implementation of common IT applications and other processes on a joint basis among the Regional Entities results in (i) lower costs for each Regional Entity and (ii) adoption of systems and processes that are consistent across the Regions, to the benefit of stakeholders, particularly those operating in multiple Regions. Each Regional Entity's 2017 budget includes an expense for the Regional Entity's share of the costs for the coordinator position, which are paid to SERC.

Achieving and maintaining consistency among the Regional Entity business plans and budgets is an ongoing process, and NERC intends to continue to work collaboratively with the Regional Entities to maintain and enhance consistency in the presentation of the NERC and Regional Entity business plans and budgets in the future.

The Regional Entity Business Plans and Budgets follow a similar format to that used for the NERC Business Plan and Budget. Each Regional Entity Business Plan and Budget begins with an Introduction section that presents a table showing the Regional Entity's budgeted Total Resources for 2017, including statutory and (where applicable) non-statutory FTEs and expenses; the proposed increases or decreases in statutory and non-statutory Fixed Assets and Working Capital Requirement; the total statutory and non-statutory Funding Requirement; and the proposed Assessments to recover the Regional Entity's statutory Funding Requirement, allocated (where applicable) among the U.S., Canadian provinces and Mexico.⁶⁴ The

⁶⁴ Information on non-statutory FTEs, expenses, and funding is, of course, only provided in the business plans and budgets of the Regional Entities that have non-statutory activities – FRCC, NPCC, SPP RE, Texas RE and WECC.

Introduction also provides general information on the Regional Entity, including information on its organization, membership and governance; provides the Regional Entity's key assumptions and its goals and key deliverables for 2017; and provides an overview of the primary cost impacts to the Regional Entity's 2017 budget. The Introduction section includes a table showing the Regional Entity's 2016 budget, 2016 projection, 2017 budget, and variance between the 2016 budget and 2017 budget, for each of the statutory programs. It also contains a chart comparing the Regional Entity's 2016 to 2017 budgeted expenditures by statutory program; and a table showing the Regional Entity's FTEs, by statutory program and administrative department, for its 2016 budget, 2016 projection, and 2017 budget. Finally, the Introduction section includes the Regional Entity's overall statutory Statement of Activities, with information presented for its 2016 budget, 2016 projection, variance between its 2016 budget and 2016 projection, 2017 budget, and variance between its 2017 budget and 2016 budget.

The Regional Entity Business Plans and Budgets next contain, in Section A – Statutory Programs, separate subsections on each statutory program and on the administrative services functions of the Regional Entity. These sections are presented in similar format to the NERC Business Plan (Section A of **Attachment 2**), including: (i) a table for each statutory program showing total FTEs, total Direct Expenses, total Indirect Expenses, increase or decrease in Fixed Assets, and total Funding Requirement, for the 2016 budget and 2017 budget and the Increase or Decrease; (ii) a table for Administrative Services showing the 2016 and 2017 budgeted Expenses and Fixed Assets and budgeted FTEs and the changes in budgeted expenditures and FTEs, for each Administrative Services function; and (iii) a Statement of Activities for the statutory program or for Administrative Services showing Funding, Expenses and Fixed Asset activity by

major line item categories, Total Budget and Total Change in Working Capital.⁶⁵ Information is presented in each of the Statements of Activities for the 2016 budget, the 2016 projection and the 2017 budget, and the variances between the 2016 budget and 2016 projection and between the 2017 budget and 2016 budget. The text of these sections for each statutory program includes discussion of the program scope and functional description, 2017 key assumptions, and goals and key deliverables for 2017. Reasons for increases or decreases in funding sources and costs in the 2016 budget for the program are provided in the narrative discussion and/or in the notes to the applicable table in Section B of the Regional Entity's Business Plan and Budget.

Section B of the Regional Entity Business Plans and Budgets presents additional financial information supporting the 2017 statutory budget. Section B contains tables detailing the development of the adjustment to the Regional Entity's 2017 assessment to achieve its target Working Capital Reserve at December 31, 2017 (Table B-1); Penalty payments received in the 12 months ended June 30, 2016, to be used as an offset to the Regional Entity's funding requirement (Table B-2); budgeted Supplemental Funding (*e.g.*, Workshop fees and Interest income) (Table B-3); budgeted Personnel Expenses (Table B-4); budgeted Meeting Expense (Table B-5); budgeted Consultants & Contracts expense (Table B-6); budgeted Office Rent (Table B-7); budgeted Office Costs (Table B-8); budgeted Professional Services expense (Table B-9); budgeted Miscellaneous Expense (Table B-10); budgeted Other Non-Operating Expenses (Table B-11); and budgeted Fixed Assets additions (Table B-12). Tables B-3 through B-12 are followed, where applicable, by explanations of significant variances between the Regional Entity's 2016 and 2017 budgets for the funding or cost category. Finally, Table B-13 provides

⁶⁵ All Expenses and Fixed Asset activity for the Administrative Services functions are allocated to, and included in the Funding Requirements for, the statutory programs.

the Regional Entity's statutory budget projections for 2018 and 2019.⁶⁶

Section C – Non-Statutory Activities of each Regional Entity Business Plan and Budget provides (where applicable) information on the Regional Entity's non-statutory activities for 2017, including program descriptions and objectives, budget information, and FTEs.⁶⁷

Following Section C, each Regional Entity Business Plan and Budget also provides, in Section D – Additional Consolidated Financial Statements, or in separate appendices: (1) a 2017 Consolidated Statement of Activities, Fixed Asset Expenditures and Changes in Working Capital showing the Regional Entity's 2017 budgeted line-item funding sources, expenses, and Fixed Asset activity, in total, by statutory and (if applicable) non-statutory, and by statutory program and Administrative Services department, as well as the Direct Expenses and Indirect Expenses for each statutory program; (2) a combined (statutory and, where applicable, non-statutory) Statement of Financial Position at (i) December 31, 2015, based on 2015 actual audited results;⁶⁸ (ii) December 31, 2016, based on the Regional Entity's 2016 projection; and (iii) December 31, 2017, based on the Regional Entity's 2017 budget; and (3) the Regional Entity's organization chart(s) for 2016 and 2017 (presented either as two separate charts or a combined chart displaying staffing numbers for each year), showing staffing comparisons for 2016 and 2017.

B. Discussion of Relevant Regional Entity Business Plan and Budget

This section summarizes highlights of the relevant Regional Entity 2017 Business Plan

⁶⁶ WECC has included its budget projections for 2018 and 2019 in Appendix A to its 2017 Business Plan and Budget, rather than in Table B-13 of Section B.

⁶⁷ MRO, ReliabilityFirst and SERC do not plan to have, and have not budgeted for, any non-statutory activities in 2017. SPP RE is unable to provide a non-statutory budget for 2017 because its planning and budgeting cycle does not result in finalization and SPP Board approval of the overall SPP, Inc. budget until October. SPP RE has included the overall SPP, Inc. 2016 budget and 2015 actual income statement, for information.

⁶⁸ The audited financial statements of each Regional Entity for 2015, were filed on June 8, 2016, in NERC's *2015 Budget True-up Report*.

and Budget.

1. NPCC

NPCC's statutory budget for 2017 is \$15,147,054, an increase of \$74,057 (0.5%) over its 2016 budget. However, NPCC's 2017 assessments are decreased by \$94,136 (0.7%) from its 2016 budget. The decrease in assessments is the net result of (i) the increased budget, (ii) a reduction in Penalty collections from \$67,000 to zero, and (iii) a decremental adjustment for Working Capital and Operating Reserve of \$827,994 versus a decremental adjustment of \$592,801 in the 2016 budget (*i.e.*, the adjustment to assessments for Working Capital and Operating Reserve reduces the 2017 assessment by \$235,192 more than in the 2016 budget). As discussed below, the decremental adjustment for Working Capital and Operating Reserve reflects that NPCC's Working Capital and Operating Reserve balance at December 31, 2016 is projected to be well above its target reserve amount. Budgeted decreases in total Meetings Expense (Meetings, Travel, and Conference Calls) of \$78,768 (5.8%) and in Consultants & Contracts Expense of \$214,500 (9.6%) are principal factors in enabling NPCC to limit its total statutory budget to a 0.5% increase.

NPCC's 2017 budget does not reflect any change in total staffing in its statutory and administrative programs from its 2016 budget (nor from its 2015 and 2014 budgets). Budgeted total staffing is 36.86 FTEs, comprised of 28.86 FTEs for the statutory programs (an increase of 1.0 FTE from the 2016 budget) and 8.00 FTEs for the administrative programs (a decrease of 1.00 FTE from the 2016 budget). NPCC is budgeting increased staffing of 1.00 FTE in its CMEP and 1.00 FTE in its Situation Awareness and Infrastructure Security program, offset by decreased staffing of 1.00 FTE in its Reliability Standards program and 1.00 in IT. The staffing changes in these four programs reflect reallocations of staff occurring during 2016 to meet

changing workloads in these programs. NPCC does not anticipate hiring any additional staff for any statutory program or administrative department in 2017.

NPCC's budgeted 2017 staffing for its CMEP is 17.0 FTE, and its 2017 budget for its CMEP is increased by \$75,853 (0.9%) from its 2016 budget. NPCC's budgeted Consultants & Contracts expense for its CMEP is decreasing by \$286,000 (18.3%) from its 2016 budget, reflecting continued implementation of the risk-based approach to compliance monitoring.

NPCC is budgeting changes in expenditures (including allocated Indirect Expenses) for its other statutory programs in 2017 from its 2016 budget as follows: increases in RAPA (\$35,392 (1.1%)), Training, Education and Operator Certification (\$28,702 (13.0%)), and Situation Awareness and Infrastructure Security (\$399,201 (25.9%)); and a decrease in Reliability Standards (\$465,091 (31.3%)). The increased budget for Training, Education and Operator Certification is due to increased Meetings expense. The increased budget for Situation Awareness and Infrastructure Security is due primarily to the increased staffing for this program, which results in both increased Personnel Expense and increased allocation of Indirect Expenses. Correspondingly, the decreased budget for Reliability Standards is due primarily to the decreased staffing for this program, which results in both lower Personnel Expense and decreased allocation of Indirect Expenses, along with a decrease in Travel Expense.

NPCC's budgeted 2017 Administrative Services expenditures are \$5,859,868, a decrease of \$126,775 (2.1%) from its 2016 budget.⁶⁹ Budgeted Personnel Expenses are decreased by \$104,244 (3.7%) from the 2016 budget, reflecting the reduced staffing in Administrative Services. Budgeted Consultants & Contracts Expense is increased by \$30,000 (24.6%),

⁶⁹ NPCC budgets Office Rent, Office Costs, Professional Services, Miscellaneous Operating Expense, and Depreciation as Indirect Expenses, rather than budgeting these costs individually in the statutory program budgets, and allocates them to the statutory programs on the basis of the proportion of direct statutory FTEs in each program.

reflecting a number of consultant and contractor engagements including a total remuneration study to be performed in 2017. Budgeted Office Costs are increased by \$39,600 (6.2%), due primarily to increased expenses for Computer Supplies and Maintenance. Professional Services expense is increased by \$30,000 (3.0%), due primarily to budgeting for search fees for an anticipated search for an independent director during 2017, due to expiration of a director's term.

NPCC's target Working Capital and Operating Reserve at December 31, 2017 is \$3,069,085, comprised of \$1,806,881 for Operating Reserve and \$1,262,204 for Working Capital. As approved by the NPCC Board of Directors, the Operating Reserve target is within the range of 30 days (8.33%) and 90 days (25.00%) of budgeted expenditures, while the Working Capital target is 30 days (8.33%) of budgeted expenditures. NPCC's Table B-1 shows a projected Working Capital and Operating Reserve of \$3,897,079 (Operating Reserve - \$2,634,875; Working Capital - \$1,262,204) at December 31, 2016; thus, NPCC's 2017 assessment amount is reduced by \$827,994 to reach its desired Working Capital and Operating Reserve at December 31, 2017.

For purposes of determining the assessments to recover NPCC's statutory funding requirement, the statutory funding requirement is allocated among the Balancing Authority Areas within NPCC in the U.S. (New York and New England), Ontario, Québec, New Brunswick and Nova Scotia. A portion (23.28%) of NPCC's statutory costs for the Compliance and Organization Registration Program (CORC) is allocated between the U.S. and Canadian Balancing Authority Areas on the basis of NEL, a portion (51.98%) of the CORC costs is allocated between the U.S. and the Canadian provinces using a compliance audit-based methodology, and the remaining portion (24.74%) of the CORC costs, representing mitigation and enforcement-related costs, is allocated between the U.S. and Canadian Balancing Authority

Areas using an enforcement activity-based methodology.⁷⁰ The portion of the costs allocated to the U.S using the audit-based methodology and the enforcement activity-based methodology is then re-allocated between the New York and New England Balancing Authority Areas on the basis of NEL, as required by PP 40-41 of the *July 16, 2009 Budget Compliance Order*. In addition, any NPCC sub-regional reliability assessment costs that will be incurred in response to U.S.-only regulatory initiatives will be considered for allocation to U.S.-only Balancing Authority Areas, consistent with §1102 of the NERC ROP. The narrative discussion on pages 59-60, and the table on page 61, of NPCC’s Business Plan and Budget (**Attachment 3**), explain and show the development of the 2017 assessments by Balancing Authority Area within NPCC to recover NPCC’s statutory funding requirement. Appropriate adjustments to the costs to be allocated are made for Penalty payments received by NPCC from U.S. registered entities (used solely to offset CORC costs to be charged to U.S. Balancing Authority Areas).

NPCC’s total non-statutory (Criteria Services Division) Funding Requirement for 2017 is \$1,105,867.

C. Metrics Related to Regional Entity Budgets

Consistent with NERC’s February 25, 2015 *Notice of the North American Electric Reliability Corporation of Revisions to Certain “Metrics” Filing Components for its Annual Business Plan and Budget Filings and its Annual Actual Cost-to-Budget True-Up Filings*, NERC is providing the metrics information listed below in **Attachment 6** and **Attachment 7** to this filing.

⁷⁰ These allocation percentages reflect the respective scopes of work to be performed by NPCC and the relevant provincial governmental and/or regulatory authorities in the Compliance area, as negotiated between NPCC and the relevant authorities in each of the provinces and reflected in the Memorandum of Understanding between NPCC and the relevant authorities for each province.

Attachment 6: Metrics Comparing Regional Entity Operations Based on the 2017 Budgets

Attachment 6 provides the following information relating to the Regional Entities' operations based on their 2017 Business Plans and Budgets:

1. Numbers of registered entities
2. Numbers of registered functions
3. Total NEL (GWh)
4. NEL (GWh) per registered entity
5. Total ERO Funding (sum of assessments plus Penalty sanctions collections)
6. ERO Funding per registered entity
7. ERO Funding per registered function
8. Total Budget (sum of Total Expenses plus Capital Expenditures)
9. Total Budget per registered entity
10. Total Budget per registered function
11. Total Statutory FTE (FTE are based on working 2,080 hours per year)
12. Registered entity per Statutory FTE
13. Registered function per Statutory FTE
14. Total Compliance Budget (sum of Direct Expenses, Indirect Expenses allocated to the Compliance Program, and Capital Expenditures)
15. Compliance budget per registered entity
16. Compliance budget per registered function
17. Total Compliance FTE
18. Registered entity per Compliance FTE
19. Registered function per Compliance FTE

In addition, **Attachment 6** provides the following metrics and graphics based on the

Regional Entities' 2017 Business Plans and Budgets:

20. Compliance Budget per Number of Registered Functions and per Number of Registered Entities.
21. Number of Registered Functions per Registered Entity
22. Compliance Program Budget as a Function of Number of Registered Entities and Number of Registered Functions
23. Number of Registered Entities per Compliance Program FTE and Number of Registered Functions per Compliance Program FTE
24. Comparisons of Number of Registered Entities per Compliance program FTE and Number of Registered Functions per Compliance Program FTE for the current year (2016) and the budget year (2017).

Attachment 7: Metrics on NERC and Regional Entity Administrative (Indirect) Costs Based on the 2016 and 2017 Budgets

Attachment 7 provides the following metrics on the budgeted Administrative Services costs of NERC and each Regional Entity, based on their budgets for 2016 and 2017:⁷¹

1. Statutory Indirect Budget as a Percentage of Total Statutory Budget, for 2016 and 2017.
2. Ratio of Statutory Direct Budget to Statutory Indirect Budget, for 2016 and 2017.
3. Statutory Indirect (Administrative) FTEs as a Percentage of Total Statutory FTEs, for 2016 and 2017.
4. Number of Direct Statutory FTEs per Indirect (Administrative) FTE, for 2016 and 2017.

⁷¹ In preparing **Attachment 7**, NERC found that incorrect numbers for Total Statutory Budget and Total Statutory Indirect Budget in SPP RE's 2016 Budget were reported in NERC's 2016 Business Plan and Budget Filing. The correct numbers for Total Statutory Budget and Total Statutory Indirect Budget in SPP RE's 2016 Budget are reported in **Attachment 7** to this 2017 filing.

Respectfully submitted,

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ATTACHMENTS 1-7

(Available on the NERC Website at

http://www.nerc.com/FilingsOrders/ca/Canadian%20Filings%20and%20Orders%20DL/Attachments_2017budget_NPCC_filing.pdf)