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STATE OF NEW HAMPSHIRE
DEPARTMENT OF HEALTH AND HUMAN SERVICES
*DIVISION OF PUBLIC HEALTH SERVICES*

Jeffrey A. Meyers
Commissioner

Lisa M. Morris
Director

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March 22, 2018

His Excellency, Governor Christopher T. Sununu
and the Honorable Council
State House
Concord, New Hampshire 03301

## REQUESTED ACTION

Authorize the Department of Health and Human Services, Division of Public Health Services, to enter into an agreement with MaineHealth dba Northern New England Poison Center, Vendor #153202-B001, 110 Free Street, Portland, Maine 04101, for the provision of poison information and control hotline services in an amount not to exceed $1,197,000, effective July 1, 2018 or upon date of Governor and Council approval, whichever is later, through June 30, 2020. 7% Federal Funds, 93% General Funds.

Funds are available in the following accounts for SFY 2019, and are anticipated to be available in SFY 2020, upon the availability and continued appropriation of funds in the future operating budgets, with authority to adjust amounts within the price limitation and adjust encumbrances between State Fiscal Years through the Budget Office, without further approval from the Governor and Executive Council, if needed and justified.

**05-95-90-902010-1228 HEALTH AND SOCIAL SERVICES, DEPT OF HEALTH AND HUMAN SVS, HHS: DIVISION OF PUBLIC HEALTH, BUREAU OF POPULATION HEALTH AND COMMUNITY SERVICES, POSION CONTR0L CENTER**

| SFY | Class/ Account | Class Title | Job Number | Total Amount |
|---|---|---|---|---|
| 2019 | 102-500731 | Contracts for Program Services | 90001228 | $545,000 |
| 2020 | 102-500731 | Contracts for Program Services | 90001228 | $545,000 |
| | | | ***Subtotal*** | ***$1,090,000*** |

**05-95-90-902510-7545 HEALTH AND SOCIAL SERVICES, DEPT OF HEALTH AND HUMAN SVS, HHS: DIVISION OF PUBLIC HEALTH, BUREAU OF INFECTIOUS DISEASE CONTROL, EMERGENCY PREPAREDNESS**

| SFY | Class/ Account | Class Title | Job Number | Total Amount |
|---|---|---|---|---|
| 2019 | 102-500731 | Contracts for Program Services | 90077410 | $43,500 |
| 2020 | 102-500731 | Contracts for Program Services | 90077410 | $43,500 |
| | | | **Subtotal** | **$87,000** |

**05-95-90-903010-8280 HEALTH AND SOCIAL SERVICES, DEPT OF HEALTH AND HUMAN SVS, HHS: DIVISION OF PUBLIC HEALTH, BUREAU OF LABORATORY, BIOMONITORING GRANT**

| SFY | Class/ Account | Class Title | Job Number | Total Amount |
|---|---|---|---|---|
| 2019 | 102-500731 | Contracts for Program Services | 90082801 | $10,000 |
| 2020 | 102-500731 | Contracts for Program Services | 90082801 | $10,000 |
| | | | ***Subtotal*** | ***$20,000*** |
| | | | **Total** | **$1,197,000** |

## EXPLANATION

The purpose of this request is to ensure the availability of poison information and control hotline services, statewide, through the utilization of the national toll free call number, established by the American Association of Poison Control Centers which will include medical consultation to New Hampshire residents and health care providers on a twenty-four (24) hour per day, seven (7) days a week basis. The Contractor has the capacity to respond to approximately twelve thousand (12,000) calls per year.

Poison control services are critical because unintentional and intentional poisonings are a significant public health problem in New Hampshire. One of the primary functions of poison information services is to reduce unnecessary and costly utilization of emergency response, emergency department, and primary health care services. Researchers have estimated that nationally, poison center services save at least seven dollars ($7.00) in health care costs for every one dollar ($1.00) spent.

In State Fiscal Year 2017, MaineHealth, through its current contract, managed more than 10,000 New Hampshire cases. Of those 10,000, 9,175 were human exposures to poison. The exposures generated 9,762 follow-up calls. Approximately 26% of the human exposure cases were generated by calls from health care facilities. These cases were generally more serious and accounted for 69% of the follow-up calls. Children under 6 years of age accounted for 52% of non-health care facility cases. These patients were treated on-site with poison center advice 95% of the time, thus saving the expense of a doctor's office or emergency department visit. Suspected suicide attempts accounted for 14% of all exposure calls (1,308). Substance abuse-related poisonings accounted for 3% of exposure calls (308). Adults sixty (60) years and older accounted for 9% of exposure calls (786). The Contractor provided some twenty (20) direct outreaches, educating the general public, health care providers, educators, students, and legislators, members of the media and others, reaching more than 1,000 people.

MaineHealth dba Northern New England Poison Center was selected for this project through a competitive bid process. A Request for Proposals was posted on The Department of Health and Human Services' web site from October 9, 2017 through November 9, 2017. The Department received one (1) proposal. The proposal was reviewed and scored by a team of individuals with program specific knowledge. The review included a thorough discussion of the strengths and weaknesses of the proposal. The Bid Summary is attached.

As referenced in the Request for Proposal and in Exhibit C-1 of this contract, this Agreement has the option to extend for up to two (2) additional years, contingent upon satisfactory delivery of services, available funding, agreement of the parties and approval of the Governor and Council.

Should the Governor and Executive Council not authorize this Request, poison center services would not be available to New Hampshire residents through the national toll free hotline, which may increase health care costs due to individuals going to Emergency Rooms for potentially non-emergent matters.

Area served: Statewide.

Source of Funds: 7% Federal Funds from US DHHS, Centers for Disease Control and Prevention, TP12-1201 HPP and PHEP Cooperative Agreement CFDA #93.069, FAIN #U90TP000535; and Biomonitoring Cooperative Agreement, CFDA #93.070, FAIN #U88EH001142; and 93% General Funds.

In the event that the Federal Funds become no longer available, additional General Funds will not be requested to support this program.

Respectfully submitted,

Lisa M. Morris
Director

Approved by:

Jeffrey A. Meyers
Commissioner

New Hampshire Department of Health and Human Services
Office of Business Operations
Contracts & Procurement Unit
Summary Scoring Sheet

**POISON CONTROL CENTER SERVICES**
RFP Name

**RFP-2019-DPHS-01-POISO**
RFP Number

| Bidder Name | Pass/Fail | Maximum Points | Actual Points |
|---|---|---|---|
| 1. Maine Health Northern New England Poison Center | | 500 | 459 |
| 2. 0 | | 500 | 0 |
| 3. 0 | | 500 | 0 |

Reviewer Names

1. JoAnne Miles-Holmes, Injury Prevention Prog Mgr, M&C Hlth
2. Elizabeth Daly, Bureau Chief Infectious Disease Control
3. Sean Marden, DPHS, MCHS
4. Ellen Chase-Lucard, Financial Administrator DPHS (Cost)
5. Kira Hageman, Finance Dept, DPHS (Cost)

Subject: Poison Control Center Services (RFP-2019-DPHS-01-POISO)

Notice: This agreement and all of its attachments shall become public upon submission to Governor and Executive Council for approval. Any information that is private, confidential or proprietary must be clearly identified to the agency and agreed to in writing prior to signing the contract.

**AGREEMENT**

The State of New Hampshire and the Contractor hereby mutually agree as follows:

**GENERAL PROVISIONS**

**1. IDENTIFICATION.**

| | | | |
|---|---|---|---|
| 1.1 State Agency Name<br>NH Department of Health and Human Services | | 1.2 State Agency Address<br>129 Pleasant Street<br>Concord, NH 03301-3857 | |
| 1.3 Contractor Name<br>MaineHealth dba Northern New England Poison Center | | 1.4 Contractor Address<br>110 Free Street<br>Portland, ME 04101 | |
| 1.5 Contractor Phone Number<br>207-661-7529 | 1.6 Account Number<br>05-95-90-902010-12280000<br>05-95-90-902510-75450000<br>05-95-90-903010-82800000 | 1.7 Completion Date<br>June 30, 2020 | 1.8 Price Limitation<br>$1,197,000 |
| 1.9 Contracting Officer for State Agency<br>E. Maria Reinemann, Esq.<br>Director of Contracts and Procurement | | 1.10 State Agency Telephone Number<br>603-271-9330 | |
| 1.11 Contractor Signature<br>A C Smith | | 1.12 Name and Title of Contractor Signatory<br>Executive Vice President & Treasurer<br>Anne G Smith | |

1.13 Acknowledgement: State of Maine, County of Cumberland

On March 5, 2018, before the undersigned officer, personally appeared the person identified in block 1.12, or satisfactorily proven to be the person whose name is signed in block 1.11, and acknowledged that s/he executed this document in the capacity indicated in block 1.12.

1.13.1 Signature of Notary Public or Justice of the Peace
Mechelle Connolly
[Seal]

Mechelle Connolly
Notary Public, Maine
My Commission Expires
~~April 4, 2019~~

1.13.2 Name and Title of Notary or Justice of the Peace
Mechelle Connolly
Notary Public

| | |
|---|---|
| 1.14 State Agency Signature<br>Lisa Morris Date: 4/3/18 | 1.15 Name and Title of State Agency Signatory<br>LISA MORRIS, DIRECTOR DPHS |

1.16 Approval by the N.H. Department of Administration, Division of Personnel *(if applicable)*

By: Director, On:

1.17 Approval by the Attorney General (Form, Substance and Execution) *(if applicable)*

By: Megan A. Lyde Attorney On: 4/17/18

1.18 Approval by the Governor and Executive Council *(if applicable)*

By: On:

**2. EMPLOYMENT OF CONTRACTOR/SERVICES TO BE PERFORMED.** The State of New Hampshire, acting through the agency identified in block 1.1 ("State"), engages contractor identified in block 1.3 ("Contractor") to perform, and the Contractor shall perform, the work or sale of goods, or both, identified and more particularly described in the attached EXHIBIT A which is incorporated herein by reference ("Services").

**3. EFFECTIVE DATE/COMPLETION OF SERVICES.**
3.1 Notwithstanding any provision of this Agreement to the contrary, and subject to the approval of the Governor and Executive Council of the State of New Hampshire, if applicable, this Agreement, and all obligations of the parties hereunder, shall become effective on the date the Governor and Executive Council approve this Agreement as indicated in block 1.18, unless no such approval is required, in which case the Agreement shall become effective on the date the Agreement is signed by the State Agency as shown in block 1.14 ("Effective Date").
3.2 If the Contractor commences the Services prior to the Effective Date, all Services performed by the Contractor prior to the Effective Date shall be performed at the sole risk of the Contractor, and in the event that this Agreement does not become effective, the State shall have no liability to the Contractor, including without limitation, any obligation to pay the Contractor for any costs incurred or Services performed. Contractor must complete all Services by the Completion Date specified in block 1.7.

**4. CONDITIONAL NATURE OF AGREEMENT.**
Notwithstanding any provision of this Agreement to the contrary, all obligations of the State hereunder, including, without limitation, the continuance of payments hereunder, are contingent upon the availability and continued appropriation of funds, and in no event shall the State be liable for any payments hereunder in excess of such available appropriated funds. In the event of a reduction or termination of appropriated funds, the State shall have the right to withhold payment until such funds become available, if ever, and shall have the right to terminate this Agreement immediately upon giving the Contractor notice of such termination. The State shall not be required to transfer funds from any other account to the Account identified in block 1.6 in the event funds in that Account are reduced or unavailable.

**5. CONTRACT PRICE/PRICE LIMITATION/ PAYMENT.**
5.1 The contract price, method of payment, and terms of payment are identified and more particularly described in EXHIBIT B which is incorporated herein by reference.
5.2 The payment by the State of the contract price shall be the only and the complete reimbursement to the Contractor for all expenses, of whatever nature incurred by the Contractor in the performance hereof, and shall be the only and the complete compensation to the Contractor for the Services. The State shall have no liability to the Contractor other than the contract price.
5.3 The State reserves the right to offset from any amounts otherwise payable to the Contractor under this Agreement those liquidated amounts required or permitted by N.H. RSA 80:7 through RSA 80:7-c or any other provision of law.
5.4 Notwithstanding any provision in this Agreement to the contrary, and notwithstanding unexpected circumstances, in no event shall the total of all payments authorized, or actually made hereunder, exceed the Price Limitation set forth in block 1.8.

**6. COMPLIANCE BY CONTRACTOR WITH LAWS AND REGULATIONS/ EQUAL EMPLOYMENT OPPORTUNITY.**
6.1 In connection with the performance of the Services, the Contractor shall comply with all statutes, laws, regulations, and orders of federal, state, county or municipal authorities which impose any obligation or duty upon the Contractor, including, but not limited to, civil rights and equal opportunity laws. This may include the requirement to utilize auxiliary aids and services to ensure that persons with communication disabilities, including vision, hearing and speech, can communicate with, receive information from, and convey information to the Contractor. In addition, the Contractor shall comply with all applicable copyright laws.
6.2 During the term of this Agreement, the Contractor shall not discriminate against employees or applicants for employment because of race, color, religion, creed, age, sex, handicap, sexual orientation, or national origin and will take affirmative action to prevent such discrimination.
6.3 If this Agreement is funded in any part by monies of the United States, the Contractor shall comply with all the provisions of Executive Order No. 11246 ("Equal Employment Opportunity"), as supplemented by the regulations of the United States Department of Labor (41 C.F.R. Part 60), and with any rules, regulations and guidelines as the State of New Hampshire or the United States issue to implement these regulations. The Contractor further agrees to permit the State or United States access to any of the Contractor's books, records and accounts for the purpose of ascertaining compliance with all rules, regulations and orders, and the covenants, terms and conditions of this Agreement.

**7. PERSONNEL.**
7.1 The Contractor shall at its own expense provide all personnel necessary to perform the Services. The Contractor warrants that all personnel engaged in the Services shall be qualified to perform the Services, and shall be properly licensed and otherwise authorized to do so under all applicable laws.
7.2 Unless otherwise authorized in writing, during the term of this Agreement, and for a period of six (6) months after the Completion Date in block 1.7, the Contractor shall not hire, and shall not permit any subcontractor or other person, firm or corporation with whom it is engaged in a combined effort to perform the Services to hire, any person who is a State employee or official, who is materially involved in the procurement, administration or performance of this



Contractor Initials
Date 3/2/11

Agreement. This provision shall survive termination of this Agreement.
7.3 The Contracting Officer specified in block 1.9, or his or her successor, shall be the State's representative. In the event of any dispute concerning the interpretation of this Agreement, the Contracting Officer's decision shall be final for the State.

**8. EVENT OF DEFAULT/REMEDIES.**
8.1 Any one or more of the following acts or omissions of the Contractor shall constitute an event of default hereunder ("Event of Default"):
8.1.1 failure to perform the Services satisfactorily or on schedule;
8.1.2 failure to submit any report required hereunder; and/or
8.1.3 failure to perform any other covenant, term or condition of this Agreement.
8.2 Upon the occurrence of any Event of Default, the State may take any one, or more, or all, of the following actions:
8.2.1 give the Contractor a written notice specifying the Event of Default and requiring it to be remedied within, in the absence of a greater or lesser specification of time, thirty (30) days from the date of the notice; and if the Event of Default is not timely remedied, terminate this Agreement, effective two (2) days after giving the Contractor notice of termination;
8.2.2 give the Contractor a written notice specifying the Event of Default and suspending all payments to be made under this Agreement and ordering that the portion of the contract price which would otherwise accrue to the Contractor during the period from the date of such notice until such time as the State determines that the Contractor has cured the Event of Default shall never be paid to the Contractor;
8.2.3 set off against any other obligations the State may owe to the Contractor any damages the State suffers by reason of any Event of Default; and/or
8.2.4 treat the Agreement as breached and pursue any of its remedies at law or in equity, or both.

**9. DATA/ACCESS/CONFIDENTIALITY/ PRESERVATION.**
9.1 As used in this Agreement, the word "data" shall mean all information and things developed or obtained during the performance of, or acquired or developed by reason of, this Agreement, including, but not limited to, all studies, reports, files, formulae, surveys, maps, charts, sound recordings, video recordings, pictorial reproductions, drawings, analyses, graphic representations, computer programs, computer printouts, notes, letters, memoranda, papers, and documents, all whether finished or unfinished.
9.2 All data and any property which has been received from the State or purchased with funds provided for that purpose under this Agreement, shall be the property of the State, and shall be returned to the State upon demand or upon termination of this Agreement for any reason.
9.3 Confidentiality of data shall be governed by N.H. RSA chapter 91-A or other existing law. Disclosure of data requires prior written approval of the State.

**10. TERMINATION.** In the event of an early termination of this Agreement for any reason other than the completion of the Services, the Contractor shall deliver to the Contracting Officer, not later than fifteen (15) days after the date of termination, a report ("Termination Report") describing in detail all Services performed, and the contract price earned, to and including the date of termination. The form, subject matter, content, and number of copies of the Termination Report shall be identical to those of any Final Report described in the attached EXHIBIT A.

**11. CONTRACTOR'S RELATION TO THE STATE.** In the performance of this Agreement the Contractor is in all respects an independent contractor, and is neither an agent nor an employee of the State. Neither the Contractor nor any of its officers, employees, agents or members shall have authority to bind the State or receive any benefits, workers' compensation or other emoluments provided by the State to its employees.

**12. ASSIGNMENT/DELEGATION/SUBCONTRACTS.** The Contractor shall not assign, or otherwise transfer any interest in this Agreement without the prior written notice and consent of the State. None of the Services shall be subcontracted by the Contractor without the prior written notice and consent of the State.

**13. INDEMNIFICATION.** The Contractor shall defend, indemnify and hold harmless the State, its officers and employees, from and against any and all losses suffered by the State, its officers and employees, and any and all claims, liabilities or penalties asserted against the State, its officers and employees, by or on behalf of any person, on account of, based or resulting from, arising out of (or which may be claimed to arise out of) the acts or omissions of the Contractor. Notwithstanding the foregoing, nothing herein contained shall be deemed to constitute a waiver of the sovereign immunity of the State, which immunity is hereby reserved to the State. This covenant in paragraph 13 shall survive the termination of this Agreement.

**14. INSURANCE.**
14.1 The Contractor shall, at its sole expense, obtain and maintain in force, and shall require any subcontractor or assignee to obtain and maintain in force, the following insurance:
14.1.1 comprehensive general liability insurance against all claims of bodily injury, death or property damage, in amounts of not less than $1,000,000per occurrence and $2,000,000 aggregate ; and
14.1.2 special cause of loss coverage form covering all property subject to subparagraph 9.2 herein, in an amount not less than 80% of the whole replacement value of the property.
14.2 The policies described in subparagraph 14.1 herein shall be on policy forms and endorsements approved for use in the State of New Hampshire by the N.H. Department of Insurance, and issued by insurers licensed in the State of New Hampshire.



Contractor Initials
Date 3/5/18

14.3 The Contractor shall furnish to the Contracting Officer identified in block 1.9, or his or her successor, a certificate(s) of insurance for all insurance required under this Agreement. Contractor shall also furnish to the Contracting Officer identified in block 1.9, or his or her successor, certificate(s) of insurance for all renewal(s) of insurance required under this Agreement no later than thirty (30) days prior to the expiration date of each of the insurance policies. The certificate(s) of insurance and any renewals thereof shall be attached and are incorporated herein by reference. Each certificate(s) of insurance shall contain a clause requiring the insurer to provide the Contracting Officer identified in block 1.9, or his or her successor, no less than thirty (30) days prior written notice of cancellation or modification of the policy.

**15. WORKERS' COMPENSATION.**

15.1 By signing this agreement, the Contractor agrees, certifies and warrants that the Contractor is in compliance with or exempt from, the requirements of N.H. RSA chapter 281-A *("Workers' Compensation").*

*15.2* To the extent the Contractor is subject to the requirements of N.H. RSA chapter 281-A, Contractor shall maintain, and require any subcontractor or assignee to secure and maintain, payment of Workers' Compensation in connection with activities which the person proposes to undertake pursuant to this Agreement. Contractor shall furnish the Contracting Officer identified in block 1.9, or his or her successor, proof of Workers' Compensation in the manner described in N.H. RSA chapter 281-A and any applicable renewal(s) thereof, which shall be attached and are incorporated herein by reference. The State shall not be responsible for payment of any Workers' Compensation premiums or for any other claim or benefit for Contractor, or any subcontractor or employee of Contractor, which might arise under applicable State of New Hampshire Workers' Compensation laws in connection with the performance of the Services under this Agreement.

**16. WAIVER OF BREACH.** No failure by the State to enforce any provisions hereof after any Event of Default shall be deemed a waiver of its rights with regard to that Event of Default, or any subsequent Event of Default. No express failure to enforce any Event of Default shall be deemed a waiver of the right of the State to enforce each and all of the provisions hereof upon any further or other Event of Default on the part of the Contractor.

**17. NOTICE.** Any notice by a party hereto to the other party shall be deemed to have been duly delivered or given at the time of mailing by certified mail, postage prepaid, in a United States Post Office addressed to the parties at the addresses given in blocks 1.2 and 1.4, herein.

**18. AMENDMENT.** This Agreement may be amended, waived or discharged only by an instrument in writing signed by the parties hereto and only after approval of such amendment, waiver or discharge by the Governor and Executive Council of the State of New Hampshire unless no such approval is required under the circumstances pursuant to State law, rule or policy.

**19. CONSTRUCTION OF AGREEMENT AND TERMS.** This Agreement shall be construed in accordance with the laws of the State of New Hampshire, and is binding upon and inures to the benefit of the parties and their respective successors and assigns. The wording used in this Agreement is the wording chosen by the parties to express their mutual intent, and no rule of construction shall be applied against or in favor of any party.

**20. THIRD PARTIES.** The parties hereto do not intend to benefit any third parties and this Agreement shall not be construed to confer any such benefit.

**21. HEADINGS.** The headings throughout the Agreement are for reference purposes only, and the words contained therein shall in no way be held to explain, modify, amplify or aid in the interpretation, construction or meaning of the provisions of this Agreement.

**22. SPECIAL PROVISIONS.** Additional provisions set forth in the attached EXHIBIT C are incorporated herein by reference.

**23. SEVERABILITY.** In the event any of the provisions of this Agreement are held by a court of competent jurisdiction to be contrary to any state or federal law, the remaining provisions of this Agreement will remain in full force and effect.

**24. ENTIRE AGREEMENT.** This Agreement, which may be executed in a number of counterparts, each of which shall be deemed an original, constitutes the entire Agreement and understanding between the parties, and supersedes all prior Agreements and understandings relating hereto.



Contractor Initials _____

Date 3/3/11

# Scope of Services

## 1. Provisions Applicable to All Services

1.1. The Contractor will submit a detailed description of the language assistance services they will provide to persons with limited English proficiency to ensure meaningful access to their programs and/or services within ten (10) days of the contract effective date.

1.2. The Contractor agrees that, to the extent future legislative action by the New Hampshire General Court or federal or state court orders may have an impact on the Services described herein, the State Agency has the right to modify Service priorities and expenditure requirements under this Agreement so as to achieve compliance therewith.

## 2. Scope of Services

2.1. The Contractor shall provide a twenty-four (24) hour, seven (7)-day-a-week hotline service, utilizing the national toll-free call number, 1-800-222-1222, (established by the American Association of Poison Control Centers) which routes phone calls to the respective regional poison control centers, for both the public and health care professionals regarding poisoning emergencies and basic poison prevention non-emergencies.

2.2. The Contractor shall maintain the capacity to respond to more than twelve thousand (12,000) calls per year including, but not limited to:

2.2.1. Responding to calls from the general public which may require immediate response from emergency medical services which may include, but not be limited to:

2.2.1.1. Making a determination whether emergency services are required.

2.2.1.2. Informing the hospital emergency department that the patient is coming.

2.2.1.3. Describing the poison, circumstance, expected effects, and recommended management to the emergency department.

2.2.1.4. Consulting with the health care providers managing the patient to determine ongoing needs.

2.2.1.5. Monitoring the patient's case throughout the course of treatment to ensure the best management of the situation.

2.2.2. Providing primary support to at least ninety percent (90%) of all non-emergent cases in the home setting including, but not limited to:

2.2.2.1. Primary prevention which involves distributing messages through partners, the news media and the internet regarding how to avoid

poisoning. Examples include, but are not limited to messaging regarding:

2.2.2.1.1. Carbon monoxide and food safety during power outages.

2.2.2.1.2. Common medication errors all year round.

2.2.2.1.3. Safe pesticide use in spring and summer.

2.2.2.1.4. Mushroom ingestion in spring through fall.

2.2.2.1.5. Holiday hazards.

2.2.2.1.6. Safe storage and disposal of medications and chemicals.

2.2.2.2. Secondary prevention efforts which include, but are not limited to ensuring that awareness of poison center services is broad, so that patients and their families know to call a poison center quickly after a possible poisoning occurs which enables a quick assessment and intervention that will often allow home management. Examples include, but are not limited to messaging regarding:

2.2.2.2.1. Child exposure to plants, mushrooms, cleaners, personal care products or medication at home with instructions and close follow-up when it is safe to do so.

2.2.2.2.2. Older adults exposure to double dosing of heart or diabetes medications which can often be safely managed at home by working with the patient and their family to monitor heart rate, blood pressure and blood glucose.

2.2.2.3. Tertiary prevention which is more applicable to health care facility cases, in which poison center staff can mitigate the severity of the poisoning and shorten the hospital course.

2.2.3. Increasing human exposure case calls from health care facilities by providing in-person and online education by poison center educators and toxicologists, as well as developing electronic materials to educate and encourage consultation.

2.3. With respect to bioterrorism and public health emergency response planning, the Contractor shall:

2.3.1. Provide call-surge backup for the Department at their request which shall include, but not be limited to:

2.3.1.1. Developing appropriate messaging in collaboration with the requesting agency for both the general public and health care professionals.

2.3.1.2. Distributing the created messaging to staff and educating as necessary.

2.3.1.3. Answering calls on the designated toll free line and triaging calls in order of severity.

2.3.1.4. Requesting that all available staff assist, whether through over time or by answering calls in lieu of other duties.

2.3.1.5. Employing a clinical toxicologist to assist with calls requiring a higher level of technical expertise.

2.3.1.6. Employing a medical director who provides supervision and assistance to all staff.

2.3.1.7. Entering all cases into the Toxicall computer database (which is a Poison Control Center data collection system) in real time which can then be reported to the requesting agency hourly, daily, or as otherwise required.

2.3.2. Collaborate with the Department to identify and share surveillance data from poison control center activities that may serve as early warning data for public health threats and emergencies with specific target audiences as determined by the Department.

2.3.3. Provide ongoing education, including emergency preparedness and response training, as requested by the Department for specific target audiences as determined by the Department.

2.4. The Contractor shall properly handle data collection and dissemination which shall include, but not be limited to:

2.4.1. Recording all New England Poison Control Center call data in the computer database, Toxicall, which resides on secure servers within Maine Medical Center.

2.4.2. Maintaining a password protected means of collecting and storing case-level data collected during hotline service calls from New Hampshire residents and health care providers.

2.4.3. Downloading hotline call data multiple times per hour to the National Poisoning Data System, which is operated by the American Association of Poison Control Centers.

2.4.4. Ensuring data dissemination is done with sufficient aggregation to protect patient privacy unless deemed an emergency by the Department where individual level data may be required to protect public health.

2.5. The Contractor shall participate in the development and dissemination of New Hampshire Health Alert Network notifications related to poisoning for both drills and actual events, as requested by the Department.

2.6. The Contractor shall provide information on emergent issues to the New Hampshire Health Alert Network, the Department, and other New Hampshire stakeholders,

including, but not limited to protocol and management of treatment for poisonings which have an elevated occurrence.

2.7. The Contractor shall maintain a list of statewide locations and ability for mobilization of poison antidotes.

2.8. The Contractor shall support the Department's state response team on emergent chemical contamination issues by helping members of the community understand lab reports which includes, but is not limited to answering hotline calls and/or sending an educator to speak to a group of community members.

2.9. The Contractor shall review poisoning cases with medical or clinical board-certified toxicologists as needed.

2.10. The Contractor shall have, at a minimum, staffing consistent with certification through the American Association of Poison Control Centers.

2.11. The Contractor shall coordinate education activities and strategies with the Department's Injury Prevention Program, including participating as a member of the Injury Prevention Advisory Council.

2.12. The Contractor shall employ a Poison Educator who shall provide services including, but not limited to:

2.12.1. Collaborating with the Injury Prevention Program, and being physically located within the Department's Injury Prevention Program office.

2.12.2. Meeting with the Injury Prevention Program Manager, either in person or by telephone, at least once per month to discuss activities over the previous month and plans for the month(s) to come.

2.12.3. Presenting at or acting as a panel member for numerous community sessions related to decreasing substance abuse including, but not limited to Alcoholics Anonymous meetings and/or Department meetings with the public.

2.12.4. Providing educational sessions and other outreach for the general public, health care providers, educators, legislators, members of the media, and others.

2.12.5. Attending injury prevention meetings in New Hampshire that include a poisoning prevention component which may include community meetings and/or Department meetings.

## 3. Reporting

3.1. Utilizing aggregate, de-identified data collected from the poison control hotline, the Contractor shall provide the following information:

3.1.1. A monthly report on opioid-related poisoning calls to the Department, or as requested by the Department via an excel spreadsheet emailed to the Injury Prevention Program, Opioid Overdose Surveillance Coordinator.

3.1.2. A quarterly report on both progress toward performance measures and call activity including demographics of callers, substances that caused the poisoning, general location where poisoning occurred, and other details to the Department via an excel spreadsheet emailed to the Injury Prevention Program, Program Manager.

3.1.3. An in-depth annual report on both progress toward performance measures and call activity including demographics of callers, substances that caused the poisoning, general location where poisoning occurred, and other details to the Department via a Word document emailed to the Injury Prevention Program, Program Manager.

3.1.4. Call information upon request on poisoning topics with a three (3)-day turn-around or less for legislative briefings or media queries. Upon receiving these types of requests, the Contractor shall contact the Department's Public Information Office (PIO) to keep the PIO informed regarding the data requested and by whom.

## 4. Performance Measures

4.1. The Contractor shall ensure that following performance indicators are achieved annually and monitored monthly to measure the effectiveness of the agreement:

4.1.1. The Vendor will maintain or increase the seven point two (7.2) penetrance rate (the number of calls per one thousand (1,000) population) for human poison exposures in New Hampshire as an indicator that education regarding the hotline was effective as the same or more individuals are calling the hotline.

4.1.2. The Poison Educator shall attend, or send a representative to, at least ninety percent (90%) of the monthly Injury Prevention Advisory Council Meetings.

4.1.3. The Poison Educator shall present or attend as a panel member to at least ten (10) educational or community outreach opportunities per year.

4.1.4. Regarding call rate, the Contractor shall ensure that:

4.1.4.1. For all non-emergent cases, for all callers, ninety percent (90%) shall be managed in the home setting to decrease health care costs.

4.1.4.2. For all non-emergent cases regarding children under age six (6) years of age, ninety percent (90%) shall be managed at home.

4.1.4.3. For all non-emergent cases for adults age sixty (60) years and older, who are living independently in the community, the Contractor shall maintain or exceed the percentage of cases at a baseline of ninety percent (90%) managed at home.

4.1.5. The Contractor shall maintain or exceed the percentage of human poisoning exposure cases managed at health care facilities at a baseline of twenty-three percent (23%) of all calls.

4.1.6. The Contractor shall respond to Department notification alerts sent during quarterly drills within thirty (30) minutes, one hundred percent (100%) of the time.

4.2. Annually, the Contractor shall develop and submit to the Department, a corrective action plan for any performance measure that was not achieved.

# Methods and Conditions Precedent to Payment

1. The State shall pay the Contractor an amount not to exceed the Form P-37, Block 1.8, Price Limitation for the services provided by the Contractor pursuant to Exhibit A, Scope of Services.

2. The Contractor agrees to provide the services in Exhibit A, Scope of Service in compliance with funding requirements. Failure to meet the scope of services may jeopardize the funded contractor's current and/or future funding.

3. This contract is funded with general funds as well as Federal funds outlined as follows:
   3.1. US Department of Health and Human Services, Centers for Disease Control and Prevention, TP12-1201 HPP and PHEP Cooperative Agreements, Catalog of Federal Domestic Assistance (CFDA #) 93.069, Federal Award Identification Number (FAIN) #U90TP000535,

   3.2. US Department of Health and Human Services, Centers for Disease Control and Prevention, Bio monitoring Cooperative Agreement, Catalog of Federal Domestic Assistance (CFDA #) 93.070, Federal Award Identification Number (FAIN) # U88EH001142.

4. The total contract funds per State Fiscal Year for the contract are $598,500 for a total contract value of $1,197,000.

5. Payment for said services shall be made monthly as follows:
   5.1. Payment shall be on a cost reimbursement basis for actual expenditures incurred in the fulfillment of this agreement, and shall be in accordance with the approved line item.

   5.2. The Contractor will submit an invoice in a form satisfactory to the State by the twentieth working day of each month, which identifies and requests reimbursement for authorized expenses incurred in the prior month. The invoice must be completed, signed, dated and returned to the Department in order to initiate payment. The Contractor agrees to keep records of their activities related to Department programs and services.

   5.3. The State shall make payment to the Contractor within thirty (30) days of receipt of each invoice, subsequent to approval of the submitted invoice and if sufficient funds are available. Contractors will keep detailed records of their activities related to DHHS-funded programs and services.

   5.4. The final invoice shall be due to the State no later than forty (40) days after the contract Form P-37, Block 1.7 Completion Date.

   5.5. Invoices must be emailed to: DPHScontractbilling@dhhs.nh.gov.

   5.6. Payments may be withheld pending receipt of required reports or documentation as identified in Exhibit A, Scope of Services, and in this Exhibit B.

6. Notwithstanding paragraph 18 of the General Provisions P-37, changes limited to adjusting amounts between budget line items, related items, amendments of related budget exhibits within the price limitation, and to adjusting encumbrances between State Fiscal Years, may be made by written agreement of both parties and may be made without obtaining approval of the Governor and Executive Council.

| | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|
| 1. Total Salary/Wages | $ 37,655.00 | $ 3,765.50 | $ 41,420.50 | $0.00 | $0.00 | $0.00 | $37,655.00 | $3,765.50 | $41,420.50 |
| 2. Employee Benefits | $ 9,413.75 | $ 941.38 | $ 10,355.13 | $0.00 | $0.00 | $0.00 | $9,413.75 | $941.38 | $10,355.13 |
| 3. Consultants | — | -- | – | $ | $ | $ | $ | $ | $ |
| 4. Equipment: | — | -- | – | $ | $ | $ | $ | $ | $ |
| Rental | — | -- | – | $ | $ | $ | $ | $ | $ |
| Repair and Maintenance | — | -- | – | $ | $ | $ | $ | $ | $ |
| Purchase/Depreciation | — | -- | – | $ | $ | $ | $ | $ | $ |
| 5. Supplies: | — | -- | – | $ | $ | $ | $ | $ | $ |
| Educational | $ 700.00 | $ 70.00 | $ 770.00 | $0.00 | $0.00 | $0.00 | $700.00 | $70.00 | $770.00 |
| Lab | — | -- | – | $ | $ | $ | $ | $ | $ |
| Pharmacy | — | -- | – | $ | $ | $ | $ | $ | $ |
| Medical | — | -- | – | $ | $ | $ | $ | $ | $ |
| Office | — | -- | – | $ | $ | $ | $ | $ | $ |
| 6. Travel | $ 5,700.00 | $ 570.00 | $ 6,270.00 | $0.00 | $0.00 | $0.00 | $5,700.00 | $570.00 | $6,270.00 |
| 7. Occupancy | — | -- | – | $ | $ | $ | $ | $ | $ |
| 8. Current Expenses | — | -- | – | $ | $ | $ | $ | $ | $ |
| Telephone | $ 1,663.07 | $ 166.31 | $ 1,829.38 | $0.00 | $0.00 | $0.00 | $1,663.07 | $166.31 | $1,829.38 |
| Postage | — | -- | – | $ | $ | $ | $ | $ | $ |
| Subscriptions | — | -- | – | $ | $ | $ | $ | $ | $ |
| Audit and Legal | — | -- | – | $ | $ | $ | $ | $ | $ |
| Insurance | — | -- | – | $ | $ | $ | $ | $ | $ |
| Board Expenses | — | -- | – | $ | $ | $ | $ | $ | $ |
| 9. Software | $ 7,200.00 | $ 720.00 | $ 7,920.00 | $0.00 | $0.00 | $0.00 | $7,200.00 | $720.00 | $7,920.00 |
| 10. Marketing/ Communications | — | -- | -- | $ - | $ - | $ - | $ - | $ - | $ - |
| 11. Staff Education and Training | — | -- | – | $ | $ | $ | $ | $ | $ |
| 12. Subcontracts/ Agreements | $ 527,405.00 | -- | $ 527,405.00 | $0.00 | $0.00 | $0.00 | $527,405.00 | $0.00 | $527,405.00 |
| Dues | $ 2,300.00 | $ 230.00 | $ 2,530.00 | $0.00 | $0.00 | $0.00 | $2,300.00 | $230.00 | $2,530.00 |
| | — | -- | – | $ | $ | $ | $ | $ | $ |
| | — | -- | -- | $ | $ | $ | $ | $ | $ |
| | — | -- | -- | $ | $ | $ | $ | $ | $ |
| **TOTAL** | $ 592,036.82 | $ 6,463.18 | $ 598,500.00 | $0.00 | $0.00 | $0.00 | $592,036.82 | $6,463.18 | $598,500.00 |

Contractor Initial

Date 3/5/2018

Exhibit B-2

| [redacted] | [redacted] | [redacted] | [redacted] | [redacted] | [redacted] | [redacted] | [redacted] | [redacted] | [redacted] |
|---|---|---|---|---|---|---|---|---|---|
| [redacted] | [redacted] | [redacted] | [redacted] | [redacted] | [redacted] | [redacted] | [redacted] | [redacted] | [redacted] |
| 1. Total Salary/Wages | $ 37,655.00 | $ 3,765.50 | $ 41,420.50 | $0.00 | $0.00 | $0.00 | $37,655.00 | $3,765.50 | $41,420.50 |
| 2. Employee Benefits | $ 9,413.75 | $ 941.38 | $ 10,355.13 | $0.00 | $0.00 | $0.00 | $9,413.75 | $941.38 | $10,355.13 |
| 3. Consultants | — | -- | -- | $ | $ | $ | $ | $ | $ |
| 4. Equipment: | — | -- | -- | $ | $ | $ | $ | $ | $ |
| Rental | — | -- | -- | $ | $ | $ | $ | $ | $ |
| Repair and Maintenance | — | -- | -- | $ - | $ - | $ - | $ - | $ - | $ - |
| Purchase/Depreciation | — | -- | -- | $ | $ | $ | $ | $ | $ |
| 5. Supplies: | — | -- | -- | $ | $ | $ | $ | $ | $ |
| Educational | $ 700.00 | $ 70.00 | $ 770.00 | $0.00 | $0.00 | $ | $700.00 | $70.00 | $770.00 |
| Lab | — | -- | -- | $ | $ | $ | $ | $ | $ |
| Pharmacy | — | -- | -- | $ | $ | $ | $ | $ | $ |
| Medical | — | -- | -- | $ | $ | $ | $ | $ | $ |
| Office | — | -- | -- | $ | $ | $ | $ | $ | $ |
| 6. Travel | $ 5,700.00 | $ 570.00 | $ 6,270.00 | $0.00 | $0.00 | $ | $5,700.00 | $570.00 | $6,270.00 |
| 7. Occupancy | — | -- | -- | $ | $ | $ | $ | $ | $ |
| 8. Current Expenses | — | -- | -- | $ | $ | $ | $ | $ | $ |
| Telephone | $ 1,663.07 | $ 166.31 | $ 1,829.38 | $0.00 | $0.00 | $ | $1,663.07 | $166.31 | $1,829.38 |
| Postage | — | -- | -- | $ | $ | $ | $ | $ | $ |
| Subscriptions | — | -- | -- | $ | $ | $ | $ | $ | $ |
| Audit and Legal | — | -- | -- | $ | $ | $ | $ | $ | $ |
| Insurance | — | -- | -- | $ | $ | $ | $ | $ | $ |
| Board Expenses | — | -- | -- | $ | $ | $ | $ | $ | $ |
| 9. Software | $ 7,200.00 | $ 720.00 | $ 7,920.00 | $0.00 | $0.00 | $ | $7,200.00 | $720.00 | $7,920.00 |
| 10. Marketing/Communications | — | -- | -- | $ | $ | $ | $ | $ | $ |
| 11. Staff Education and Training | — | -- | -- | $ | $ | $ | $ | $ | $ |
| 12. Subcontracts/Agreements | $ 527,405.00 | -- | $ 527,405.00 | $0.00 | $0.00 | $ | $527,405.00 | $0.00 | $527,405.00 |
| Dues | $ 2,300.00 | $ 230.00 | $ 2,530.00 | $0.00 | $0.00 | $ | $2,300.00 | $230.00 | $2,530.00 |
| | — | -- | -- | $ | $ | $ | $ | $ | $ |
| | — | -- | -- | $ | $ | $ | $ | $ | $ |
| | — | -- | -- | $ | $ | $ | $ | $ | $ |
| **TOTAL** | $ 592,036.82 | $ 6,463.18 | $ 598,500.00 | $0.00 | $0.00 | $ | $592,036.82 | $6,463.18 | $598,500.00 |

Contractor Initial

Date 3/5/2018

## SPECIAL PROVISIONS

Contractors Obligations: The Contractor covenants and agrees that all funds received by the Contractor under the Contract shall be used only as payment to the Contractor for services provided to eligible individuals and, in the furtherance of the aforesaid covenants, the Contractor hereby covenants and agrees as follows:

1. **Compliance with Federal and State Laws:** If the Contractor is permitted to determine the eligibility of individuals such eligibility determination shall be made in accordance with applicable federal and state laws, regulations, orders, guidelines, policies and procedures.

2. **Time and Manner of Determination:** Eligibility determinations shall be made on forms provided by the Department for that purpose and shall be made and remade at such times as are prescribed by the Department.

3. **Documentation:** In addition to the determination forms required by the Department, the Contractor shall maintain a data file on each recipient of services hereunder, which file shall include all information necessary to support an eligibility determination and such other information as the Department requests. The Contractor shall furnish the Department with all forms and documentation regarding eligibility determinations that the Department may request or require.

4. **Fair Hearings:** The Contractor understands that all applicants for services hereunder, as well as individuals declared ineligible have a right to a fair hearing regarding that determination. The Contractor hereby covenants and agrees that all applicants for services shall be permitted to fill out an application form and that each applicant or re-applicant shall be informed of his/her right to a fair hearing in accordance with Department regulations.

5. **Gratuities or Kickbacks:** The Contractor agrees that it is a breach of this Contract to accept or make a payment, gratuity or offer of employment on behalf of the Contractor, any Sub-Contractor or the State in order to influence the performance of the Scope of Work detailed in Exhibit A of this Contract. The State may terminate this Contract and any sub-contract or sub-agreement if it is determined that payments, gratuities or offers of employment of any kind were offered or received by any officials, officers, employees or agents of the Contractor or Sub-Contractor.

6. **Retroactive Payments:** Notwithstanding anything to the contrary contained in the Contract or in any other document, contract or understanding, it is expressly understood and agreed by the parties hereto, that no payments will be made hereunder to reimburse the Contractor for costs incurred for any purpose or for any services provided to any individual prior to the Effective Date of the Contract and no payments shall be made for expenses incurred by the Contractor for any services provided prior to the date on which the individual applies for services or (except as otherwise provided by the federal regulations) prior to a determination that the individual is eligible for such services.

7. **Conditions of Purchase:** Notwithstanding anything to the contrary contained in the Contract, nothing herein contained shall be deemed to obligate or require the Department to purchase services hereunder at a rate which reimburses the Contractor in excess of the Contractors costs, at a rate which exceeds the amounts reasonable and necessary to assure the quality of such service, or at a rate which exceeds the rate charged by the Contractor to ineligible individuals or other third party funders for such service. If at any time during the term of this Contract or after receipt of the Final Expenditure Report hereunder, the Department shall determine that the Contractor has used payments hereunder to reimburse items of expense other than such costs, or has received payment in excess of such costs or in excess of such rates charged by the Contractor to ineligible individuals or other third party funders, the Department may elect to:
   7.1. Renegotiate the rates for payment hereunder, in which event new rates shall be established;
   7.2. Deduct from any future payment to the Contractor the amount of any prior reimbursement in excess of costs;

7.3. Demand repayment of the excess payment by the Contractor in which event failure to make such repayment shall constitute an Event of Default hereunder. When the Contractor is permitted to determine the eligibility of individuals for services, the Contractor agrees to reimburse the Department for all funds paid by the Department to the Contractor for services provided to any individual who is found by the Department to be ineligible for such services at any time during the period of retention of records established herein.

RECORDS: MAINTENANCE, RETENTION, AUDIT, DISCLOSURE AND CONFIDENTIALITY:

8. **Maintenance of Records:** In addition to the eligibility records specified above, the Contractor covenants and agrees to maintain the following records during the Contract Period:
   8.1. Fiscal Records: books, records, documents and other data evidencing and reflecting all costs and other expenses incurred by the Contractor in the performance of the Contract, and all income received or collected by the Contractor during the Contract Period, said records to be maintained in accordance with accounting procedures and practices which sufficiently and properly reflect all such costs and expenses, and which are acceptable to the Department, and to include, without limitation, all ledgers, books, records, and original evidence of costs such as purchase requisitions and orders, vouchers, requisitions for materials, inventories, valuations of in-kind contributions, labor time cards, payrolls, and other records requested or required by the Department.
   8.2. Statistical Records: Statistical, enrollment, attendance or visit records for each recipient of services during the Contract Period, which records shall include all records of application and eligibility (including all forms required to determine eligibility for each such recipient), records regarding the provision of services and all invoices submitted to the Department to obtain payment for such services.
   8.3. Medical Records: Where appropriate and as prescribed by the Department regulations, the Contractor shall retain medical records on each patient/recipient of services.

9. **Audit:** Contractor shall submit an annual audit to the Department within 60 days after the close of the agency fiscal year. It is recommended that the report be prepared in accordance with the provision of Office of Management and Budget Circular A-133, "Audits of States, Local Governments, and Non Profit Organizations" and the provisions of Standards for Audit of Governmental Organizations, Programs, Activities and Functions, issued by the US General Accounting Office (GAO standards) as they pertain to financial compliance audits.
   9.1. Audit and Review: During the term of this Contract and the period for retention hereunder, the Department, the United States Department of Health and Human Services, and any of their designated representatives shall have access to all reports and records maintained pursuant to the Contract for purposes of audit, examination, excerpts and transcripts.
   9.2. Audit Liabilities: In addition to and not in any way in limitation of obligations of the Contract, it is understood and agreed by the Contractor that the Contractor shall be held liable for any state or federal audit exceptions and shall return to the Department, all payments made under the Contract to which exception has been taken or which have been disallowed because of such an exception.

10. **Confidentiality of Records:** All information, reports, and records maintained hereunder or collected in connection with the performance of the services and the Contract shall be confidential and shall not be disclosed by the Contractor, provided however, that pursuant to state laws and the regulations of the Department regarding the use and disclosure of such information, disclosure may be made to public officials requiring such information in connection with their official duties and for purposes directly connected to the administration of the services and the Contract; and provided further, that the use or disclosure by any party of any information concerning a recipient for any purpose not directly connected with the administration of the Department or the Contractor's responsibilities with respect to purchased services hereunder is prohibited except on written consent of the recipient, his attorney or guardian.

Notwithstanding anything to the contrary contained herein the covenants and conditions contained in the Paragraph shall survive the termination of the Contract for any reason whatsoever.

11. **Reports:** Fiscal and Statistical: The Contractor agrees to submit the following reports at the following times if requested by the Department.
    11.1. Interim Financial Reports: Written interim financial reports containing a detailed description of all costs and non-allowable expenses incurred by the Contractor to the date of the report and containing such other information as shall be deemed satisfactory by the Department to justify the rate of payment hereunder. Such Financial Reports shall be submitted on the form designated by the Department or deemed satisfactory by the Department.
    11.2. Final Report: A final report shall be submitted within thirty (30) days after the end of the term of this Contract. The Final Report shall be in a form satisfactory to the Department and shall contain a summary statement of progress toward goals and objectives stated in the Proposal and other information required by the Department.

12. **Completion of Services:** Disallowance of Costs: Upon the purchase by the Department of the maximum number of units provided for in the Contract and upon payment of the price limitation hereunder, the Contract and all the obligations of the parties hereunder (except such obligations as, by the terms of the Contract are to be performed after the end of the term of this Contract and/or survive the termination of the Contract) shall terminate, provided however, that if, upon review of the Final Expenditure Report the Department shall disallow any expenses claimed by the Contractor as costs hereunder the Department shall retain the right, at its discretion, to deduct the amount of such expenses as are disallowed or to recover such sums from the Contractor.

13. **Credits:** All documents, notices, press releases, research reports and other materials prepared during or resulting from the performance of the services of the Contract shall include the following statement:
    13.1. The preparation of this (report, document etc.) was financed under a Contract with the State of New Hampshire, Department of Health and Human Services, with funds provided in part by the State of New Hampshire and/or such other funding sources as were available or required, e.g., the United States Department of Health and Human Services.

14. **Prior Approval and Copyright Ownership:** All materials (written, video, audio) produced or purchased under the contract shall have prior approval from DHHS before printing, production, distribution or use. The DHHS will retain copyright ownership for any and all original materials produced, including, but not limited to, brochures, resource directories, protocols or guidelines, posters, or reports. Contractor shall not reproduce any materials produced under the contract without prior written approval from DHHS.

15. **Operation of Facilities: Compliance with Laws and Regulations:** In the operation of any facilities for providing services, the Contractor shall comply with all laws, orders and regulations of federal, state, county and municipal authorities and with any direction of any Public Officer or officers pursuant to laws which shall impose an order or duty upon the contractor with respect to the operation of the facility or the provision of the services at such facility. If any governmental license or permit shall be required for the operation of the said facility or the performance of the said services, the Contractor will procure said license or permit, and will at all times comply with the terms and conditions of each such license or permit. In connection with the foregoing requirements, the Contractor hereby covenants and agrees that, during the term of this Contract the facilities shall comply with all rules, orders, regulations, and requirements of the State Office of the Fire Marshal and the local fire protection agency, and shall be in conformance with local building and zoning codes, by-laws and regulations.

16. **Equal Employment Opportunity Plan (EEOP):** The Contractor will provide an Equal Employment Opportunity Plan (EEOP) to the Office for Civil Rights, Office of Justice Programs (OCR), if it has received a single award of $500,000 or more. If the recipient receives $25,000 or more and has 50 or

more employees, it will maintain a current EEOP on file and submit an EEOP Certification Form to the OCR, certifying that its EEOP is on file. For recipients receiving less than $25,000, or public grantees with fewer than 50 employees, regardless of the amount of the award, the recipient will provide an EEOP Certification Form to the OCR certifying it is not required to submit or maintain an EEOP. Non-profit organizations, Indian Tribes, and medical and educational institutions are exempt from the EEOP requirement, but are required to submit a certification form to the OCR to claim the exemption. EEOP Certification Forms are available at: http://www.ojp.usdoj/about/ocr/pdfs/cert.pdf.

17. **Limited English Proficiency (LEP):** As clarified by Executive Order 13166, Improving Access to Services for persons with Limited English Proficiency, and resulting agency guidance, national origin discrimination includes discrimination on the basis of limited English proficiency (LEP). To ensure compliance with the Omnibus Crime Control and Safe Streets Act of 1968 and Title VI of the Civil Rights Act of 1964, Contractors must take reasonable steps to ensure that LEP persons have meaningful access to its programs.

18. **Pilot Program for Enhancement of Contractor Employee Whistleblower Protections:** The following shall apply to all contracts that exceed the Simplified Acquisition Threshold as defined in 48 CFR 2.101 (currently, $150,000)

CONTRACTOR EMPLOYEE WHISTLEBLOWER RIGHTS AND REQUIREMENT TO INFORM EMPLOYEES OF WHISTLEBLOWER RIGHTS (SEP 2013)

(a) This contract and employees working on this contract will be subject to the whistleblower rights and remedies in the pilot program on Contractor employee whistleblower protections established at 41 U.S.C. 4712 by section 828 of the National Defense Authorization Act for Fiscal Year 2013 (Pub. L. 112-239) and FAR 3.908.

(b) The Contractor shall inform its employees in writing, in the predominant language of the workforce, of employee whistleblower rights and protections under 41 U.S.C. 4712, as described in section 3.908 of the Federal Acquisition Regulation.

(c) The Contractor shall insert the substance of this clause, including this paragraph (c), in all subcontracts over the simplified acquisition threshold.

19. **Subcontractors:** DHHS recognizes that the Contractor may choose to use subcontractors with greater expertise to perform certain health care services or functions for efficiency or convenience, but the Contractor shall retain the responsibility and accountability for the function(s). Prior to subcontracting, the Contractor shall evaluate the subcontractor's ability to perform the delegated function(s). This is accomplished through a written agreement that specifies activities and reporting responsibilities of the subcontractor and provides for revoking the delegation or imposing sanctions if the subcontractor's performance is not adequate. Subcontractors are subject to the same contractual conditions as the Contractor and the Contractor is responsible to ensure subcontractor compliance with those conditions.
When the Contractor delegates a function to a subcontractor, the Contractor shall do the following:
    19.1. Evaluate the prospective subcontractor's ability to perform the activities, before delegating the function
    19.2. Have a written agreement with the subcontractor that specifies activities and reporting responsibilities and how sanctions/revocation will be managed if the subcontractor's performance is not adequate
    19.3. Monitor the subcontractor's performance on an ongoing basis

19.4. Provide to DHHS an annual schedule identifying all subcontractors, delegated functions and responsibilities, and when the subcontractor's performance will be reviewed
19.5. DHHS shall, at its discretion, review and approve all subcontracts.

If the Contractor identifies deficiencies or areas for improvement are identified, the Contractor shall take corrective action.

**DEFINITIONS**
As used in the Contract, the following terms shall have the following meanings:

COSTS: Shall mean those direct and indirect items of expense determined by the Department to be allowable and reimbursable in accordance with cost and accounting principles established in accordance with state and federal laws, regulations, rules and orders.

DEPARTMENT: NH Department of Health and Human Services.

FINANCIAL MANAGEMENT GUIDELINES: Shall mean that section of the Contractor Manual which is entitled "Financial Management Guidelines" and which contains the regulations governing the financial activities of contractor agencies which have contracted with the State of NH to receive funds.

PROPOSAL: If applicable, shall mean the document submitted by the Contractor on a form or forms required by the Department and containing a description of the Services to be provided to eligible individuals by the Contractor in accordance with the terms and conditions of the Contract and setting forth the total cost and sources of revenue for each service to be provided under the Contract.

UNIT: For each service that the Contractor is to provide to eligible individuals hereunder, shall mean that period of time or that specified activity determined by the Department and specified in Exhibit B of the Contract.

FEDERAL/STATE LAW: Wherever federal or state laws, regulations, rules, orders, and policies, etc. are referred to in the Contract, the said reference shall be deemed to mean all such laws, regulations, etc. as they may be amended or revised from the time to time.

CONTRACTOR MANUAL: Shall mean that document prepared by the NH Department of Administrative Services containing a compilation of all regulations promulgated pursuant to the New Hampshire Administrative Procedures Act. NH RSA Ch 541-A, for the purpose of implementing State of NH and federal regulations promulgated thereunder.

SUPPLANTING OTHER FEDERAL FUNDS: The Contractor guarantees that funds provided under this Contract will not supplant any existing federal funds available for these services.

## Exhibit C-1

### REVISIONS TO GENERAL PROVISIONS

1. Subparagraph 4 of the General Provisions of this contract, Conditional Nature of Agreement, is replaced as follows:

   4. CONDITIONAL NATURE OF AGREEMENT.

   Notwithstanding any provision of this Agreement to the contrary, all obligations of the State hereunder, including without limitation, the continuance of payments, in whole or in part, under this Agreement are contingent upon continued appropriation or availability of funds, including any subsequent changes to the appropriation or availability of funds affected by any state or federal legislative or executive action that reduces, eliminates, or otherwise modifies the appropriation or availability of funding for this Agreement and the Scope of Services provided in Exhibit A, Scope of Services, in whole or in part. In no event shall the State be liable for any payments hereunder in excess of appropriated or available funds. In the event of a reduction, termination, or modification of appropriated or available funds, the State shall have the right to withhold payment until such funds become available, if ever. The State shall have the right to reduce, terminate, or modify services under this Agreement immediately upon giving the Contractor notice of such reduction, termination or modification. The State shall not be required to transfer funds from any other source or account into the Account(s) identified in block 1.6 of the General Provisions, Account Number, or any other account, in the event funds are reduced or unavailable.

2. Subparagraph 10 of the General Provisions of this contract, Termination, is amended by adding the following language;

   10.1 The State may terminate the Agreement at any time for any reason, at the sole discretion of the State, 30 days after giving the Contractor written notice that the State is exercising its option to terminate the Agreement.

   10.2 In the event of early termination, the Contractor shall, within 15 days of notice of early termination, develop and submit to the State a Transition Plan for services under the Agreement, including but not limited to, identifying the present and future needs of clients receiving services under the Agreement and establishes a process to meet those needs.

   10.3 The Contractor shall fully cooperate with the State and shall promptly provide detailed information to support the Transition Plan including, but not limited to, any information or data requested by the State related to the termination of the Agreement and Transition Plan and shall provide ongoing communication and revisions of the Transition Plan to the State as requested.

   10.4 In the event that services under the Agreement, including but not limited to clients receiving services under the Agreement are transitioned to having services delivered by another entity including contracted providers or the State, the Contractor shall provide a process for uninterrupted delivery of services in the Transition Plan.

   10.5 The Contractor shall establish a method of notifying clients and other affected individuals about the transition. The Contractor shall include the proposed communications in its Transition Plan submitted to the State as described above.

3. Extension:

   The Department reserves the right to renew the Contract for up to two (2) additional years, subject to the continued availability of funds, satisfactory performance of services and approval by the Governor and Executive Council.

## CERTIFICATION REGARDING DRUG-FREE WORKPLACE REQUIREMENTS

The Contractor identified in Section 1.3 of the General Provisions agrees to comply with the provisions of Sections 5151-5160 of the Drug-Free Workplace Act of 1988 (Pub. L. 100-690, Title V, Subtitle D; 41 U.S.C. 701 et seq.), and further agrees to have the Contractor's representative, as identified in Sections 1.11 and 1.12 of the General Provisions execute the following Certification:

**ALTERNATIVE I - FOR GRANTEES OTHER THAN INDIVIDUALS**

**US DEPARTMENT OF HEALTH AND HUMAN SERVICES - CONTRACTORS**
**US DEPARTMENT OF EDUCATION - CONTRACTORS**
**US DEPARTMENT OF AGRICULTURE - CONTRACTORS**

This certification is required by the regulations implementing Sections 5151-5160 of the Drug-Free Workplace Act of 1988 (Pub. L. 100-690, Title V, Subtitle D; 41 U.S.C. 701 et seq.). The January 31, 1989 regulations were amended and published as Part II of the May 25, 1990 Federal Register (pages 21681-21691), and require certification by grantees (and by inference, sub-grantees and sub-contractors), prior to award, that they will maintain a drug-free workplace. Section 3017.630(c) of the regulation provides that a grantee (and by inference, sub-grantees and sub-contractors) that is a State may elect to make one certification to the Department in each federal fiscal year in lieu of certificates for each grant during the federal fiscal year covered by the certification. The certificate set out below is a material representation of fact upon which reliance is placed when the agency awards the grant. False certification or violation of the certification shall be grounds for suspension of payments, suspension or termination of grants, or government wide suspension or debarment. Contractors using this form should send it to:

Commissioner
NH Department of Health and Human Services
129 Pleasant Street,
Concord, NH 03301-6505

1. The grantee certifies that it will or will continue to provide a drug-free workplace by:
   - 1.1. Publishing a statement notifying employees that the unlawful manufacture, distribution, dispensing, possession or use of a controlled substance is prohibited in the grantee's workplace and specifying the actions that will be taken against employees for violation of such prohibition;
   - 1.2. Establishing an ongoing drug-free awareness program to inform employees about
     - 1.2.1. The dangers of drug abuse in the workplace;
     - 1.2.2. The grantee's policy of maintaining a drug-free workplace;
     - 1.2.3. Any available drug counseling, rehabilitation, and employee assistance programs; and
     - 1.2.4. The penalties that may be imposed upon employees for drug abuse violations occurring in the workplace;
   - 1.3. Making it a requirement that each employee to be engaged in the performance of the grant be given a copy of the statement required by paragraph (a);
   - 1.4. Notifying the employee in the statement required by paragraph (a) that, as a condition of employment under the grant, the employee will
     - 1.4.1. Abide by the terms of the statement; and
     - 1.4.2. Notify the employer in writing of his or her conviction for a violation of a criminal drug statute occurring in the workplace no later than five calendar days after such conviction;
   - 1.5. Notifying the agency in writing, within ten calendar days after receiving notice under subparagraph 1.4.2 from an employee or otherwise receiving actual notice of such conviction. Employers of convicted employees must provide notice, including position title, to every grant officer on whose grant activity the convicted employee was working, unless the Federal agency

has designated a central point for the receipt of such notices. Notice shall include the identification number(s) of each affected grant;

1.6. Taking one of the following actions, within 30 calendar days of receiving notice under subparagraph 1.4.2, with respect to any employee who is so convicted

1.6.1. Taking appropriate personnel action against such an employee, up to and including termination, consistent with the requirements of the Rehabilitation Act of 1973, as amended; or

1.6.2. Requiring such employee to participate satisfactorily in a drug abuse assistance or rehabilitation program approved for such purposes by a Federal, State, or local health, law enforcement, or other appropriate agency;

1.7. Making a good faith effort to continue to maintain a drug-free workplace through implementation of paragraphs 1.1, 1.2, 1.3, 1.4, 1.5, and 1.6.

2. The grantee may insert in the space provided below the site(s) for the performance of work done in connection with the specific grant.

Place of Performance (street address, city, county, state, zip code) (list each location)

Check ☐ if there are workplaces on file that are not identified here.

Contractor Name:

3/5/18
Date

Name: Aubrey G. Swalwell
Title: Exec. Director

## CERTIFICATION REGARDING LOBBYING

The Contractor identified in Section 1.3 of the General Provisions agrees to comply with the provisions of Section 319 of Public Law 101-121, Government wide Guidance for New Restrictions on Lobbying, and 31 U.S.C. 1352, and further agrees to have the Contractor's representative, as identified in Sections 1.11 and 1.12 of the General Provisions execute the following Certification:

US DEPARTMENT OF HEALTH AND HUMAN SERVICES - CONTRACTORS
US DEPARTMENT OF EDUCATION - CONTRACTORS
US DEPARTMENT OF AGRICULTURE - CONTRACTORS

Programs (indicate applicable program covered):
*Temporary Assistance to Needy Families under Title IV-A
*Child Support Enforcement Program under Title IV-D
*Social Services Block Grant Program under Title XX
*Medicaid Program under Title XIX
*Community Services Block Grant under Title VI
*Child Care Development Block Grant under Title IV

The undersigned certifies, to the best of his or her knowledge and belief, that:

1. No Federal appropriated funds have been paid or will be paid by or on behalf of the undersigned, to any person for influencing or attempting to influence an officer or employee of any agency, a Member of Congress, an officer or employee of Congress, or an employee of a Member of Congress in connection with the awarding of any Federal contract, continuation, renewal, amendment, or modification of any Federal contract, grant, loan, or cooperative agreement (and by specific mention sub-grantee or sub-contractor).

2. If any funds other than Federal appropriated funds have been paid or will be paid to any person for influencing or attempting to influence an officer or employee of any agency, a Member of Congress, an officer or employee of Congress, or an employee of a Member of Congress in connection with this Federal contract, grant, loan, or cooperative agreement (and by specific mention sub-grantee or sub-contractor), the undersigned shall complete and submit Standard Form LLL, (Disclosure Form to Report Lobbying, in accordance with its instructions, attached and identified as Standard Exhibit E-I.)

3. The undersigned shall require that the language of this certification be included in the award document for sub-awards at all tiers (including subcontracts, sub-grants, and contracts under grants, loans, and cooperative agreements) and that all sub-recipients shall certify and disclose accordingly.

This certification is a material representation of fact upon which reliance was placed when this transaction was made or entered into. Submission of this certification is a prerequisite for making or entering into this transaction imposed by Section 1352, Title 31, U.S. Code. Any person who fails to file the required certification shall be subject to a civil penalty of not less than $10,000 and not more than $100,000 for each such failure.

Contractor Name:

3/5/18
Date

Name: [illegible]
Title: [illegible]

## CERTIFICATION REGARDING DEBARMENT, SUSPENSION AND OTHER RESPONSIBILITY MATTERS

The Contractor identified in Section 1.3 of the General Provisions agrees to comply with the provisions of Executive Office of the President, Executive Order 12549 and 45 CFR Part 76 regarding Debarment, Suspension, and Other Responsibility Matters, and further agrees to have the Contractor's representative, as identified in Sections 1.11 and 1.12 of the General Provisions execute the following Certification:

INSTRUCTIONS FOR CERTIFICATION

1. By signing and submitting this proposal (contract), the prospective primary participant is providing the certification set out below.

2. The inability of a person to provide the certification required below will not necessarily result in denial of participation in this covered transaction. If necessary, the prospective participant shall submit an explanation of why it cannot provide the certification. The certification or explanation will be considered in connection with the NH Department of Health and Human Services' (DHHS) determination whether to enter into this transaction. However, failure of the prospective primary participant to furnish a certification or an explanation shall disqualify such person from participation in this transaction.

3. The certification in this clause is a material representation of fact upon which reliance was placed when DHHS determined to enter into this transaction. If it is later determined that the prospective primary participant knowingly rendered an erroneous certification, in addition to other remedies available to the Federal Government, DHHS may terminate this transaction for cause or default.

4. The prospective primary participant shall provide immediate written notice to the DHHS agency to whom this proposal (contract) is submitted if at any time the prospective primary participant learns that its certification was erroneous when submitted or has become erroneous by reason of changed circumstances.

5. The terms "covered transaction," "debarred," "suspended," "ineligible," "lower tier covered transaction," "participant," "person," "primary covered transaction," "principal," "proposal," and "voluntarily excluded," as used in this clause, have the meanings set out in the Definitions and Coverage sections of the rules implementing Executive Order 12549: 45 CFR Part 76. See the attached definitions.

6. The prospective primary participant agrees by submitting this proposal (contract) that, should the proposed covered transaction be entered into, it shall not knowingly enter into any lower tier covered transaction with a person who is debarred, suspended, declared ineligible, or voluntarily excluded from participation in this covered transaction, unless authorized by DHHS.

7. The prospective primary participant further agrees by submitting this proposal that it will include the clause titled "Certification Regarding Debarment, Suspension, Ineligibility and Voluntary Exclusion - Lower Tier Covered Transactions," provided by DHHS, without modification, in all lower tier covered transactions and in all solicitations for lower tier covered transactions.

8. A participant in a covered transaction may rely upon a certification of a prospective participant in a lower tier covered transaction that it is not debarred, suspended, ineligible, or involuntarily excluded from the covered transaction, unless it knows that the certification is erroneous. A participant may decide the method and frequency by which it determines the eligibility of its principals. Each participant may, but is not required to, check the Nonprocurement List (of excluded parties).

9. Nothing contained in the foregoing shall be construed to require establishment of a system of records in order to render in good faith the certification required by this clause. The knowledge and



Contractor Initials _____

Date 3/5/18

information of a participant is not required to exceed that which is normally possessed by a prudent person in the ordinary course of business dealings.

10. Except for transactions authorized under paragraph 6 of these instructions, if a participant in a covered transaction knowingly enters into a lower tier covered transaction with a person who is suspended, debarred, ineligible, or voluntarily excluded from participation in this transaction, in addition to other remedies available to the Federal government, DHHS may terminate this transaction for cause or default.

PRIMARY COVERED TRANSACTIONS

11. The prospective primary participant certifies to the best of its knowledge and belief, that it and its principals:
    - 11.1. are not presently debarred, suspended, proposed for debarment, declared ineligible, or voluntarily excluded from covered transactions by any Federal department or agency;
    - 11.2. have not within a three-year period preceding this proposal (contract) been convicted of or had a civil judgment rendered against them for commission of fraud or a criminal offense in connection with obtaining, attempting to obtain, or performing a public (Federal, State or local) transaction or a contract under a public transaction; violation of Federal or State antitrust statutes or commission of embezzlement, theft, forgery, bribery, falsification or destruction of records, making false statements, or receiving stolen property;
    - 11.3. are not presently indicted for otherwise criminally or civilly charged by a governmental entity (Federal, State or local) with commission of any of the offenses enumerated in paragraph (l)(b) of this certification; and
    - 11.4. have not within a three-year period preceding this application/proposal had one or more public transactions (Federal, State or local) terminated for cause or default.

12. Where the prospective primary participant is unable to certify to any of the statements in this certification, such prospective participant shall attach an explanation to this proposal (contract).

LOWER TIER COVERED TRANSACTIONS

13. By signing and submitting this lower tier proposal (contract), the prospective lower tier participant, as defined in 45 CFR Part 76, certifies to the best of its knowledge and belief that it and its principals:
    - 13.1. are not presently debarred, suspended, proposed for debarment, declared ineligible, or voluntarily excluded from participation in this transaction by any federal department or agency.
    - 13.2. where the prospective lower tier participant is unable to certify to any of the above, such prospective participant shall attach an explanation to this proposal (contract).

14. The prospective lower tier participant further agrees by submitting this proposal (contract) that it will include this clause entitled "Certification Regarding Debarment, Suspension, Ineligibility, and Voluntary Exclusion - Lower Tier Covered Transactions," without modification in all lower tier covered transactions and in all solicitations for lower tier covered transactions.

Contractor Name:

Date 3/5/13

Name: [illegible]
Title: [illegible]

## CERTIFICATION OF COMPLIANCE WITH REQUIREMENTS PERTAINING TO FEDERAL NONDISCRIMINATION, EQUAL TREATMENT OF FAITH-BASED ORGANIZATIONS AND WHISTLEBLOWER PROTECTIONS

The Contractor identified in Section 1.3 of the General Provisions agrees by signature of the Contractor's representative as identified in Sections 1.11 and 1.12 of the General Provisions, to execute the following certification:

Contractor will comply, and will require any subgrantees or subcontractors to comply, with any applicable federal nondiscrimination requirements, which may include:

- the Omnibus Crime Control and Safe Streets Act of 1968 (42 U.S.C. Section 3789d) which prohibits recipients of federal funding under this statute from discriminating, either in employment practices or in the delivery of services or benefits, on the basis of race, color, religion, national origin, and sex. The Act requires certain recipients to produce an Equal Employment Opportunity Plan;

- the Juvenile Justice Delinquency Prevention Act of 2002 (42 U.S.C. Section 5672(b)) which adopts by reference, the civil rights obligations of the Safe Streets Act. Recipients of federal funding under this statute are prohibited from discriminating, either in employment practices or in the delivery of services or benefits, on the basis of race, color, religion, national origin, and sex. The Act includes Equal Employment Opportunity Plan requirements;

- the Civil Rights Act of 1964 (42 U.S.C. Section 2000d, which prohibits recipients of federal financial assistance from discriminating on the basis of race, color, or national origin in any program or activity);

- the Rehabilitation Act of 1973 (29 U.S.C. Section 794), which prohibits recipients of Federal financial assistance from discriminating on the basis of disability, in regard to employment and the delivery of services or benefits, in any program or activity;

- the Americans with Disabilities Act of 1990 (42 U.S.C. Sections 12131-34), which prohibits discrimination and ensures equal opportunity for persons with disabilities in employment, State and local government services, public accommodations, commercial facilities, and transportation;

- the Education Amendments of 1972 (20 U.S.C. Sections 1681, 1683, 1685-86), which prohibits discrimination on the basis of sex in federally assisted education programs;

- the Age Discrimination Act of 1975 (42 U.S.C. Sections 6106-07), which prohibits discrimination on the basis of age in programs or activities receiving Federal financial assistance. It does not include employment discrimination;

- 28 C.F.R. pt. 31 (U.S. Department of Justice Regulations – OJJDP Grant Programs); 28 C.F.R. pt. 42 (U.S. Department of Justice Regulations – Nondiscrimination; Equal Employment Opportunity; Policies and Procedures); Executive Order No. 13279 (equal protection of the laws for faith-based and community organizations); Executive Order No. 13559, which provide fundamental principles and policy-making criteria for partnerships with faith-based and neighborhood organizations;

- 28 C.F.R. pt. 38 (U.S. Department of Justice Regulations – Equal Treatment for Faith-Based Organizations); and Whistleblower protections 41 U.S.C. §4712 and The National Defense Authorization Act (NDAA) for Fiscal Year 2013 (Pub. L. 112-239, enacted January 2, 2013) the Pilot Program for Enhancement of Contract Employee Whistleblower Protections, which protects employees against reprisal for certain whistle blowing activities in connection with federal grants and contracts.

The certificate set out below is a material representation of fact upon which reliance is placed when the agency awards the grant. False certification or violation of the certification shall be grounds for suspension of payments, suspension or termination of grants, or government wide suspension or debarment.

In the event a Federal or State court or Federal or State administrative agency makes a finding of discrimination after a due process hearing on the grounds of race, color, religion, national origin, or sex against a recipient of funds, the recipient will forward a copy of the finding to the Office for Civil Rights, to the applicable contracting agency or division within the Department of Health and Human Services, and to the Department of Health and Human Services Office of the Ombudsman.

The Contractor identified in Section 1.3 of the General Provisions agrees by signature of the Contractor's representative as identified in Sections 1.11 and 1.12 of the General Provisions, to execute the following certification:

1. By signing and submitting this proposal (contract) the Contractor agrees to comply with the provisions indicated above.

Contractor Name:

Date 3/5/18

Name: [illegible]
Title: [illegible]

## CERTIFICATION REGARDING ENVIRONMENTAL TOBACCO SMOKE

Public Law 103-227, Part C - Environmental Tobacco Smoke, also known as the Pro-Children Act of 1994 (Act), requires that smoking not be permitted in any portion of any indoor facility owned or leased or contracted for by an entity and used routinely or regularly for the provision of health, day care, education, or library services to children under the age of 18, if the services are funded by Federal programs either directly or through State or local governments, by Federal grant, contract, loan, or loan guarantee. The law does not apply to children's services provided in private residences, facilities funded solely by Medicare or Medicaid funds, and portions of facilities used for inpatient drug or alcohol treatment. Failure to comply with the provisions of the law may result in the imposition of a civil monetary penalty of up to $1000 per day and/or the imposition of an administrative compliance order on the responsible entity.

The Contractor identified in Section 1.3 of the General Provisions agrees, by signature of the Contractor's representative as identified in Section 1.11 and 1.12 of the General Provisions, to execute the following certification:

1. By signing and submitting this contract, the Contractor agrees to make reasonable efforts to comply with all applicable provisions of Public Law 103-227, Part C, known as the Pro-Children Act of 1994.

Contractor Name:

3/5/18
Date

ACS
Name: AUGUST G. SCHLEIN
Title: EVP / TREASURER

## HEALTH INSURANCE PORTABLITY ACT
## BUSINESS ASSOCIATE AGREEMENT

The Contractor identified in Section 1.3 of the General Provisions of the Agreement agrees to comply with the Health Insurance Portability and Accountability Act, Public Law 104-191 and with the Standards for Privacy and Security of Individually Identifiable Health Information, 45 CFR Parts 160 and 164 applicable to business associates. As defined herein, "Business Associate" shall mean the Contractor and subcontractors and agents of the Contractor that receive, use or have access to protected health information under this Agreement and "Covered Entity" shall mean the State of New Hampshire, Department of Health and Human Services.

**(1) Definitions.**

a. "Breach" shall have the same meaning as the term "Breach" in section 164.402 of Title 45, Code of Federal Regulations.

b. "Business Associate" has the meaning given such term in section 160.103 of Title 45, Code of Federal Regulations.

c. "Covered Entity" has the meaning given such term in section 160.103 of Title 45, Code of Federal Regulations.

d. "Designated Record Set" shall have the same meaning as the term "designated record set" in 45 CFR Section 164.501.

e. "Data Aggregation" shall have the same meaning as the term "data aggregation" in 45 CFR Section 164.501.

f. "Health Care Operations" shall have the same meaning as the term "health care operations" in 45 CFR Section 164.501.

g. "HITECH Act" means the Health Information Technology for Economic and Clinical Health Act, TitleXIII, Subtitle D, Part 1 & 2 of the American Recovery and Reinvestment Act of 2009.

h. "HIPAA" means the Health Insurance Portability and Accountability Act of 1996, Public Law 104-191 and the Standards for Privacy and Security of Individually Identifiable Health Information, 45 CFR Parts 160, 162 and 164 and amendments thereto.

i. "Individual" shall have the same meaning as the term "individual" in 45 CFR Section 160.103 and shall include a person who qualifies as a personal representative in accordance with 45 CFR Section 164.501(g).

j. "Privacy Rule" shall mean the Standards for Privacy of Individually Identifiable Health Information at 45 CFR Parts 160 and 164, promulgated under HIPAA by the United States Department of Health and Human Services.

k. "Protected Health Information" shall have the same meaning as the term "protected health information" in 45 CFR Section 160.103, limited to the information created or received by Business Associate from or on behalf of Covered Entity.

l. "Required by Law" shall have the same meaning as the term "required by law" in 45 CFR Section 164.103.

m. "Secretary" shall mean the Secretary of the Department of Health and Human Services or his/her designee.

n. "Security Rule" shall mean the Security Standards for the Protection of Electronic Protected Health Information at 45 CFR Part 164, Subpart C, and amendments thereto.

o. "Unsecured Protected Health Information" means protected health information that is not secured by a technology standard that renders protected health information unusable, unreadable, or indecipherable to unauthorized individuals and is developed or endorsed by a standards developing organization that is accredited by the American National Standards Institute.

p. Other Definitions - All terms not otherwise defined herein shall have the meaning established under 45 C.F.R. Parts 160, 162 and 164, as amended from time to time, and the HITECH
Act.

(2) **Business Associate Use and Disclosure of Protected Health Information.**

a. Business Associate shall not use, disclose, maintain or transmit Protected Health Information (PHI) except as reasonably necessary to provide the services outlined under Exhibit A of the Agreement. Further, Business Associate, including but not limited to all its directors, officers, employees and agents, shall not use, disclose, maintain or transmit PHI in any manner that would constitute a violation of the Privacy and Security Rule.

b. Business Associate may use or disclose PHI:
   I. For the proper management and administration of the Business Associate;
   II. As required by law, pursuant to the terms set forth in paragraph d. below; or
   III. For data aggregation purposes for the health care operations of Covered Entity.

c. To the extent Business Associate is permitted under the Agreement to disclose PHI to a third party, Business Associate must obtain, prior to making any such disclosure, (i) reasonable assurances from the third party that such PHI will be held confidentially and used or further disclosed only as required by law or for the purpose for which it was disclosed to the third party; and (ii) an agreement from such third party to notify Business Associate, in accordance with the HIPAA Privacy, Security, and Breach Notification Rules of any breaches of the confidentiality of the PHI, to the extent it has obtained knowledge of such breach.

**d.** The Business Associate shall not, unless such disclosure is reasonably necessary to provide services under Exhibit A of the Agreement, disclose any PHI in response to a request for disclosure on the basis that it is required by law, without first notifying Covered Entity so that Covered Entity has an opportunity to object to the disclosure and to seek appropriate relief. If Covered Entity objects to such disclosure, the Business

Associate shall refrain from disclosing the PHI until Covered Entity has exhausted all remedies.

e. If the Covered Entity notifies the Business Associate that Covered Entity has agreed to be bound by additional restrictions over and above those uses or disclosures or security safeguards of PHI pursuant to the Privacy and Security Rule, the Business Associate shall be bound by such additional restrictions and shall not disclose PHI in violation of such additional restrictions and shall abide by any additional security safeguards.

**(3) Obligations and Activities of Business Associate.**

a. The Business Associate shall notify the Covered Entity's Privacy Officer immediately after the Business Associate becomes aware of any use or disclosure of protected health information not provided for by the Agreement including breaches of unsecured protected health information and/or any security incident that may have an impact on the protected health information of the Covered Entity.

b. The Business Associate shall immediately perform a risk assessment when it becomes aware of any of the above situations. The risk assessment shall include, but not be limited to:

- The nature and extent of the protected health information involved, including the types of identifiers and the likelihood of re-identification;
- The unauthorized person used the protected health information or to whom the disclosure was made;
- Whether the protected health information was actually acquired or viewed
- The extent to which the risk to the protected health information has been mitigated.

The Business Associate shall complete the risk assessment within 48 hours of the breach and immediately report the findings of the risk assessment in writing to the Covered Entity.

c. The Business Associate shall comply with all sections of the Privacy, Security, and Breach Notification Rule.

d. Business Associate shall make available all of its internal policies and procedures, books and records relating to the use and disclosure of PHI received from, or created or received by the Business Associate on behalf of Covered Entity to the Secretary for purposes of determining Covered Entity's compliance with HIPAA and the Privacy and Security Rule.

e. Business Associate shall require all of its business associates that receive, use or have access to PHI under the Agreement, to agree in writing to adhere to the same restrictions and conditions on the use and disclosure of PHI contained herein, including the duty to return or destroy the PHI as provided under Section 3 (l). The Covered Entity shall be considered a direct third party beneficiary of the Contractor's business associate agreements with Contractor's intended business associates, who will be receiving PHI

pursuant to this Agreement, with rights of enforcement and indemnification from such business associates who shall be governed by standard Paragraph #13 of the standard contract provisions (P-37) of this Agreement for the purpose of use and disclosure of protected health information.

f. Within five (5) business days of receipt of a written request from Covered Entity, Business Associate shall make available during normal business hours at its offices all records, books, agreements, policies and procedures relating to the use and disclosure of PHI to the Covered Entity, for purposes of enabling Covered Entity to determine Business Associate's compliance with the terms of the Agreement.

g. Within ten (10) business days of receiving a written request from Covered Entity, Business Associate shall provide access to PHI in a Designated Record Set to the Covered Entity, or as directed by Covered Entity, to an individual in order to meet the requirements under 45 CFR Section 164.524.

h. Within ten (10) business days of receiving a written request from Covered Entity for an amendment of PHI or a record about an individual contained in a Designated Record Set, the Business Associate shall make such PHI available to Covered Entity for amendment and incorporate any such amendment to enable Covered Entity to fulfill its obligations under 45 CFR Section 164.526.

i. Business Associate shall document such disclosures of PHI and information related to such disclosures as would be required for Covered Entity to respond to a request by an individual for an accounting of disclosures of PHI in accordance with 45 CFR Section 164.528.

j. Within ten (10) business days of receiving a written request from Covered Entity for a request for an accounting of disclosures of PHI, Business Associate shall make available to Covered Entity such information as Covered Entity may require to fulfill its obligations to provide an accounting of disclosures with respect to PHI in accordance with 45 CFR Section 164.528.

k. In the event any individual requests access to, amendment of, or accounting of PHI directly from the Business Associate, the Business Associate shall within two (2) business days forward such request to Covered Entity. Covered Entity shall have the responsibility of responding to forwarded requests. However, if forwarding the individual's request to Covered Entity would cause Covered Entity or the Business Associate to violate HIPAA and the Privacy and Security Rule, the Business Associate shall instead respond to the individual's request as required by such law and notify Covered Entity of such response as soon as practicable.

l. Within ten (10) business days of termination of the Agreement, for any reason, the Business Associate shall return or destroy, as specified by Covered Entity, all PHI received from, or created or received by the Business Associate in connection with the Agreement, and shall not retain any copies or back-up tapes of such PHI. If return or destruction is not feasible, or the disposition of the PHI has been otherwise agreed to in the Agreement, Business Associate shall continue to extend the protections of the Agreement, to such PHI and limit further uses and disclosures of such PHI to those purposes that make the return or destruction infeasible, for so long as Business

Associate maintains such PHI. If Covered Entity, in its sole discretion, requires that the Business Associate destroy any or all PHI, the Business Associate shall certify to Covered Entity that the PHI has been destroyed.

**(4) Obligations of Covered Entity**

a. Covered Entity shall notify Business Associate of any changes or limitation(s) in its Notice of Privacy Practices provided to individuals in accordance with 45 CFR Section 164.520, to the extent that such change or limitation may affect Business Associate's use or disclosure of PHI.

b. Covered Entity shall promptly notify Business Associate of any changes in, or revocation of permission provided to Covered Entity by individuals whose PHI may be used or disclosed by Business Associate under this Agreement, pursuant to 45 CFR Section 164.506 or 45 CFR Section 164.508.

c. Covered entity shall promptly notify Business Associate of any restrictions on the use or disclosure of PHI that Covered Entity has agreed to in accordance with 45 CFR 164.522, to the extent that such restriction may affect Business Associate's use or disclosure of PHI.

**(5) Termination for Cause**

In addition to Paragraph 10 of the standard terms and conditions (P-37) of this Agreement the Covered Entity may immediately terminate the Agreement upon Covered Entity's knowledge of a breach by Business Associate of the Business Associate Agreement set forth herein as Exhibit I. The Covered Entity may either immediately terminate the Agreement or provide an opportunity for Business Associate to cure the alleged breach within a timeframe specified by Covered Entity. If Covered Entity determines that neither termination nor cure is feasible, Covered Entity shall report the violation to the Secretary.

**(6) Miscellaneous**

a. Definitions and Regulatory References. All terms used, but not otherwise defined herein, shall have the same meaning as those terms in the Privacy and Security Rule, amended from time to time. A reference in the Agreement, as amended to include this Exhibit I, to a Section in the Privacy and Security Rule means the Section as in effect or as amended.

b. Amendment. Covered Entity and Business Associate agree to take such action as is necessary to amend the Agreement, from time to time as is necessary for Covered Entity to comply with the changes in the requirements of HIPAA, the Privacy and Security Rule, and applicable federal and state law.

c. Data Ownership. The Business Associate acknowledges that it has no ownership rights with respect to the PHI provided by or created on behalf of Covered Entity.

d. Interpretation. The parties agree that any ambiguity in the Agreement shall be resolved to permit Covered Entity to comply with HIPAA, the Privacy and Security Rule.

e. Segregation. If any term or condition of this Exhibit I or the application thereof to any person(s) or circumstance is held invalid, such invalidity shall not affect other terms or conditions which can be given effect without the invalid term or condition; to this end the terms and conditions of this Exhibit I are declared severable.

f. Survival. Provisions in this Exhibit I regarding the use and disclosure of PHI, return or destruction of PHI, extensions of the protections of the Agreement in section (3) I, the defense and indemnification provisions of section (3) e and Paragraph 13 of the standard terms and conditions (P-37), shall survive the termination of the Agreement.

IN WITNESS WHEREOF, the parties hereto have duly executed this Exhibit I.

| Department of Health and Human Services | MAINEHEALTH |
|---|---|
| The State | Name of the Contractor |
| Signature of Authorized Representative | Signature of Authorized Representative |
| LISA MORRIS | |
| Name of Authorized Representative | Name of Authorized Representative |
| DIRECTOR, DPHS | Executive Vice President + Treasurer |
| Title of Authorized Representative | Title of Authorized Representative |
| 4/3/18 | |
| Date | Date |

## CERTIFICATION REGARDING THE FEDERAL FUNDING ACCOUNTABILITY AND TRANSPARENCY ACT (FFATA) COMPLIANCE

The Federal Funding Accountability and Transparency Act (FFATA) requires prime awardees of individual Federal grants equal to or greater than $25,000 and awarded on or after October 1, 2010, to report on data related to executive compensation and associated first-tier sub-grants of $25,000 or more. If the initial award is below $25,000 but subsequent grant modifications result in a total award equal to or over $25,000, the award is subject to the FFATA reporting requirements, as of the date of the award.

In accordance with 2 CFR Part 170 (Reporting Subaward and Executive Compensation Information), the Department of Health and Human Services (DHHS) must report the following information for any subaward or contract award subject to the FFATA reporting requirements:

1. Name of entity
2. Amount of award
3. Funding agency
4. NAICS code for contracts / CFDA program number for grants
5. Program source
6. Award title descriptive of the purpose of the funding action
7. Location of the entity
8. Principle place of performance
9. Unique identifier of the entity (DUNS #)
10. Total compensation and names of the top five executives if:
    - 10.1. More than 80% of annual gross revenues are from the Federal government, and those revenues are greater than $25M annually and
    - 10.2. Compensation information is not already available through reporting to the SEC.

Prime grant recipients must submit FFATA required data by the end of the month, plus 30 days, in which the award or award amendment is made.

The Contractor identified in Section 1.3 of the General Provisions agrees to comply with the provisions of The Federal Funding Accountability and Transparency Act, Public Law 109-282 and Public Law 110-252, and 2 CFR Part 170 (Reporting Subaward and Executive Compensation Information), and further agrees to have the Contractor's representative, as identified in Sections 1.11 and 1.12 of the General Provisions execute the following Certification:

The below named Contractor agrees to provide needed information as outlined above to the NH Department of Health and Human Services and to comply with all applicable provisions of the Federal Financial Accountability and Transparency Act.

Contractor Name:

3/5/18
Date

Name: Albert G. Schlaikjer
Title: Exec. Director

## FORM A

As the Contractor identified in Section 1.3 of the General Provisions, I certify that the responses to the below listed questions are true and accurate.

1. The DUNS number for your entity is: 858582372

2. In your business or organization's preceding completed fiscal year, did your business or organization receive (1) 80 percent or more of your annual gross revenue in U.S. federal contracts, subcontracts, loans, grants, sub-grants, and/or cooperative agreements; and (2) $25,000,000 or more in annual gross revenues from U.S. federal contracts, subcontracts, loans, grants, subgrants, and/or cooperative agreements?

   X NO _____ YES

   If the answer to #2 above is NO, stop here

   If the answer to #2 above is YES, please answer the following:

3. Does the public have access to information about the compensation of the executives in your business or organization through periodic reports filed under section 13(a) or 15(d) of the Securities Exchange Act of 1934 (15 U.S.C.78m(a), 78o(d)) or section 6104 of the Internal Revenue Code of 1986?

   _____ NO _____ YES

   If the answer to #3 above is YES, stop here

   If the answer to #3 above is NO, please answer the following:

4. The names and compensation of the five most highly compensated officers in your business or organization are as follows:

   Name: _____ Amount: _____

   Name: _____ Amount: _____

   Name: _____ Amount: _____

   Name: _____ Amount: _____

   Name: _____ Amount: _____

## DHHS INFORMATION SECURITY REQUIREMENTS

1. Confidential Information: In addition to Paragraph #9 of the General Provisions (P-37) for the purpose of this SOW, the Department's Confidential information includes any and all information owned or managed by the State of NH - created, received from or on behalf of the Department of Health and Human Services (DHHS) or accessed in the course of performing contracted services - of which collection, disclosure, protection, and disposition is governed by state or federal law or regulation. This information includes, but is not limited to Personal Health Information (PHI), Personally Identifiable Information (PII), Federal Tax Information (FTI), Social Security Numbers (SSN), Payment Card Industry (PCI), and or other sensitive and confidential information.

2. The vendor will maintain proper security controls to protect Department confidential information collected, processed, managed, and/or stored in the delivery of contracted services. Minimum expectations include:

   2.1. Contractor shall not store or transfer data collected in connection with the services rendered under this Agreement outside of the United States. This includes backup data and Disaster Recovery locations.

   2.2. Maintain policies and procedures to protect Department confidential information throughout the information lifecycle, where applicable, (from creation, transformation, use, storage and secure destruction) regardless of the media used to store the data (i.e., tape, disk, paper, etc.).

   2.3. Maintain appropriate authentication and access controls to contractor systems that collect, transmit, or store Department confidential information where applicable.

   2.4. Encrypt, at a minimum, any Department confidential data stored on portable media, e.g., laptops, USB drives, as well as when transmitted over public networks like the Internet using current industry standards and best practices for strong encryption.

   2.5. Ensure proper security monitoring capabilities are in place to detect potential security events that can impact State of NH systems and/or Department confidential information for contractor provided systems.

   2.6. Provide security awareness and education for its employees, contractors and sub-contractors in support of protecting Department confidential information

   2.7. Maintain a documented breach notification and incident response process. The vendor will contact the Department within twenty-four 24 hours to the Department's contract manager, and additional email addresses provided in this section, of a confidential information breach, computer security incident, or suspected breach which affects or includes any State of New Hampshire systems that connect to the State of New Hampshire network.

      2.7.1. "Breach" shall have the same meaning as the term "Breach" in section 164.402 of Title 45, Code of Federal Regulations. "Computer Security Incident" shall have the same meaning "Computer Security Incident" in section two (2) of NIST Publication 800-61, Computer Security Incident Handling Guide, National Institute of Standards and Technology, U.S. Department of Commerce.

      Breach notifications will be sent to the following email addresses:

      2.7.1.1. DHHSChiefInformationOfficer@dhhs.nh.gov

      2.7.1.2. DHHSInformationSecurityOffice@dhhs.nh.gov

   2.8. If the vendor will maintain any Confidential Information on its systems (or its sub-contractor systems), the vendor will maintain a documented process for securely disposing of such data upon request or contract termination; and will obtain written certification for any State of New Hampshire data destroyed

by the vendor or any subcontractors as a part of ongoing, emergency, and or disaster recovery operations. When no longer in use, electronic media containing State of New Hampshire data shall be rendered unrecoverable via a secure wipe program in accordance with industry-accepted standards for secure deletion, or otherwise physically destroying the media (for example, degaussing). The vendor will document and certify in writing at time of the data destruction, and will provide written certification to the Department upon request. The written certification will include all details necessary to demonstrate data has been properly destroyed and validated. Where applicable, regulatory and professional standards for retention requirements will be jointly evaluated by the State and the vendor prior to destruction.

2.9. If the vendor will be sub-contracting any core functions of the engagement supporting the services for State of New Hampshire, the vendor will maintain a program of an internal process or processes that defines specific security expectations, and monitoring compliance to security requirements that at a minimum match those for the vendor, including breach notification requirements.

3. The vendor will work with the Department to sign and comply with all applicable State of New Hampshire and Department system access and authorization policies and procedures, systems access forms, and computer use agreements as part of obtaining and maintaining access to any Department system(s). Agreements will be completed and signed by the vendor and any applicable sub-contractors prior to system access being authorized.

4. If the Department determines the vendor is a Business Associate pursuant to 45 CFR 160.103, the vendor will work with the Department to sign and execute a HIPAA Business Associate Agreement (BAA) with the Department and is responsible for maintaining compliance with the agreement.

5. The vendor will work with the Department at its request to complete a survey. The purpose of the survey is to enable the Department and vendor to monitor for any changes in risks, threats, and vulnerabilities that may occur over the life of the vendor engagement. The survey will be completed annually, or an alternate time frame at the Departments discretion with agreement by the vendor, or the Department may request the survey be completed when the scope of the engagement between the Department and the vendor changes. The vendor will not store, knowingly or unknowingly, any State of New Hampshire or Department data offshore or outside the boundaries of the United States unless prior express written consent is obtained from the appropriate authorized data owner or leadership member within the Department.

6. Data Security Breach Liability. In the event of any security breach Contractor shall make efforts to investigate the causes of the breach, promptly take measures to prevent future breach and minimize any damage or loss resulting from the breach. The State shall recover from the Contractor all costs of response and recovery from the breach, including but not limited to: credit monitoring services, mailing costs and costs associated with website and telephone call center services necessary due to the breach.



Contractor Initials

Date 3/5/18

# State of New Hampshire
# Department of State

CERTIFICATE

I, William M. Gardner, Secretary of State of the State of New Hampshire, do hereby certify that MAINEHEALTH is a Maine Nonprofit Corporation registered to do business in New Hampshire as NORTHERN NEW ENGLAND POISON CENTER on February 21, 2008. I further certify that all fees and documents required by the Secretary of State's office have been received and is in good standing as far as this office is concerned.

Business ID: **591877**

IN TESTIMONY WHEREOF,
I hereto set my hand and cause to be affixed
the Seal of the State of New Hampshire,
this 26th day of October A.D. 2017.

William M. Gardner
Secretary of State

STATE OF NEW HAMPSHIRE

# CERTIFICATE OF AUTHORIZATION

I, Robert S. Frank, Secretary of MaineHealth, a Maine nonprofit corporation, do hereby certify that:

The following are the duly elected President and Executive Vice President and Treasurer of the Corporation.

| NAME | OFFICE |
|---|---|
| William L. Caron, Jr. | President |
| Albert G. Swallow, III | Executive Vice President and Treasurer |

Section 6-6 of the Bylaws provide the following:

> The Board of Trustees, shall elect a President who shall serve as the Chief Executive Officer and who shall have overall responsibility for the management of the Corporation. He shall be given the necessary authority to effect this responsibility, subject to such policies as may be adopted by the Board or any committees to which the Board has delegated power for such action. The President shall have the authority to sign and execute on behalf of MaineHealth all checks, notes, mortgages, deeds, bonds, contracts, leases and other instruments necessary to be executed in the course of the MaineHealth regular business except as otherwise provided by law or by the Board and subject to such policies or resolutions as may be adopted by the Board. The President may authorize the Treasurer or another officer or agent of MaineHealth to execute such documents or instruments in his place. He shall, unless otherwise expressly provided, be an ex-officio member of all board Committees, except the Audit Committee, with vote, and shall act as the duly authorized representative of the Board in all matters except those for which the Board has formally delegated authority to some other person or group.

Accordingly, the Executive Vice President and Treasurer of MaineHealth, Albert G. Swallow, III, is authorized to execute checks, notes, mortgages, deeds, bonds, contracts, leases and other instruments on behalf of MaineHealth. This authorization has not been amended or revoked as of the date of this Certificate.

IN WITNESS WHEREOF, I have hereunto set my hand and the seal of the Corporation this 5th day of March, 2018.

Robert S. Frank

Robert S. Frank, Secretary

STATE OF MAINE
CUMBERLAND, SS

March 5, 2018

Personally appeared the above named Robert S. Frank, Secretary of MaineHealth as aforesaid, and acknowledged the foregoing instrument to be his free act and deed in his said capacity and the free act and deed of said MaineHealth.

Before me

Ann W. Cook

Notary Public/~~Attorney at Law~~
Print Name: Ann W. Cook
Commission Expires: April 2, 2020

H:\LEGAL\shared\Forms\Certificate of Authorization.doc

ANN W. COOK
NOTARY PUBLIC
YORK COUNTY
MAINE
MY COMMISSION EXPIRES APRIL 02, 2020

ACORD®

# CERTIFICATE OF LIABILITY INSURANCE

DATE (MM/DD/YYYY)
02/14/2018

THIS CERTIFICATE IS ISSUED AS A MATTER OF INFORMATION ONLY AND CONFERS NO RIGHTS UPON THE CERTIFICATE HOLDER. THIS CERTIFICATE DOES NOT AFFIRMATIVELY OR NEGATIVELY AMEND, EXTEND OR ALTER THE COVERAGE AFFORDED BY THE POLICIES BELOW. THIS CERTIFICATE OF INSURANCE DOES NOT CONSTITUTE A CONTRACT BETWEEN THE ISSUING INSURER(S), AUTHORIZED REPRESENTATIVE OR PRODUCER, AND THE CERTIFICATE HOLDER.

IMPORTANT: If the certificate holder is an ADDITIONAL INSURED, the policy(ies) must be endorsed. If SUBROGATION IS WAIVED, subject to the terms and conditions of the policy, certain policies may require an endorsement. A statement on this certificate does not confer rights to the certificate holder in lieu of such endorsement(s).

| PRODUCER | CONTACT NAME: | |
|---|---|---|
| Medical Mutual Insurance Company of Maine<br>One City Center PO Box 15275<br>Portland, ME 04112 | PHONE (A/C, No, Ext): 2077752791 | FAX (A/C, No): 2075238320 |
| | E-MAIL ADDRESS: | |

| INSURER(S) AFFORDING COVERAGE | NAIC # |
|---|---|
| INSURER A : Medical Mutual Ins Co of Maine | |
| INSURER B : | |
| INSURER C : | |
| INSURER D : | |
| INSURER E : | |
| INSURER F : | |

INSURED
MaineHealth
110 Free Street
Portland ME 04101

**COVERAGES** **CERTIFICATE NUMBER:** **REVISION NUMBER:**

THIS IS TO CERTIFY THAT THE POLICIES OF INSURANCE LISTED BELOW HAVE BEEN ISSUED TO THE INSURED NAMED ABOVE FOR THE POLICY PERIOD INDICATED. NOTWITHSTANDING ANY REQUIREMENT, TERM OR CONDITION OF ANY CONTRACT OR OTHER DOCUMENT WITH RESPECT TO WHICH THIS CERTIFICATE MAY BE ISSUED OR MAY PERTAIN, THE INSURANCE AFFORDED BY THE POLICIES DESCRIBED HEREIN IS SUBJECT TO ALL THE TERMS, EXCLUSIONS AND CONDITIONS OF SUCH POLICIES. LIMITS SHOWN MAY HAVE BEEN REDUCED BY PAID CLAIMS.

| INSR LTR | TYPE OF INSURANCE | ADDL INSD | SUBR WVD | POLICY NUMBER | POLICY EFF (MM/DD/YYYY) | POLICY EXP (MM/DD/YYYY) | LIMITS | |
|---|---|---|---|---|---|---|---|---|
| A | X COMMERCIAL GENERAL LIABILITY | | | ME CHL 000363 | 10/01/2017 | 10/01/2018 | EACH OCCURRENCE | $ 2,000,000 |
| | CLAIMS-MADE [X] OCCUR | | | | | | DAMAGE TO RENTED PREMISES (Ea occurrence) | $ 50,000 |
| | | | | | | | MED EXP (Any one person) | $ 5,000 |
| | | | | | | | PERSONAL & ADV INJURY | $ 5,000,000 |
| | GEN'L AGGREGATE LIMIT APPLIES PER: | | | | | | GENERAL AGGREGATE | $ 5,000,000 |
| | POLICY [ ] PRO-JECT [ ] LOC | | | | | | PRODUCTS - COMP/OP AGG | $ 5,000,000 |
| | OTHER: | | | | | | | $ |
| | AUTOMOBILE LIABILITY | | | | | | COMBINED SINGLE LIMIT (Ea accident) | $ |
| | ANY AUTO | | | | | | BODILY INJURY (Per person) | $ |
| | ALL OWNED AUTOS / SCHEDULED AUTOS | | | | | | BODILY INJURY (Per accident) | $ |
| | HIRED AUTOS / NON-OWNED AUTOS | | | | | | PROPERTY DAMAGE (Per accident) | $ |
| | | | | | | | | $ |
| | UMBRELLA LIAB OCCUR | | | | | | EACH OCCURRENCE | $ |
| | EXCESS LIAB CLAIMS-MADE | | | | | | AGGREGATE | $ |
| | DED RETENTION $ | | | | | | | $ |
| | WORKERS COMPENSATION AND EMPLOYERS' LIABILITY Y/N | | | | | | PER STATUTE / OTH-ER | |
| | ANY PROPRIETOR/PARTNER/EXECUTIVE OFFICER/MEMBER EXCLUDED? N/A (Mandatory in NH) | | | | | | E.L. EACH ACCIDENT | $ |
| | If yes, describe under DESCRIPTION OF OPERATIONS below | | | | | | E.L. DISEASE - EA EMPLOYEE | $ |
| | | | | | | | E.L. DISEASE - POLICY LIMIT | $ |

DESCRIPTION OF OPERATIONS / LOCATIONS / VEHICLES (ACORD 101, Additional Remarks Schedule, may be attached if more space is required)

It is hereby agreed and understood that Northern New England Poison Center of MaineHealth is covered as an additional insured under the above described policy.

**CERTIFICATE HOLDER**

NH DHHS
129 Pleasant Street
Concord, NH 03301

**CANCELLATION**

SHOULD ANY OF THE ABOVE DESCRIBED POLICIES BE CANCELLED BEFORE THE EXPIRATION DATE THEREOF, NOTICE WILL BE DELIVERED IN ACCORDANCE WITH THE POLICY PROVISIONS.

AUTHORIZED REPRESENTATIVE

Frank W Lani

# CERTIFICATE OF LIABILITY INSURANCE

DATE (MM/DD/YYYY): 2/15/2018

THIS CERTIFICATE IS ISSUED AS A MATTER OF INFORMATION ONLY AND CONFERS NO RIGHTS UPON THE CERTIFICATE HOLDER. THIS CERTIFICATE DOES NOT AFFIRMATIVELY OR NEGATIVELY AMEND, EXTEND OR ALTER THE COVERAGE AFFORDED BY THE POLICIES BELOW. THIS CERTIFICATE OF INSURANCE DOES NOT CONSTITUTE A CONTRACT BETWEEN THE ISSUING INSURER(S), AUTHORIZED REPRESENTATIVE OR PRODUCER, AND THE CERTIFICATE HOLDER.

IMPORTANT: If the certificate holder is an ADDITIONAL INSURED, the policy(ies) must be endorsed. If SUBROGATION IS WAIVED, subject to the terms and conditions of the policy, certain policies may require an endorsement. A statement on this certificate does not confer rights to the certificate holder in lieu of such endorsement(s).

| PRODUCER | CONTACT NAME: Judy Cardimino |
|---|---|
| Cross Insurance<br>491 Main Street<br>P.O. Box 1388<br>Bangor ME 04401 | PHONE (A/C, No, Ext): (207) 404-5305 FAX (A/C, No): 207-942-4678<br>E-MAIL ADDRESS: jcardimino@crossagency.com |
| | INSURER(S) AFFORDING COVERAGE — NAIC # |
| | INSURER A: First Maine Captive — NA |
| INSURED | INSURER B: |
| MaineHealth<br>110 Free Street<br>Portland ME 04101 | INSURER C:<br>INSURER D:<br>INSURER E:<br>INSURER F: |

**COVERAGES** **CERTIFICATE NUMBER:** CL17122134102 **REVISION NUMBER:**

THIS IS TO CERTIFY THAT THE POLICIES OF INSURANCE LISTED BELOW HAVE BEEN ISSUED TO THE INSURED NAMED ABOVE FOR THE POLICY PERIOD INDICATED. NOTWITHSTANDING ANY REQUIREMENT, TERM OR CONDITION OF ANY CONTRACT OR OTHER DOCUMENT WITH RESPECT TO WHICH THIS CERTIFICATE MAY BE ISSUED OR MAY PERTAIN, THE INSURANCE AFFORDED BY THE POLICIES DESCRIBED HEREIN IS SUBJECT TO ALL THE TERMS, EXCLUSIONS AND CONDITIONS OF SUCH POLICIES. LIMITS SHOWN MAY HAVE BEEN REDUCED BY PAID CLAIMS.

| INSR LTR | TYPE OF INSURANCE | ADDL INSD | SUBR WVD | POLICY NUMBER | POLICY EFF (MM/DD/YYYY) | POLICY EXP (MM/DD/YYYY) | LIMITS | |
|---|---|---|---|---|---|---|---|---|
| | COMMERCIAL GENERAL LIABILITY | | | X | | | EACH OCCURRENCE | $ |
| | ☐ CLAIMS-MADE ☐ OCCUR | | | | | | DAMAGE TO RENTED PREMISES (Ea occurrence) | $ |
| | | | | | | | MED EXP (Any one person) | $ |
| | | | | | | | PERSONAL & ADV INJURY | $ |
| | GEN'L AGGREGATE LIMIT APPLIES PER: | | | | | | GENERAL AGGREGATE | $ |
| | ☐ POLICY ☐ PRO-JECT ☐ LOC | | | | | | PRODUCTS - COMP/OP AGG | $ |
| | OTHER: | | | | | | | $ |
| | AUTOMOBILE LIABILITY | | | | | | COMBINED SINGLE LIMIT (Ea accident) | $ |
| | ☐ ANY AUTO | | | | | | BODILY INJURY (Per person) | $ |
| | ☐ ALL OWNED AUTOS ☐ SCHEDULED AUTOS | | | | | | BODILY INJURY (Per accident) | $ |
| | ☐ HIRED AUTOS ☐ NON-OWNED AUTOS | | | | | | PROPERTY DAMAGE (Per accident) | $ |
| | | | | | | | | $ |
| | ☐ UMBRELLA LIAB ☐ OCCUR | | | | | | EACH OCCURRENCE | $ |
| | ☐ EXCESS LIAB ☐ CLAIMS-MADE | | | | | | AGGREGATE | $ |
| | ☐ DED ☐ RETENTION $ | | | | | | | $ |
| A | WORKERS COMPENSATION AND EMPLOYERS' LIABILITY Y/N<br>ANY PROPRIETOR/PARTNER/EXECUTIVE OFFICER/MEMBER EXCLUDED? ☐ (Mandatory in NH)<br>If yes, describe under DESCRIPTION OF OPERATIONS below | N/A | | 1-2018 | 1/1/2018 | 1/1/2019 | X PER STATUTE ☐ OTH-ER | |
| | | | | | | | E.L. EACH ACCIDENT | $ 1,000,000 |
| | | | | | | | E.L. DISEASE - EA EMPLOYEE | $ 1,000,000 |
| | | | | | | | E.L. DISEASE - POLICY LIMIT | $ 1,000,000 |

DESCRIPTION OF OPERATIONS / LOCATIONS / VEHICLES (ACORD 101, Additional Remarks Schedule, may be attached if more space is required)

Active Members:
MaineHealth

**CERTIFICATE HOLDER**

State of NH, DHHS
129 Pleasant Street
Concord, NH 03301

**CANCELLATION**

SHOULD ANY OF THE ABOVE DESCRIBED POLICIES BE CANCELLED BEFORE THE EXPIRATION DATE THEREOF, NOTICE WILL BE DELIVERED IN ACCORDANCE WITH THE POLICY PROVISIONS.

AUTHORIZED REPRESENTATIVE

Judith Cardimino/JCO Judith Cardimino

## Mission Statements

**MaineHealth – Organization:**

**Mission:** MaineHealth and its members, reflecting the needs of our communities, acting within available resources and consistent with agreed upon strategic priorities, will:

- Have as its primary goal, the continual improvement of the health of the communities served.
- Maintain our integrated not-for-profit, community owned, comprehensive delivery system providing the continuum of care from health and wellness promotion, prevention and health maintenance through physician services, behavioral health, primary and secondary acute care, tertiary services, rehabilitation, chronic care, long term care, home care, palliative care and hospice.
- Consist of regionally organized providers operating in concert.
- Provide care regardless of ability to pay.
- Provide high-quality, safe and accessible health services which are integrated and delivered with care and compassion through a supported and highly engaged workforce.
- Continually redesign our care processes to ensure the highest value (quality and cost).
- Lead health professions education and research efforts.
- Maintain financial viability.
- Accept and manage financial risk.
- Continually redesign our administrative/support processes to ensure the highest value (quality and cost).

**Maine Medical Center – Contractor:**

**Mission:** Maine Medical Center is dedicated to maintaining and improving the health of the communities it serves by:

- Caring for our community
- Educating tomorrow's caregivers
- Researching new ways to provide care

**Northern New England Poison Center – Agency:**

**Mission:** To prevent poisonings, minimize the effects of poisonings and reduce health care costs for the benefit of the residents it serves. The NNEPC achieves this by providing 24-hour emergency and non-emergency hotline services for the public and health care professionals. The center also provides surveillance, education and consultation services.

KPMG

# MAINEHEALTH AND SUBSIDIARIES

Auditors' Reports as Required by Title 2 U.S. Code of Federal Regulations Part 200, Uniform Administrative Requirements, Cost Principles, and Audit Requirements for Federal Awards and *Government Auditing Standards* and Related Information

Year ended September 30, 2016

**MAINEHEALTH AND SUBSIDIARIES**

**Table of Contents**

KPMG LLP
Two Financial Center
60 South Street
Boston, MA 02111

## Independent Auditors' Report

The Board of Trustees
MaineHealth:

### Report on the Financial Statements

We have audited the accompanying consolidated financial statements of MaineHealth and subsidiaries (MaineHealth), which comprise the consolidated balance sheets as of September 30, 2016 and 2015, and the related consolidated statements of operations, changes in net assets, and cash flows for the years then ended, and the related notes to the consolidated financial statements.

*Management's Responsibility for the Financial Statements*

Management is responsible for the preparation and fair presentation of these consolidated financial statements in accordance with U.S. generally accepted accounting principles; this includes the design, implementation, and maintenance of internal control relevant to the preparation and fair presentation of consolidated financial statements that are free from material misstatement, whether due to fraud or error.

*Auditors' Responsibility*

Our responsibility is to express an opinion on these consolidated financial statements based on our audits. We did not audit the 2016 financial statements of Southern Maine Health Care; Pen Bay Healthcare; Lincoln Health Group, Inc.; Waldo County Healthcare, Inc.; Maine Behavioral Healthcare; Western Maine Health Care Corporation; HomeHealth – Visiting Nurses of Southern Maine; The Memorial Hospital at North Conway, NH; or Franklin Community Health Network (collectively, the Other Consolidated Subsidiaries), which statements reflect total assets constituting 35% of consolidated total assets as of September 30, 2016 and total revenues constituting 40% of consolidated total revenues for the year then ended. Nor did we audit the 2015 financial statements of Southern Maine Health Care; Pen Bay Healthcare; Lincoln County Health Care, Inc.; Waldo County Healthcare, Inc.; Maine Behavioral Healthcare; Western Maine Health Care Corporation; HomeHealth – Visiting Nurses of Southern Maine or The Memorial Hospital at North Conway, NH (collectively, the Other Consolidated Subsidiaries), which statements reflect total assets constituting 38% of consolidated total assets as of September 30, 2015 and total revenues constituting 44% of consolidated total revenues for the year then ended. Those statements were audited by other auditors, whose reports have been furnished to us, and our opinion, insofar as it relates to the amounts included for the Other Consolidated Subsidiaries, is based solely on the reports of the other auditors. We conducted our audits in accordance with auditing standards generally accepted in the United States of America and the standards applicable to financial audits contained in *Government Auditing Standards*, issued by the Comptroller General of the United States. Those standards require that we plan and perform audit to obtain reasonable assurance about whether the consolidated financial statements are free from material misstatement. The 2016 financial statements of Southern Maine Health Care; Pen Bay Healthcare; Lincoln Health Group, Inc.; Waldo County Healthcare, Inc.; Western Maine Health Care Corporation; HomeHealth – Visiting Nurses of Southern Maine; The Memorial Hospital at North Conway, NH; and Franklin Community Health Network (collectively, the Other Consolidated Subsidiaries) were not audited in accordance with *Government Auditing Standards*. Nor were the 2015 financial statements of Southern Maine Health Care; Pen Bay Healthcare; Lincoln County Health Care, Inc.; Waldo County Healthcare, Inc.; Western Maine Health Care Corporation; HomeHealth – Visiting Nurses of Southern Maine and The Memorial Hospital at North Conway, NH (collectively, the Other Consolidated Subsidiaries) audited in accordance with *Government Auditing Standards*.

KPMG

An audit involves performing procedures to obtain audit evidence about the amounts and disclosures in the consolidated financial statements. The procedures selected depend on the auditors' judgment, including the assessment of the risks of material misstatement of the consolidated financial statements, whether due to fraud or error. In making those risk assessments, the auditor considers internal control relevant to the entity's preparation and fair presentation of the consolidated financial statements in order to design audit procedures that are appropriate in the circumstances, but not for the purpose of expressing an opinion on the effectiveness of the entity's internal control. Accordingly, we express no such opinion. An audit also includes evaluating the appropriateness of accounting policies used and the reasonableness of significant accounting estimates made by management, as well as evaluating the overall presentation of the consolidated financial statements.

We believe that the audit evidence we have obtained is sufficient and appropriate to provide a basis for our audit opinion.

*Opinion*

In our opinion, the consolidated financial statements referred to above present fairly, in all material respects, the consolidated financial position of MaineHealth and subsidiaries as of September 30, 2016 and 2015, and consolidated results of their operations, the changes in their net assets, and their cash flows for the years then ended in accordance with U.S. generally accepted accounting principles.

*Other Matter*

Our audit was conducted for the purpose of forming an opinion on the consolidated financial statements as a whole. The accompanying supplementary schedule of expenditures of federal awards is presented for purposes of additional analysis, as required by Title 2 U.S. Code of Federal Regulations Part 200, *Uniform Administrative Requirements, Cost Principles, and Audit Requirements for Federal Awards*, and is not a required part of the consolidated financial statements. Such information is the responsibility of management and was derived from and relates directly to the underlying accounting and other records used to prepare the consolidated financial statements. The information has been subjected to the auditing procedures applied in the audit of the consolidated financial statements and certain additional procedures, including comparing and reconciling such information directly to the underlying accounting and other records used to prepare the consolidated financial statements or to the consolidated financial statements themselves, and other additional procedures in accordance with auditing standards generally accepted in the United States of America. In our opinion, the supplementary schedule of expenditure of federal awards is fairly stated, in all material respects, in relation to the consolidated financial statements as a whole.

**Other Reporting Required by *Government Auditing Standards***

In accordance with *Government Auditing Standards*, we have also issued our report dated February 7, 2017, on our consideration of MaineHealth's internal control over financial reporting and on our tests of its compliance with certain provisions of laws, regulations, contracts, and grant agreements and other matters. The purpose of that report is to describe the scope of our testing of internal control over financial reporting and compliance and the results of that testing, and not to provide an opinion an internal control over financial reporting or on compliance. That report is an integral part of an audit performed in accordance with *Government Auditing Standards* in considering MaineHealth's, internal control over financial reporting and compliance.

KPMG LLP

Boston, Massachusetts
February 7, 2017, except for the
supplementary schedule of expenditures of federal awards,
which is as of June 26, 2017

**MAINEHEALTH AND SUBSIDIARIES**

Consolidated Balance Sheets

September 30, 2016 and 2015

(In thousands)

| Assets | 2016 | 2015 |
|---|---|---|
| Current assets: | | |
| Cash and cash equivalents | $ 184,843 | 188,505 |
| Investments | 426,301 | 362,491 |
| Patient accounts receivable – net | 220,033 | 198,252 |
| Current portion of investments whose use is limited | 11,756 | 26,936 |
| Inventories, prepaid expenses, and other current assets | 73,933 | 65,259 |
| Estimated amounts receivable under reimbursement regulations | 23,023 | 29,772 |
| Total current assets | 939,889 | 871,215 |
| Investments whose use is limited by: | | |
| Debt agreements | 9,409 | 28,488 |
| Board designation | 226,439 | 210,461 |
| Self-insurance trust agreements | 44,102 | 42,699 |
| Specially designated specific purpose funds | 56,743 | 59,397 |
| Plant replacement funds | 20,002 | 29,503 |
| Funds functioning as endowment funds | 111,548 | 100,425 |
| Pooled life income funds | 3,025 | 2,930 |
| | 471,268 | 473,903 |
| Less current portion | 11,756 | 26,936 |
| | 459,512 | 446,967 |
| Property, plant, and equipment – net | 1,076,357 | 1,040,696 |
| Other assets | 135,130 | 84,997 |
| Total | $ 2,610,888 | 2,443,875 |

| Liabilities and Net Assets | 2016 | 2015 |
|---|---|---|
| Current liabilities: | | |
| Current portion of long-term debt | $ 20,446 | 17,192 |
| Lines of credit | 12,970 | 6,750 |
| Accounts payable and other current liabilities | 111,840 | 91,346 |
| Accrued payroll, payroll taxes, and amounts withheld | 46,251 | 68,174 |
| Accrued earned time | 56,927 | 53,053 |
| Accrued interest payable | 4,035 | 4,110 |
| Estimated amounts payable under reimbursement regulations | 100,933 | 97,435 |
| Self-insurance reserves | 23,653 | 26,983 |
| Deferred revenue | 5,562 | 5,421 |
| Total current liabilities | 382,617 | 370,464 |
| Accrued retirement benefits | 364,957 | 239,995 |
| Self-insurance reserves – less current portion | 32,872 | 31,170 |
| Estimated amounts payable under reimbursement regulations | 10,523 | 10,200 |
| Long-term debt – less current portion | 413,819 | 400,836 |
| Other liabilities | 54,077 | 46,013 |
| Total liabilities | 1,258,865 | 1,098,678 |
| Net assets: | | |
| Unrestricted | 1,183,617 | 1,176,811 |
| Temporarily restricted | 90,239 | 91,813 |
| Permanently restricted | 78,167 | 76,573 |
| Total net assets | 1,352,023 | 1,345,197 |
| Total | $ 2,610,888 | 2,443,875 |

See accompanying notes to consolidated financial statements.

**MAINEHEALTH AND SUBSIDIARIES**

Consolidated Statements of Operations

Years ended September 30, 2016 and 2015

(In thousands)

| | 2016 | 2015 |
|---|---|---|
| Unrestricted revenues and other support: | | |
| Net patient service revenue (net of contractual allowances and discounts) | $ 2,098,797 | 1,974,582 |
| Provision for bad debts | 99,912 | 97,523 |
| Net patient service revenue – net of provision for bad debts | 1,998,885 | 1,877,059 |
| Direct research revenue | 12,299 | 11,007 |
| Indirect research revenue | 3,081 | 2,781 |
| Other revenue | 171,083 | 131,525 |
| Total unrestricted revenues and other support | 2,185,348 | 2,022,372 |
| Expenses: | | |
| Salaries | 1,081,263 | 1,009,028 |
| Employee benefits | 283,991 | 263,988 |
| Supplies | 308,657 | 269,561 |
| Professional fees and purchased services | 191,367 | 174,520 |
| Facility and other costs | 98,940 | 102,261 |
| State taxes | 36,775 | 37,188 |
| Interest | 16,164 | 14,661 |
| Depreciation and amortization | 122,504 | 115,352 |
| Total expenses | 2,139,661 | 1,986,559 |
| Income from operations | 45,687 | 35,813 |
| Nonoperating gains (losses): | | |
| Gifts and donations – net of related expenses | 919 | 152 |
| Interest and dividends | 15,463 | 13,843 |
| Recognized loss on cash flow hedge instruments | (2,589) | (2,614) |
| Equity in earnings of joint ventures | 5,465 | 4,482 |
| Contribution of net assets from acquired subsidiaries | — | 42,953 |
| Increase (decrease) in fair value of investments | 33,475 | (24,421) |
| Other | (2,089) | (983) |
| Total nonoperating gains – net | 50,644 | 33,412 |
| Excess of revenues and nonoperating gains – net over expenses | 96,331 | 69,225 |
| Net assets released from restrictions for property, plant, and equipment | 1,181 | 2,711 |
| Retirement benefit plan adjustments | (86,642) | (70,671) |
| Change in net unrealized loss on cash flow hedge instruments | — | (348) |
| Other | (4,064) | (1,302) |
| Increase (decrease) in unrestricted net assets | $ 6,806 | (385) |

See accompanying notes to consolidated financial statements.

**MAINEHEALTH AND SUBSIDIARIES**

Consolidated Statements of Changes in Net Assets

Years ended September 30, 2016 and 2015

(In thousands)

| | 2016 | 2015 |
|---|---|---|
| Unrestricted net assets: | | |
| Excess of revenues and nonoperating gains – net over expenses | $ 96,331 | 69,225 |
| Net assets released from restrictions for property, plant, and equipment | 1,181 | 2,711 |
| Retirement benefit plan adjustments | (86,642) | (70,671) |
| Change in net unrealized (loss) on cash flow hedge instruments | — | (348) |
| Other | (4,064) | (1,302) |
| Increase (decrease) in unrestricted net assets | 6,806 | (385) |
| Temporarily restricted net assets: | | |
| Gifts and donations | 3,107 | 3,960 |
| Interest and dividends | 757 | 618 |
| Realized and unrealized gains (losses) on investments | 4,557 | (9,279) |
| Change in present value of pooled life and charitable remainder trusts | 126 | (145) |
| Net assets released from restrictions for operations | (9,264) | (8,113) |
| Contribution of net assets from acquired subsidiaries | — | 1,641 |
| Net assets released from restrictions for property, plant, and equipment | (857) | (2,711) |
| Decrease in temporarily restricted net assets | (1,574) | (14,029) |
| Permanently restricted net assets: | | |
| Gifts and donations | 349 | 1,352 |
| Change in value of perpetual and beneficial interest trusts | 1,245 | (2,919) |
| Contribution of net assets from acquired subsidiaries | — | 1,271 |
| Increase (decrease) in permanently restricted net assets | 1,594 | (296) |
| Increase (decrease) in net assets | 6,826 | (14,710) |
| Net assets – beginning of year | 1,345,197 | 1,359,907 |
| Net assets – end of year | $ 1,352,023 | 1,345,197 |

See accompanying notes to consolidated financial statements.

**MAINEHEALTH AND SUBSIDIARIES**

Consolidated Statements of Cash Flows

Years ended September 30, 2016 and 2015

(In thousands)

| | 2016 | 2015 |
|---|---|---|
| Cash flows from operating activities: | | |
| Increase (decrease) in net assets | $ 6,826 | (14,710) |
| Adjustments to reconcile increase in net assets to net cash provided by operating activities: | | |
| Depreciation and amortization | 122,767 | 115,573 |
| Provision for bad debts | 99,912 | 97,523 |
| Amortization of bond premiums | (835) | (380) |
| Equity in earnings of joint ventures | (5,465) | (4,482) |
| Net realized and change in unrealized (gains) losses on investments | (38,032) | 33,700 |
| Net loss on cash flow hedge instruments | 2,589 | 2,962 |
| (Gain) loss on disposal of fixed assets | (673) | 3,037 |
| Gain on refinancing of debt | (74) | — |
| Restricted contributions and investment income | (4,339) | (5,560) |
| Retirement benefit plan adjustments | 86,642 | 70,671 |
| Net assets of acquired affiliates | — | (45,865) |
| Increase (decrease) in cash resulting from a change in: | | |
| Patient accounts receivable | (121,693) | (88,348) |
| Inventories, prepaid expenses, and other current assets | (8,674) | (3,346) |
| Other assets | (39,750) | 8,116 |
| Accounts payable and other current liabilities | 3,612 | 16,996 |
| Amounts (receivable) payable under reimbursement regulations | 10,570 | 11,575 |
| Self-insurance reserves | (1,628) | 694 |
| Accrued retirement benefits | 38,320 | (947) |
| Other liabilities | 5,586 | (201) |
| Net cash provided by operating activities | 155,661 | 197,008 |
| Cash flows from investing activities: | | |
| Purchases of investments | (564,950) | (1,668,790) |
| Proceeds from sales of investments | 541,696 | 1,620,980 |
| Decrease in other assets | (11,883) | (4,177) |
| Distributions from joint ventures | 4,505 | 4,862 |
| Purchases of property, plant, and equipment | (153,322) | (145,958) |
| Proceeds from sale of fixed assets | 861 | 108 |
| Beginning cash balance of acquired subsidiaries | — | 911 |
| Net cash used in investing activities | (183,093) | (192,064) |
| Cash flows from financing activities: | | |
| Payments of long-term debt | (18,706) | (63,218) |
| Proceeds from issuance of long-term debt | 38,137 | 123,303 |
| Restricted contributions and investment income | 4,339 | 5,560 |
| Net cash provided by financing activities | 23,770 | 65,645 |
| Net (decrease) increase in cash and cash equivalents | (3,662) | 70,589 |
| Cash and cash equivalents – beginning of year | 188,505 | 117,916 |
| Cash and cash equivalents – end of year | $ 184,843 | 188,505 |
| Supplemental information: | | |
| Interest paid on long-term indebtedness | $ 16,239 | 16,355 |
| Issuance of capital lease | 4,432 | 880 |
| Noncash refinancing of revenue and revenue refunding bonds | 26,368 | — |

See accompanying notes to consolidated financial statements.

## (1) Reporting Entity

### *Organization*

MaineHealth (MH) is the parent of Maine Medical Center (MMC), Southern Maine Health Care (SMHC), Coastal Healthcare Alliance (CHA) (formerly Pen Bay Healthcare and Waldo County Healthcare) LincolnHealth Group (LHG) (formerly Lincoln County Health Care, Inc.) , Maine Behavioral Healthcare (MBH), Western Maine Health Care Corporation (WMHCC), NorDx, MaineHealth Care at Home (MHCH) (formerly HomeHealth Visiting Nurses), The Memorial Hospital at North Conway, N.H. (TMH), Franklin Community Health Network (FCHN), Maine Physician Hospital Organization, Inc. (MPHO), Synernet, Inc. (Synernet), MaineHealth Cardiology, MaineHealth Accountable Care Organization, LLC (MaineHealth ACO), and Geriatric Resource Network, (collectively, MaineHealth).

The purpose of MaineHealth is to lead the development of a premier community care network that provides a broad range of integrated health care services for populations in Maine and northern New England. Through MaineHealth's member organizations, the network provides services along the full continuum of care as necessary to improve the health status of the populations it serves. As such, revenue includes those generated from direct patient care services, amounts earned from incentive and risk arrangements, the provision of medical education and training services, sundry revenue generated from the operations of the subsidiaries, fund-raising conducted to support the activities of MaineHealth and its subsidiaries, and investment earnings.

On May 1, 2016, MaineHealth Care at Home (MHCH) purchased certain assets of other MaineHealth affiliated home health and hospice service providers, Waldo County Home Healthcare Services and Kno-Wal-Lin Home Health Management, Inc. and its subsidiaries, Kno-Wal-Lin Home Care and Hospice, Inc. and Kno-Wal-Lin Help at Home, Inc. Since all of the organizations were under common control and already included in the consolidated financial statements there was no impact on financial reporting.

During 2015, the Maine Department of Health and Human Services approved the formation of a new parent company for Pen Bay Healthcare (PBH) and Waldo County Healthcare (WCH). PBH and WCH officially began operating as a unified system under the legal name of Coastal Healthcare Alliance on December 1, 2015. Pen Bay Medical Center and Waldo County General Hospital will remain separate organizations, each with their own operations and medical staff, but the formal partnership allows both organizations and their medical staff to develop integrated services. Since both organizations are already in the consolidated financial statements there was no impact on financial reporting.

## (2) Significant Accounting Policies

### *(a) Basis of Presentation*

The accompanying consolidated financial statements include the accounts of MaineHealth. The consolidated financial statements have been presented in conformity with accounting principles generally accepted in the United States of America (GAAP) consistent with the Financial Accounting Standards Board (FASB) Accounting Standards Codification (ASC) Topic 954, *Health Care Entities*, and other pronouncements applicable to health care organizations. The assets of any member of the consolidated group may not be available to meet the obligations of other members in the group, except as disclosed in note 10. Upon consolidation, intercompany transactions and balances have been eliminated.

*(b) Use of Estimates*

The preparation of financial statements in conformity with GAAP requires management to make estimates and assumptions that affect the reported amounts of assets and liabilities and disclosure of contingent assets and liabilities at the date of the consolidated financial statements. Estimates also affect the reported amounts of revenues and expenses during the reporting period. Actual results could differ from those estimates. Significant estimates are made in the areas of patient accounts receivable, the fair value of financial instruments, amounts receivable and payable under reimbursement regulations, asset retirement obligations (AROs), retirement benefits, self-insurance reserves, and the fair values of assets and liabilities acquired in business combinations accounted for as acquisitions.

*(c) Cash and Cash Equivalents*

Cash and cash equivalents include investments in highly liquid debt securities purchased with a maturity at the date of purchase of three months or less, excluding amounts classified as investments whose use is limited.

*(d) Investments*

Investments are stated at fair value. The recorded value of investments in hedge funds and limited partnerships is based on fair value as estimated by management using information provided by external investment managers. MaineHealth has applied the provisions of Accounting Standards Update (ASU 2009-12), *Investments in Certain Entities that Calculate Net Asset Value (NAV) per Share (or its Equivalent).* This standard allows for the estimation of the fair value of investments in investment companies for which the investment does not have a readily determinable fair value in investments in investment companies for which the investment does not have a readily determinable value using NAV per share or its equivalent as a practical expedient. MaineHealth has utilized the NAV reported by each of the underlying funds as a practical expedient to estimate the value of the investment for each of these funds. MaineHealth believes that these valuations are a reasonable estimate of fair value as of September 30, 2016 and 2015, but are subject to uncertainty and, therefore, may differ from the value that would have been used had a market for the investments existed. Such differences could be material. Certain of the hedge fund and limited partnership investments have restrictions on the withdrawal of the funds see note 7. Investments are classified as current assets based on the availability of funds for current operations. Investment income or loss (including realized and unrealized gains and losses on investments, interest, and dividends) is included in the excess of revenues and nonoperating gains – net over expenses, unless the income or loss is restricted by donor or law. The accounting for the pension plan assets is disclosed in note 7.

As provided for under ASC Topic 825, *Financial Instruments*, MaineHealth made the irrevocable election to report investments and investments whose use is limited at fair value with changes in value reported in the excess of revenues and nonoperating gains – net over expenses. As a result of this election, MaineHealth reflects changes in the fair value, including both increases and decreases in value whether realized or unrealized, in its excess of revenues and nonoperating gains – net over expenses.

Investments, in general, are exposed to various risks, such as interest rate, credit, and overall market volatility. As such, it is reasonably possible that changes in the values of investments will occur in the

near term and that such changes could materially affect the amounts reported in the consolidated financial statements.

### *(e) Investments Whose use is Limited*

Investments whose use is limited primarily include investments held by trustees under debt agreements, self-insurance trust agreements, and designated investments set aside by the Board of Trustees (of member Boards) for purposes over which those Boards retain control and may at its discretion subsequently use for other purposes. In addition, investments whose use is limited include investments restricted by donors for specific purposes or periods, as well as investments restricted by donors to be held in perpetuity by MaineHealth, and the related appreciation on those investments. Amounts required to meet current liabilities of MaineHealth have been classified as current assets.

### *(f) Property, Plant, and Equipment*

Property, plant, and equipment are recorded at cost, or at fair value at the date of acquisition, if acquired in a business combination accounted for using the acquisition method of accounting. Depreciation is provided over the estimated useful life of each class of depreciable assets and is computed using the straight-line method. Interest costs incurred on borrowed funds during the period of construction of capital assets are capitalized as a component of the cost of acquiring those assets. MaineHealth recorded capitalized interest of approximately $1,177,000 and $1,836,000 for the years ended September 30, 2016 and 2015, respectively.

Gifts of long-lived assets, such as land, building, or equipment, are reported as increases in unrestricted net assets and are excluded from the excess of revenue and nonoperating gains – net over expenses. Gifts of long-lived assets with explicit restrictions that specify how the assets are to be used and gifts of cash or other assets that must be used to acquire long-lived assets are reported as restricted support. Absent explicit donor stipulations about how long those long-lived assets must be maintained, expirations of donor restrictions are reported when the donated or acquired long-lived assets are placed in service.

### *(g) Impairment of Long-Lived Assets*

Long-lived assets to be held and used are reviewed for impairment whenever circumstances indicate that the carrying amount of an asset may not be recoverable. Long-lived assets to be disposed of are reported at the lower of carrying amount or fair value, less cost to sell.

### *(h) Asset Retirement Obligations (ARO)*

AROs, which are included in other liabilities in the accompanying consolidated balance sheets, are legal obligations associated with the retirement of long-lived assets. These liabilities are initially recorded at fair value and the related asset retirement costs are capitalized by increasing the carrying amount of the related assets by the same amount as the liability. Asset retirement costs are subsequently depreciated over the useful lives of the related assets. Subsequent to initial recognition, MaineHealth records period-to-period changes in the ARO liability resulting from the passage of time, increases or decreases in interest expense, and revisions to either the timing or the amount of the original expected cash flows to the related assets.

*(i) Accounting for Defined Benefit Pension and Other Postretirement Plans*

MaineHealth recognizes the overfunded or underfunded status of its defined benefit and postretirement plans as an asset or liability in its consolidated balance sheets. Changes in the funded status of the plans are reported as a change in unrestricted net assets presented below the excess of revenues and nonoperating gains – net over expenses in its consolidated statements of operations and changes in net assets in the year in which the changes occur.

The measurement of benefit obligations and net periodic benefit cost is provided by third-party actuaries based on estimates and assumptions approved by MaineHealth's management. These valuations reflect the terms of the plans and use participant-specific information, such as compensation, age, and years of service, as well as certain assumptions, including estimates of discount rates, expected long-term rate of return on plan assets, rate of compensation increases, interest-crediting rates, and mortality rates.

*(j) Temporarily and Permanently Restricted Net Assets*

Temporarily restricted net assets are those whose use by MaineHealth has been limited by donors or law to a specific time period or purpose. Permanently restricted net assets reflect the original value of gifts that have been restricted by donors to be maintained by MaineHealth in perpetuity.

*(k) Beneficial Interests in Perpetual Trusts*

Beneficial interests in perpetual trusts consist of MaineHealth's proportionate share of the fair value of assets held by trustees in trust for the benefit of MaineHealth in perpetuity, the income from which is available for distribution to MaineHealth periodically. The assets held in trust consist primarily of cash equivalents and marketable securities. The fair values of perpetual trusts are measured using the net asset value as a practical expedient. Such amounts are included in other assets in the accompanying consolidated balance sheets. Distribution from beneficial interests in perpetual trusts is included in nonoperating gains, unless restricted by donors.

*(l) Excess of Revenues and Nonoperating Gains – Net over Expenses*

The consolidated statements of operations include excess of revenues and nonoperating gains – net over expenses as the performance indicator. Changes in unrestricted net assets, which are excluded from excess of revenues and nonoperating gains – net over expenses, consistent with industry practice, include the effective portion of changes in the fair value of cash flow hedge instruments, retirement benefit plan adjustments, contributions of long-lived assets (including assets acquired using contributions which by donor restriction were to be used for the purposes of acquiring such assets), and capital grants.

*(m) Consolidated Statements of Operations*

For purpose of display, transactions deemed by management to be ongoing, major, or central to the provision of health care and related services are reported as operating revenues and expenses. Peripheral or incidental transactions are reported as nonoperating gains and losses.

***(n) Net Patient Service Revenue***

Net patient service revenue is reported at estimated net realizable amounts from patients, third-party payors, and others for services rendered and includes estimated retroactive revenue adjustments due to future audits, reviews, and investigations. Retroactive adjustments are considered in the recognition of revenue on an estimated basis in the period the related services are rendered, and such amounts are adjusted in future periods as adjustments become known or as years are no longer subject to such audits, reviews, and investigations. Contracts, laws, and regulations governing the Medicare and Medicaid programs are complex and subject to interpretation. As a result, there is at least a reasonable possibility that recorded estimates will change by a material amount in the near term.

***(o) Free Care***

MaineHealth provides care without charge or at amounts less than its established rates to patients who meet certain criteria under its Board-established free care policies. Because MaineHealth does not pursue collection of amounts determined to qualify as free care, they are not reported as net patient service revenue.

***(p) Bad Debts***

MaineHealth recognizes a provision for bad debts in establishing an allowance for services provided which may ultimately be uncollectible. The amount of the allowance for bad debts is based on historical trends and current market conditions.

***(q) Direct and Indirect Research Revenue and Related Expenses***

Revenue related to research grants and contracts is recognized as the related costs are incurred. Indirect costs relating to certain government grants and contracts are reimbursed at fixed rates negotiated with the government agencies. Research grants and contracts are accounted for as exchange transactions. Amounts received in advance of incurring the related expenditures are recorded as unexpended research grants and are included in deferred revenue.

***(r) Other Revenue***

Revenue which is not related to patient medical care but is central to the day-to-day operations of MaineHealth is included in other revenue. This revenue includes pharmacy sales, cafeteria sales, medical school revenue, grant revenue, rental revenue, meaningful use incentive payments, net assets released from restrictions for operations, and other support services revenue.

***(s) Meaningful Use***

MaineHealth is in the process of fully implementing Electronic Health Record Technology (EHR). MaineHealth qualified and applied for meaningful use incentive payments from Medicare and Medicaid related to the implementation of EHR as provided for under the Health Information Technology for Economic and Clinical Health Act. As a result, MaineHealth recognized $5,929,000 and $7,636,000 of other revenue associated with these payments for the years ended September 30, 2016 and 2015, respectively.

*(t) Gifts and Donations*

Unconditional promises to give cash and other assets to MaineHealth are reported at fair value at the date the promise is received. Unconditional promises to give that are expected to be collected in future years are recorded at the present value of estimated future cash flows. The discounts on those amounts are computed using a risk-free rate applicable to the year in which the promise is received. Amortization of the discount is included in contribution revenue. Conditional promises to give are recognized when the conditions are substantially met. The gifts are reported as either temporarily or permanently restricted net assets if they are received with donor stipulations that limit the use of the donated assets. When a donor restriction expires, that is, when a stipulated time restriction ends or purpose restriction is accomplished, temporarily restricted net assets are reclassified as unrestricted net assets and reported in the consolidated statements of operations as net assets released from restrictions, which is included in other revenue. Donor-restricted contributions whose restrictions are met within the same year received are reported as unrestricted contributions in the accompanying consolidated financial statements.

*(u) Self-Insurance Reserves*

The liabilities for outstanding losses and loss-related expenses and the related provision for losses and loss-related expenses include estimates for losses incurred but not reported as well as losses pending settlement. Such liabilities are based on estimates and, while management believes the amounts provided are adequate, the ultimate liability may be greater than or less than the amounts provided. As a result, there is at least a reasonable possibility that recorded estimates will change by a material amount in the near term. The methods for making such estimates and the resulting liability are actuarially reviewed on an annual basis, and any necessary adjustments are reflected in current operations.

*(v) Income Tax Status*

The Internal Revenue Service has previously determined that MaineHealth and its subsidiaries (except Maine Medical Partners (MMP), MPHO, and Synernet) are organizations as described in Section 501(c)(3) of the Internal Revenue Code (IRC) and are exempt from federal income taxes on related income pursuant to Section 501(a) of the IRC. MMP had significant net operating loss carryovers at September 30, 2016 and 2015. A valuation allowance has been provided for the entire deferred tax benefit for the net operating losses, due to uncertainty of realization. MMP, MPHO, and Synernet did not have material taxable income in 2016 and 2015. Accordingly, no provision for income taxes has been made in the accompanying consolidated financial statements.

MaineHealth recognizes the effect of income tax positions only if those positions are more likely than not of being sustained. Recognized income tax positions are measured at the largest amount of benefit that is greater than fifty percent likely to be realized upon settlement. Changes in measurement are reflected in the period in which the change in judgment occurs. MaineHealth did not recognize the effect of any income tax positions in either 2016 or 2015.

*(w) New Accounting Pronouncements*

In August 2016, the FASB issued ASU No. 2016-14, *Presentation of Financial Statements for Not-for-Profit Entities (Topic 958)* (ASU 2016-14). Under ASU 2016-14, the existing three-category

classification of net assets (i.e., unrestricted, temporarily restricted and permanently restricted: will be replaced with a simplified model that combines temporarily restricted and permanently restricted into a single category called "net assets with donor restrictions". ASU 2016-14 also enhances certain disclosures regarding board designations, donor restrictions and qualitative information regarding management of liquid resources. In addition to reporting expenses by functional classifications, ASU 2016-14 will also require the financial statements to provide information about expenses by their nature, along with enhanced disclosures about the methods used to allocate costs among program and support functions. ASU 2016-14 is effective for the Corporation's fiscal year ending September 30, 2019, with early adoption permitted. The Corporation is currently evaluating the impact of the pending adoption of ASU 2016-14 on the consolidated financial statements.

In February 2016, the FASB issued ASU No. 2016-02, *Leases (Topic 842)* (ASU 2016-02). Under ASU 2016-02, at the commencement of a long-term lease, lessees will recognize a liability equivalent to the discounted payments due under the lease agreement, as well as, an offsetting right-of-use asset. ASU 2016-02 is effective for the Corporation on October 1, 2019, with early adoption permitted. Lessees (for capital and operating leases) must apply a modified retrospective transition approach for leases existing at, or entered into after, the beginning of the earliest comparative period presented in the financial statements. The modified retrospective approach would not require any transition accounting for leases that expired before the earliest comparative period presented. Lessees may not apply a full retrospective transition approach. The Corporation is currently evaluating the impact of the pending adoption of ASU 2016-02 on the consolidated financial statements.

In May 2014, the FASB issued ASU No. 2014-09, *Revenue from Contracts with Customers* (ASU 2014-09), which requires revenue to be recognized when promised goods or services are transferred to customers in amounts that reflect the consideration to which the Corporation expects to be entitled in exchange for those goods and services. ASU 2014-09 will replace most existing revenue recognition guidance in U.S. GAAP when it becomes effective. ASU 2014-09 is effective for the Corporation on October 1, 2018. ASU 2014-09 permits the use of either the retrospective or cumulative effect transition method. The Corporation is evaluating the impact that ASU 2014-09 will have on its consolidated financial statements and related disclosures.

***(x) Reclassifications***

Certain amounts in the 2015 consolidated financial statements have been reclassified to conform to the 2016 presentation.

**(3) Community Benefit Programs**

As a nonprofit organization dedicated to community service, MaineHealth provides many services for the community in addition to its range of health care services and programs. We support our communities by implementing best practice interventions ranging from prevention and wellness to disease management. These services include evidenced-based programs to improve care and outcomes for people suffering from chronic diseases such as diabetes, asthma, chronic obstructive pulmonary disease and behavioral health issues. MaineHealth also provides training and education opportunities for physicians and other providers that focus on achieving patient-centered healthcare. In addition, our system works to ensure patients receive excellent coordination of care through our transitions of care programs. MaineHealth also offers, through its

Access to Care program, donated healthcare services and free or low-cost medications to low-income and uninsured patients.

A wide range of community health improvement and prevention programs support our efforts to promote healthy lifestyles. MaineHealth's healthy lifestyle programs include initiatives that target both children and adults. Engaging community health professionals and provider organizations, community partners, family members and local and state government is a key component to the successful implementation and continued effectiveness of these programs. Our tobacco cessation program, through highly trained Tobacco Treatment Educators, provides ongoing support to our community healthcare providers with the goal of reducing tobacco use. This program also offers a free confidential coaching service in support of Maine residents who seek to quit the use of tobacco. Other community health improvement programs include healthy lifestyle, oral health, healthy weight, and childhood immunization initiatives.

**(4) Net Patient Service Revenue**

MaineHealth has agreements with third-party payors that provide for payments to MaineHealth at amounts different from its established rates. A summary of the payment arrangements with major third-party payors is as follows:

***(a)*** *Medicare and State Medicaid Programs* – Maine Medical Center, Southern Maine Health Care, Pen Bay Medical Center (a subsidiary of CHA) and Franklin Memorial Hospital are paid at prospectively determined rates for inpatient and outpatient services rendered to Medicare and Medicaid beneficiaries. Inpatient rates vary according to a patient classification system that is based on clinical diagnosis and other factors. Outpatient services are paid based on a prospective rate per ambulatory visit/procedure. LincolnHealth, Waldo County General Hospital (a subsidiary of CHA), Stephens Memorial Hospital (a subsidiary of WMHCC) and TMH are Critical Access Hospitals reimbursed at cost for services provided to Medicare and Medicaid beneficiaries for certain services. Cost reimbursable services are paid at an interim rate with final settlement determined after submission, review and audit of annual cost reports by MaineHealth and audited thereof by the Medicare administrative contractor, the State of Maine and the State of New Hampshire.

Several MaineHealth hospitals receive disproportionate share (DSH) payments. These payments are made to qualifying hospitals to cover the costs of providing care to low income patients. These payments are subject to audit by the Centers for Medicare and Medicaid and are, therefore, subject to change. These amounts are recorded as net patient service revenue.

In 2004, the State of Maine, established several health care provider taxes (State taxes). The enactment of the State taxes allowed the State of Maine to add revenues to the State of Maine General Fund while minimizing the potential of lost federal matching funds in the MaineCare program. The hospital-specific portion of the State taxes is based on a percentage of those hospital's net patient service revenue. Taxes on nursing homes are based on 6.0% of net patient service revenue. The State of New Hampshire levies a provider tax on New Hampshire hospitals known as the Medicaid Enhancement Tax. The tax is based on hospital net patient service revenue and on the number of occupied Intermediate Care Facility beds.

The State of New Hampshire established a Medicaid Enhancement Tax program in 1991. This program taxes hospital services at approximately 5.5% of net patient service revenues. The State of New Hampshire also levies a tax on intermediate care facilities at approximately 5.5%.

For the years ended September 30, 2016 and 2015, MaineHealth recorded State taxes of approximately $36,775,000 and $37,188,000, respectively.

(b) *Nongovernmental Payors* – MaineHealth also has entered into payment agreements with certain commercial insurance carriers, health maintenance organizations, and preferred provider organizations. The basis for payment to MaineHealth under these agreements includes prospectively determined rates per discharge, discounts from established charges, and prospectively determined daily rates.

(c) *Uninsured Patients* – For uninsured patients that do not qualify for free care, MaineHealth recognizes revenue on the basis of its standard rates for services provided (or on the basis of discounted rates, if negotiated or provided by policy). Based on historical experience, a significant portion of uninsured patients will be unable or unwilling to pay for the services provided.

(d) *Allowance for Bad Debts and Free Care* – Accounts receivable are reduced by an allowance for bad debts and free care. In evaluating the collectability of accounts receivable, MaineHealth analyzes its past history and identifies trends for each of its major payor sources of revenue to estimate the appropriate allowance for bad debts and provision for bad debts. Management regularly reviews data about these major payor sources of revenue in evaluating the sufficiency of the allowance for bad debts. For receivables associated with services provided to patients who have third-party coverage, MaineHealth analyzes contractually due amounts and provides an allowance for bad debts and a provision for bad debts, if necessary. For receivables associated with self-pay patients, MaineHealth records a significant provision for bad debts in the period of service on the basis of its past experience, which indicates that many patients are unable or unwilling to pay the portion of their bill for which they are financially responsible. The difference between the standard rates and the amounts actually collected after all reasonable collection efforts have been exhausted is charged off against the allowance for bad debts.

MaineHealth provides care without charge or at amounts less than its established rates to patients who meet certain criteria under its Board-established free care policy. Because MaineHealth does not pursue collection of amounts determined to qualify as free care, they are not reported as net patient service revenue. MaineHealth estimates the costs associated with providing charity care by calculating a ratio of total cost to total gross charges, and then multiplying that ratio by the gross charges associated with providing care to patients eligible for free care. The estimated cost of caring for charity care patients for the years ended September 30, 2016 and 2015, was $53,103,000 and $50,589,000, respectively. Funds received from gifts and grants to subsidize charity services provided for the years ended September 30, 2016 and 2015, were $479,000 and $612,000, respectively.

Net patient service revenue (after contractual allowances and discounts), recognized during the years ended September 30, 2016 and 2015, from these major payor sources, is as follows (in thousands):

| | | 2016 | 2015 |
|---|---|---|---|
| Medicare | $ | 693,904 | 664,641 |
| State Medicaid Programs | | 252,611 | 253,929 |
| Anthem Blue Cross and Blue Shield | | 404,850 | 387,069 |
| Other third-party payors | | 663,542 | 598,258 |
| Patients | | 83,890 | 70,685 |
| Net patient service revenue (after contractual allowances and discounts) | | 2,098,797 | 1,974,582 |
| Provision for bad debts | | 99,912 | 97,523 |
| Net patient service revenue – net of provision for bad debts | $ | 1,998,885 | 1,877,059 |

Net patient service revenue for the years ended September 30, 2016 and 2015, consists of the following (in thousands):

| | | 2016 | 2015 |
|---|---|---|---|
| Gross charges: | | | |
| Inpatient services | $ | 610,959 | 619,378 |
| Inpatient ancillary services | | 1,207,265 | 1,075,566 |
| Outpatient services | | 2,129,125 | 2,015,650 |
| | | 3,947,349 | 3,710,594 |
| Deductions from gross charges: | | | |
| Contractual adjustments | | 1,749,879 | 1,640,069 |
| Free care | | 98,673 | 95,943 |
| | | 1,848,552 | 1,736,012 |
| Net patient service revenue (net of contractual allowance and discounts) | | 2,098,797 | 1,974,582 |
| Provision for bad debts | | 99,912 | 97,523 |
| Net patient service revenue – net of provision for bad debts | $ | 1,998,885 | 1,877,059 |

Net patient service revenue in 2016 and 2015 included approximately $13,651,000 and $17,049,000, respectively, primarily as a result of favorable settlements with third-party payors regarding prior years.

## (5) Patient Accounts Receivable

Patient accounts receivable consists of the following at September 30, 2016 and 2015, (in thousands):

| | | 2016 | 2015 |
|---|---|---|---|
| Patient accounts receivable | $ | 616,450 | 564,139 |
| Less: | | | |
| Allowances for contractual adjustments and advance payments from third-party reimbursing agencies | | 275,827 | 243,312 |
| Allowances for bad debts and free care | | 120,590 | 122,575 |
| Patient accounts receivable – net | $ | 220,033 | 198,252 |

MaineHealth establishes an allowance for bad debts and free care based on the amount and age of self-pay and commercial accounts. MaineHealth has not changed its free care or uninsured discount policies during fiscal years 2016 or 2015. MaineHealth does not maintain a material allowance for bad debts from third-party payors nor did it have significant write offs from third-party payors.

## (6) Investments and Investments whose use is Limited

The composition of investments and investments whose use is limited at September 30, 2016 and 2015, is set forth as follows (in thousands):

| | | 2016 | 2015 |
|---|---|---|---|
| Investments (current assets) | $ | 426,301 | 362,491 |
| Investments whose use is limited | | 471,267 | 473,903 |
| Total | $ | 897,568 | 836,394 |
| Cash equivalents | $ | 64,022 | 71,196 |
| Fixed income securities – bonds | | 273,544 | 429,467 |
| Equity investments – stocks | | 476,877 | 263,456 |
| Investment in real property | | 3,058 | 2,242 |
| Common collective trusts | | — | 4,544 |
| Limited partnerships | | 29,032 | 13,718 |
| Hedge funds | | 51,035 | 51,771 |
| Total | $ | 897,568 | 836,394 |

Investments whose use is limited include amounts required by debt agreements and amounts restricted by donors. The Board also segregates certain unrestricted net assets as Board designated in order to make provision for future capital improvements, to fund self-insured professional and general liability and workers' compensation risks, and to provide for other specific purposes.

Investments whose use is limited by debt agreements include debt service funds, which are composed of semiannual deposits to fund principal and interest payments, and construction funds. These investments are held pursuant to the requirements of the outstanding Revenue Bonds and Revenue Refunding Bonds.

The current portion of investments whose use is limited at September 30, 2016 and 2015, is composed of the following (in thousands):

| | | 2016 | 2015 |
|---|---|---|---|
| Trusteed under debt agreements | $ | 7,300 | 22,413 |
| Self-insurance trusts | | 4,456 | 4,523 |
| Total | $ | 11,756 | 26,936 |

Investment income and net gains and losses on investments and investments whose use is limited, cash equivalents, and other investments for the years ended September 30, 2016 and 2015, consist of the following (in thousands):

| | | 2016 | 2015 |
|---|---|---|---|
| Unrestricted net assets: | | | |
| Interest and dividends | $ | 15,463 | 13,843 |
| Change in fair value of investments | | 33,475 | (24,421) |
| | | 48,938 | (10,578) |
| Temporarily restricted net assets: | | | |
| Interest and dividends | | 757 | 618 |
| Change in fair value of investments | | 4,557 | (9,279) |
| | | 5,314 | (8,661) |
| Total | $ | 54,252 | (19,239) |

## (7) Fair Value of Financial Instruments

### *(a) Fair Value Measurements*

MaineHealth classifies its investments into Level 1, which refers to securities valued using quoted prices from active markets for identical assets and Level 2, which refers to securities not traded on an active market, but for which observable market inputs are readily available. Assets and liabilities are classified in their entirety based on the lowest level of input that is significant to the fair value measurement.

### *(b) Asset Valuation Techniques*

Valuation techniques maximize the use of relevant observable inputs and minimize the use of unobservable inputs. ASU 2015-10, *Technical Corrections and Improvements*, clarified one aspect of the definition of readily determinable fair value (RDFV) thereby affecting the measurement of and disclosure about certain equity investments. During 2016, based on this technical correction,

MaineHealth re-evaluated its investments historically measured at NAV as a practical expedient in structures with characteristics similar to mutual funds. Based on that re-evaluation, NAV disclosures have been amended, and certain investments aggregating $9,089,000 previously accounted for using NAV as a practical expedient as of September 30, 2015 and previously excluded from the fair value hierarchy were determined to have a RDFV and have been included as Level 1 investments at that date in the retirement plan table. MaineHealth revised the presentation of c in the defined pension plan investments from the NAV table to level 1 for the year ended September 30, 2015, based upon ASU 2015-10, *Technical Corrections and Improvements.* The following is a description of the valuation methodologies used for assets measured at fair value.

*Cash equivalents* – The investments strategy for these are low-risk, low-return, highly liquid investments, typically with a maturity of three months or less, including US Government, T bills, bank certificates, corporate commercial paper or other money market instruments that are based on quoted prices and are actively traded.

*Fixed income securities-bonds* – These securities are investments in corporate or sovereign bonds and notes, certificates of deposit, or other loans providing a periodic payment and eventual return of principal at maturity. Certain corporate bonds and notes are valued at the closing price reported in the active market in which the bond is traded. Other corporate bonds and notes are valued based on yields currently available on comparable securities of issuers with similar credit ratings. When quoted prices are not available for identical or similar bonds, the bond is valued under a discounted cash flow approach that maximizes observable inputs, such as current yields of similar instruments, but includes adjustments for certain risks that may not be observable, such as credit and liquidity risks.

*Equity investments-stock*s – These investments include marketable equity securities, mutual funds, exchange traded, and closed-end funds. The fair value of marketable equity securities are principally based on quoted market prices. Exchange-traded funds and closed-end funds are valued at the last sale price or official closing price on the exchange or system on which they are principally traded. Investments in mutual funds are valued at their NAV at year-end. These funds are required to publish their daily NAV and to transact at that price. The mutual funds held are deemed to be actively traded.

*Investment in Real Property* – Investments in real property are valued yearly at fair value, using the market approach, as determined by comparable sales data beginning on the date of acquisition.

*Common/Collective Trusts* – These include diverse investments in securities issued by the U.S. Treasury and global bond funds using the Common Collective Trust vehicle to obtain lower expense ratios. These investments are designed to generate attractive risk-adjusted returns. The fair value of common collective trusts are based on the NAV of the fund, representing the fair value of the underlying investments, which are generally securities traded on an active market. The NAV as provided by the trustee, is used as a practical expedient to estimate fair value.

*Limited partnerships* – These include investments in offshore and private equity funds. They have objectives of capital appreciation with absolute returns over the medium and long term. These investments are designed to generate attractive risk-adjusted returns. The estimated fair values of limited partnerships for which quoted market prices are not readily available, are determined based upon information provided by the fund managers. Such information is generally based on NAV of the

fund, which is used as a practical expedient to estimate fair values. The limited partnerships invest primarily in readily available marketable equity securities. The limited partnerships allocate gains, losses, and expenses to the partners based on ownership percentage as described in the respective partnership agreements.

*Hedge funds* – The investments are inclusive of a variety of types of equity, debt, and derivative investments, designed to mitigate volatility while generating equity like returns. The estimated fair values of limited partnerships and hedge funds, for which quoted market prices are not readily available, are determined based upon information provided by the fund managers. Such information is generally based on NAV of the fund, which is used as a practical expedient to estimate fair value. The hedge funds invest primarily in readily marketable equity securities. The hedge funds allocate gains, losses, and expenses to the partners based on ownership percentage as described in the respective hedge fund agreements.

The following methods and assumptions were used by MaineHealth in estimating the fair value of MaineHealth's financial instruments that are not measured at fair value on a recurring basis for disclosures in the consolidated financial statements:

*Interest Rate Swaps* – MaineHealth uses inputs other than quoted prices that are observable to value the interest rate swaps. MaineHealth considers these inputs to be Level 2 inputs in the context of the fair value hierarchy. The fair value of the net interest rate swap liabilities was $14,286,000 and $11,696,000 at September 30, 2016 and 2015, respectively. These values represent the estimated amounts MaineHealth would receive or pay to terminate agreements, taking into consideration current interest rates and the current creditworthiness of the counterparty. The fair value of the interest rate swap agreements are reported in other long-term liabilities.

*Pledges Receivable* – The current yields for 1 to 10-year U.S. Treasury notes are used to discount pledges receivable. MaineHealth considers these yields to be a Level 2 input in the context of the fair value hierarchy. Pledges received were discounted at rates ranging from 0.25% to 1.06% in fiscal year 2016. Pledges received were discounted at rates ranging from 0.25% to 1.37% in fiscal year 2015. Outstanding pledges receivable in 2016 and 2015, which have been recorded within other long-term assets at fair value, totaled approximately $2,291,000 and $3,167,000, respectively.

*Receivables and Payables* – The carrying value of MaineHealth's receivables and payables approximate fair value, as maturities are very short term.

MaineHealth's investments at fair value set forth by level within the fair value hierarchy at September 30, 2016 and 2015 are as follows:

| | September 30, 2016 | | | | |
|---|---|---|---|---|---|
| | Investments measured at NAV | Quoted prices in active markets (Level 1) | Significant other observable inputs (Level 2) | Unobservable inputs (Level 3) | Total |
| Cash equivalents, net of receivables and payables | $ — | 64,022 | — | — | 64,022 |
| Long term investments: | | | | | |
| Fixed income securities-bonds | 11,286 | 96,552 | 165,706 | — | 273,544 |
| Equity investments-stocks | 9,488 | 464,468 | 2,921 | — | 476,877 |
| Investment in real property | 1,602 | — | 1,456 | — | 3,058 |
| Common/collective trust | — | — | — | — | — |
| Limited partnerships | 29,032 | — | — | — | 29,032 |
| Hedge funds | 51,035 | — | — | — | 51,035 |
| Total long term investments | 102,443 | 561,020 | 170,083 | — | 833,546 |
| Total investments | 102,443 | 625,042 | 170,083 | — | 897,568 |
| Beneficial interest in trusts | — | — | — | 38,914 | 38,914 |
| Total | $ 102,443 | 625,042 | 170,083 | 38,914 | 936,482 |

| | September 30, 2015 | | | | |
|---|---|---|---|---|---|
| | Investments measured at NAV | Quoted prices in active markets (Level 1) | Significant other observable inputs (Level 2) | Unobservable inputs (Level 3) | Total |
| Cash equivalents, net of receivables and payables | $ — | 71,196 | — | — | 71,196 |
| Long term investments: | | | | | |
| Fixed income securities-bonds | 14,251 | 272,639 | 142,577 | — | 429,467 |
| Equity investments-stocks | 11,256 | 252,200 | — | — | 263,456 |
| Investment in real property | 677 | — | 1,565 | — | 2,242 |
| Common/collective trust | 4,544 | — | — | — | 4,544 |
| Limited partnerships | 13,718 | — | — | — | 13,718 |
| Hedge funds | 51,771 | — | — | — | 51,771 |
| Total long term investments | 96,217 | 524,839 | 144,142 | — | 765,198 |
| Total investments | 96,217 | 596,035 | 144,142 | — | 836,394 |
| Beneficial interest in trusts | — | — | — | 37,669 | 37,669 |
| Total | $ 96,217 | 596,035 | 144,142 | 37,669 | 874,063 |

The net change in the beneficial interest in trusts of $1,245,000 and $919,000, in 2016 and 2015 respectively, represents the change in the fair value of the trusts net of distributions.

The information regarding the fair value measurements of the assets held by MMC's defined benefit pension plan (see note 13) at September 30, 2016 and 2015, is as follows (in thousands):

| | September 30, 2016 | | | |
|---|---|---|---|---|
| | Investments measured at NAV | Quoted prices in active markets (Level 1) | Significant other observable inputs (Level 2) | Total |
| Cash equivalents, net of receivables and payables | $ — | 6,560 | — | 6,560 |
| Long term investments: | | | | |
| Fixed income securities-bonds | — | 18,659 | 33,483 | 52,142 |
| Equity investments-stocks | — | 314,169 | — | 314,169 |
| Common/collective trust | 21,474 | — | — | 21,474 |
| Limited partnerships | 56,205 | — | — | 56,205 |
| Hedge funds | 83,816 | — | — | 83,816 |
| Total long term investments | 161,495 | 332,828 | 33,483 | 527,806 |
| Total investments | $ 161,495 | 339,388 | 33,483 | 534,366 |

| | September 30, 2015 | | | |
|---|---|---|---|---|
| | Investments measured at NAV | Quoted prices in active markets (Level 1) | Significant other observable inputs (Level 2) | Total |
| Cash equivalents, net of receivables and payables | $ — | 2,570 | — | 2,570 |
| Long term investments: | | | | |
| Fixed income securities-bonds | — | 7,974 | 29,488 | 37,462 |
| Equity investments-stocks | — | 294,412 | — | 294,412 |
| Common/collective trust | 43,905 | — | — | 43,905 |
| Limited partnerships | 28,095 | — | — | 28,095 |
| Hedge funds | 90,628 | — | — | 90,628 |
| Total long term investments | 162,628 | 302,386 | 29,488 | 494,502 |
| Total investments | $ 162,628 | 304,956 | 29,488 | 497,072 |

### *(c) Liquidity*

Equity investments, fixed income investments, investments in real property, common collective trusts, limited partnerships, hedge funds and beneficial interest in perpetual trusts are redeemable at NAV under the terms of the subscription and/or partnership agreements. Investments, including short-term investments, with daily liquidity generally do not require any notice prior to withdrawal. Investments with monthly, quarterly or annual redemption frequency typically require notice periods ranging from 30 to 180 days. The long term investments fair value are broken out below by their redemption

frequency as of September 30, 2016 and 2015 for both the investments and MMC's defined benefit pension plan:

| Liquidity - NAV Measured Investments | MaineHealth Investments September 30, 2016 | | | | | | |
|---|---|---|---|---|---|---|---|
| | Daily | Bi-Monthly | Monthly | Quarterly | Annual | Illiquid | Total |
| Fixed income securities - bonds | $ — | — | 6,168 | 1,886 | — | 3,232 | 11,286 |
| Equity investments - stocks | — | — | 2,638 | 6,844 | — | 6 | 9,488 |
| Investment in real property | — | — | — | — | — | 1,602 | 1,602 |
| Limited partnerships | — | 9,346 | 7,193 | 8,471 | — | 4,022 | 29,032 |
| Hedge funds | 9,031 | — | 17,913 | 12,397 | 11,694 | — | 51,035 |
| | $ 9,031 | 9,346 | 33,912 | 29,598 | 11,694 | 8,862 | 102,443 |

| Liquidity - NAV Measured Investments | MaineHealth Investments September 30, 2015 | | | | | | |
|---|---|---|---|---|---|---|---|
| | Daily | Bi-Monthly | Monthly | Quarterly | Annual | Illiquid | Total |
| Fixed income securities - bonds | $ — | — | 7,788 | 3,260 | — | 3,203 | 14,251 |
| Equity investments - stocks | — | — | 7,785 | 95 | — | 3,376 | 11,256 |
| Investment in real property | — | — | — | — | — | 677 | 677 |
| Common collective trust | — | — | 4,544 | — | — | — | 4,544 |
| Limited partnerships | — | — | 6,191 | 7,527 | — | — | 13,718 |
| Hedge funds | 5,451 | — | 21,194 | 12,668 | 12,458 | — | 51,771 |
| | $ 5,451 | — | 47,502 | 23,550 | 12,458 | 7,256 | 96,217 |

| Liquidity – NAV Measured Investments | MaineHealth Investments September 30, 2016 | | | | | |
|---|---|---|---|---|---|---|
| | Daily | Bi-Monthly | Monthly | Quarterly | Annual | Total |
| Common/collective trusts | $ — | — | 21,474 | — | — | 21,474 |
| Limited partnerships | — | 26,559 | — | 21,860 | 7,786 | 56,205 |
| Hedge funds | 27,246 | — | 28,196 | 17,305 | 11,069 | 83,816 |
| | $ 27,246 | 26,559 | 49,670 | 39,165 | 18,855 | 161,495 |

| Liquidity – NAV Measured Investments | MaineHealth Investments September 30, 2016 | | | | |
|---|---|---|---|---|---|
| | Daily | Monthly | Quarterly | Annual | Total |
| Common/collective trusts | $ — | 43,905 | — | — | 43,905 |
| Limited partnerships | — | — | 20,434 | 7,661 | 28,095 |
| Hedge funds | 15,754 | 36,702 | 26,496 | 11,676 | 90,628 |
| | $ 15,754 | 80,607 | 46,930 | 19,337 | 162,628 |

Investments with a redemption frequency of illiquid may include lock-ups with definite expiration dates, restricted shares and side pockets, as well as private equity and real assets funds where MaineHealth has no liquidity terms until the investments are sold by the fund manager. MaineHealth has total capital commitments for alternative investments outstanding of $2,727,000 and $3,361,000 at

September 30, 2016 and 2015 respectively. Specific short-term investments within MaineHealth's portfolio will be used to fund this commitment. Investments associated with beneficial interests in perpetual trust agreements have been categorized as illiquid because they are not available to support operations.

***(d) Transfers between Levels***

The availability of observable market data is monitored to assess the appropriate classification of financial instruments within the fair value hierarchy. Changes in economic conditions or model-based valuation techniques may require the transfer of financial instruments from one fair value level to another. In such instances, the transfer is reported at the beginning of the reporting period. There were no transfers between Level 1 and Level 2 for the years ended September 30, 2016 and 2015.

The valuation methods as described in note 7(b) may produce a fair value calculation that may not be indicative of what the management would realize upon disposition or reflective of future fair values. Furthermore, although management believes its valuation methods are appropriate and consistent with methods employed by other market participants, the use of different methodologies or assumptions to determine the fair value of certain financial instruments could result in a different fair value measurement at the reporting date.

## (8) Property, Plant, and Equipment

Property, plant, and equipment at September 30, 2016 and 2015, consist of the following (in thousands):

| Equipment | | 2016 | 2015 |
|---|---|---|---|
| Land and land improvements | $ | 93,408 | 93,210 |
| Buildings | | 1,172,767 | 1,113,173 |
| Equipment | | 972,465 | 874,388 |
| Construction in progress | | 99,733 | 93,384 |
| Total | | 2,338,373 | 2,174,155 |
| Less accumulated depreciation | | 1,262,016 | 1,133,459 |
| Total | $ | 1,076,357 | 1,040,696 |

Depreciation expense for the years ended September 30, 2016 and 2015, was approximately $119,693,000 and $113,780,000, respectively. At September 30, 2016 and 2015, the remaining commitment on construction contracts was approximately $3,386,000 and $30,392,000, respectively. The value of property, plant, and equipment acquisitions in accounts payable at September 30, 2016 and 2015, was approximately $7,592,000 and $4,672,000, respectively. Total equipment under capital leases included in the table above is approximately $21,115,000 and $21,229,000 as of September 30, 2016 and 2015, respectively. Accumulated amortization relating to the equipment under capital leases was approximately $7,616,000 and $7,069,000 in September 2016 and 2015, respectively and is included in accumulated depreciation.

*Information Technology Investment*

MaineHealth has made and continues to make a significant investment in its information technology. A significant project to acquire and implement an ambulatory electronic health record began in 2007, was expanded in 2010 to include the inpatient electronic health record system and other financial systems and then was expanded again in 2016 to include Maine Behavioral Healthcare and MaineHealth members who joined the system since 2010. The current project budget is approximately $329,000,000 and is expected to be completed in 2019. Approximately $266,000,000 had been expended as of September 30, 2016.

## (9) Other Assets

Other assets at September 31, 2016 and 2015, consist of the following (in thousands):

| | | 2016 | 2015 |
|---|---|---|---|
| Grants, notes, and pledges receivable | $ | 6,764 | 7,073 |
| Investments in joint ventures | | 12,369 | 13,359 |
| Goodwill and intangible assets | | 1,749 | 1,764 |
| Estimated insurance recoveries | | 9,851 | 6,743 |
| Beneficial interest in perpetual and charitable remainder trusts | | 39,984 | 38,682 |
| Deferred compensation assets | | 46,930 | — |
| Other | | 17,483 | 17,376 |
| Total | $ | 135,130 | 84,997 |

In 2016, MaineHealth combined the majority of its members' 457(b) plans into one plan, the assets of this plan are included above in deferred compensation assets and there is a corresponding liability included in accrued retirement benefits. MaineHealth has investments in various joint ventures. The Maine Heart Center and the MMC Physician Hospital Organization, Inc., ventures are physician and hospital collaborations, which manage risk and provide incentives to deliver high-quality, cost-effective patient care. The MMC Physician Hospital Organization, Inc. was dissolved in 2016 and therefore the investment in the joint venture was terminated in 2016. New England Rehabilitation Hospital of Portland is an acute care rehabilitation facility. Maine Molecular Imaging, LLC provides mobile PET/CT imaging services. MaineHealth's investments in these joint ventures are accounted for using the equity method of accounting as its ownership in each joint venture is greater than 20% and less than or equal to 50%.

MaineHealth's investments in joint ventures, excluding investments accounted for using the cost method, include the following as of September 30, 2016 and 2015 (in thousands):

| Name of joint venture | Ownership percentage | | 2016 Total assets | Long-term debt | Share of net assets | Share of earnings |
|---|---|---|---|---|---|---|
| New England Rehabilitation Hospital of Portland | 50% | $ | 20,178 | 6,581 | 5,570 | 4,700 |
| Maine Heart Center | 50% | | 11,973 | — | 633 | (6) |
| Maine Molecular Imaging, LLC | 48% | | 1,794 | — | 586 | 677 |
| Concentra Maine, Inc | 49% | | 2,625 | — | 1,522 | 774 |
| Pine Tree Insurance | 68% | | 2,831 | — | 2,333 | (143) |
| | | $ | 39,401 | 6,581 | 10,644 | 6,002 |

| Name of joint venture | Ownership percentage | | 2015 Total assets | Long-term debt | Share of net assets | Share of earnings |
|---|---|---|---|---|---|---|
| New England Rehabilitation Hospital of Portland | 50% | $ | 19,514 | 7,030 | 5,051 | 4,187 |
| Maine Heart Center | 50% | | 13,984 | — | 639 | 126 |
| Maine Molecular Imaging, LLC | 48% | | 906 | — | 603 | 691 |
| MMC Physician Hospital Organization | 50% | | 2,828 | — | 674 | (51) |
| Concentra Maine, Inc | 49% | | 1,886 | — | 1,120 | 714 |
| Pine Tree Insurance | 74% | | 8,902 | — | 2,429 | 6 |
| | | $ | 48,020 | 7,030 | 10,516 | 5,673 |

## (10) Long-Term Debt and Revolving Lines of Credit

Long-term debt at September 30, 2016 and 2015 consists of the following (in thousands):

| Name of Issue | Interest rate | Type of rate | Final maturity | 2016 | 2015 |
|---|---|---|---|---|---|
| Revenue Bonds: | | | | | |
| Maine Health and Higher Educational | | | | | |
| Facilities Authority: | | | | | |
| Franklin Memorial Hospital (subsidiary of FCHN) – Series 2016A | 3.0%-5.0% | Fixed | 2034 | $ 10,015 | — |
| Franklin Memorial Hospital – Series 2006F | 4.0%-5.0% | Fixed | 2036 | — | 11,615 |
| Franklin Memorial Hospital – Series 2011C | 2.0%-5.0% | Fixed | 2032 | 6,818 | 7,178 |
| Coves Edge (subsidiary of LHG) & LHG – Series 2011A | 4.0% -5.0% | Fixed | 2031 | 11,777 | 13,227 |
| MMC – Series 2014 | 3.0%-5.0% | Fixed | 2044 | 79,675 | 79,675 |
| MMC – Series 2011A | 0.75% | Variable | 2030 | 12,508 | 13,198 |
| MMC – Series 2008A | 4.0%-5.0% | Fixed | 2036 | 38,700 | 38,700 |
| Penobscot Bay Medical Center (subsidiary of CHA) – Series 2014A | 3.0%-5.0% | Fixed | 2025 | 4,071 | 4,841 |
| Penobscot Bay Medical Center – Series 2008C | 3.0%-5.0% | Fixed | 2038 | 5,016 | 5,161 |
| Quarry Hill (susidiary of CHA) – Series 2007A | 4.0%-5.0% | Fixed | 2030 | 10,090 | 10,650 |
| Penobscot Bay Medical Center – Series 2007B | 4.0%-5.0% | Fixed | 2027 | 3,592 | 3,877 |
| Waldo County General Hospital (subsidiary of CHA) – Series 2014A | 3.0%-5.0% | Fixed | 2028 | 4,962 | 5,307 |
| MBHC – Series 2012A | 2.0%-5.0% | Fixed | 2032 | 16,732 | 17,542 |
| SMHC – Series 2016A | 4.0%-5.0% | Fixed | 2026 | 11,825 | — |
| SMHC – Series 2007A | 4.0%-4.75% | Fixed | 2026 | 3,024 | 3,294 |
| SMHC – Series 2006F | 4.0%-5.0% | Fixed | 2026 | — | 14,699 |
| Stephens Memorial Hospital (subsidiary of WMHCC) – Series 2014 | 2.0%-5.0% | Fixed | 2044 | 5,000 | 5,290 |
| Finance Authority of Maine: | | | | | |
| MaineHealth – Series 2014 | 2.36% | Fixed | 2025 | 94,846 | 65,491 |
| SMHC | 2.91% | Fixed | 2033 | 14,650 | 15,310 |
| New Hampshire Health and Education Facilities Authority: | | | | | |
| The Memorial Hospital at North Conway, (sub. Of TMH) – Series 2006 | 5.25% | Fixed | 2036 | 17,290 | 17,775 |
| Notes Payable: | | | | | |
| LHG | 4.21% | Fixed | 2027 | 2,838 | 3,017 |
| MH | 2.18% | Variable | 2020 | 11,634 | 12,486 |
| MH | 2.18% | Variable | 2020 | 10,482 | 10,764 |
| MH | 3.42% | Fixed | 2025 | 6,654 | 4,813 |
| SMHC | 2.02% | Variable | 2017 | 3,432 | 3,407 |
| Maine Health and Higher Educational | | | | | |
| Facilities Authority: | | | | | |
| Penobscot Bay Medical Center | 3.11% | Fixed | 2024 | 3,734 | 4,172 |
| Other, including capital leases | | | | 35,681 | 39,844 |
| Total bonds, loans, notes payable and capital leases before bond issuance costs and premiums | | | | 425,046 | 411,333 |
| Less unamortized bond issuance costs | | | | (4,064) | (4,578) |
| Add unamortized premiums net of discounts | | | | 13,283 | 11,273 |
| Total bonds, loans, notes payable and capital leases | | | | 434,265 | 418,028 |
| Less portion classified as current liabilities | | | | 20,446 | 17,192 |
| | | | | $ 413,819 | 400,836 |

Annual principal maturities of long-term debt for the five fiscal years after September 30, 2016, and the years thereafter, are as follows (in thousands):

| | Bonds and notes | Capital lease obligations |
|---|---|---|
| 2017 | $ 17,415 | 3,508 |
| 2018 | 27,694 | 2,979 |
| 2019 | 24,438 | 2,706 |
| 2020 | 42,398 | 2,162 |
| 2021 | 24,348 | 1,714 |
| Years thereafter | 272,544 | 10,662 |
| | 408,837 | 23,731 |
| Less amount representing interest under capital lease obligations | | 6,637 |
| | | $ 17,094 |

The Board of Trustees of MMC adopted a system funding agreement and a Corporate Model Master Trust Indenture (the Indenture) and the Board of Trustees of MaineHealth adopted a system funding agreement and a Parent Model Master Trust Indenture. These actions resulted in the creation of an Obligated Group for the MaineHealth system (the Obligated Group). MaineHealth subsidiaries that are Designated Affiliates of the Obligated Group (the Designated Affiliates) have access to lower cost capital and less restrictive debt covenants. MaineHealth subsidiaries that are designated affiliates include MMC, SMHC, Stephens Memorial Hospital, Spring Harbor Hospital (a subsidiary of MBH), and St. Andrews Hospital (a subsidiary of LCHC). The Designated Affiliates are indirectly liable for the debt service on the obligations issued under the Indenture for each participant. MMC must remain a part of the Obligated Group and has approval authority over new subsidiaries requesting participation in the Obligated Group. On September 30, 2016 and 2015, the Obligated Group had obligations totaling approximately $211,020,000 and $216,804,000, respectively that are covered under the Parent Model Master Trust Indenture.

Certain of the Maine Health and Higher Educational Facilities Authority (MHHEFA) Revenue Bonds and Revenue Refunding Bonds were issued under the terms of a Master Trust Indenture Agreement. Under the terms of the bonds, certain MaineHealth members are required to maintain deposits with a trustee. Such deposits are included with investments whose use is limited in the consolidated balance sheets. The bonds also require that the members of the Obligated Group satisfy certain measures of financial performance (including a minimum debt service coverage ratio) as long as the bonds are outstanding. Management is not aware of any noncompliance with such covenants at September 30, 2016. Other outstanding debt agreements also require the borrowers to satisfy certain financial covenants. Pen Bay Medical Center and Quarry Hill (subsidiaries of CHA) and FCHN, who are not members of the Obligated Group, are required to maintain, for each fiscal year, a ratio of income available for debt service to annual debt service of 1.20 in accordance with each entity's respective note agreements with MHHEFA. At September 30, 2016 Pen Bay Medical Center, Quarry Hill and FCHN had not met this ratio. As a result of this noncompliance all three organizations are taking corrective action in accordance with the loan agreements.

The Series 2008A bondholders have the option to put the bonds back to MMC. Such bonds would be subject to remarketing efforts by the remarketing agent. To the extent that such remarketing efforts were to be unsuccessful, the nonmarketable bonds would be purchased from the proceeds of letter of credit agreements with banks, which expire on October 3, 2018. If the letter of credit agreements are not extended or replaced, the bonds must either be tendered or converted to long-term fixed-rate bonds. If tendered, MMC, pursuant to the loan agreement, would be precluded from instructing the remarketing agent to conduct an auction with the bonds to be sold on a variable-rate basis, and the bonds would be purchased from the proceeds of the expiring letter of credit agreement. Bonds purchased from the proceeds of the letter of credit agreement are converted to Bank Bonds and are payable over 10 years. The Series 2008A bonds have been classified in accordance with the scheduled maturities contained in the bond agreements in the accompanying consolidated balance sheets.

In June 2016, Series 2016A Revenue Bonds for SMHC, Franklin Memorial Hospital and Penobscot Bay Medical Center totaling $23,905,000 were issued through MHHEFA for the purpose of refinancing their MHHEFA Series 2006F, 2006A and 2006F bonds respectively. The bonds were issued at a premium of $3,585,000 and are collateralized by property and equipment and a security interest in the gross receipts of the organizations. The bonds bear interest ranging from 3.0% to 5.0% and mature between 2025 and 2034.

In January 2015, Maine Health and Higher Educational Facilities Authority (MHHEFA) issued tax exempt revenue bonds for MaineHealth Issue, Series 2014, which totaled $85,105,000. The MMC portion of this issuance of $79,675,000 was used to finance renovations and equipment for the Bean Building and to refinance a portion of MHHEFA Revenue Bonds, Series 2008A totaling $42,760,000. The bond issue includes $27,865,000 of serial bonds with maturities from 2015 through 2034 and carries interest rates from 2.0% to 5.0%. The bond issue also includes term bonds of $24,290,000 due in 2039 and $27,520,000 due in 2044 with interest rates of 5.0% and 4.0%, respectively. The balance of the proceeds, $5,430,000, was used by Stephens Memorial Hospital Association, a subsidiary of Western Maine Health Care Corporations, to finance construction of and equipment for a new medical office building. These bonds were issued under the MaineHealth Master Trust Indenture and through the Obligated Group.

MaineHealth established an information systems project, known as the SeHR (Shared electronic Health Record) Project that will implement a system-wide integrated electronic health record system and financial system. The SeHR Project is an integrated suite of technology solutions to support the healthcare delivery for MaineHealth members, providers and the communities MaineHealth serves. Initial funding for the SeHR Project was drawn from cash reserves held by MaineHealth and many of the subsidiary members.

In Fiscal Year 2014, additional funding for the SeHR Project was acquired by MaineHealth through loan agreements that provide borrowings of up to a combined $101,500,000 under both tax-exempt interest and taxable interest debt instruments. MaineHealth issued a tax exempt revenue bond through the Finance Authority of Maine (FAME) and entered into a bond purchase agreement for the direct placement of these bonds with TD Bank, N.A. for up to $94,800,000. MaineHealth also entered into a term loan with TD Bank, N.A. for up to $6,700,000 to be drawn upon in support of the SeHR Project. At September 30, 2016 the full amount of the available funds had been drawn down.

Repayment of each members' allocable share of the SeHR project funding will be the responsibility of MaineHealth and certain system members deemed "SeHR Affiliates" under a project specific system funding agreement called the "SeHR System Funding Agreement" (SFA). The SFA outlines the requirements of

participation of MaineHealth and each SeHR Affiliate. The SeHR Affiliates means the following subsidiaries of MaineHealth: Maine Medical Center, MaineHealth Care at Home, LincolnHealth Group, NorDx, Coastal Healthcare Alliance, Southern Maine Health Care, Waldo County Healthcare, Inc., and Western Maine Health Care Corporation.

The obligations of MaineHealth under the debt instruments with TD Bank, N. A. were allocated to each SeHR Affiliate based on percentages stated in the SFA. The SFA also requires each SeHR Affiliate to fund a Debt Service Reserve Fund to be held by an agent determined by MaineHealth. In the event any SeHR Affiliate fails to pay its allocable share of the loan obligations and the amounts due to the Debt Service Reserve Fund, then the remaining SeHR Affiliates will be obligated to fund that shortfall based on its allocable share as a percentage of the total of the nondefaulting SeHR Affiliates.

Deferred financing costs of $4,064,000 in 2016 and $4,578,000 in 2015 are reported as a component of long-term debt and represent the costs incurred in connection with the issuance of the bonds. These costs are being amortized over the term of the bonds. Amortization expense for the years ended September 30, 2016 and 2015 was approximately $533,000 and $199,000, respectively. The original issue discount/premium is amortized/accreted over the term of the related bonds using the effective interest method.

MaineHealth and its subsidiaries have various lines of credit available totaling $56,400,000 and $54,400,000 in 2016 and 2015, respectively, at various interest rates ranging from to 2.02% to 3.50% at September 30, 2016 and maturing at various dates through 2017. At September 30, 2016 and 2015, $13,720,000 and $6,750,000, respectively, was outstanding under these lines of credit.

***Interest Rate Swaps***

The estimated fair values of the interest rate swap agreements at September 30, 2016 and 2015, and the change in their fair values for the years then ended are as follows (in thousands):

| Instrument | Associated debt | Estimated fair value | | Gain (loss) recognized in net assets (effective portion) | | Gain (loss) recognized in excess of revenues over expenses | | Notional amount | |
|---|---|---|---|---|---|---|---|---|---|
| | | 2016 | 2015 | 2016 | 2015 | 2016 | 2015 | 2016 | 2015 |
| Nonhedged contracts: | | | | | | | | | |
| Floating to fixed rate swap | 2008 Bonds | $ (9,911) | (8,095) | — | — | (1,816) | (2,473) | 25,000 | 25,000 |
| Floating to fixed rate swap | Bank notes | (1,299) | (1,632) | — | — | 334 | 279 | 14,220 | 15,322 |
| Constant Maturity swap | 2008A Bonds | 1,085 | 1,274 | — | — | (189) | 93 | 25,000 | 25,000 |
| Forward starting swap | 2011A Bonds | 63 | 223 | — | — | 63 | 119 | 14,720 | 15,430 |
| Floating to fixed rate swap | 2008A Bonds | (4,224) | — | — | — | (758) | — | 15,685 | — |
| Hedged contracts: | | | | | | | | | |
| Floating to fixed rate swap | 2008A Bonds | — | (3,466) | — | (348) | — | (632) | — | 15,685 |
| | | $ (14,286) | (11,696) | — | (348) | (2,366) | (2,614) | 94,625 | 96,437 |

The fair values of the interest rate swap agreements are reported in other long-term liabilities. The change in fair value of the effective portion of the interest rate swap agreements that qualify for hedge accounting are reported as a change in unrestricted net assets. The change in fair value of the interest rate swap agreements

that do not qualify for hedge accounting (including any ineffective portion of qualifying hedge instruments) are reported as a nonoperating activity. MaineHealth has reported the net periodic interest rate settlement on the interest rate swaps as a component of interest expense in the consolidated statements of operations. In January 2015, MMC partially terminated a portion of the 2008A Bond swaps. This resulted in a loss of $1,960,000 which is included in the recognized loss on cash flow hedge instruments in the consolidated statement of operations.

The primary risk managed by MaineHealth's derivative instruments is interest rate risk. MaineHealth uses interest rate swaps to modify its exposure to interest rate risk by converting a portion of its variable-rate borrowings to a fixed-rate basis, thus reducing the impact of interest rate changes on future interest expense. MaineHealth also uses other interest rate swaps to restructure its interest rate exposure by utilizing swaps with different maturity and basis techniques.

These interest rate, basis, and constant maturity swaps involve counterparty credit risk exposure. The counterparties are major financial institutions that at one time met MaineHealth's criteria for financial stability and creditworthiness. In each interest rate swap agreement, the counterparty is required to provide a Credit Support Annex. If the counterparty's debt is rated below certain levels and there is a counterparty liability, the counterparty is required to post collateral.

**(11) Self-Insurance Trusts and Reserves**

Certain MaineHealth entities are partially self-insured for professional and general liability risks. These entities share risk above certain amounts with an insurance company for all claims related to the partially self-insured plans. MaineHealth maintains separate trusts for professional and general liability insurance. MaineHealth funds these trusts based upon actuarial valuations and historical experience. Self-insurance reserves for self-insured unpaid claims and incidents are estimated using actuarial valuations, historical payment patterns, and current trends. Self-insurance reserves are recorded in the period the claim or incident occurs and adjusted in future periods as additional data becomes known.

All other entities purchase professional and general liability insurance on a claims-made basis. As of September 30, 2016 and 2015, there are no known claims outstanding, which, in the opinion of management, will be settled for amounts in excess of insurance coverage. These entities intend to renew coverage on a claims-made basis and anticipate that such coverage will be available. As of September 30, 2016 and 2015, an accrual for estimated claims incurred but not reported was recorded. An estimated recovery related to such claims is included in the consolidated financial statements at September 30, 2016 and 2015.

MaineHealth provides health and dental insurance for its employees through a self-insured plan administered by MaineHealth. Self-insurance reserves for unpaid claims and incidents are carried at MaineHealth.

With the exception of TMH MaineHealth provides workers compensation insurance for its employees through a self-insured plan administered by MaineHealth. Self-insurance reserves are carried at MaineHealth for unpaid claims and settlements are estimated using actuarial valuations. Self-insurance reserves are recorded in the period the incident occurs and adjusted in future periods as additional data becomes known. TMH is fully insured through New Hampshire Employers Insurance Company.

## (12) Asset Retirement Obligations

MaineHealth has previously recognized a liability for the fair value of its asset retirement obligation (ARO). The liability is related to the estimated costs to remove the asbestos contained within MaineHealth's facilities. The ARO is reported with other liabilities.

A reconciliation of liabilities for AROs at September 30, 2016 and 2015, is as follows (in thousands):

| | | 2016 | 2015 |
|---|---|---|---|
| Asset retirement obligations – beginning of year | $ | 17,124 | 17,136 |
| Accretion expense | | 450 | 447 |
| Remediation | | (18) | (459) |
| Asset retirement obligations – end of year | $ | 17,556 | 17,124 |

## (13) Retirement Benefits

### *(a) Defined Benefit Pension Plan*

MMC sponsors a defined benefit pension plan (the Plan) covering all grandfathered employees that work 750 or more hours in a plan year. Effective January 1, 2014, all new hires were excluded from participation in the Plan. Such employees are eligible to participate in the defined contribution plan (The Maine Medical Center 403(b) Retirement Plan). The Plan was also amended effective January 1, 2011, to change the basis of a participant's accrued benefit. Prior to January 1, 2011, accrued benefits were based on final average pay. Effective January 1, 2011, for participants hired on or before December 31, 2009, there is a benefit based on the participant's final average pay through December 31, 2020, and years of service through December 31, 2010.

For participants currently employed or hired on or after January 1, 2010, but before January 1, 2014, accrued benefits are based on a cash balance formula that became effective January 1, 2011. A participant's cash balance account is increased by an annual cash balance contribution for participants with 750 hours of service, and interest credits in accordance with the terms of the amended Plan document. The annual cash balance contribution is determined by applying a rate based on age and years of service to the participant's annual compensation. Interest credits are equal to a percentage of the participant's cash balance account on the first day of the Plan year and are credited on the last day of the Plan year prior to payment of the annual cash balance contribution. Except for certain instances, the rate of interest used to determine the interest credit for a Plan year is 5%. Retiring or terminating employees have the option to receive a lump-sum payment, annuity, or transfer to another qualified plan in accordance with the terms of the amended Plan document.

MMC's funding policy is to contribute amounts to fund current service cost and to fund over 30 years the estimated accrued benefit cost arising from qualifying service prior to the establishment of the Plan. The assets of the Plan are held in trust and are invested in a diversified portfolio that includes temporary cash investments, marketable equity securities, mutual funds, U.S. Treasury notes, corporate bonds and notes, hedge funds, and other funds.

*(b) **Defined Benefit Postretirement Medical Plan***

As of May 1, 2015, MMC retirees who were enrolled in the Over 65 Retiree Group Companion Plan have transitioned to supplemental retiree health insurance options offered through a private Medicare Exchange engaged by MMC and the Companion Plan was curtailed. Transitioned retirees, certain future retirees who are all currently age 65 or older, and their spouses, are each eligible for a $1,100 employer contribution to a Health Reimbursement Account (HRA) if they meet the same eligibility requirements outlined above. All other MMC retirees who become Medicare eligible are also eligible to obtain supplemental coverage through the private Medicare Exchange but are not eligible for the employer contribution to the HRA.

Effective January 1, 2016 under age 65 retirees no longer have the option to enroll in the Under 65 Retiree Medical Plan. Retirees enrolled in the plan on or before December 31, 2015 will be grandfathered until such time as they age into Medicare coverage at age 65. Grandfathered retirees will continue to pay 100% of the cost (with the exception of those retirees enrolled as a result of the Voluntary Early Retirement Window in 2013. These retirees by a special agreement pay the active employee rate for either three years or until they turn 65 whichever is sooner).

The activity in the plan and postretirement medical plan using valuation dates of September 30, 2016 and 2015, consists of the following (in thousands):

| | Defined benefit pension plan | | Postretirement medical plan | |
|---|---|---|---|---|
| | 2016 | 2015 | 2016 | 2015 |
| Net periodic benefit cost: | | | | |
| Service cost | $ 29,497 | 29,464 | — | 8 |
| Interest cost | 34,209 | 30,575 | 297 | 355 |
| Expected return on plan assets | (45,154) | (41,188) | — | — |
| Amortization of: | | | | |
| Actuarial loss | 20,395 | 19,329 | 103 | 150 |
| Prior service credit | (1,462) | (1,462) | (193) | (141) |
| Net periodic benefit cost | $ 37,485 | 36,718 | 207 | 372 |
| Change in benefit obligation: | | | | |
| Benefit obligation – beginning of year | $ 728,957 | 679,903 | 6,525 | 9,700 |
| Service cost | 29,498 | 29,464 | — | 8 |
| Interest cost | 34,209 | 30,575 | 297 | 355 |
| Plan amendment | — | — | — | (2,457) |
| Actuarial loss (gain) | 111,198 | 17,729 | (475) | (392) |
| Benefits paid | (48,413) | (26,576) | (534) | (689) |
| Expenses paid | (4,685) | (2,138) | — | — |
| Benefit obligation – end of year | $ 850,764 | 728,957 | 5,813 | 6,525 |
| Change in plan assets: | | | | |
| Net assets of plan – beginning of year | $ 497,072 | 521,265 | — | — |
| Actual return on plan assets | 50,392 | (32,479) | — | — |
| Employer contribution | 40,000 | 37,000 | 534 | 689 |
| Benefits paid | (48,413) | (26,576) | (534) | (689) |
| Expenses paid | (4,685) | (2,138) | — | — |
| Net assets of plan – end of year | 534,366 | 497,072 | — | — |
| Net amount recognized | $ (316,398) | (231,885) | (5,813) | (6,525) |

The accumulated benefit obligation for the defined benefit pension plan was $813,728,000 and $694,984,000 for the years ended September 30, 2016 and 2015.

Unrestricted net assets at September 30, 2016 and 2015, include unrecognized losses of $407,859,000 and $322,294,000, respectively, related to the Plans. Of this amount, $30,279,000 is expected to be recognized in net periodic pension cost in 2017. The loss in 2016 was due to the significant drop in the long-term interest rates underlying the discount rate. The loss in 2015 was due to the change in the mortality table and investment performance.

The assumptions of the Plan as of September 30, 2016 and 2015 are as follows:

| | 2016 | 2015 |
|---|---|---|
| Measurement date | September 30 | September 30 |
| Census date | January 1 | January 1 |
| Used to determine net periodic pension cost: | | |
| Discount rate | 4.82% | 4.61% |
| Rate of compensation increase | 3.00 | 3.00 |
| Expected long-term rate of return on plan assets | 8.00 | 8.00 |
| Used to determine benefit obligation: | | |
| Discount rate | 3.79 | 4.82 |
| Rate of compensation increase for 2015 and 2016 | 3.00 | 2.75 |
| Rate of compensation increase for 2017 and after | 3.00 | 3.00 |

The expected long-term rate of return on plan assets for the Plan reflects MMC's estimate of future investment returns (expressed as an annual percentage) taking into account the allocation of plan assets among different investment classes and long-term expectations of future returns on each class.

The targeted allocation for the Plan investments are: debt securities – 30.0%, U.S. equity securities – 22.5%, international equity securities – 17.5%, emerging market equity securities – 5.0%, natural resources – 10.0%, and alternative investments – 15.0%. The Plan's investments as of September 30, 2016 and 2015, are disclosed in note 7.

The Plan's overall financial objective is to provide sufficient assets to satisfy the retirement benefit requirements of the Plan's participants. This objective is to be met through a combination of contributions to the Plan and investment returns. The long-term investment objective for the Plan is to attain a total return (net of investment management fees) of at least 5% per year in excess of the rate of inflation measured by the Consumer Price Index. The nature and duration of benefit obligations, along with assumptions concerning asset class returns and return correlations, are considered when determining an appropriate asset allocation to achieve the investment objectives.

Investment policies and strategies governing the assets of the Plan are designed to achieve the financial objectives within prudent risk parameters. Risk management practices include the use of external investment managers, the maintenance of a portfolio diversified by asset class, investment approach, and security holdings, and the maintenance of sufficient liquidity to meet benefit obligations as they come due.

The medical inflation assumption used for measurement purposes in the per capita cost of covered health care benefits for the Postretirement Medical Plan was 6.5% and 7% annual rate of increase respectively, for the years ended September 30, 2016 and 2015. This rate was assumed to gradually decrease to 5.0% by 2019 and remain at that level thereafter. A 1% increase in the medical inflation rate would cause an approximately $1,000 increase in the benefit obligation, whereas a 1% reduction would cause a $1,000 reduction in the benefit obligation.

The weighted average discount rates used in determining the accumulated postretirement medical benefit obligation were 3.79% and 4.82% for the years ended September 30, 2016 and 2015, respectively. The weighted average discount rates used in determining the net periodic postretirement medical benefit cost were 4.82% for the fiscal year ended September 30, 2016 and 4.61% and 4.28% for fiscal year ended September 2015. As the postretirement medical plan is unfunded, no assumption was required as to the long-term rate of return on assets.

Future benefits are expected to be paid as follows at September 30, 2016 (in thousands):

| | Defined benefit pension plan | Postretirement medical plan (net of retiree contributions) |
|---|---|---|
| Years ending September 30: | | |
| 2017 | $ 44,443 | 634 |
| 2018 | 46,347 | 575 |
| 2019 | 50,436 | 541 |
| 2020 | 55,227 | 512 |
| 2021 | 57,417 | 488 |
| 2022–2026 | 315,231 | 2,048 |

The estimated expected contribution to be made during 2017 is $40,000,000.

### *(c) Defined Contribution Pension Plans*

MaineHealth subsidiaries sponsor various defined contribution plans, which benefit substantially all of their employees. Amounts expensed under these plans were approximately $18,425,000 and $19,104,000 in 2016 and 2015, respectively.

### *(d) Nonqualified Deferred Compensation Plan*

MaineHealth offers a 457(b) nonqualified deferred compensation plan to certain eligible employees. Eligible employees may elect up to the maximum dollar amount as defined by section 402(g) of the Internal Revenue Service code. The plan is funded solely by employee contributions that are invested in various marketable securities at the direction of the employees. These investments are classified as Level 1 investments which are valued using quoted prices for active markets of identical assets. The assets of the plan are the legal assets of MaineHealth until they are distributed to participants, and therefore the plan assets and corresponding liability are reported in the accompanying consolidated balance sheet.

## (14) Net Assets

### *(a) Temporarily Restricted Net Assets*

Temporarily restricted net assets are restricted primarily for health care services at September 30, 2016 and 2015, and consist of the following (in thousands):

| | | 2016 | 2015 |
|---|---|---|---|
| Donor-restricted specific purpose funds | $ | 15,903 | 15,056 |
| Accumulated appreciation on permanently restricted net assets | | 69,949 | 72,138 |
| Plant replacement funds | | 957 | 1,293 |
| Pooled life and charitable remainder trusts | | 3,430 | 3,326 |
| | $ | 90,239 | 91,813 |

### *(b) Permanently Restricted Net Assets*

Permanently restricted net assets at September 30, 2016 and 2015, consist of investments to be held in perpetuity, the income from which is expendable primarily to support the care of patients (in thousands):

| | | 2016 | 2015 |
|---|---|---|---|
| Endowment funds | $ | 39,253 | 38,904 |
| Beneficial interests in perpetual trusts | | 38,914 | 37,669 |
| | $ | 78,167 | 76,573 |

### *(c) Endowment Funds*

MaineHealth's endowment consists of funds established for a variety of purposes. For the purposes of this disclosure, endowment funds include donor-restricted endowment funds. As required by GAAP, net assets associated with endowment funds are classified and reported based on the existence or absence of donor-imposed restrictions.

### *(d) Interpretation of Relevant Law*

MaineHealth has interpreted state law as requiring realized and unrealized gains on permanently restricted net assets to be retained in a temporarily restricted net asset classification until appropriated by the Board and expended. State law allows the Board to appropriate so much of the net appreciation of permanently restricted net assets as is prudent considering MaineHealth's long-and short-term needs, present and anticipated financial requirements, and expected total return on its investments, price level trends, and general economic conditions. The amount of net appreciation of permanently restricted net assets appropriated in 2016 and 2015 was $6,185,000 and $6,325,000, respectively.

As a result of this interpretation, MaineHealth classifies as permanently restricted net assets (a) the original value of the gifts donated to the permanent endowment when explicit donor stipulations

requiring permanent maintenance of the historical fair value are present and (b) the original value of the subsequent gifts to the permanent endowment when explicit donor stipulations requiring permanent maintenance of the historical fair value are present. The remaining portion of the donor-restricted endowment fund composed of accumulated gains not required to be maintained in perpetuity is classified as temporarily restricted net assets until those amounts are appropriated for expenditure in a manner consistent with the donor's stipulations. MaineHealth considers the following factors in making a determination to appropriate or accumulate donor-restricted endowment funds: duration and preservation of fund, purposes of the donor-restricted endowment funds, general economic conditions, the possible effect of inflation and deflation, the expected total return from income and the appreciation of investments, other resources of MaineHealth, and the investment policies of MaineHealth.

***(e) Endowment Investment Return Objectives***

MaineHealth has adopted investment policies for endowment assets that attempt to provide a predictable stream of funding to the programs supported by its endowment while seeking to maintain the purchasing power of the endowment assets. Endowment assets include those assets of donor-restricted funds that the organization must hold in perpetuity or for a donor-specified period(s) as well as board-designated funds. Under this policy, the endowment assets are invested in a manner to attain a total return (net of investment management fees) of at least 5.0% per year in excess of inflation, measured by the Consumer Price Index. To satisfy its long-term rate of return objectives, MaineHealth targets a diversified asset allocation that places a greater emphasis on equity-based investments within prudent risk constraints.

*(f) Endowment Net Asset Composition*

The following is a summary of the endowment net asset composition by type of fund at September 30, 2016 and 2015, and the changes therein for the years then ended (in thousands):

| | Temporarily restricted | Permanently restricted | Total |
|---|---|---|---|
| Endowment net assets – September 30, 2014 | $ 85,252 | 36,593 | 121,845 |
| Net investment depreciation | (8,620) | (35) | (8,655) |
| Gifts, donations, and other | 302 | 1,390 | 1,692 |
| Appropriation of endowment assets for expenditure | (6,325) | — | (6,325) |
| Endowments of acquired affiliates | 1,529 | 956 | 2,485 |
| | 72,138 | 38,904 | 111,042 |
| Endowment net assets – September 30, 2015 | | | |
| Net investment appreciation | 4,080 | 7 | 4,087 |
| Gifts, donations, and other | (84) | 342 | 258 |
| Appropriation of endowment assets for expenditure | (6,185) | — | (6,185) |
| Endowment net assets – September 30, 2016 | $ 69,949 | 39,253 | 109,202 |

*(g) Funds with Deficiencies*

From time to time, the fair value of assets associated with individual donor-restricted endowment funds may fall below the level that the donor requires MaineHealth to retain as a fund of perpetual duration. There were no significant deficiencies of this nature as of September 30, 2016 or 2015.

**(15) Concentration of Credit Risk**

Financial instruments, which potentially subject MaineHealth to concentration of credit risk, consist of patient accounts receivable, estimated amounts receivable under reimbursement regulations, and certain investments. Investments, which include government and agency securities, stocks, and corporate bonds, are not concentrated in any corporation or industry. MaineHealth grants credit without collateral to its patient's,

most of who are insured under third-party payor agreements. The mix of receivables from patients and third-party payors at September 30, 2016 and 2015, was as follows:

| | 2016 | 2015 |
|---|---|---|
| Medicare | 34% | 31% |
| State Medicaid Programs | 11 | 11 |
| Anthem Blue Cross and Blue Shield | 7 | 9 |
| Other third-party payors | 24 | 25 |
| Patients | 24 | 24 |
| | 100% | 100% |

## (16) Operating Leases

MaineHealth leases equipment and office space under various noncancelable operating leases. Future minimum payments due under noncancelable operating leases with a term of one year or more as of September 30, 2016, are as follows (in thousands):

| | |
|---|---|
| Years ending September 30: | |
| 2017 | $ 12,604 |
| 2018 | 10,619 |
| 2019 | 9,630 |
| 2020 | 8,228 |
| 2021 | 4,164 |
| Thereafter | 10,407 |
| | $ 55,652 |

Rent expense under operating leases amounted to approximately $15,074,000 in 2016 and $13,357,000 in 2015.

## (17) Functional Expenses

MaineHealth provides health care services through its acute care, specialty care, and ambulatory care facilities. Expenses relating to providing these services for the years ended September 30, 2016 and 2015, are as follows (in thousands):

| | 2016 | 2015 |
|---|---|---|
| Professional care of patients | $ 1,369,186 | 1,255,136 |
| Dietary | 23,849 | 23,335 |
| Household and property | 82,846 | 88,398 |
| Administrative and general services | 467,845 | 435,474 |
| Research | 20,492 | 17,015 |
| State taxes | 36,775 | 37,188 |
| Interest | 16,164 | 14,661 |
| Depreciation and amortization | 122,504 | 115,352 |
| | $ 2,139,661 | 1,986,559 |

## (18) Contingencies

MaineHealth is subject to complaints, claims, and litigation, which have risen in the normal course of business. In addition, MaineHealth is subject to compliance with laws and regulations of various governmental agencies. Recently, governmental review of compliance with these laws and regulations has increased resulting in fines and penalties for noncompliance by individual health care providers. Compliance with these laws and regulations is subject to future government review, interpretation, or actions, which are unknown and un-asserted at this time.

## (19) Subsequent Events

MaineHealth has evaluated subsequent events through February 7, 2017, which is the date the consolidated financial statements were issued.

In February, 2017 MaineHealth additional funding for the implementation of the Shared electronic Medical Record (SeHR) Project will be acquired by MaineHealth through loan agreements that provide borrowings of up to a combined $61,000,000 under both tax-exempt interest and taxable interest debt instruments. MaineHealth will issue a tax exempt revenue bond through the Finance Authority of Maine (FAME) and will enter into a bond purchase agreement for the direct placement of these bonds with a bank. MaineHealth will also enter into a term loan with a bank to be drawn upon in support of the SeHR Project. Repayment of the debt will be the responsibility of MaineHealth and certain system members under a specific system funding agreement called the SeHR Loan II System Funding Agreement (SFA). The SFA outlines the requirements of the participation of MaineHealth and each of the MaineHealth members that are participating in the SFA. Participating members in the SFA are Maine Medical Center, Southern Maine Health Care, Coastal Healthcare Alliance, Franklin Community Health Network, LincolnHealth Group, Western Maine Health Care, The Memorial Hospital, MaineHealth care at Home and NorDx.

# SUPPLEMENTARY INFORMATION

**MAINEHEALTH AND SUBSIDIARIES**

Supplementary Schedule of Expenditures of Federal Awards

Year ended September 30, 2016

| Federal grantor/pass-through grantor | Program title | Federal CFDA number | Pass-through entity identification number | Passed through to subrecipients | 2016 expenditures |
|---|---|---|---|---|---|
| U.S. Department of Health and Human Services: | | | | | |
| Direct Awards | Maternal and Child Health Federal Consolidated Programs | 93.110 | | — | 183,849 |
| | Poison Center Support and Enhancement Grant Program | 93.253 | | — | 184,467 |
| Pass-through awards: | | | | | |
| State of New Hampshire | Hospital Preparedness Program | 93.074 | 05-95-90-902010-7545-102-500731 | — | 58,453 |
| State of Maine | Hospital Preparedness Program | 93.074 | CDC-16-438 | — | 113,876 |
| State of Maine | Hospital Preparedness Program | 93.074 | CDC-17-438 | — | 37,114 |
| | Subtotal CFDA Number 93.074 | | | — | 209,443 |
| City of Portland | Prevention of Disease, Disability and Death by Infectious Disease | 93.082 | CDC-15-1047 | — | 1,189 |
| City of Portland | Prevention of Disease, Disability and Death by Infectious Disease | 93.082 | CDC-16-1047 | — | 46,500 |
| | Subtotal CFDA Number 93.082 | | | — | 47,689 |
| State of Maine | State Public Health Approaches for Ensuring Quitline Capacity | 93.735 | CDC-15-1461 | — | (456) |
| State of Maine | State Public Health Approaches for Ensuring Quitline Capacity | 93.735 | CDC-16-1461 | — | 52,722 |
| State of Maine | State Public Health Approaches for Ensuring Quitline Capacity | 93.735 | CDC-17-1461 | — | 7,466 |
| | Subtotal CFDA Number 93.735 | | | — | 59,732 |
| State of Maine | Partnership for a Tobacco-Free Maine | 93.777 | CDC-17-085 | — | 25,889 |
| State of Maine | Partnership for a Tobacco-Free Maine | 93.778 | CDC-16-085 | — | 200,000 |
| Total Expenditures of Federal Awards | | | | $ — | 910,869 |

See accompanying independent auditors' report and notes to supplementary schedule of expenditures of federal awards.

**(1) Reporting Entity**

The accompanying Supplementary Schedule of Expenditures of Federal Awards (the Schedule) presents the activity of all federal award programs of MaineHealth, the parent entity, as described in note 1 to the basic consolidated financial statements. Federal expenditures of other MaineHealth subsidiaries are not included in the accompanying Supplementary Schedule of Expenditure of Federal Awards.

**(2) Summary of Significant Accounting Policies**

*Basis of Presentation*

The accompanying Schedule has been prepared using the accrual basis of accounting and in accordance Title 2 U.S. Code of Federal Regulations Part 200, *Uniform Administrative Requirements, Cost Principles, and Audit Requirements for Federal Awards*. The purpose of the Schedule is to present a summary of those activities of MaineHealth for the year ended September 30, 2016, which have been financed by the U.S. Government (federal awards). For purposes of the Schedule, federal awards include all federal assistance entered into directly between the federal government and MaineHealth and federal funds awarded to MaineHealth by a primary recipient. Because the Schedule presents only a selected portion of the activities of MaineHealth, it is not intended to and does not present the consolidated financial position, results of operation, changes in net assets, and cash flows of MaineHealth and its subsidiaries.

**(3) Summary of Facilities and Administrative Costs**

MaineHealth recovers facilities and administrative costs (indirect costs) associated with expenditures pursuant to arrangements with the federal government. During fiscal year 2016, MaineHealth was awarded a provisional rate of 17.9% for the period July 1, 2014 to September 30, 2016, based on modified total direct costs, for its research and development grant expenditures. MaineHealth has elected not to use the 10-percent de minimis indirect cost rate under the Uniform Guidance.

**(4) Subrecipient Awards**

MaineHealth did not pass through any Federal Awards to subrecipient organizations during the year ended September 30, 2016.

KPMG LLP
Two Financial Center
60 South Street
Boston, MA 02111

**Independent Auditors' Report on Internal Control over Financial Reporting and on Compliance and Other Matters Based on An Audit of Financial Statements Performed in Accordance with *Government Auditing Standards***

The Board of Trustees
MaineHealth:

We have audited the consolidated financial statements of MaineHealth and subsidiaries (MaineHealth), in accordance with the auditing standards generally accepted in the United States of America and the standards applicable to financial audits contained in *Government Auditing Standards* issued by the Comptroller General of the United States, which comprise the consolidated balance sheet as of September 30, 2016, and the related consolidated statements of operations, changes in net assets, and cash flows for the year then ended, and for the related notes to the consolidated financial statements, and have issued our report thereon dated February 7. 2017. Our report includes a reference to other auditors who audited the financial statements of Southern Maine Health Care; Pen Bay Healthcare; Lincoln Health Group, Inc.; Waldo County Healthcare, Inc.; Maine Behavioral Healthcare; Western Maine Health Care Corporation; HomeHealth – Visiting Nurses of Southern Maine; The Memorial Hospital at North Conway, NH; and Franklin Community Health Network (collectively, the Other Consolidated Subsidiaries), as described in our report on MaineHealth's consolidated financial statements. This report does not include the results of the other auditors' testing of internal control over financial reporting or compliance and other matters that are reported on separately by those auditors. The financial statements of Southern Maine Health Care; Pen Bay Healthcare; Lincoln Health Group, Inc.; Waldo County Healthcare, Inc.; Western Maine Health Care Corporation; HomeHealth – Visiting Nurses of Southern Maine; and The Memorial Hospital at North Conway, NH (collectively, the Other Consolidated Subsidiaries) were not audited in accordance with *Government Auditing Standards*.

*Internal Control over Financial Reporting*

In planning and performing our audit of the consolidated financial statements, we considered MaineHealth's internal control over financial reporting (internal control) to determine the audit procedures that are appropriate in the circumstances for the purpose of expressing our opinion on the consolidated financial statements, but not for the purpose of expressing an opinion of effectiveness of MaineHealth's internal control. Accordingly, we do not express an opinion on the effectiveness of MaineHealth's internal control.

A deficiency in internal control exists when the design or operation of a control does not allow management or employees, in the normal course of performing their assigned functions, to prevent, or detect and correct misstatements on a timely basis. A material weakness is a deficiency, or combination of deficiencies, in internal control, such that there is a reasonable possibility that a material misstatement of the entity's financial statements will not be prevented, or detected and corrected on a timely basis. A significant deficiency is a deficiency, or a combination of deficiencies, in internal control that is less severe than a material weakness, yet important enough to merit attention by those charged with governance.

KPMG

Our consideration of internal control over financial reporting was for the limited purpose described in the first paragraph of this section and was not designed to identify all deficiencies in internal control over financial reporting that might be material weaknesses or significant deficiencies. Given these limitations, during our audit we did not identify any deficiencies in internal control that we consider to be material weaknesses. However, material weaknesses may exist that have not been identified. We did identify a deficiency in internal control, described in the accompanying schedule of findings and questioned costs as Finding 2016-001 Information Technology that we consider to be a significant deficiency.

*Compliance and Other Matters*

As part of obtaining reasonable assurance about whether MaineHealth's consolidated financial statements are free of material misstatement, we performed tests of its compliance with certain provisions of laws, regulations, contracts, and grants agreements, noncompliance with which could have a direct and material effect on the determination of financial statement amounts. However, providing an opinion on compliance with those provisions was not an objective of our audit, and accordingly, we do not express such an opinion. The results of our tests disclosed no instances of noncompliance or other matters that are required to be reported under *Government Auditing Standards*.

*MaineHealth's Response to Findings*

MaineHealth's response to the findings identified in our audit is described in the accompanying schedule of findings and questioned costs. MaineHealth's response was not subjected to the auditing procedures applied in the audit of the consolidated financial statements and, accordingly, we express no opinion on the response.

*Purpose of This Report*

The purpose of this report is solely to describe the scope of our testing of material control and compliance and the results of that testing, and not to provide an opinion on the effectiveness of MaineHealth's internal control or on compliance. This report is an integral part of an audit performed in accordance with *Government Auditing Standards* in considering MaineHealth's internal control and compliance. Accordingly, this communication is not suitable for any other purpose.

KPMG LLP

Boston, Massachusetts
February 7, 2017

KPMG LLP
Two Financial Center
60 South Street
Boston, MA 02111

## Independent Auditors' Report on Compliance for Each Major Federal Program and Report on Internal Control over Compliance Required by Uniform Guidance

The Board of Trustees
MaineHealth:

### Report on Compliance for Each Major Federal Program

We have audited MaineHealth and subsidiaries' (MaineHealth) compliance with the types of compliance requirements described in the OMB Compliance Supplement that could have a direct and material effect on MaineHealth's major federal program for the year ended September 30, 2016. MaineHealth's major federal program is identified in the summary of auditors' results section of the accompanying schedule of findings and questioned costs.

MaineHealth's consolidated financial statements include the operations of Maine Medical Center, Maine Behavioral Healthcare, and Franklin Community Health Network which received $17,289,358 in federal awards which are not included in the supplementary schedule of expenditure of federal awards for the year ended September 30, 2016. Our audit, described below, did not include the operations of Maine Medical Center, Maine Behavioral Healthcare or Franklin Community Health Network because Maine Medical Center, Maine Behavioral Healthcare, and Franklin Community Health Network engaged other auditors to perform audits in accordance with Title 2 U.S. Code of Federal Regulations Part 2, *Uniform Guidance Administrative Requirements, Cost Principles, and Audit Requirements for Federal Awards* (Uniform Guidance).

*Management's Responsibility*

Management is responsible for compliance with the requirements of laws, regulations, contracts, and grants applicable to its federal programs.

*Auditor's Responsibility*

Our responsibility is to express an opinion on compliance for MaineHealth's major federal program based on our audit of the types of compliance requirements referred to above. We conducted our audit of compliance in accordance with auditing standards generally accepted in the United States of America; the standards applicable to financial audits contained in *Government Auditing Standards*, issued by the Comptroller General of the United States; and the Uniform Guidance. Those standards and the Uniform Guidance require that we plan and perform the audit to obtain reasonable assurance about whether noncompliance with the types of compliance requirements referred to above that could have a direct and material effect on a major federal program occurred. An audit includes examining, on a test basis, evidence about MaineHealth's compliance with those requirements and performing such other procedures as we considered necessary in the circumstances.

We believe that our audit provides a reasonable basis for our opinion on compliance for the major federal program. However, our audit does not provide a legal determination of MaineHealth's compliance.

*Opinion on Each Major Federal Program*

In our opinion, MaineHealth complied, in all material respects, with the types of compliance requirements referred to above that could have a direct and material effect on the major federal program for the year ended September 30, 2016.

KPMG

**Report on Internal Control over Compliance**

Management of MaineHealth is responsible for establishing and maintaining effective internal control over compliance with the types of compliance requirements referred to above. In planning and performing our audit of compliance, we considered MaineHealth's internal control over compliance with the types of requirements that could have a direct and material effect on its major federal program to determine the auditing procedures that are appropriate in the circumstances for the purpose of expressing an opinion on compliance for the major federal program and to test and report on internal control over compliance in accordance with the Uniform Guidance, but not for the purpose of expressing an opinion on the effectiveness of internal control over compliance. Accordingly, we do not express an opinion on the effectiveness of MaineHealth's internal control over compliance.

A deficiency in internal control over compliance exists when the design or operation of a control over compliance does not allow management or employees, in the normal course of performing their assigned functions, to prevent, or detect and correct, noncompliance with a type of compliance requirement of a federal program on a timely basis. A material weakness in internal control over compliance is a deficiency, or combination of deficiencies, in internal control over compliance, such that there is a reasonable possibility that material noncompliance with a type of compliance requirement of a federal program will not be prevented, or detected and corrected, on a timely basis. A significant deficiency in internal control over compliance is a deficiency, or a combination of deficiencies, in internal control over compliance with a type of compliance requirement of a federal program that is less severe than a material weakness in internal control over compliance, yet important enough to merit attention by those charged with governance.

Our consideration of internal control over compliance was for the limited purpose described in the first paragraph of this section and was not designed to identify all deficiencies in internal control over compliance that might be material weakness or significant deficiencies and therefore, material weaknesses and significant deficiencies may exist that were not identified. We did not identify any deficiencies in internal control over compliance that we consider to be material weaknesses.

The purpose of this report on internal control over compliance is solely to describe the scope of our testing of internal control over compliance and the results of that testing based on the requirements of Uniform Guidance. Accordingly, this report is not suitable for any other purpose.

KPMG LLP

Boston, Massachusetts
June 26, 2017

**(1) Summary of Auditors' Results**

*Consolidated Financial Statements*

Type of auditors' report issued on whether financial statements were prepared in accordance with U.S. GAAP: Unmodified

Internal control deficiencies over financial reporting disclosed by the audit of the financial statements:

- Material weakness(es) identified? _____ yes __X__ no

Significant deficiency(ies) identified not considered to be material weaknesses? __X__ yes _____ none reported

Noncompliance material to the financial statements noted? _____ yes __X__ no

*Federal Awards*

Internal control deficiencies over major programs:

- Material weakness(es) identified? _____ yes __X__ no
- Significant deficiency(ies) identified not considered to be material weaknesses? _____ yes __X__ none reported

Type of auditors' report issued on compliance for major programs: Unmodified

Any audit findings disclosed that are required to be reported in accordance with section 510(a) of The Uniform Guidance? _____ yes __X__ no

*Identification of Major Program*

| **Name of federal program or cluster** | **CFDA No.** |
|---|---|
| Hospital Preparedness Program | 93.074 |

Dollar threshold used to distinguish between type A and type B programs: $750,000

Auditee qualified as low-risk auditee? __X__ yes _____ no

**(2) Findings Relating to the Financial Statements Reported in Accordance with *Government Auditing Standards***

*2016-001 Information Technology*

During our 2016 audit, we identified certain deficiencies related to MaineHealth's information technology related controls to be a significant deficiency. The deficiencies relate to the following aspects of the information technology control environment:

- Segregation of duties related to change management for the Epic and Lawson applications
- Restoration testing related to the Epic and Lawson applications
- Logical access (access of connections to computer networks, system files and data) related to administrative access, user access reviews and terminations for the Epic and Lawson applications

Each of the identified deficiencies increases the risk that unauthorized access and/or changes may be made to MaineHealth's network and/or Epic and Lawson applications, thereby impacting the confidentiality, integrity and/or availability of the systems and the completeness and accuracy of financial data.

We recommend that management take steps to address the identified deficiencies and thereby decrease the risk that systems and the completeness and accuracy of financial data could be compromised.

*Management's Response*

While we concur that there are several deficiencies in these information technology controls and we are actively taking steps to rectify these deficiencies, it is important to note that the auditor's testing did not expose any failures in process that resulted in unapproved or unauthorized changes having been made to the systems of record or an inability to restore data from a system backup.

Management will:

- Evaluate add-on technologies to enhance our controls
- Convert each response into a comprehensive Information Systems corrective action plan
- Reallocate internal resources to implement these corrective actions

Closely monitor and report on compliance to these plans, including periodic updates on our progress to the MaineHealth Audit Committee.

**(3) Federal Award Findings and Questioned Costs**

None noted.

Board of Trustees

Officers

- **President:** Bill Caron, MaineHealth
- **Chair:** Susannah Swihart
- **Secretary:** Robert S. Frank, MaineHealth
- **Assistant Secretary:** Beth Kelsch, MaineHealth


Kathryn Barber

Kathy Barber has spent her career in medical/biotech industry sales and marketing. A Skidmore College and University of Chicago Graduate School of Business graduate, she worked for Abbott Laboratories in a management development program and at IDEXX Laboratories in Westbrook in marketing positions in the food safety, human diagnostics and veterinary medicine divisions.

Barber is a past board member of the Gulf of Maine Research Institute and Barber Foods. In 2007, she joined the board of trustees at Bangor Savings Bank and sits on the Human Resource, Audit and Governance Committees. She is also a board member for Piper Shores LLC a lifecare community in Scarborough, Maine as well as the Robotics Institute of Maine.


Gene Bergoffen

Gene Bergoffen is the immediate past chair of the Memorial Hospital Board of Trustees, and serves on its Executive and Governance Committees. He is also the Principal of MaineWay Services, performing research studies on truck safety for the Federal Motor Carrier Safety Association. He is an attorney, completing his degree at Georgetown University Law Center. Initially trained as a forester, with a BS in Forestry and MS in Public Administration, he has worked for the US Forest Service as Director of Legislative Affairs, and the National Forest Products Association.

Before relocating to Fryeburg, Maine, he was President and CEO of the National Private Truck Council, representing the nation's private truck fleet community. Active in community affairs, Bergoffen was chair of the Fryeburg Planning Board, and served on the board of the Tin Mountain Conservation Center in the Mount Washington Valley, and is now a member of the Eastern Slopes Airport Authority Board.

 Joseph M. Bujold

Joe Bujold has served on the Board of Franklin Memorial Hospital/Franklin Community Health Network since 2007, and has held his current role of board chairman there since 2009.

A native of Maine and a graduate of Middlebury College, Bujold has served in a number of professional leadership roles. He lived in Farmington for 11 years during the 60s and 70s at which time he served as president of Bass Shoe Co., then based in Wilton, Maine. He later joined an international consulting firm, Alexander Proudfoot, which works with major companies of the world to improve business processes and performance. For 18 years, Bujold ran various units of the company and was based in Brussels, Belgium; Sydney, Australia; and Singapore. He returned to the United States in 1989 to serve as chief executive officer of Alexander Proudfoot Company worldwide.

Bujold has also been an advisor and consultant to the law firm Holland & Knight and Dexter Shoe Company. He and his wife Lee reside in Farmington and are the parents of two grown children, Noelle and Marc.

ill Burke

Bill Burke is an experienced media executive who held various positions at Turner Broadcasting and Time Warner, including president of TBS Super Station and general manager of Turner Classic Movies. He also served as president and chief executive officer (CEO) of The Weather Channel Companies. Burke also co-authored Call Me Ted, the autobiography of Ted Turner. He is a graduate of Amherst College and received his MBA from the Harvard Business School. In addition to being current vice-chair of the Maine Medical Center board, Burke is chairman of the Portland Sea Dogs and the US Biathlon Association, a director of Simulmedia, Inc., and serves on the advisory board of Specific Media, Inc.

teven Dobieski, MD

Dr. Dobieski graduated from Bates College and received his MD from the University of Connecticut School of Medicine. He completed his residency training in internal medicine at Maine Medical Center and became board-certified in internal medicine. He joined the Greater Portland Medical Group and subsequently took a position at InterMed. Currently, he is a shareholder and full-time internist with InterMed. Dobieski is a member of the InterMed board and the Quality Improvement committee at InterMed. He also is a member of the InterMed Best Practices Work Group. He has been a long-standing member of the American College of Physicians and is an active member in the Maine chapter of the ACP.

 Greg Dufour

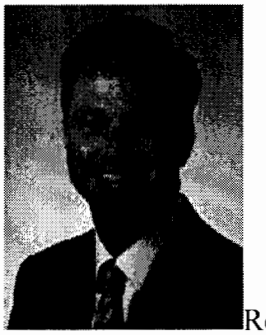
*Vice Chair*

Greg Dufour is president and CEO of Camden National Corporation, Maine's largest publicly traded community bank and the parent company of Camden National Bank and Acadia Trust, N.A. Dufour is also president and CEO of Camden National Bank, a $2.6 billion community bank headquartered in Camden, Maine and is chair of the board of directors of Acadia Trust, N.A., which is headquartered in Portland, Maine. Dufour was named to his current role in 2009 after serving as president and CEO of Camden National Bank since 2004. Prior to joining Camden National, Dufour was managing director of finance for IBEX Capital Markets in Boston, MA, a specialty investment advisor, and held several positions in the finance division at Fleet/Boston Financial Group. His community service includes serving as the current chair of the Maine Bankers Association, a member of the board of trustees and secretary of the board of Pen Bay Healthcare. He also is a member of the advisory board of Lie-Nielsen Toolworks. Dufour and his wife Doreen reside in Rockport, Maine.

 Emmons

Chris Emmons is the president and CEO of Gorham Savings Bank. He graduated from the University of Maine, Orono, and began his banking career at Maine National Bank in 1977. After stops at BayBank and TD Banknorth, he joined Gorham Savings Bank in 2003. He is a Board member of the Federal Deposit Insurance Corporation Advisory Council on Community Banking.

A strong community supporter, Emmons is involved with the Maine Bankers Association and a number of local non-profit organizations. He is a trustee of MaineHealth (past vice chair) and Maine Medical Center. He is also a board member of Educate Maine, the University of Maine Board of Visitors, and the Alfond Scholarship Foundation, and co-chair of the Maine Early Learning Investment Group. Emmons' 30+ years of service to United Way of Greater Portland began as a loaned executive in the late 1970s; he has served as past campaign chair and past board chair. Emmons was inducted into the Maine Business Hall of Fame in 2007.

 Robert S. Frank

*Secretary*

Robert Frank has served as deputy general counsel for MaineHealth since July 2009. In that capacity, he has provided legal advice in connection with strategic initiatives and acquisitions, competition laws compliance, payor contracting, data security and breach matters, risk management and insurance, federal and state healthcare provider licensing, and has overseen professional liability, regulatory and business litigation and dispute resolution matters. Prior to his work at MaineHealth, he was an associate at the Morrison & Forester law firm in San Francisco (1979-82); an assistant attorney general at the Maine Department of Attorney General (1982-1987); an associate and then partner in the law firm Verrill Dana (1987-1995), and a founding member and partner of Harvey & Frank (1995-2009). While in private law practice, he represented various hospitals, physician practices and health insurance carriers, the Maine Hospital Association, and on special assignment to the American Hospital Association in connection with the drafting of federal antitrust and health care guidelines. He also served as a visiting lecturer of antitrust law for three terms at The University of Maine Law School (1997-1990), and currently serves as a panel member on the Grievance Commission of the Maine Board of Overseers of the Bar.

Bob is a graduate of Emory University (B.A. Physics), and Yale Law School (J.D.). He is a member of the Midcoast Symphony Orchestra, and a past board member, treasurer and founder. He also served as treasurer and board member of the LARK Society for Chamber Music, and a board member of Young Peoples' Theater in Brunswick.


Bernard Gaines

Bernard Gaines has served on the board of trustees for Southern Maine Medical Center, and now Southern Maine Health Care (SMHC), since 2001. He has served as chairman of the board of trustees at SMMC/SMHC since 2011. He has also served previously on the MaineHealth board.

Gaines is a retired executive from Unum. He currently owns BSG Properties, LLC. He is married and living in Saco.

Gaines volunteers his time as a member of the SMHC Physician Services board of directors, the Thornton Academy Board of Directors, is a member of the Saco Lodge (Masons), the Order of the Eastern Star and the BPOE Elks.


George Hissong

George (Ted) Hissong serves on the Southern Maine Health Care (SMHC) Board of Trustees as vice chairman and is chairman of the SMHC Governance Committee. He is president and CEO of Stafford Systems, Inc. located in Kennebunk, Maine, a position he has held since 1988. Hissong has served as a trustee of the Kennebunk Light and Power District, two years as chair as well as a trustee of the Kennebunk Sewer District. He is currently a member of the Sanford Industrial Development Commission and serves on the board of Port Opera.

Hissong graduated with a Bachelor's of Science degree in physical chemistry from Heidelberg University, Tiffin, OH and attended graduate school at Purdue University, W. Lafayette, IN.

George Isaacson

George Isaacson, a graduate of Bowdoin College and the University of Pennsylvania Law School, is a senior partner in the law firm of Brann & Isaacson. He serves as General Counsel to L.L. Bean, Inc. and represents direct marketing companies throughout the United States. He has regularly been listed in "The Best Lawyers in America," a peer-selected referral guide. George is a Senior Lecturer on the Bowdoin College faculty, teaching courses on Constitutional Law and Comparative Constitutional Law. He is a member of the Board of Trustees of MaineHealth and its Strategic Planning Committee. He is also a member of the Board of Trustees of the Maine Public Broadcasting Network. He is a past President of the Bowdoin International Music Festival, and a former member of the governing boards of Maine Medical Center, Pine Tree Legal Assistance, Casinos No!, Livermore Falls Trust Company, Friends of Retarded, Inc., and Congregation Beth Abraham.

David James Kumaki, MD, FACP

David James Kumaki, MD, is an active member of the medical staff at Stephens Memorial Hospital specializing in Internal Medicine. He simultaneously served as chair of both the Stephens Memorial Physician Hospital Organization (PHO) and the Maine PHO. Kumaki is a physician leader on MaineHealth's Shared Health Record project (SeHR) and a member of the SeHR executive committee. He is also chief medical information officer for Western Maine

Health. Previously on the staff at New Hampshire's Androscoggin Valley Hospital, his experience extends well beyond New England. Kumaki is a long-time member of the Wilderness Medical Society and Nepal Studies Association. His experience includes several positions in Kathmandu, Nepal: staff physician for Canadian International Water and Energy Consultants' International Clinic; acting medical officer and consultant in Internal Medicine for the Peace Corps; and volunteer physician for the Himalayan Rescue Association. He also spent time in Greater Boston, first as an Intern and resident at Boston City Hospital, and later on the staff at East Boston Neighborhood Health Center, New England Baptist Hospital and Symmes Hospital.


Sandy Matheson

Sandy Matheson is the executive director of the Maine Public Employees Retirement System. She was previously the director of the Washington State Department of Retirement Systems. Matheson's career has been in management, healthcare and financial services. She served as the president and CEO of Hanford Environmental Health Foundation, the board chair of Kennewick General Hospital, consulted and acted as interim CEO for various organizations, and taught as an adjunct instructor for the Washington State University business program. Matheson has been involved with a broad range of civic and charitable activities and in 2003 was named the Tri-Citian of the Year in Washington State for her community service.

Matheson graduated with a bachelor's degree in Economics from Northwestern University and a MBA from Washington State University.


Michelson

Jere Michelson is Executive Vice President and Chief Financial Officer of Libra Foundation, with oversight responsibility for all financial aspects of the Foundation's interests.

Prior to joining Libra Foundation, Michelson was a member of the management group at the accounting firm of Baker Newman Noyes, LLC in Portland, where he consulted primarily on closely-held corporations and shareholders with multi-state operations in that firm's corporate tax department. In 2001, he left public accounting to join Libra Foundation in its pursuit for the betterment of Maine's citizenry.

Michelson is the vice chairman of the Maine Medical Center Board of Trustees and a member of the Executive Committee. He also sits on the Audit and Finance committees at MaineHealth. Through appointment from Sen. Susan Collins, Jere serves on the Military Service Academy Selection Committee.

He received his bachelor's degree in accounting from the University of Southern Maine in Portland and his master's degree in taxation from Thomas College in Waterville. Mr. Michelson serves on the boards of Pineland Farms Natural Meats, Inc., Pineland Farms Potato Company, Inc., and Gorham Savings Bank.

Thomas J. Ryan, Jr., MD, FACC

Thomas J. Ryan, Jr., MD, has served as medical director of the Cardiac Catheterization Laboratory at Maine Medical Center since 2003. Ryan's awards and honors include being twice elected One of the Best Doctors in America as well as Cardiology Teacher of the Year at MMC. He's a Fellow in the American College of Cardiology and The Society for Cardiac Angiography and Interventions. He sits on many committees, including the Northern New England Cardiovascular Disease Study Group. His research includes dozens of published works, and his academic appointments include Harvard Medical School and Vermont School of Medicine.

 Melissa Smith

Melissa Smith, the President and CEO of WEX, a global corporate payments company. A finance expert by training, Smith joined WEX in 1998 and played a pivotal role as WEX's chief financial officer, leading the company through a highly successful initial public offering and focusing on its growth as a public company. Her record of execution, continuous improvement, and increased responsibilities for WEX's business operations led to her appointment as president of the Americas, and ultimately as president and CEO of the entire company. As CEO, Smith has responsibility for the company's day-to-day global operations and its long-term strategic growth. She also serves as a WEX board member.

Smith is an active member of her community and was named The Girl Scouts of Maine's 2013 Woman of Distinction, and a Mainebiz 2012 Woman to Watch. Recognized as an industry leader, Melissa was named the PYMNTS.com 2014 Most Innovative Woman in Payments and a PaymentsSource 2014 Most Influential Woman in Payments. She serves on the Center for Grieving Children's Board of Directors and participates in the Executive Women's Forum, which she co-founded to provide a support network for female executives in her local community.

Melissa began her career at Ernst & Young and earned a bachelor's degree in business administration from the University of Maine.

 Susannah Swihart

*Chair*

Susannah Swihart spent two decades at BankBoston Corporation in a wide variety of leadership, operational, and strategic roles, including Vice Chairman and CFO. Previous responsibilities at BankBoston included management of a variety of corporate banking businesses, operations, and risk functions. During that period, Susannah was a member of the executive committee of the board of trustees of the Boys & Girls Clubs of Boston, ran BankBoston's $3+ million United Way campaign in 1998, and later chaired the $1 million Women's Leadership Breakfast for the United Way of Massachusetts Bay. Since returning to Maine in 2000, she has committed her efforts to a variety of corporate and community boards. In addition to MMC's Board of Trustees, Susannah serves on the boards of directors of the Dead River Company and MaineHealth and is the former board chair of Common Good Ventures and the Boys & Girls Clubs of Southern Maine. Susannah is a graduate of Harvard College and Harvard Business School.

# CURRICULUM VITAE
## Karen Simone, PharmD, DABAT, FAACT

**FULL NAME AND DEGREE/S**: Karen E. Simone, PharmD, DABAT, FAACT (formerly Karen S. Krummen)
**CURRENT ADMINISTRATIVE TITLE:** Director, Northern New England Poison Center
**OFFICE ADDRESS**: Northern New England Poison Center, 22 Bramhall Street, Portland, ME 04102
**OFFICE PHONE NUMBER:** (207) 662-7221
**E-MAIL ADDRESS:** simonk@mmc.org
**FAX ADDRESS:** (207) 662-5941

## EDUCATION

Undergraduate

| | | |
|---|---|---|
| *1992* | *Bachelor of Science in Pharmacy* | *University of Cincinnati* |

Medical School and/or Graduate School (for graduate degrees note field or discipline)

| | | |
|---|---|---|
| *1994* | *Doctor of Pharmacy* | *University of Cincinnati* |

## POSTDOCTORAL TRAINING

*Experiential*

## LICENSURE AND CERTIFICATION

*Pharmacy:*

| | |
|---|---|
| *1992 – present* | *Ohio* |
| *2000 – present* | *California* |
| *2001 – present* | *Maine* |

*Toxicology:*

*Diplomate of the American Board of Applied Toxicology*

| | |
|---|---|
| *1998 – present* | *National/International* |

*Specialist in Poison Information, Certified by American Association of Poison Control Centers*

| | |
|---|---|
| *1993 - 2000* | *National* |

*Preparedness:*

*Homeland Security Exercise and Evaluation Program (HSEEP), certified as trained by the Maine Emergency Management Agency*

| | |
|---|---|
| *2008* | *National* |

## ACADEMIC APPOINTMENTS

*2009 – present, Assistant Professor of Emergency Medicine, School of Medicine, Tufts University*
*2010 – 2013, Clinical Assistant Professor of Emergency Medicine, College of Osteopathic Medicine, University of New England*
*2000 – 2011, Assistant Professor of Emergency Medicine, College of Medicine, University of Vermont*
*1998 – 2000, Assistant Professor of Clinical Drug Information, College of Pharmacy, University of Cincinnati*

**HOSPITAL APPOINTMENTS**

*2000 – present, Director, Northern New England Poison Center, Maine Medical Center*
*1994 – 2000, Manager/Clinical Coordinator of Drug and Poison Information Services, Cincinnati Drug & Poison Information Center, Cincinnati Children's Hospital Medical Center*
*1992 – 1994, Senior Drug and Poison Information Specialist, Cincinnati Drug & Poison Information Center, University Hospital in Cincinnati*
*1989 – 1992, Drug and Poison Information Provider, Cincinnati Drug & Poison Information Center, University Hospital in Cincinnati*

**AWARDS AND HONORS**

*2012, Advocacy in Action Award, New Futures*
*2011, Designation as a Fellow of the American Academy of Clinical Toxicology*
*2009, Award on behalf of the Northern New England Poison Center for Collaboration, Quality Service and Contribution to the Knowledge in the Field, presented at the 2009 International Symposium on Pharmaceuticals in the Home and Environment*
*2008, Dr. John Snow Epidemiological Contribution Award, 2008, Maine Health and Human Services, Public Health Division of Infectious Disease*
*2008, Arkansas Traveler Award, State of Arkansas*
*1994, Student Fellowship Award, Cincinnati Drug and Poison Information*
*1991, AB, Dolly and Ralph Cohen Scholarship, University of Cincinnati*
*1991, Merck Sharp and Dohme Award, University of Cincinnati*
*1991, Procter & Gamble Research and Scholarly Activity Award, University of Cincinnati*
*1991, Plough Pharmacy Scholarship, University of Cincinnati*
*1991, Rho Chi Society, Beta Nu Chapter, University of Cincinnati*
*1990, David Uhlfelder Scholarship, University of Cincinnati*

**HOSPITAL, MEDICAL SCHOOL, OR UNIVERSITY COMMITTEE ASSIGNMENTS**:

*2014 – present: Chair of the Quality Excellence Committee for Maine Behavioral Healthcare*
*2013 – present: Member of the Board of Trustees for Spring Harbor Hospital (now a larger collaborative called Maine Behavioral Healthcare)*
*2006 – 2007: Maine Medical Center Pain Committee*
*2001 – 2005: Maine Injury Prevention Committee at Maine Medical Center*

**OTHER MAJOR COMMITEE ASSIGNMENTS**:

*2016 – present: Immediate Past-President, American Academy of Clinical Toxicology*
*2014 – 2016: President, American Academy of Clinical Toxicology*
*2012 – 2014: President-Elect, American Academy of Clinical Toxicology*
*2010 – present: Member of the New Hampshire Injury Prevention Advisory Council*
*2009 – present: Government Affairs Committee, renamed Government Relations Committee, American Association of Poison Control Centers*
*2008 – present: Strategic National Stockpile Advisory Group, State of Maine*
*2006 - present: Member of the Editorial Board, Clinical Toxicology, The Official Journal of the American Academy of Clinical Toxicology, European Association of Poisons Centres and Clinical Toxicologists, and American Association of Poison Control Centers*
*2006 - 2015: State of Maine Integrated Core Injury Prevention, Injury Community Planning Group*

*2003 – 2015: Community Epidemiology Surveillance Network, State of Maine*
*2012 – 2014: President-Elect, American Academy of Clinical Toxicology*
*2007 – 2013: Fatality Reviewer, American Association of Poison Control Centers*
*2008 – 2012: Secretary, American Academy of Clinical Toxicology*
*2008 – 2012: Mushroom Task Force, State of Maine*
*2006 – 2011: American Board of Applied Toxicology Web Ad Hoc Web Task Force*
*2004 – 2011: Secretary/Treasurer, American Board of Applied Toxicology (ABAT)*
*2004 – 2010: Benzodiazepine Study Group, Steering Committee*
*2008 – 2009: LD1991 Workgroup, Co-Chair, Options for Ongoing Funding for the Northern New England Poison Center mandated by that State of Maine Joint Standing Committee on Appropriations and Financial Affairs, reporting to the Joint Standing Committee on Health and Human Services*
*2007 – 2009: Co-Chair of the Managers' Committee, American Association of Poison Control Centers*
*2007 – 2008: Cumberland County Public Health Assessment Data Workgroup*
*2007 – 2008: Member of the Board of Trustees, American Academy of Clinical Toxicology*
*2007 – 2008: Safe Medicine for ME Advisory Committee*
*2006 – 2007: HRSA Poison Help/Widmeyer Campaign AAPCC Expanded Review Committee Managing Directors' Representative Professional Advisory Committee Member appointed by the American Association of Poison Control Centers*
*2003 – 2007: Secretary, New England Chapter of the National Association of Drug Diversion Investigators*
*2002 - 2004: American Association of Poison Control Centers Certified Specialists in Poison Information Exam Committee*
*2002 - 2003: Poison Data Book Consolidation Committee, Northeast United States*

## TRAINING OF GRADUATE STUDENTS/POST DOCTORAL

*2011 – present: Doctor of Pharmacy Clerkship for the University of New England College of Pharmacy in elective drug information and/or toxicology rotations*
*2010 – present: Toxicology and Poisoning for Maine Medical Center Medical Pharmacy Residents in elective toxicology rotations*
*2004 - present: Doctor of Pharmacy Clerkship for Creighton University, School of Pharmacy and Health Professions in elective drug information and/or toxicology rotations*
*2000 – present: Toxicology and Poisoning for Maine Medical Center Medical Students and Residents in elective toxicology rotations*
*2004 - 2011: Introduction to Toxicology and the Poison Center for Maine Medical Center Emergency Medicine Medical Students*
*1998 – 2000: Doctor of Pharmacy Drug Information Rotation for the University of Cincinnati College of Pharmacy*

## TEACHING RESPONSIBILITY

*July 20, 2016, Despite what you mother says, not all that is green and leafy is good for you . . . (plant and mushroom toxicity), Maine Medical Center Emergency Department, Toxicology Rounds, Portland, ME*
*April 5, 2016, Management of Psychotropic Drug Overdose, Psychiatry Resident Psychopharmacology Seminar, Maine Medical Center in Portland, ME*

*September 22, 2015, Toxicology – New Drugs, Pulmonary, Critical Care & Sleep Division Lecture Series, Tufts University School of Medicine in Boston, MA*

*September 18, 2015, Substance Abuse Trends in Maine, Psychobehavioral Conference, Maine Medical Center in Portland, ME*

*April 2, 2014, The Low-Down on Street Drugs in Maine, Social Worker Grand Rounds, Maine Medical Center in Portland, ME*

*April 10, 2012, Psychogenic Illness and Ticking Timebombs, Toxicology Rounds, Maine Medical Center in Portland, ME*

*March 4, 2014, Management of Psychotropic Drug Overdose, Psychiatry Resident Psychopharmacology Seminar, Maine Medical Center in Portland, ME*

*February 29, 2012, Introduction to Toxicology – Toxicokinetics, University of New England Medical Students, Pharmacology in Biddeford, ME*

*December 20, 2011, Bath Salts, Synthetic Cannabinoids (K2), Salvia divinorum and other natural/and not-so-natural highs, Psychiatry Rounds for Maine Medical Center in Portland, ME*

*December 14, 2011, Update on Significant Toxic Substances of Abuse in Maine – The Poison Center and Maine awash with Bath Salts, Grand Rounds for Mid Coast Hospital in Brunswick, ME*

*August 9, 2011, Opioids, Toxicology Rounds, Maine Medical Center in Portland, ME*

*April 28, 2011, Introduction to Toxicology – Toxicokinetics, University of New England Medical Students, Pharmacology in Biddeford, ME*

*November 9, 2010, Anion and Osmol Gaps, Iron and Isopropyl Alcohol – When you have more gaps than you think . . ., Toxicology Rounds, Maine Medical Center in Portland, ME*

*November 5, 2010, Aspirin, Toxic Alcohols, Sympathomimetics and Other Toxic Problems in the ICU, Fletcher Allen Health Care, Grand Rounds in Burlington, VT*

*November 5, 2010, Ethylene Glycol, Fletcher Allen Health Care, Medical Residents Morning Report in Burlington, VT*

*November 5, 2010, Aspirin and Other Dialyzable Toxins, Fletcher Allen Health Care, Lunch Conference with Nephrology and Pulmonary Residents, Fellows and Attendings in Burlington, VT*

*September 29, 2010, Substance Abuse, University of New England Medical Students, Psychiatry in Biddeford, ME*

*September 2, 2010, Substance Abuse and the Poison Center, presented to the Mercy Hospital Integrated Pain Management Group in Portland, ME*

*April 29, 2010, Introduction to Toxicology – Toxicokinetics, University of New England Medical Students, Pharmacology in Biddeford, ME*

*April 29, 2010, Drug Interactions, University of New England Medical Students, Pharmacology in Biddeford, ME*

*October 14, 2009, Substance Abuse, University of New England Medical Students, Psychiatry in Biddeford, ME*

*April 30, 2009, Introduction to Toxicology – Toxicokinetics, University of New England Medical Students, Pharmacology in Biddeford, ME*

*April 30, 2009, Drug Interactions, University of New England Medical Students, Pharmacology in Biddeford, ME*

*November 11, 2008, GI Decontamination: Evidence- and Theory-based or Magic, Maine Medical Center, Toxicology Rounds in Biddeford, ME*

*October 6, 2008, Substance Abuse, University of New England Medical Students, Psychiatry in Biddeford, ME*

*May 12, 2008, Introduction to Toxicology – Toxicokinetics, University of New England Medical Students, Pharmacology in Biddeford, ME*

*May 6, 2008, Drug Interactions, University of New England Medical Students, Pharmacology in Biddeford, ME*

*September 30, 2007, Substance Abuse, University of New England Medical Students, Psychiatry in Biddeford, ME*

*September 27, 2007, Paralytic Shellfish Poisoning – Case Series, Eastern Maine Medical Center, Clinical Pathological Conference in Bangor, ME*

*September 18, 2007, Grapes that Bite – Toxic Spider Bites, Maine Medical Center, Toxicology Rounds in Portland, ME*

*July 31, 2007, Topical Cantharides Leading to Toxic Toddler, Maine Medical Center, Pediatric Morning Rounds in Portland, ME*

*June 14, 2007, Decontamination, and Management of Tricyclic Antidepressants, and Calcium Channel and, Beta Blocker Overdoses, Eastern Maine Medical Center, Pediatric Rounds in Bangor, ME*

*May 15, 2007, Pesticides – Scabies can kill; you can't get away with killing your 4th wife, 5th wife and mother; if DEET can melt your sunglasses is it OK to put on your one year old, Maine Medical Center, Toxicology Rounds in Portland, ME*

*May 7, 2007, Introduction to Toxicology – Toxicokinetics, University of New England Medical Students, Pharmacology in Biddeford, ME*

*April 30, 2007, Drug Interactions, University of New England Medical Students, Pharmacology*

*April 6, 2006, Prescription Drug Abuse – In Your Backyard, University of New England Medical Students, Public Health Week on behalf of the Physicians for Social Responsibility in Biddeford, ME*

*April 6, 2006, Overview of Methamphetamine – Toxicological Concerns, University of New England Medical Students, Public Health Week on behalf of the Physicians for Social Responsibility in Biddeford, ME*

*March 16, 2006, Introduction to Toxicology – Toxicokinetics, University of New England Medical Students, Pharmacology in Biddeford, ME*

*September 30, 2005, Psychiatric Medications in Overdose, University of New England Medical Students, Psychiatry in Biddeford, ME*

*March 24, 2005, Introduction to Toxicology – Toxicokinetics, University of New England Medical Students, Pharmacology in Biddeford, ME*

*September 24, 2004, Substance Abuse, University of New England Medical Students, Psychiatry in Biddeford, ME*

*April 12, 2004, Introduction to Toxicology – Toxicokinetics, University of New England Medical Students, Pharmacology in Biddeford, ME*

*September 26, 2003, Substance Abuse, University of New England Medical Students, Psychiatry in Biddeford, ME*

*September 19, 2003, Kerosene Poisoning in Children, Maine Medical Center, Pediatric Morning Rounds in Portland, ME*

*April 12, 2003, Introduction to Toxicology – Toxicokinetics, University of New England Medical Students, Pharmacology in Biddeford, ME*

*May 21, 2003, Analgesics and Pain Relief, University of New England Medical Students, Pharmacology in Biddeford, ME*

*May 2, 2003, Methadone Poisoning in Children, Maine Medical Center, Pediatric Morning Rounds in Portland, ME*

*February 21, 2003, New Trends in Drug Abuse, Maine General Medical Center - Augusta, Grand Rounds*

*January 23, 2003, Unusual Acetaminophen Toxicity, Maine Medical Center, Pediatric Morning Rounds in Portland, ME*
*January 7, 2003, NMS/Serotonin Syndrome, Maine Medical Center, Psychiatry Grand Rounds in Portland, ME*
*December 17, 2002, Toxicology and the Lab, Maine Medical Center, Toxicology Rounds in Portland, ME*
*December 10, 2002, Herbal and OTC Medications, Maine Medical Center, Pediatric Grand Rounds in Portland, ME*
*October 2, 2002, Substance Abuse, University of New England Medical Students, Psychiatry in Biddeford, ME*
*April 26, 2002, Introduction to Toxicology – Toxicokinetics, University of New England Medical Students, Pharmacology*
*April 24, 2002, Introduction to Toxicology – Toxidromes, University of New England Medical Students, Pharmacology in Biddeford, ME*

## PROFESSIONAL SOCIETIES

*American Board of Applied Toxicology*
*American Association of Clinical Toxicologists*
*American Association of Poison Control Centers*

## OFFICE AND COMMITTEE ASSIGNMENTS IN PROFESSIONAL SOCIETIES

*2016 – present: Immediate Past-President, American Academy of Clinical Toxicology*
*2014 – 2016: President, American Academy of Clinical Toxicology 2012 – 2014, American Academy of Clinical Toxicology, President-Elect*
*2012 – 2014: President-Elect, American Academy of Clinical Toxicology*
*2008 – 2012, American Academy of Clinical Toxicology, Secretary*
*2004 – 2011, American Board of Applied Toxicology, Secretary/Treasurer*
*2007 – 2009, American Association of Poison Control Centers Co-Chair of the Managers' Committee*
*2007 – 2008, American Academy of Clinical Toxicology, Member of the Board of Trustees*
*2003 – 2007, New England Chapter of the National Association of Drug Diversion Investigators, Secretary*

## MAJOR RESEARCH INTERESTS

*Research interests are varied and include work in poisoning and toxicology, substance abuse, older adult medication concerns, public health, preparedness and surveillance. A current research and practice goal is to enhance data-sharing and utilization to improve community surveillance and public health through increasing interactions between local, county, state, regional and national partners. See research below for related funded projects in all areas.*

## GRANT/CONTRACT/RESEARCH SUPPORT

*Title: In-Market Safety Surveillance of Laundry Detergent using Poison Control Center Data*
*Funding Agency: Cincinnati Children's Hospital Medical Center through the Cincinnati Drug & Poison Information Center, sponsored by Procter & Gamble*
*Period: March 15, 2012 – present*
*Role: Site Coordinator (Principal Investigator at Site)*
*Title: Interpretation of Urine and other Substances of Abuse Monitoring to Support Clinicians*

*Managing Patients with Pain and Psychiatric Disorders receiving Prescription Drugs with Abuse Potential*
*Funding Agency: blinded*
*Period: April 1, 2010 – present*
*Role: Principal Investigator*

*Title: Northern New England Poison Prevention Project to Provide Quality Health Care Access to Hard-to-Reach Populations*
*Funding Agency: Department of Health and Human Services, Health Resources and Services Administration, Poison Control Stabilization and Enhancement Program*
*Period: September 1, 2009 – present*
*Role: Principal Investigator*

*Title: Maine Pharmaceutical Cache, Consulting, and 24/7 Phone Line*
*Funding Agency: State of Maine, Department of Health and Human Services*
*Period: August 10, 2008 – present*
*Role: Principal Investigator*

*Title: Poison Control Center: Assistance, Education and Surveillance Activities*
*Funding Agency: Vermont Department of Health*
*Period: September 1, 2004 – present*
*Role: Principal Investigator*

*Title: Poison Information Center Services*
*Funding Agency: State of New Hampshire, Department of Safety (initially) Department of Health and Human Services (currently)*
*Period: July 1, 2004 – present*
*Role: Principal Investigator*

*Title: Researched Abuse, Diversion and Addiction-Related Surveillance*
*Funding Agency: Denver Health and Hospital Authority*
*Period: November 3, 2002 – present*
*Role: Site Coordinator (Principal Investigator at Site)*

*Title: Northern New England Poison Center, Toxicology Consultation/Education Services*
*Funding Agency: State of Maine, Department of Health and Human Services*
*Period: July 1, 2000 – present*
*Role: Principal Investigator*

*Title: Social Marketing Enhancement using Social Media and Chat – Targeting the Computer-Savvy and Telephone-Averse*
*Funding Agency: Department of Health and Human Services, Health Resources and Services Administration, Poison Control Stabilization and Enhancement Program*
*Period: September 1, 2010 – August 31, 2012*
*Role: Principal Investigator*

*Title: After Hours On Call Telephone Service for the Maine Center for Disease Control and Prevention*
*Funding Agency: State of Maine, Department of Health and Human Services, Maine Center for Disease Control & Prevention/Public Health Systems*
*Period: July 1, 2008 – August 9, 2008*
*Role: Principal Investigator*

*Title: Grant to Enhance Access to and Financial Stability of the Northern New England Poison Center (NNEPC) Serving Maine (ME), New Hampshire (NH) and Vermont (VT)*
*Funding Agency: Department of Health and Human Services, Health Resources and Services Administration, Poison Control Stabilization and Enhancement Program*

*Period: September 1, 2007 – August 31, 2009*
*Role: Principal Investigator*

*Title: Real Time Disease Detection*
*Funding Agency: Vermont Department of Health, Division of Health Improvement*
*Period: January 2, 2007 – August 8, 2008*
*Role: Principal Investigator*

*Title: Maine Pharmaceutical Stockpile*
*Funding Agency: State of Maine, Department of Health and Human Services*
*Period: April 1, 2007 – August 31, 2008*
*Role: Principal Investigator*

*Title: Substance Abuse Sentinel Surveillance and Reporting System associated with Researched Abuse, Diversion and Addiction-Related Surveillance*
*Funding Agency: Denver Health and Hospital Authority*
*Period: July 1, 2005 – December 31, 2008*

*Title: Evaluation of the value of real-time poison center data sharing between the Northern New England Poison Center and the State Public Health Agencies in Maine, New Hampshire and Vermont*
*Funding Agency: Department of Health and Human Services, Health Resources and Services Administration, Poison Control Stabilization and Enhancement Program*
*Period: September 1, 2005 – 2007*
*Role: Principal Investigator*

*Title: Northern New England Poison Center, Toxicology Consultation/Education Services; After Hours Call Answering Service*
*Funding Agency: State of Maine, Department of Health and Human Services*
*Period: July 1, 2004 – June 30, 2008*
*Role: Principal Investigator*

*Title: Grant to Certify (initially) to Stabilize (later) the Northern New England Poison Center Serving Maine, New Hampshire and Vermont*
*Funding Agency: Department of Health and Human Services, Health Resources and Services Administration, Poison Control Stabilization and Enhancement Program*
*Period: September 1, 2004 – August 31, 2007*
*Role: Principal Investigator*

*Title: Northern New England Poison Center, Toxicology Consultation/Education Services; After Hours Call Answering Service; Maine Pharmaceutical Stockpile*
*Funding Agency: State of Maine, Department of Health and Human Services*
*Period: July 1, 2002 – June 30, 2004*
*Role: Principal Investigator*

*Title: Certification Grant to form a Northern New England Poison Center serving Maine and Vermont*
*Funding Agency: Department of Health and Human Services, Health Resources and Services Administration, Poison Control Stabilization and Enhancement Program*
*Period: September 1, 2001 – August 31, 2004*
*Role: Principal Investigator*

*Title: Rural Outreach and Poison Center Training Grant for Maine, Vermont and Northeastern New York*
*Funding Agency: Department of Health and Human Services, Health Resources and Services Administration, Poison Control Stabilization and Enhancement Program*
*Period: September 1, 2001 – August 31, 2003*
*Role: Principal Investigator*

## EDITORIAL BOARDS AND ACTIVITY

*2009 - present: Scientific Peer Reviewer, NIH Exploratory/Developmental Research Grant Award (R-21, R-49, U01), Centers for Disease Control and Prevention, National Center for Injury Prevention and Control*

*2006 - present: Member of the Editorial Board, Clinical Toxicology, The Official Journal of the American Academy of Clinical Toxicology, European Association of Poisons Centres and Clinical Toxicologists, and American Association of Poison Control Centers*

*2007 – 2013: Fatality Reviewer, American Association of Poison Control Centers*

## *BIBLIOGRAPHY


*a) Simone KE, "Thirty U.S. Poison Center reports Later, Greater demand, more difficult problems," Clinical Toxicology, 2014 52(2) 91-92.*

*DeGrasse A, Rivera V, Roach J, White K, Callahan J, Couture D, Simone K, Peredy T, Poli M. Paralytic shellfish toxins in clinical matrices: Extension of AOAC official method 2005.06 to human urine and serum and application to a 2007 case study in Maine. Deep Sea Research Part II: Topical Studies in Oceanography 2014;103:368-75.*

*Cavallo S, et al. Exposure to Nitrogen Dioxide in an Indoor Ice Arena – New Hampshire, 2011. Morbidity and Mortality Weekly Report 2012;61(8):139-142.*

*Gersheimer KF, Rea V. Mills DA, Montagna CP, Simone K. Arsenic poisoning caused by intentional contamination of coffee at a church gathering – and epidemiological approach to a forensic investigation. Journal of Forensic Sciences 2010;44(4):11116-9.*

*Simone KE, Spiller HA. Poison center surveillance data: the good, the bad and ... the flu. Clin Toxicol 2010;48(5):415-7.*

*Daubert GP, Spiller H, Crouch BI, Seifert S, Simone K, Smolinske S. Pulmonary toxicity following exposure to waterproofing grout sealer. Journal of Medical Toxicology: Official Journal of the American College of Medical Toxicology 2009;4(3):125-9.*

*Tomassoni AJ, Simone KE. Herbal medicines for children: an illusion of safety? Curr Opin Pediatr 2001;13(2):162-9.*

*Simone KE, Tomassoni AJ. Administration of oral n-acetylcysteine intravenously. The Journal of Pediatric Pharmacology and Therapeutics 2001;6(1): 72-8.*

*c) Simone KE. Cyproheptadine. In: Brent J, ed. Critical Care Toxicology, 2nd ed. Switzerland: Springer International Publishing, 2016:in press.*

*Simone KE. Medical Consequences of Over-the-Counter Drug Abuse. In: Brick J, ed. Handbook of the Medical Consequences of Alcohol and Drug Abuse. 2nd ed. Routlege, New York, NY: Haworth Press, 2008:491-526.*

d) *Simone, KE, Peredy T. Bath Salts and Tasers, the Northern New England Poison Center's Northern Exposures. 1/12.*

*Wiegand T, Simone, KE, Miller R, Heinen M, Kramer M. "Suboxone" for the Northern New England Poison Center's Northern Exposures. 1/12.*

*Dart RC, Simone KE. The Challenge of Chronic Pain Management, newsletter with continuing pharmacy education for New Mexico pharmacists sponsored by the New Mexico Pharmacists Association and SynerMed® Communications supported by an educational grant from PriCara, Unit of Ortho McNeil, Inc. 10/08.*

*Simone KE. Cyanokit® To treat or not to treat? That is the question . . . Journal of Maine EMS, April 2008:23.*

g) *Krummen, KE. Albuterol Overdose in Children: Characterization and Management, presented at the University of Cincinnati Pharmacy College to faculty and students, Cincinnati, OH, 6/1/94.*

h) *Wang GS, Simone KE, Palmer RB. Description of edible marijuana products, potency ranges, and similarities to mainstream foods. Clin Toxicol 2014;52:805 (abstract).*

*Schaeffer TH, Bond AG, Earnshaw ME, Simone KE. Methemogobinemia and Hemolysis in an Undiagnosed G6PD Patient After Receiving Pegloticase. Clin Toxicol 2015;53(7): 686 (abstract).*

*Wiegand TC, Simone KE. Suboxone Exposure; How Long is the Initially Symptomatic Child at risk for Sequallae after Naloxone Reversal? A Case Report and Literature Review. In press for Clin Toxicol, to be presented at the XXIX International Congress of the European Association of Poisons Centres and Clinical Toxicologists Meeting in Stockholm Sweden in May 2009(abstract).*

*Tomassoni A, Simone K. Lessons Learned from Response to a Covert Chemical Threat. Clin Toxicol 2004;42(5): 703(abstract).*

*Simone, KE, Clement, C, Tomassoni AT. Financial Savings Associated with Videoconference Technology. Clin Toxicol 2004;4(5): 702(abstract).*

*Tomassoni AT, Simone KE. Development and Use of a Decentralized Antidote Stockpile in a Rural State. Clin Toxicol 2004;4(5): 710(abstract).*

*Smith HW, Simone KE, Aziz W, Lambert DA, Greene KA, Hayman M, The Role of Clinical Pharmacists in Mass Arsenic Poisoning, Pharmacotherapy 2003;23(10)(abstract).*

*Simone ,KE, Bond GR. Detection of Unusual Abuse Patterns Using Broad Searching of the Toxic Exposure Surveillance System. Clin Toxicol 2002;40(5):657-8(abstract).*

*Simone, KE, Bond GR. Dextromethorphan: A Successful Example of Monitoring for Emerging Abuse Using the Toxic Exposure Surveillance System. Clin Toxicol 2002;40(5):653-4(abstract).*

*Kemmerer D, Simone KE, Tomassoni A. Non-Anion Gap Metabolic Acidosis Associated with Acute on Chronic Topiramate Overdose. Clin Toxicol 2002;40(5):691(abstract).*

*Simone KE, Bottei EM, Siegel ES, Tsipis GB. "Coricidin Abuse in Ohio Teens and Young Adults," Journal of Toxicology Clinical Toxicology 2000; 38(5):532(abstract).*

*Finke D, Roll D, Sunshein M, Simone KE. The Internet: Sometimes Helpful, Sometimes Not. Clin Toxicol 2000;38(5):564(abstract).*

*Krummen KE, Tsipis G, Siegel E, Bottei E. Accuracy of Drug Abuse Call Patterns in Predicting Prescription Drug Abuse. Clin Toxicol 1999;37(5):643(abstract).*

*Krummen KE, Nelson E, Tsipis G, Siegel E, Bottei E. Tramadol Abuse in the Cincinnati Area. Clin Toxicol 1999;37(5):647(abstract).*

*Krummen KE, Bottei E, Whiteman P. Sex on the Streets of Cincinnati. Clin Toxicol 1999;37(5):647 (abstract).*

*Prybys K, Krummen KE. Airway Edema Resulting from Nonionic Laundry Soap Powder. Clin Toxicol 1996;34(5):567(abstract).*

*Krummen KE, Tsipis G, Siegel E, Sigell L. Description of Questions about Herbal Products and Other Nutritional Supplements Posed of a Consumer Information Service. Clin Toxicol 1996;34(5):596(abstract).*

*Tsipis G, Krummen KE, Sigell L. Telephone Medication Information Service for Older Adults. Clin Toxicol 1996;34(5):632(abstract).*

*Krummen KE, Tsipis G, Siegel E. Herbal Highs: Natural is Not Necessarily Nice, presented as a poster session at the National Parents' Resource Institute for Drug Education (PRIDE) World Drug Conference, Cincinnati, OH, March 28-30, 1996.*

*Tsipis G, Sigell L, Krummen KE. HOPEline An Internet-Accessible Drug Abuse/Chemical Dependency Database, presented as a poster session at the National Parents' Resource Institute for Drug Education (PRIDE) World Drug Conference, Cincinnati, OH, March 28-30, 1996.*

*Sigell L, Krummen KE. A Unique Drug Abuse Prevention, Intervention and Crisis Management Service, presented as a poster session at the National Parents' Resource Institute for Drug Education (PRIDE) World Drug Conference, Cincinnati, OH, March 28-30, 1996.*

*i) August 3, 2016, Drug Management Issues, Assistant Secretary for Preparedness and Response Medical Countermeasures Dispensing Leveraging Best Practices and Enhancing Capabilities Regional Planning Summit, Providence, RI*

*May 26, 2016, Debate: Opioid Dependence Treatment: Should Substitution Therapy be the Management of Choice, XXXVI International Congress of the European Association of Poisons Centres and Clinical Toxicologists, Madrid, Spain*

*May 20, 2016, Substance Abuse Interventions – Responses of the Addicted; not always what we had planned, New Hampshire Dental Society Annual Meeting, Meredith, NH*

*April 6, 2016, Toxicology, Horizons 2016, Warwick, RI*

*February 7, 2016, Substance Abuse: Do we recognize what we are seeing in primary care?, 2016 Dartmouth CO-OP Project Annual Meeting, North Conway, NH*

*January 20, 2016, Substance Abuse Interventions – Responses from the Addicted, the Maine Medical Associations - Inside ME's Medicine Cabinet: What Prescription Monitoring Can Tell Us About Prescribers & Patients, Portland, ME*

*November 7, 2015, Substance Abuse Interventions – Responses of the Addicted; not always what we had planned, New Hampshire Medical Society Annual Scientific Conference, Portsmouth, NH*

*October 17, 2015, Synthetic Street Drugs and Sedation in the ICU, Exeter Hospital 3rd Annual Critical Care Conference, Exeter, NH*

*October 12, 2015, PEC: Drug Abuse Urinalysis Testing: Basic Introduction to Interpretation, North American Congress of Clinical Toxicology, San Francisco, CA*

*May 29, 2015, Debate: Should cannabis be legalized in terms of public health issues, XXXV International Congress of the European Association of Poisons Centres and Clinical Toxicologists, St. Julian's, Malta*

*April 3, 2014, Synthetic Street Drugs, Horizons 2014 Region 1 of the American*

*Association of Critical Care Nurses, Portland, ME*

*April 2, 2014, Opioid Poisoning and Poison Center Data, RX Drug Summit, The Killer Co-Pay: The REAL Cost of Rx Drug Misuse, Strafford County Rx Taskforce Annual Prescription Drug Summit, Wentworth Douglas Hospital, Dover, NH*

*March 19, 2014, Drugs of Abuse and Resources of the Poison Center, presented at the 40-hour Basic Drug Enforcement Training Program in Vassalboro, ME.*

*March 3, 2014, Update on Drugs of Abuse in northern New England, New England Organ Bank, Waltham, MA (by webinar)*

*November 21, 2014, Commonly Misused Drugs – What they are and what they Do, presented at the Shalom House in Portland, ME.*

*October 18, 2012, Commonly Misused Drugs – What they are and what they Do, presented at the Shalom House in Saco, ME.*

*July 25, 2012, New Trends in Drug Abuse, presented at the School Nurse Summer Institute at Bates College in Lewiston, ME.*

*July 19, 2012, Substance Abuse Trends and Interpretation of Urine Drug Screen Results, presented to medical staff at Spring Harbor Hospital in Westbrook, ME.*

*June 6, 2012, Substance Abuse and Poisoning – Same or Different, presented for pharmacy continuing education on behalf of the New Hampshire Board of Pharmacy at Frisbie Memorial Hospital in Rochester, NH.*

*March 21, 2012, Drugs of Abuse and Resources of the Poison Center, presented at the 40-hour Basic Drug Enforcement Training Program in Vassalboro, ME.*

*March 7, 2012, Education Standards – Why do we need them?, presented at the American Association of Poison Control Centers Mid Year Meeting in Saint Petersburg, FL.*

*May 15, 2011, Prescription Drug Abuse, presented at the American Academy of Pediatrics Adolescent Medicine Conference for the Maine Chapter, Vermont Chapter and District 1 in Bar Harbor, ME.*

*March 23, 2011, Drugs of Abuse and Resources of the Poison Center, presented at the 40-hour Basic Drug Enforcement Training Program in Vassalboro, ME.*

*December 9, 2010, K2, Salvia, Jagerbombs, Subies, Monster and other driving hazards – enhance your knowledge and increase you chances of detection, presented at the Drug Recognition Expert Training in Boise, ID.*

*November 9, 2010, Northern New England Poison Center Teen Poisonings – from RX Drugs to K2, Salvia and Monster, presented at the 2010 Maine Association for Health, Physical Education, Recreation and Dance Conference in Rockland, ME.*

*October 12, 2010, AACT Articles You May Have Missed, panel speaker at the 2010 North American Congress of Clinical Toxicology in Denver, CO.*

*March 18, 2010, Drugs of Abuse and Resources of the Poison Center, presented at the 40-hour Basic Drug Enforcement Training Program in Vassalboro, ME.*

*October 10, 2009, Saturday's Dean's Lecture - Using Simulated Patient Learning to Recognize and Manage Drug-to-Drug Interactions, presented with colleagues to University of New England College of Osteopathic Medicine's 25th Continuing Medical Education/Reunion Weekend to Alumni in Portland, ME.*

*September 23, 2009, Maine Attempts to Treat Pain and Addiction – is treatment part of the problem? Presented at the 2009 North American Congress of Clinical Toxicology as part of the American Association of Poison Control Centers symposium on Emerging Opportunities for Poison Center Data in San Antonio, TX.*

*August 8, 2009, Herbal and Over-the-Counter Medications: Highs, Enhancements and Misadventures" Presented at the Fifteenth Annual International Association*

*of Chiefs of Police Training Conference on Drugs, Alcohol & Impaired Driving "Dynamic, Revolutionary, Effective" in Little Rock, AR.*

*April 22, 2009, Maine Attempts to Treat Pain and Addiction – is treatment part of the problem? Presented at the Researched Abuse, Diversion, and Addiction-Related Surveillance (RADARS®) Third Annual Scientific Meeting: Risk Management of Scheduled Drugs – Where Are We Now? Where Are We Headed? in Bethesda, MD.*

*March 25, 2009, Sports Supplements - Red Bull, 5-hour ENERGY, Yellow Jackets, Stacker, Mini Thins, Creatine and Amino Acids - what's the harm? on behalf of the Knox County Community Health Coalition for Rockland High School in Rockland, Maine.*

*March 11, 2009, Alcohol and Drug Abuse – Real Teen Risk for Chevrus High School in Portland, ME.*

*February 4, 2009, Drugs of Abuse and Resources of the Poison Center for the Maine Criminal Justice Academy ME Basic Law Enforcement Training Program in Vasselboro, ME.*

*January 26, 2009, Poisoning and Antidotes: Update on Toxicity and Managements (new antidotes and new ways to use old antidotes) for the University of Rhode Island College of Pharmacy and Maine Society of Health-System Pharmacists Continuing Pharmacy Education Program in Bethel, ME.*

*December 9, 2008, Pharmaceuticals in water: sources, impact, interventions for the Maine Rural Water Association's Pharmaceuticals in our water and wastewater conference in Freeport, ME.*

*December 7, 2008, Substance Abuse and the Pharmacy - Are you the Neighborhood Drug Supplier? for the Massachusetts College of Pharmacy & Health Sciences' New Hampshire Pharmacists Association Continuing Education Program in Manchester, NH.*

*December 4, 2008, Methamphetamine, other Drugs of Abuse and Resources of the Poison Center for the Maine Drug Enforcement Agency Laboratory Enforcement Team Refresher Course in Bangor, ME.*

*December 3, 2008, Inhalant Abuse for the Mercy Medical Center Department of EMS Refresher Training Education in Holyoke, MA.*

*November 21, 2008, Alcohol, Inhalants, Over-the-Counter and Prescription Drug Abuse for the Penobscot Job Corps Academy in Bangor, ME.*

*November 20, 2008, Energy Drinks on behalf of the Knox County Community Health Coalition for the Thomaston School District in Thomaston, ME.*

*November 19, 2008, Toxicology and Substance Abuse Laboratory Results for the Maine Medical Center Social Work Department in Portland, ME.*

*November 11, 2008, Facilitator for the Benzodiazepine and other Prescription Drugs Symposium on Prescription Drug Trends for the 2008 International Symposium on Pharmaceutical in the Home and Environment: Catalysts for Change – Sixth Annual Maine Benzodiazepine Study Group Conference in South Portland, ME.*

*October 22, 2008, A Career in Poison Control for the Maine Explorer Program at Maine Medical Center in Portland, ME.*

*October 13, 2008, Defining the Problem: What the Data Tell Us for the 2008 Symposium on preventing prescription and over the counter drug poisoning in South Burlington, VT.*

*September 24, 2008, Carbon monoxide exposure during house fire – pediatric patient with large anion gap acidosis – need to treat for cyanide? for physicians and pharmacists at the New England Regional Toxicology Meeting in Hartford, CT.*

*October 11, 2008, Substance Abuse and Emergency Preparedness for the Maine Pharmaceutical Association 2008 Fall Conference in Rockport, ME.*

*September 18, 1008, Basic Disaster Life Support Program, classes on chemical, biological and psychological issues associated with mass casualties related to terror, pandemic or industrial release on behalf of the National Center for Emergency Medical Preparedness & Response at Texas A & M Health Science Center for the New England Pharmacists Convention in Uncasville, CT.*

*September 14, 2008, Moderator for Platform Session 1:Poison Center at the North American Congress of Clinical Toxicology in Toronto, Canada.*

*July 5, 2008, SASRS, a home-grown toxicological surveillance system for the Maine Medical Center Information Systems Department in Portland, ME.*

*June 19, 2008, Herbal Highs for the 2008 Arkansas Drug Recognition Expert Conference for the Criminal Justice Institute in Little Rock, AR.*

*June 4, 2008, Substance Abuse and the Laboratory, for counselors and a physician at the Spring Harbor Access Program in Portland, ME.*

*June 1, 2008, Substance Abuse in Northern New England – Poison Center Perspective" for the 10th Annual Pharmacy Services Collaborative CE Program by Lahey Clinic supported by the Hitchcock Foundation in Fairlee, VT.*

*May 21, 2008, Substance Abuse and the Laboratory" for counselors and a physician at the Spring Harbor Access Program in Portland, ME.*

*April 24, 2008, Adolescent Drug Use Trends for the 23rd Maine Schoolsite Health Promotion in Carrabassett Valley, ME.*

*March 19, 2008, Social Hosting – It's more than taking the keys discussion of alcohol and caffeine on behalf of the Knox County Community Health Coalition for the Camden Hills Regional High School in Camden, ME.*

*February 29, 2008, Dangerous Drugs in Teens for physicians, nurses and counselors at Goodall Hospital in Sanford, ME.*

*February 25, 2008, Buprenorphine - Discussion between treatment providers and national experts for the University of Vermont Substance Abuse Treatment Center in Burlington, VT.*

*October 31, 2007, Current Trends and Concerns Surrounding Benzodiazepine Poisoning for the Fifth Annual Benzodiazepine Study Group Conference in Portland, ME.*

*October 17, 2007, Chronic Pain, Addiction, and the Law teleconference series for New Mexico Pharmacists' continuing education sponsored by the New Mexico Pharmacists Association and SynerMed® Communications supported by an educational grant from PriCara, Unit of Ortho McNeil, Inc.*

*October 14, 2007, Substance Abuse and Emergency Preparedness - Just Another Day at the Poison Center for the Annual Meeting of the Maine Pharmacy Association.*

*October 12, 2007, Chronic Pain, Addiction, and the Law teleconference series for New Mexico Pharmacists' continuing education sponsored by the New Mexico Pharmacists Association and SynerMed® Communications supported by an educational grant from PriCara, Unit of Ortho McNeil, Inc.*

*September 25, 2007, New Substance Abuse Trends in Teens and Early 20s for physicians, nurses, counselors and others working in the University of Southern Maine Health Clinic in Portland, ME.*

*July 30, 2007, Poisonings, Scope of the Problem for health care professionals and lay people at the Prescription Drug Misuse – A Community Challenge Conference for the Maine Injury Prevention Group in Hallowell, ME.*

*July 11, 2007, Current Trends in Substance Abuse" for Spring Harbor Hospital for nurses, physicians, social workers and other care-givers in Westbrook, ME.*

*June 25, 2007, Facilitated Sexual Assault for a sexual assault training course for detectives and counselors in Ellsworth, ME.*

*May 17, 2006, Interpretation of Substance of Abuse Laboratory Results for the Family Support Program of the Social Work Department of Maine Medical Center in Portland, ME.*

*May 5, 2006, Medication Administration on behalf of Youth Alternatives to care givers of institutionalized youth in Portland, ME.*

*April 2, 2006, Adverse Effects – Concentration on Older Adults for the Annual Maine Pharmacy Association Spring Conference in South Portland, ME.*

*March 24, 2006, Drugs Commonly Diverted for the New England Chapter of the National Association of Drug Diversion Investigators Conference in Newport, RI.*

**October 2017**
**Tammi H. Schaeffer, DO, FACEP, FACMT, FAACT**
**Medical Director, Northern New England Poison Center**
**Director, Medical Toxicology**
**Attending Emergency Physician, Maine Medical Center**
**22 Bramhall St, Portland, ME 04102**
**Ph. (207) 662-7222**
**tschaeffer@mmc.org**

## EDUCATION

Undergraduate

1989, Mobile Intensive Care Paramedic, Union County College, Cranford, New Jersey

1991, BA, Psychology, Rutgers University, New Brunswick, New Jersey

Medical School

2001, DO, University of New England College of Osteopathic Medicine, Biddeford, Maine

## POSTDOCTORAL TRAINING

Internship and Residency

2001-2004, Emergency Medicine, Morristown Memorial Hospital, Atlantic Health System, Morristown, New Jersey

2003-2004, Chief Resident in Emergency Medicine, Morristown Memorial Hospital, Atlantic Health System, Morristown, New Jersey

Fellowship

2004-2006, Medical Toxicology, Rocky Mountain Poison and Drug Center, Denver Health, Denver, Colorado

## LICENSURE AND CERTIFICATION

| | |
|---|---|
| 2013-Present | Unrestricted Medical License, Maine |
| 2013-Present | Intermediate ICS-300 (Expanding Incidents) |

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|---|---|
| 2004-Present | Unrestricted Medical License, Colorado |
| 2005-Present | American Board of Emergency Medicine<br>Board Certified in Emergency Medicine |
| 2006-Present | American Board of Emergency Medicine<br>Board Certified in Medical Toxicology |
| 1981-Present | Basic Life Support |
| 1988-Present | Advanced Life Support |
| 1988-Present | Pediatric Advanced Life Support |

## ACADEMIC APPOINTMENTS

Associate Professor, Department of Emergency Medicine, Tufts University School of Medicine, Boston, Massachusetts, 2013-Present

Assistant Clinical Professor, Department of Emergency Medicine, University of Colorado School of Medicine, Aurora, Colorado, 2006-2013

Assistant Clinical Professor, Department of Primary Care, Rocky Vista University College of Osteopathic Medicine, Parker, Colorado, 2008-2013

Clinical Instructor, Department of Emergency Medicine, University of Colorado School of Medicine, Aurora, Colorado, 2004-2006

## HOSPITAL APPOINTMENTS

Attending Physician, Maine Medical Center, Department of Emergency Medicine, Portland, Maine, 2013-Current

Attending Physician, Denver Health and Hospital Authority, Department of Medical Toxicology, Denver, Colorado, 2006-2013

Attending Physician, University of Colorado Hospital, Department of Emergency Medicine-Medical Toxicology, Aurora, Colorado, 2006-2013

Attending Physician, Littleton Adventist Hospital, Departments of Emergency Medicine and Medical Toxicology, Littleton, Colorado, 2004-2013

Attending Physician, Porter Adventist Hospital, Departments of Emergency

Medicine and Medical Toxicology, Denver, Colorado, 2004-2013

Attending Physician, Swedish Medical Center, Department of Medical Toxicology Englewood, Colorado, 2006-2013

Attending Physician, Children's Hospital of Colorado, Department of Medical Toxicology Aurora, Colorado, 2007-2010

Attending Physician, Sky Ridge Medical Center, Department of Medical Toxicology Lone Tree, Colorado, 2007-2009

## AWARDS AND HONORS

Fellow, American Academy of Clinical Toxicology, October 2017

Fellow, American College of Medical Toxicology, October 2012

"Physician of the Month" Littleton Adventist Hospital, June 2012

Fellow, American College of Emergency Physicians, January 2012

Centura Health Physician Leadership Program Daniels College of Business, University of Denver, Denver, Colorado, February 2011

Air Force Challenge Coin Recipient, Colonel Shawn Varney, USAF, June 2009

Star Award (Outstanding Service), Rocky Mountain Poison and Drug Center, Denver Health, January 2006, August 2008, December 2009

Best Resident Presentation, "Comparing the Effectiveness of Diphenhydramine and Glycopyrrolate to Atropine in Treating Organophosphate Poisoning", Atlantic Health Systems (NJ) Annual Research Day-Morristown Memorial Hospital, June 2004

Who's Who in American Colleges and Universities, June 2001

Sigma Sigma Phi, University of New England College of Osteopathic Medicine, 1998

Best Presentation, "Excessive Fluid Administration During Prehospital Intravenous
Administration", Morristown Memorial Hospital (NJ) Annual Research Day, June 1997

Paramedic Team Excellence Award - New Jersey MICU Program Administrators Association, May 1995

Class "D" Award - UMDNJ University Hospital, Emergency Medical Services, 1990

## HOSPITAL. MEDICAL SCHOOL OR UNIVERSITY COMMITTEE ASSIGNMENTS

Member, ED Service Line Leadership Council, Maine Medical Center, Portland, Maine February 2017-Present

Member, Nurse-Physician Emergency Department Collaboration Council, Maine Medical Center, Portland, Maine, December 2016-Present

Member, Clinical Promotions and Appointments Subcommittee. Tufts University School of Medicine, July 2016

Member, MaineHealth Opioid Prescribing Workgroup, MaineHealth, Portland, Maine, April 2016-Present

Member, Sub-Group, Clinical Pathway, In-Patient Opioid Substance Use Disorder Work Group, Maine Medical Center, Portland, Maine, December 2015-Present

Member, In-Patient Opioid Substance Use Disorder Work Group, Maine Medical Center, Portland, Maine, December 2015-Present

Member, Medical Education Outcomes Research Group, Maine Medical Center, Portland, Maine, March 2015-Present

Member, Continuing Medical Education Advisory Committee, Maine Medical Center, Portland, Maine, March 2015-Present

Member, Hospital Incident Command System Team, Maine Medical Center, Portland, Maine, December 2013-Present

Member, Formulary Subcommittee, Maine Medical Center, Portland, Maine, September 2013-Present

Member, Pharmacy and Therapeutics Committee, Maine Medical Center, Portland, Maine, September 2013-Present

Chairperson, Pharmacy and Therapeutics Committee, Littleton Adventist Hospital, Littleton, Colorado, July 2009-2013

Member, Medical Executive Committee, Littleton Adventist Hospital, Littleton,

Colorado, July 2009-2013

Member, Data Safety and Monitoring Board, Rocky Mountain Poison and Drug Center, "Up and Down" Acetaminophen Toxicity Study, Denver, Colorado, October 2008-December 2012

Member, Interview Committee, Rocky Vista University College of Osteopathic Medicine, Parker, Colorado, September 2008-September 2012

Member, Data Safety and Monitoring Board, Rocky Mountain Poison and Drug Center, Aracmyn-Phase II Trial Denver, Colorado, August 2006-July 2008

Meeting Coordinator, Western Fellows Toxicology Meeting, Rocky Mountain Poison and Drug Center Denver, Colorado, April 2006

Resident Member, Atlantic Health System-Transitional Year Residency Program, Internal Review Committee, 2003-2004

Resident Representative, American College of Emergency Medicine, New Jersey Chapter State, 2002 – 2004

President, Emergency Medicine Club, University of New England College of Osteopathic Medicine, 1998

Member, Orientation Committee, University of New England College of Osteopathic Medicine, 1998

Member, Sigma Sigma Phi, University of New England College of Osteopathic Medicine, 1997

Vice President, Emergency Medicine Club, University of New England College of Osteopathic Medicine, 1997

**OTHER MAJOR COMMITEE ASSIGNMENTS**: (National, Regional)

Co-chairperson, American Academy of Clinical Toxicology, Member and Learner Career Development Initiative. September 2017

Member, Medical Toxicology Board Review Material Update and Review, American College of Medical Toxicology. August 2017

Member, Panel Discussion, Maine Marijuana Law and their Impact on Youth, Maine Chapter American Academy of Pediatrics, Bethel, Maine, March 2017

Moderator, Lightening Oral Presentations, New England Research Day Regional Society for Academic Medicine Yearly Meeting, Worcester, Massachusetts, March 2017

Subject Matter Expert, Toxicology, Model EMS Clinical Guidelines Project

National Association of EMS Officials, January 2017

Subject Matter Expert, Toxicology, State of Maine Toxicology EMS Guidelines, December 2016

Subject Matter Expert, Toxicology, State of New Hampshire Toxicology EMS Guidelines, December 2016

Moderator, Research Platform Presentations, North American Congress of Clinical Toxicology, Boston, Massachusetts, September 2016

Member, Maine Opiates Collaborative Prevention-Harm Reduction Task Force State of Maine, February 2016-May 2016

Member, Accreditation Committee, American Association of Poison Control Centers, October 2015-Present

Abstract Reviewer, North American Congress of Clinical Toxicology, April 2015-Present

Moderator, American Academy of Clinical Toxicology, Pre-Symposium, Critical Care Update for the Medical Toxicologist. North American Congress of Clinical Toxicology, New Orleans, Louisiana, 2014

Member and Consultant, CONCAWE, Hazardous Materials Group, First Aid Subgroup, Brussels, Belgium, 2013-2014

Platform Moderator, 2013 Annual Scientific Meeting American College of Medical Toxicology, Puerto Rico, March 2013

Member and Consultant, PPDC 21$^{st}$ Century Toxicology/New Integrated Testing Strategies Workgroup, Subgroup, Biomonitoring Group, Priority Pesticide List, United States Environmental Protection Agency Panel Member, 2012-2015

Course Facilitator and Lecturer, Fundamental Principles of Occupational Health, BP OneHealth London, England, December 2012

Appointee/Member, American Association of Poison Control Centers, National Fatality Review Team, 2010-Present

Moderator, ACMT Practice Symposium Opioid Forensics, North American Congress of Clinical Toxicology Denver, Colorado, October 2010

Item Writer, Medical Toxicology In-service Exam, American College of Medical Toxicology, 2009-Present

Moderator, Year in Toxicology Toxicology in the Battlefield, North American Congress of Clinical Toxicology Toronto, Canada, September 2008

Antidote Summit, Panel member of internationally recognized toxicologists to recommend antidote stocking guidelines in United States hospitals, Washington, DC,
March 2008

## TEACHING RESPONSIBILITY

Course Director, 4th Year Elective in Medical Toxicology at Maine Medical Center, Tufts University School of Medicine. September 2013-Present

Rotation Director, Medical Toxicology, Department of Emergency Medicine, Maine Medical Center, September 2013-Present

Course Lecturer, "Fundamental Principles of Occupational Health" BP OneHealth, 2012-2013

Course Instructor/Lecturer, "Health Effects of Clandestine Methamphetamine Labs", American College of Medical Toxicology/Agency for Toxic Substances and Disease Registry, April 2011-2013

Preceptor, Medical Toxicology and Emergency Medicine, Rocky Vista University College of Osteopathic Medicine. 2010-2013

Core Faculty, Fellowship in Medical Toxicology, Rocky Mountain Poison and Drug Center, Denver Health, 2006-2013

Core Faculty, Rotation in Medical Toxicology, Rocky Mountain Poison and Drug Center, Denver Health, 2006-2013

Primary Preceptor, Rotation in Medical Toxicology Rocky Mountain Poison and Drug Center, University of Colorado School of Pharmacy, 2009-2011

Instructor, Principles in Clinical Medicine, Rocky Vista University College of Osteopathic Medicine, 2008-2010

World Health Organization, Fellowship in Medical Toxicology, Bien Vien Bach Mai Hospital and Poison Center, Bach Mai Hospital Hanoi, Vietnam May-June 2009

Advanced Haz Mat Life Support, Instructor and Medical Director, 2008-2010

Faculty, Fresh Tissue Lab Airway Course, University of New England COM,

1999

IV Teaching for Medical Students, University of New England COM, 1998

Course Coordinator/Instructor – PALS/ACLS, Morristown Memorial Hospital, 1993 – 1997

Clinical Instructor, Union County College Paramedic Program 1992 – 1997

Instructor, Morristown Memorial Hospital Mobile Intensive Care Unit, Continuing Education 1992 -1997

Clinical Preceptor, Morristown Memorial Hospital Mobile Intensive Care Unit Paramedic Student Program 1991 – 1997

## OTHER ACADEMIC SERVICE

Submitted and reviewed peer-reviewed toxicology simulation cases for ACEP Toxicology Section

Panel Member, Emergency Medicine, Specialty Advising, Guidance, and Planning. Tufts University School of Medicine, January 2017

Created a pharmacology module for Procedural Sedation Day, Emergency Medicine Residency, Maine Medical Center, December 2016

Created a toxicology-specific evaluation and set of Milestones for Emergency Department Residents rotating on Medical Toxicology, Maine Medical Center, December 2016

Pediatric Morning Report, Pediatric Marijuana Exposure Maine Medical Center, December 2016

Journal Club, Unexpected Health Effects of Legalization of Marijuana, August 2016

Tox Tidbits, Daily Toxicology Teaching Points, Tox Education Month, Maine Medical Center, Department of Emergency Medicine, August 2016

University of New England College of Osteopathic Medicine, Speed Networking for Medical Students, March 2016

Toxicology In-Service Review, Maine Medical Center, February 2016

University of New England College of Osteopathic Medicine, Pre-SOMA

Day for Undergraduates, "My Journey", October 2014

## PROFESSIONAL SOCIETIES

Member, Maine Medical Association

Member, American Academy of Clinical Toxicology

Member, American College of Emergency Medicine

Member, American College of Medical Toxicology

## OFFICE AND COMMITTEE ASSIGNMENTS IN PROFESSIONAL SOCIETIES

Chairperson, Membership Committee, American Academy of Clinical Toxicology, February 2017-Present

Member, American Board of Emergency Medicine, Medical Toxicology Certification Exam Standard Setting, November 2016

Member, Board of Trustees, American Academy of Clinical Toxicology, September 2016-Present

Member, National Poison Center Accreditation Committee, American Association of Poison Control Centers, October 2015-Present

Member, American College of Emergency Medicine, Medical Toxicology Section, Simulation Grant Group, October 2015-Present

Chairperson, Ad Hoc Event Planning Committee, North American Congress of Clinical Toxicology, 2015-Present

Member, Clerkship Council of Medical Toxicology, American College of Medical Toxicology, March 2015-Present

Member, American College of Emergency Physicians, Medical Toxicology Section, 2014-Present

Member, Ad Hoc Event Planning Committee, North American Congress of Clinical Toxicology, 2014-2015

Member, Planning Committee for AACT Pre-Symposium, North American Congress of Clinical Toxicology, 2014

Member, Medical Directors Advisory Board, American Association of Poison Control Centers, 2013-Present

Member, Telemedicine Interest Group, American College of Medical Toxicology, 2013- Present

Member, Medication Management, American College of Medical Toxicology, 2010-Present

Member, Envenomation Special Interest Group, American Academy of Clinical Toxicology,2009-Present

Member, Practice Committee American College of Medical Toxicology, 2009-Present

## MAJOR RESEARCH INTERESTS

Opioid abuse, misuse, and diversion

Medical Education

ED naloxone

Pharmacovigilance and drug safety

## EDITORIAL BOARDS AND ACTIVITY

Editorial/Submission Reviewer, Journal of Medical Toxicology 2009-Present

Editorial/Submission Reviewer, Clinical Toxicology 2009-Present

Editorial/Submission Reviewer, Journal of Emergency Medicine 2010-2015

Contributing Editor, Thompson Micromedex (Poisindex) 2004-2006

## RESEARCH ACTIVITY

Sub-Investigator, REVERSE AD Study (Boehringer-Ingelheim), Maine Medical Center, Portland, Maine, October 2015-February 2016

Sub-Investigator, ANALATRO Phase III, Instituto de bioclon, Rocky Mountain Poison and Drug Center, 2009

## BIBLIOGRAPHY

***Peer Reviewed***

**Schaeffer TH.** Abuse-Deterrent Formulations, an Evolving Technology Against the Abuse and Misuse of Opioid Analgesics. J Med Toxicol. 2012 Dec; 8(4):400-7

**Schaeffer TH**, Khatri V, Kokko J, Lavonas EJ. The Rate of Immediate Hypersensitivity Reactions and Serum Sickness Following Administration of Crotalidae Polyvalent Immune Fab Antivenom - A Meta-Analysis. Acad Emerg Med 2012; 19(2):121-31

Brent J, **Schaeffer TH.** Systematic Review of Parkinsonian Syndromes in Patients with Acute Paraquat Poisoning. J Occup Environ Med. 2011 Nov; 53(11):1332-6

Yin S, Lavonas EJ, Kokko, J, Mlynarchek SL, Bogdan GB, **Schaeffer TH**. Factors Associated with Difficulty to Achieve Initial Control with Crotalidae Polyvalent Immune Fab Antivenom in Snakebite Patients. Acad Emeg Med 2011; 18 (1) 46-52

**Schaeffer TH**, Mlynarchek SL, Stanford C, Delgado J, Holstege C & Bogdan GM. Treatment of chronically digoxin poisoned patients with a newer digoxin-specific antibody. J Am Osteopath Assoc. 2010; 110(10) 587-592

Lavonas EJ, Kokko J, **Schaeffer TH**, Mlynarchek SL, Bogdan GM, Dart RC. Short-Term Outcomes After Fab Antivenom Therapy for Severe Crotaline Snakebite. Ann Emerg Med. 2011 Feb; 57(2):128-137

Monte AA, Bodmer M, **Schaeffer TH**. Low molecular weight heparin: management by observation. Annals of Pharmacotherapy 2010 Nov;44(11):1836-9

Lavonas EJ, **Schaeffer TH**, Kokko J, Mlynarchek SL, Bogdan GM, Crotaline Fab antivenom is effective in cases of severe North American pit viper envenomation: a systematic review. BMC Emergency Medicine 2009 Jun 22; 9(1):13

Borron SW, Caravati EM, Cobaugh DJ, Curry SC, Dart R, Falk JL, Goldfrank L, Gorman SE, Groft S, Heard K, Miller K, Olson KR, O'Malley G, Seger D, Seifert SA, Sivilotti MLA, **Schaeffer TH**, Tomassoni AJ, Wise R, Bogdan GM, Alhelail M, Buchanan J, Hoppe J, Lavonas E, Mlynarchek S, Rhyee S, Varney S & Zosel A. Antidote Summit Authorship Group. Expert Consensus Guidelines for Stocking of Antidotes in Hospitals That Provide Emergency Care. Ann Emerg Med 2009; 54(3):386-394.

***Published Case Reports***

Heard K, **Schaeffer TH**. Massive acetylcysteine overdose associated with cerebral edema and seizures. Clin Toxicol (Phila). 2011 Jun; 49(5):423-5

Monte AA, Bodmer M, **Schaeffer TH**. Low molecular weight heparin: management by observation. Annals of Pharmacotherapy 2010 Nov; 44(11):1836-9

Buchanan JA, Alhelail MA, Cetaruk EW, **Schaeffer TH**, Palmer R, Brent J. Massive ethylene glycol ingestion treated with fomepizole alone. J Med Toxicol, 2010; 6(2):131- 134.

***Books Edited***

**Schaeffer TH** Chapter Reviewer/Editor, Roberts "Recognition and Management of Pesticide Poisonings", Sixth Edition, United States EPA, 2013.

**Schaeffer TH** Associate Editor, Kazzi and Shih (Editors) "Resident and Student Association, Toxicology Handbook, Second Edition". American Academy of Emergency Medicine. United Press 2011.

***Book Chapters***

**Kennedy A, Schaeffer TH**, Pyridoxine, Critical Care Toxicology-Diagnosis and Management of the Critically Poisoned Patient (Ed. Brent et al) Springer 2017 ISBN 978-3-319-17899-8

**Schaeffer TH**, Ethanol, Critical Care Toxicology-Diagnosis and Management of the Critically Poisoned Patient (Ed. Brent et al) Springer 2017 ISBN 978-3-319-17899-8

**Schaeffer TH**, "Bites and Stings" In Beebe and Myers, "The Paramedic Professional" Volume 3 EMS Operations. Cengage, 2011.

**Schaeffer TH**, et al. "Management of Crotaline Snakebites in the United States" In White and Dart Snakebite-A Brief Medical Guide Philadelphia: Julian White, 2008.

***Published Abstracts, Posters, and Oral Presentations***

Hinson D, Hinojosa M, Varney S, and **Schaeffer, TH.** What could it be, honey? Think outside the (botulism) box. Clinical Toxicology 2017; 55(7) 689-868.
*Presented as a poster presentation, North American Congress of Clinical Toxicology, Vancouver, BC, Canada October 2017*

Layton G, Chen P, Varney S, **Schaeffer, TH.** Novel Oral Anticoagulants (NOACs) exposures reported to a poison center network during 2011–2016. Clinical Toxicology 2017; 55(7) 689-868.
*Presented as a poster presentation, North American Congress of Clinical Toxicology, Vancouver, BC, Canada October 2017*

Hernandez R, Varney S, **Schaeffer TH,** Villarreal L. Bullying and suicide attempts reported to a statewide poison system. Clinical Toxicology 2017; 55(7) 689-868
*Presented as a poster presentation, North American Congress of Clinical Toxicology, Vancouver, BC, Canada October 2017*

**Schaeffer TH** for the Maine Medical Center Naloxone Research Group. Emergency Prescribers and Rescue Naloxone: Results of a Health-System Survey.
*Presented as an oral lightening presentation, National SAEM Meeting, New Orleans, LA May 2016*

**Schaeffer TH** for the Maine Medical Center Naloxone Research Group. Emergency Prescribers and Rescue Naloxone: Results of a Health-System Survey.
*Presented as an oral lightening presentation, SAEM New England Regional Meeting, Worcester, MA, March 2016*

**Schaeffer TH,** Bond AG, Earnshaw MD, Simone KE. Methemoglobinemia and Hemolysis in an Undiagnosed G6PDD Patient after Receiving Pegloticase. Clinical Toxicology 2015; 53 (7) 686.
*Presented as a poster presentation, North American Congress of Clinical Toxicology, San Francisco, CA, October 2015*

**Schaeffer TH**, Kralik KS, Strout TD. The Use of Ketamine for Agitated Patients in the Prehospital Setting: A Systematic Review of the Literature. Clinical Toxicology 2015; 53 (7) 657.
*Presented as a poster presentation, North American Congress of Clinical Toxicology, San Francisco, CA, October 2015*

Carli L**, Schaeffer TH**, Bui A, Green JL, Dart RC, Pediatric Cough/Cold Medication Safety Surveillance Team Adverse Events Associated with the Use of Unapproved Prescription Cough and Cold Product in Children. Clinical Toxicology 2011; 49 (6) 518.
*Presented as a platform presentation, North American Congress of Clinical Toxicology, Washington DC, October 2011*

Jacob J, **Schaeffer TH.** Self-Medication with Amitraz for Delusions of Parasitosis: Dermal Exposure and Delayed Presentation, Clinical Toxicology 2011; 49 (6) 518.
*Presented as a poster presentation, North American Congress of Clinical Toxicology, Washington, DC, October 2011*

**Schaeffer TH,** Phillips SD, Krieger GR. Correlation of Blood Lead Levels and Soil Lead Levels in Pediatric patients in Sub-Saharan Africa. Clinical Toxicology 2011; 49(3) 252.
*Presented as a platform presentation, International Congress of the European*

*Association of Poisons Centers. Dubrovnik, Croatia May 2011*

Sande MK, Thompson DK, **Schaeffer TH**, Monte AA. Fomepizole for Severe Disulfiram-Ethanol Reaction. Clinical Toxicology. 2010; 48(6). 614.
*Presented as a poster presentation, North American Congress of Clinical Toxicology, Washington, DC, October 2010*

Monte AA, Bodmer M, **Schaeffer TH**. Low Molecular Weight Heparin Overdose: Intervention or Observation. Clinical Toxicology. 2010; 48(6). 611.
*Presented as a poster presentation, North American Congress of Clinical Toxicology, Denver, CO, October 2010*

Zosel A, Yin S, Kokko J, Mlynarchek SL, , Bogdan GM, Lavonas EJ, **Schaeffer TH.** Is an Initial Severity Score after Crotalid Envenomation Associated with Antivenom Vials Needed to Treat? Clinical Toxicology, 2009; 47(6), 741.
*Presented as a poster presentation, North American Congress of Clinical Toxicology, San Antonio, TX, September 2009*

Kokko J, Yin S, Mlynarchek SL, , Bogdan GM, Lavonas EJ, **Schaeffer TH.** Do Snakebite Patients of Varying Severity and Achievement of Initial Control Benefit from Antivenom? Clinical Toxicology, 2009; 47(6), 718.
*Presented as a poster presentation, North American Congress of Clinical Toxicology, Antonio, TX, September 2009*

Siddiqui FS, Palatnick W, **Schaeffer TH**. The Kiss of Death: Case Report of a Western Gaboon Viper (Bitis gabonica) Bite to the Face. Clinical Toxicology, 2009; 47(6), 714.
*Presented as a poster presentation, North American Congress of Clinical Toxicology, San Antonio, TX, September 2009*

Khac NP, Xuan DT, Du NT, Phillips SD, **Schaeffer TH**, Dart RD. Immunosuppressive Therapy in Patients with Paraquat Poisoning in Vietnam. Clinical Toxicology, 2009; 47(6), 704.
*Presented as a platform presentation, North American Congress of Clinical Toxicology, San Antonio TX, September 2009*

Buchanan JA, Varney SM, Mlynarchek SL, Kokko J, Bogdan GM, Lavonas EJ, **Schaeffer TH.** Immediate Adverse Events after Administration of Crotalidae Polyvalent Immune Fab. Clinical Toxicology, 2009; 47(6), 703.
*Presented as a platform presentation, North American Congress of Clinical Toxicology, San Antonio TX, September 2009*

Yin S, Varney SM, Kokko J, Mlynarchek SL, Bogdan GM, Lavonas EJ, **Schaeffer TH.** Factors Associated with the Failure to Achieve Initial Control with Fab Antivenom in Snakebite Patients. Clinical Toxicology, 2009; 47(6), 703.
*Presented as a platform presentation, North American Congress of Clinical*

*Toxicology, San Antonio TX, September 2009*

Buchanan JA, Alhelail MA, Cetaruk EW, **Schaeffer TH**, Palmer R, Brent J. Massive ethylene glycol ingestion treated with fomepizole alone. Clinical Toxicology, 2008; 46(7), 606.
*Presented as a poster presentation, North American Congress of Clinical Toxicology, Toronto, Canada, September 2008*

Nguyen NT, Thu BH, **Schaeffer TH**, Phillips SD. Hymenoptera envenomation in Vietnam. Clinical Toxicology, 2008; 46(7), 640.
*Presented as a poster presentation, North American Congress of Clinical Toxicology, Toronto, Canada, September 2008*

Buchanan JA, Phillips SD, **Schaeffer TH**. Severe rattlesnake envenomation in a patient with idiopathic thrombocytopenia purpura (ITP). Clinical Toxicology, 2008; 46(7), 640.
*Presented as a poster presentation, North American Congress of Clinical Toxicology, Toronto, Canada, September 2008*

**Schaeffer TH**, Phillips SD, Waksman J, Cetaruk E, Kulig K, Brent J. Rapid airway loss (RAL) after rattlesnake (RS) envenomation. Clinical Toxicology, 2008; 46(7), 640
*Presented as a poster presentation, North American Congress of Clinical Toxicology, Toronto, Canada, September 2008*

Stanford CF, **Schaeffer TH**, Delgado JD et al. Treating Life-Threatening Digoxin Toxicity with Digoxin Immune Fab. Clin Toxicol 2007; 45:626.
*Presented as a poster presentation, North American Congress of Clinical Toxicology, New Orleans, LA, 2007*

Mendoza C, **Schaeffer TH**, Hoppe JH, et al. Acute Median Nerve Entrapment Requiring Surgery After Snakebite to the Hand. Clin Toxicol 2007; 45:626.
*Presented as a poster presentation, North American Congress of Clinical Toxicology, New Orleans, LA, 2007*

Mlynarchek SL, Palmer KL, **Schaeffer TH**, & Stanford CF. Integration of a post marketing safety reporting system with medical management by a regional poison center. Society of Clinical Research Associates (SoCRA), 16th Annual Conference, Clinical Research: Improving Health, Meeting Ethical and Regulatory Challenges – Globally. Denver, CO: 2007.

Hoppe JH, **Schaeffer TH**, Phillips. Persistent Hypoglycemia Complicating Metformin Overdose in a Non- Diabetic Adult. Clin Toxicol 2007; 45:609.
*Presented as a poster presentation, North American Congress of Clinical Toxicology, New Orleans, LA, 2007*

**Schaeffer TH**, Heard K, Bronstein AC. Outcomes of Ethylene Glycol Ingestions in Children Less than 6 as Reported to United States (US) Poison Centers (PC). Clin Toxicol 2006; 44:769.
*Presented as a poster presentation, North American Congress of Clinical Toxicology, San Francisco, October 2006*

Mendoza C, **Schaeffer TH**, Bronstein AC, Dart RC, Heard K. A Cohort Study of Acute Lung Injury after Use of a Spray-On Grout Sealer. Clin Toxicol 2006; 44:721.
*Presented as a poster presentation, North American Congress of Clinical Toxicology, San Francisco, October 2006*

Ahmadi M, **Schaeffer TH**, Heard K. Evolution of a T40MS R Wave in a Citalopram Overdose (OD) with Serotonin Syndrome (SS). Clin Toxicol 2006; 44: 658.
*Presented as a poster presentation, North American Congress of Clinical Toxicology, San Francisco, October 2006*

**Schaeffer, TH,** Waksman, JC, Schaffer, MS-Accidental Overdose of Verapamil in an Infant from Medical Error. Clinical Toxicology 2005; 43:732
*Presented as a poster presentation, North American Congress of Clinical Toxicology, Orlando, FL, September 2005*

**Schaeffer TH** , Phillips SD, Heard KJ, Dart RC. Terminal 40ms R wave height vs. serum levels in tricyclic antidepressant (TCA) overdose: Is there a correlation? Clinical Toxicology 2005; 43:686
*Presented as a poster presentation, North American Congress of Clinical Toxicology, Orlando, FL, September 2005*

**Schaeffer, TH**, Hung, OL, Shih RD - Comparing the Effectiveness of Diphenhydramine and Glycopyrrolate to Atropine in Treating Organophosphate Poisoning Clin Toxicol 2004: 42:645 Morristown Memorial Hospital, Morristown, NJ
*Presented as a platform presentation –North American Congress of Clinical Toxicology, Seattle, WA September 2004*

Doran, JV, Irving, C, **Schaeffer, TH** - Excessive Fluid Administration During Prehospital Intravenous Administration
*Presented as a poster presentation American College of Emergency Physicians, National Scientific Assembly, San Francisco, CA, October 1997*

***Non-peer reviewed publications***

Co-Author, Opioid/Unknown Substance PPE Recommendation, Collaboration between Maine EMS, Maine CDC, and Northern New England Poison Center

Emergency Medicine Guideline, Sedation in the Emergency Department, Department of Emergency Medicine, Maine Medical Center, emguidelines.org

Emergency Medicine Guideline, Acute Acetaminophen Overdose, Department of Emergency Medicine, Maine Medical Center

Emergency Medicine Guideline, Repeated Supratherapeutic Acetaminophen Overdose,

Northern Exposure, Northern New England Poison Center Newsletter, Pediatric Marijuana Exposure, September 2014

The SCOPE, Physician Newsletter, Maine Medical Center, 2014, The Northern New England Poison Center, August, 2014

Management of Crotaline Snakebite in the United States, Rocky Mountain Poison and Drug Center, 2006

Rocky Mountain Poison and Drug Center Quarterly newsletter, "Snakes, Spiders, and Scorpions, oh my", 2006

## INVITED LECTURES/PRESENTATIONS

Drug-Induced Takotsubo Syndrome, A different kind of achey-breaky heart. American Academy of Clinical Toxicology Pre-symposium, NACCT 2017, Vancouver, British Columbia, Canada, October 2017

What can the PC do for you? Maine Medical Center Outpatient Pediatrics Monthly Meeting, Portland, ME, August 2017

Antidotes for Calcium Channel Blocker Toxicity, New Toys for an Old Friend, University of Vermont, Department of Emergency Medicine, Burlington, VT, May 2017

Newer (and not so new) Drugs of Abuse, Copley Hospital, Morrisville, VT, May 2017

Newer (and not so new) Drugs of Abuse, Northwestern Medical Center, St. Albans, VT, May 2017

"Tox rule breakers – when 4-6 hours of observation is not enough" Sugarloaf Emergency Medicine Winter Symposium, Carrabassett Valley, Maine, March 2017

"When is a gummy bear not just a gummy bear? Unexpected Health Effect of

Marijuana Legalization" Sugarloaf Emergency Medicine Winter Symposium, Carrabassett Valley, Maine, March 2017

"Illicit Drugs in School, What are We Seeing?" MSAD1 Annual In-Service Day, Presque Isle, Maine, March 2017

"Marijuana in Maine, What Does it Mean?" MSAD1 Annual In-Service Day, Presque Isle, Maine, March 2017

"Unintended Health Effects of the Legalization of Marijuana", Grand Rounds, Department of Pediatrics, Eastern Maine Medical Center, Bangor, Maine, January 2018

"New Drugs of Abuse", Grand Rounds, Maine General Hospital, Augusta, Maine, November 2016

"Drugs of Abuse in the Community, Update for the Primary Care Provider", Primary Care in Today's Changing Practice Environment, University of New England College of Osteopathic Medicine, Biddeford, Maine, October 2016

"Cardiovascular Effects of Illicit Drugs", Phillips M. Payson Nursing Lecture Contemporary Issues in Cardiac Care, Portland, Maine, September 2016

"Overview of Toxicology for Pediatrics", Department of Pediatrics, Maine Medical Center, Portland Maine, August 2016

"Steel is good but sometimes antidotes are better", Grand Rounds, Department of Surgery, Maine Medical Center, Portland, Maine, August 2016

"Tox for School Nurses, what did they get into now?" 2016 School Nurse Summer Institute, Maine Department of Education, Lewiston, Maine, July 2016

"Toxicology for Pharmacists, What is Important to Know?" Husson University School of Pharmacy, Bangor, Maine, April 2016

"Down the K-Hole: Ketamine for Agitation in the ED" Sugarloaf Emergency Medicine Winter Symposium, Carrabassett Valley, Maine, March 2016

"The 2hr acetaminophen Level and Other Tall Tales from Toxland" Sugarloaf Emergency Medicine Winter Symposium, Carrabassett Valley, Maine, March 2016

"Lessons Learned from Joan Rivers & More - Procedural Sedation in the ED" Sugarloaf Emergency Medicine Winter Symposium, Carrabassett Valley, Maine, March 2016

"Substance Abuse, What Are We Seeing at the NNEPC?" New Hampshire Osteopathic Winter Symposium, North Conway, New Hampshire, January 2016

"Naloxone from the ED, the Maine Med Experience" Maine Health ED Workgroup Meeting, Portland, Maine, December 2015

Panel Discussion and Q&A – "Procedural Sedation and Review of Best Practices" Maine Health 5th Annual ED Symposium, Portland, Maine, November 2015

"Death by Syringe, Healthcare Providers Who Murder" New Jersey State Conference on EMS, Atlantic City, New Jersey, November 2015

"Designer Drugs and New Jersey, Perfect Together" New Jersey State Conference on EMS, Atlantic City, New Jersey, November 2015

Panel Member, American Academy of Clinical Toxicology, Acute/Intensive Care Symposium, North American Congress of Clinical Toxicology, San Francisco, California, October 2015

"Designer Drugs in the Emergency Department" Department of Emergency Medicine Grand Rounds, Pen Bay Medical Center, Rockport, Maine, June 2015

"Not for Human Consumption, the New Designer Drugs" Emergency Nurses Association, New England Regional Symposium, South Portland, Maine, April 2015

"Calcium Channel Blocker Toxicity" University of Vermont Department of Pediatrics, Burlington, Vermont, April 2015

"Designer Drugs for Law Enforcement" Vermont Police Academy Pittsford, Vermont, April 2015

"High Dose Insulin for CCB toxicity, you want me to give WHAT??" Sugarloaf Emergency Medicine Winter Symposium, Carrabassett Valley, Maine, March 2015

"Toxic Alcohols When You Can't Get a Level, I need a drink!" Sugarloaf Emergency Medicine Winter Symposium, Carrabassett Valley, Maine, March 2015

"Designer Drugs, it's not a good look for anyone" Sugarloaf Emergency Medicine Winter Symposium, Carrabassett Valley, Maine, March 2015

"Household Toxicology…tox is in the house!!" Grand Rounds, University of

Vermont Medical Center, Burlington, Vermont, March 2015

"What's New (or old) at the Northern New England Poison Center" Grand Rounds, Stephens Memorial Hospital. Norway, Maine, February 2015

"Pick Your Poison" Atlantic Partners EMS, Maine State EMS Conference, Rockland, Maine, November 2014

"Update in Pediatric Toxicology" Grand Rounds, Department of Pediatrics, Maine Medical Center, Portland, Maine, August 2014

"Weapons of Mass Destruction" Maine Task Force-1, Northern New England MMRS, Portland, Maine, May 2014

"Kids and Drugs, Never a Good Combination" 21st Annual DCYF Conference Handouts- From Silos to Synergy: Implementing Vision, Manchester, New Hampshire, April 2014

"Toxins Aren't Just Little Pills" Department of Pediatrics Didactics Conference, Maine Medical Center, Portland, Maine, April 2014

"Pediatric Altered Mental Status" Pediatric Morning Report, Pediatric Residency Maine Medical Center, Portland, Maine, March 2014

"Occupational Risks of Petroleum Products" CONCAWE, Brussels, Belgium, February 2014

"Potpourri of Toxicology, Update in Emergency Medicine" University of Vermont, Stowe, Vermont, January 2014

"Approach to the Polypharm OD" Pediatric Morning Report, Pediatric Residency Maine Medical Center, Portland, Maine, December 2013

"Pathway in Medicine" University of New England College of Osteopathic Medicine, Pre-SOMA Meeting, Biddeford, Maine, October 2013

"Stuffed with Dilemma's, Clinical Management of Body Stuffers, Does the Literature Guide Us", ACMT Pre-Meeting Symposium: CSI: Atlanta: Toxicology, Law Enforcement and Crime Scene Investigation, September 2013

AACT Articles You May Have Missed, North American Congress of Clinical

Toxicology, Atlanta, GA, September 2013

"Update on Abuse Deterrent Opioids" Rocky Mountain Poison and Drug Center Research Meeting, Denver, Colorado, April 2013

"Emergency Medical Mass Casualty Exercise, Fundamental Principles of Occupational Health" One Health BP, Port of Spain, Trinidad May 2013

"Toxicology In and Out of the Hospital" Grand Rounds, Department of Medicine, Littleton Adventist Hospital, Littleton, Colorado, March 2013

"Principles of Substance Abuse in the Workplace, Fundamental Principles of Occupational Health" OneHealth BP- London, England, December 2012

"The Risks of Occupational Exposure to Sugarcane Work, Brazil and Beyond" Global Health Conference, BP, OneHealth, Chicago, Illinois, June 2012

"What Are We Seeing?" Littleton Adventist Hospital Safety Key Meeting, Littleton, Colorado, May 2012

"Principles of Toxicology and Exposure Fundamental Principles of Occupational Health" OneHealth BP, Tbilisi, Georgia, April 2012

"Toxicology and NJ EMS" New Jersey State EMS Convention, Atlantic City, New Jersey, November 2011

"Overview of Occupational Health Encounters" MC252, OneHealth BP, US Health Conference, Helios, BP America, Houston, Texas, November 2011

"Spiders and Scorpions, or why do I need to check my boots?" Emergency Medicine Club, Rocky Vista University College of Osteopathic Medicine, Parker, Colorado, April 2011

"Packers and Stuffer, are we going on a trip?" Emergency Medicine Residency Education, Toxicology RPAC, Doctor's Hospital, Columbus, Ohio, March 2011

"Household Toxicology Emergency Medicine Residency Education" Toxicology RPAC, Doctor's Hospital, Columbus, Ohio, March 2011

"Prehospital Envenomation" Centura EMS Consortium, Franktown Fire Department, Franktown, Colorado, March 2011

"Intravenous Lipid Emulsion Therapy, it's a good kind of fat (maybe)"

Scientific Assembly, American Academy of Emergency Medicine, Orlando, Florida, February 2011

"Opioid Abuse Deterrent Technology-We Can Make it Better, Stronger, Faster....Maybe" ACMT Symposium-Euphoria and Dysphoria, North American Congress of Clinical Toxicology, Denver, Colorado, October 2010

"Poison Centers in the United States" Emergency Medicine Club, Rocky Vista University College of Osteopathic Medicine, Parker, Colorado, May 2010

"Weapons of Mass Destruction" Emergency Medicine Club, Rocky Vista University College of Osteopathic Medicine, Parker, Colorado, April 2010

"Evidence-Based Antidote Stocking Guidelines in the United States" Mediterranean Emergency Medicine Congress, Valencia, Spain, September 2009

"Risk Stratification and GI Decontamination in the Pediatric Poisoned Patient" Mediterranean Emergency Medicine Congress, Valencia, Spain, September 2009

"World Health Organization, Fellowship in Medical Toxicology" Bien Vien Bach Mai Hospital and Poison Center, Bach Mai Hospital-Hanoi, Vietnam, May-June 2009

"Adverse Drug Events and Causality" Western Medical Toxicology Fellowship Conference, San Diego, California, April 2009

"What's New in the Tox Literature?" Emergency Medicine Residency Education, Doctor's Hospital, Columbus, Ohio, March 2009

"Snake Envenomation or why not to touch the sharp end of a rattlesnake..." National Association of Medical Examiners Scientific Meeting, Denver, Colorado, February 2009

"Paracetamol Toxicity and Treatment with N-Acetylcysteine" 2008 US-Vietnam Toxicology Symposium at Bien Vien Bach Mai Bach Mai Hospital, Hanoi, Vietnam, November 2008

"Hyperthermic Syndromes in Toxicology" 2008 US-Vietnam Toxicology Symposium at Bien Vien Bach Mai Bach Mai Hospital, Hanoi, Vietnam, November 2008

"Discussant, Case Presentation Competition Benzylpiperazine" North

American Congress of Clinical Toxicology New Orleans, Louisiana, October 2007

"Rattlesnake Envenomation" Littleton Adventist Hospital, Emergency Medical Services, Continuing Education, Littleton, Colorado, September 2007

"Woulda, Shoulda, Coulda" Grand Rounds, Department of Emergency Medicine, Atlantic Health System, Morristown Memorial Hospital, Morristown, New Jersey, August 2007

"3 Tox Cases that May Change Your Practice" Littleton Adventist Hospital, Department of Emergency Medicine Continuing Education, Littleton, Colorado, January 2007

"Toxicology for Prehospital Providers" Colorado State EMS Convention, Keystone, Colorado, November 2006

"Envenomations", Grand Rounds, Department of Medicine Good Samaritan Exempla Medical Center, Lafayette, Colorado, July 2006

"Toxic Envenomation" Continuing Education Seminar, Evergreen Fire Department, Evergreen, Colorado, June 2006

"The Lab in Medical Toxicology" University of Colorado Health Sciences Center, Addiction Medicine Fellowship, Department of Psychiatry, April 2006

"Prehospital Toxicology" Denver Health Medical Center Paramedic Training Program, March 2006

"Clinical Trial for Black Widow Spider Antivenom Toxinology-International Course" Adelaide, SE Australia, November 2005

"Antidepressants, Now and Then" Denver Health Medical Center Residency in Emergency Medicine, August 2005

"Pediatric Toxicology" Presbyterian/St. Luke's Medical Center Continuing Medical Education, Grand Rounds Denver, Colorado, May 2005

"Toxicology in the ICU" Department of Pulmonology and Critical Care University of Colorado Health Sciences Center, Denver, Colorado, May 2005

"Envenomations" The Children's Hospital, Grand Rounds, Pediatric Emergency

Medicine Denver, Colorado, March 2005

"Calcium Channel Blocker Overdose-A Case Study" Colorado Springs Fire Department, American Medical Response, Colorado Springs, Colorado, January 2005

"Acetaminophen and Aspirin: Friends and Foes" University of Colorado Health Sciences Center School of Pharmacy, Denver, Colorado, December 2004

"Introduction to Toxicology" Denver Health and Hospital Authority, University of Colorado Health Sciences Medical School, Denver, Colorado, August 2004

"Prehospital Toxicology for Paramedics or what was that I took? I feel funny" Union County College, Scotch Plains, New Jersey, February 2004

"Pediatric Anaphylaxis, or bugs, drugs, and catecholamines, I've got the epi epi shakes" Combined Education Conference, Pediatrics/Emergency Medicine, Morristown Memorial Hospital, Residency in Emergency Medicine Morristown, New Jersey, July 2003

"Potpourri of Cardiology, or, Even if it Smells Nice, You May Not Want to Put It in Your Mouth" Union County College Paramedic Program, Plainfield, New Jersey, February 2003

"The Club Drugs: Should We Give Them a "Rave" Review?" Emergency Medicine Education Conference, Morristown Memorial Hospital, Residency in Emergency Medicine, Morristown, New Jersey, December 2002

"Congestive Heart Failure: State of the Art Evaluation and Treatment" Combined Education Conference, Internal Medicine/Emergency Medicine, Morristown Memorial Hospital, Residency in Emergency Medicine, Morristown, New Jersey, June 2002

"Imaging in the Diagnosis of Pulmonary Embolus" Emergency Medicine Education Conference, Morristown Memorial Hospital, Residency in Emergency Medicine Morristown, New Jersey, December 2001

## SOCIAL MEDIA AND NEWS MEDIA

The 2-hr Acetaminophen Level and Other Tall Tales from Our Favorite Analgesic, Blog Post, , www.downeastem.org
September 2017

How Much Caffeine is Safe for the Average Person, WCSH News, Interview, May 2017

Get Down that K-Hole! Ketamine for Control of the Agitated Adult Emergency Department Patient, Blog Post, www.downeastem.org
March 2017

Cannabinoid Hyperemesis Syndrome, Interview, WCSH News, January 2017

Poison Boy and the Safety Rangers Podcast, Carbon Monoxide in New England, November 2017

Carbon Monoxide Toxicity, Interview, WMTW News, February 2015

"From household toxins to drug overdoses, Portland poison center is on health care's front lines", Print Newspaper Article, Bangor Daily News, March 2014

# KEY ADMINISTRATIVE PERSONNEL

## NH Department of Health and Human Services

**Contractor Name:** MaineHealth

**Name of Program:** Poison Control Center Services

| BUDGET PERIOD: SFY 19 | | | | |
|---|---|---|---|---|
| NAME | JOB TITLE | SALARY | PERCENT PAID FROM THIS CONTRACT | AMOUNT PAID FROM THIS CONTRACT |
| Karen Simone, PharmD, DABAT | Director Poison Control Center | $156,042 | 8.00% | $12,483.30 |
| Tammi Schaeffer, MD | Physician Medical Director | $289,432 | 3.35% | $9,695.95 |
| | | $0 | 0.00% | $0.00 |
| | | $0 | 0.00% | $0.00 |
| | | $0 | 0.00% | $0.00 |
| | | $0 | 0.00% | $0.00 |
| TOTAL SALARIES (Not to exceed Total/Salary Wages, Line Item 1 of Budget request) | | | | $22,179.25 |

| BUDGET PERIOD: SFY 18 | | | | |
|---|---|---|---|---|
| NAME | JOB TITLE | SALARY | PERCENT PAID FROM THIS CONTRACT | AMOUNT PAID FROM THIS CONTRACT |
| Karen Simone, PharmD, DABAT | Director Poison Control Center | $156,042 | 8.00% | $12,483.36 |
| Tammi Schaeffer, MD | Physician Medical Director | $289,432 | 3.35% | $9,695.96 |
| | | $0 | 0.00% | $0.00 |
| | | $0 | 0.00% | $0.00 |
| | | $0 | 0.00% | $0.00 |
| | | $0 | 0.00% | $0.00 |
| TOTAL SALARIES (Not to exceed Total/Salary Wages, Line Item 1 of Budget request) | | | | $22,179.32 |