

### Public Report: Efficacy of Service Delivery Reforms at Bridgewater State Hospital (BSH) and Continuity of Care for BSH Persons Served



Exterior barbed wire fence and exterior sign of Bridgewater State Hospital.

A public report to the President of the Senate, Speaker of the House of Representatives, Chairs of the Joint Committee on Mental Health Substance Use and Recovery, Joint Committee on the Judiciary, Senate Ways and Means Committee, and House Ways and Means Committee, submitted pursuant to the FY 2024 Budget (Line Item #8900-0001).

February 2024

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### **Introduction and Overview**

This report covers the Disability Law Center's (DLC) monitoring of Bridgewater State Hospital (BSH), including the Bridgewater State Hospital Units at Old Colony Correctional Center (OCCC BSH Units), known as the Intensive Stabilization and Observation Unit (ISOU) and the Residential Unit (RU), pursuant to authority granted by Line Item #8900-0001,<sup>1</sup> for the period from June 2023 through December 2023. BSH and the OCCC BSH Units are located within Department of Correction (DOC) facilities.

DLC issued a private report concerning the topics discussed herein on February 29, 2024 to the honorable legislators designated in Line Item #8900-001. The private report included Appendix D containing select photographs taken by DLC's mold expert during a December 2023 sight inspection, as discussed further in Section 2 below. Appendix D has been redacted for purposes of the public report.

DLC is a nonprofit organization and the Commonwealth's designated Protection and Advocacy agency (P&A) for persons with disabilities, granting DLC federal authority to investigate abuse and neglect of people with disabilities, monitor settings where people with disabilities live or receive services, provide legal representation, and engage in other advocacy to advance the rights of individuals with disabilities. Because of the high demand for DLC services and our limited staffing and resources, DLC's intensive ongoing monitoring of BSH would not be possible without the support and expanded authority granted by Line Item #8900-0001.

Remarkably, it has now been a decade since DLC began continuously advocating to protect the rights of and improve care for Persons Served (PS) at BSH. DLC reaches this milestone having billed over 10,000 hours to a range of work, including 7 different P&A investigations into PS abuse or neglect, continuous onsite and remote P&A monitoring, serving as monitor of 2 settlement agreements<sup>2</sup>, individual advocacy, stakeholder collaborations, and legislative advocacy. DLC has diligently devoted our time and resources to BSH because PS deserve access to mental health treatment in a safe, therapeutic environment of recovery. While BSH

<sup>1</sup> FY2024 Budget Line Item #8900-0001, allotting over \$757 million in funds "[f]or the operation of the department of correction" states, in pertinent part:

[P]rovided further, that not less than \$125,000 shall be expended for the Disability Law Center, Inc. to monitor the efficacy of service delivery reforms at Bridgewater state hospital, including units at the Old Colony correctional center and the treatment center: provided further, that the Disability Law Center, Inc. may investigate the physical environment of said facilities, including infrastructure issues, and may use methods including, but not limited to, testing and sampling the physical and environmental conditions, whether or not they are utilized by patients or incarcerated persons; provided further, that the Disability Law Center, Inc. may monitor the continuity of care for persons who are discharged from Bridgewater state hospital to county correctional facilities or department of mental health facilities, including assessment of the efficacy of admission, discharge and transfer planning procedures and coordination between the department of correction. Wellpath LLC, the department of mental health and county correctional facilities; and provided further, that not less than once every 6 months, the Disability Law Center, Inc. shall report on the impact of these reforms on those who received services at Bridgewater state hospital to the joint committee on mental health, substance use and recovery, the joint committee on the judiciary, the house and senate committees on ways and means, the senate president and the speaker of the house of representatives.

<sup>2</sup> DLC served as monitor of our December 15, 2014 settlement agreement with the Commonwealth and as independent monitor for the settlement agreement in *Minich v. Spencer*, No. NOCV2014-00448.

has made some significant improvements over the past decade, the deteriorating facility under the authority and control of the DOC still unquestionably fails to provide appropriate conditions and services for PS.

During this reporting period, DLC conducted monitoring of Wellpath Recovery Solutions (Wellpath) delivery of services at BSH, incorporating assessment of continuity of care for PS upon discharge, through a variety of activities, including:

- Weekly onsite BSH visits;
- BSH PS video, phone, and in-person meetings;
- BSH staff in-person meetings;
- Onsite visits to the ISOU and the RU to meet with facility staff and PS;
- Meetings with BSH administrators and Wellpath leaderships;
- Correspondence with DOC administrators;
- BSH PS Governance Meetings;
- Participation in BSH Governing Body meetings and Department of Mental Health quarterly meetings;
- Requests for data and documentation to Wellpath and DOC;
- Requests to meet with DOC;
- Review of Wellpath 24 Hour Nursing Reports;
- Review of DOC video footage of PS restraint and seclusion;
- Review of DOC Incident Reports;
- Review and analysis of BSH restraint and seclusion data;
- Review of BSH restraint and seclusion orders and documentation;
- Review of numerous PS medical records;
- Review and analysis of PS discharge data;
- Onsite visits to Department of Mental Health (DMH) hospitals and units: Lemuel Shattuck Hospital, Worcester Recovery Center and Hospital, Tewksbury State Hospital, and Western MA Unit at Mountain View to meet with facility staff and discharged PS;
- Onsite visit to Bristol County Jail and House of Corrections to tour facility, meet facility staff and discharged PS;
- Phone interviews with discharged PS in DMH hospitals, county correctional facilities, and the community;
- Regular meetings with fellow mental health advocates about BSH; and
- Meetings and correspondence with BSH friends and family group.

In addition to monitoring activities, DLC continues to gather and review information relative to several open investigations into PS abuse and neglect commenced in previous reporting periods.

DOC did not respond to DLC's July 2023 report during the reporting period that followed. However, on January 4, 2024, DOC sent DLC a letter acknowledging receipt of the report, attached hereto as **Appendix B**. DOC's letter reiterated that the agency had "retained Dr. Debra Pinals as an independent expert on forensic mental health care to review the current practices, procedures and policies at BSH" and indicated that a "more detailed conversation concerning DLC's most recent recommendations should await the completion of Dr. Pinals' work." <sup>3</sup> DLC notes that, although DLC has had productive meetings with Dr. Pinals and looks forward to

<sup>&</sup>lt;sup>3</sup> App. B at 1

learning more about any recommendations, we are not aware of any timeline for Dr. Pinals to complete her work. DOC's letter then provided several positive updates:

- BSH began employing additional measures to ensure that uses of restraint, as defined by M.G. L. 123, § 21, "are both accurately tracked and utilized appropriately," including "daily video review of all events (seclusion, physical restraint, and involuntary medication) both for appropriateness and for completion of documentation." Events deemed to require further review are reviewed by Executive Leadership in a weekly Serious Clinical Episode Committee meeting. Where deviation from the requirements of § 21 may have occurred, "appropriate investigation and action are undertaken," including staff interviews and staff retraining and discipline, when warranted.<sup>4</sup>
- DOC "retained a Qualified Mental Health Professional as a fourth Health Service Division Regional Administrator to oversee the delivery of services on a day-to-day basis."
- Wellpath "submitted revisions to the Seclusion and Restraint Policy and Involuntary Psychotropic Medication Policy to ensure that they are as closely aligned as possible with M.G.L. c. 123, sec. 21 and relevant DMH policies and regulations." These were reviewed by Dr. Pinals.
- "A significant emphasis on new employee and annual training has been placed on person served engagement, de-escalation techniques and reducing the need for the use of seclusion, restraint and involuntary medication."

DOC did not address in its recent response a range of other concerns DLC raised in the July 2023 report, such as those related to the aging BSH physical plant, PS language access, PS access to medical care, treatment of PS in the OCCC BSH Units, and PS continuity of care.

With another reporting period closed, DLC repeats our urgent call for the Commonwealth to transfer oversight of the BSH population from DOC to DMH and to construct a new psychiatric hospital. Both of these reforms are essential to protect the health, safety, and rights of PS. Efforts to patch BSH's deteriorating physical plant and gradually change the troubling culture and practices within have not produced sustainable results. Ten years of scrupulous DLC involvement have shown that BSH is irreparably unsuitable to serve its population. Massachusetts must cease involuntarily committing people with complex mental health needs and disabilities to a state prison facility where they will foreseeably face countertherapeutic conditions and suffer violations of their legal rights by those meant to provide them treatment.

<sup>5</sup> App. B at 2.

<sup>&</sup>lt;sup>4</sup> App. B at 1-2.

<sup>&</sup>lt;sup>6</sup> *Id.*. DOC had previously committed in its June 7, 2023 response to DLC's January 2023 report to "revising BSH policies to utilize the terminology [DLC] feels is required by M.G.L. c. 123 and regulations." DLC, Public Report on the Efficacy of Service Delivery Reforms at Bridgewater State Hospital (BSH) and Continuity of Care for BSH Persons Served (July 2023), App. B at 3, <a href="https://www.dlc-ma.org/wp-content/uploads/2023/08/DLC-BSH-Public-Report-7.31.2023.pdf">https://www.dlc-ma.org/wp-content/uploads/2023/08/DLC-BSH-Public-Report-7.31.2023.pdf</a> [hereinafter "DLC July 2023 Report"]. <sup>7</sup> *Id.* 

In the discussion below, DLC focuses on 8 broad topics:

- 1. Medication Restraint Updates and Major Concerns Regarding Involuntary Medication Practices;
- 2. Ongoing Physical Plant Conditions Posing Health and Safety Risks to Persons Served and Staff;
- 3. Improper Practices in Provision of Medications for Opioid Use Disorder to Persons Served;
- 4. Inadequate Access to Appropriate Medical Care for Persons Served;
- 5. Poor Access to Treatment and Conditions for New Admissions in the Bradford Units:
- 6. Disparate Treatment and Conditions for Persons Served in the BSH Units at Old Colony Correctional Center;
- 7. Challenges in Persons Served Continuity of Care; and
- 8. Other Important Issues DLC Is Following.

For PS privacy, DLC uses pseudonyms in discussions of individual PS experiences. DLC offers comprehensive recommendations for improving the legal rights, health, safety, and treatment of PS at the conclusion of the report.

### 1. Medication Restraint Updates and Major Concerns Regarding Involuntary Medication Practices

Since May 2018, DLC has been raising concerns in public reports about the use of involuntary psychotropic medication on BSH and OCCC BSH Unit PS absent a court order. Since Wellpath became the BSH contractor, use of seclusion and 4-point restraints at the prison facility have gone down significantly, but reliance on forced medication has become a mainstay. As DLC has repeatedly described, DOC and Wellpath have employed policies and practices that subject PS to medication absent emergency circumstances in violation of Massachusetts law and have failed to observe documentation and reporting requirements. Most egregious, BSH policy governing the application of involuntary medication explicitly sanctioned medication restraint under the guise of an Emergency Treatment Order (ETO) when a PS presented with behaviors that posed only a "potential harm to self or others" based on a provider risk assessment "that contextualizes the current behavioral presentation with the PS' historical and current risk factors for serious violence leading to significant personal injury or self-harm, or harm to others." An

<sup>&</sup>lt;sup>8</sup> All of DLC's public reports are available here: <a href="https://www.dlc-ma.org/monitoring-investigations-reports/">https://www.dlc-ma.org/monitoring-investigations-reports/</a>.

<sup>&</sup>lt;sup>9</sup> Prior to engaging Wellpath, DOC was subject to litigation and an investigation by DLC concerning excessive, illegal seclusion and restraint practices at BSH. As noted above, both of these matters resulted in settlement agreements for which DLC served as monitor.

<sup>&</sup>lt;sup>10</sup> See M.G.L. c. 123, §21; Rogers v. Comm'r of the Dep't of Mental Health, 390 Mass. 489 (1983); Matter of Guardianship of Roe, 383 Mass. 415 (1981).

<sup>&</sup>lt;sup>11</sup> Bridgewater State Hospital Policy and Procedure Manual – Use of Involuntary Psychotropic Medication, 5.2.1, 5.2.4 (July 12, 2022) (emphasis added).

ETO could be administered absent a present emergency or a finding that it is the least restrictive option. <sup>12</sup> Following DLC's January 2022 report, <sup>13</sup> the Executive Office of Public Safety and Security and DOC argued that ETOs were involuntary medication "for treatment," rather than medication restraint. <sup>14</sup> Through our monitoring, including review of daily reports, restraint and seclusion order forms, and other records, interviews, first-hand observations, and watching video footage, DLC confirmed systemic legal violations in the application of ETOs again during the last reporting period.

Following DOC's January 4, 2024 response to DLC's July 2023 report conveying that Wellpath had "submitted revisions to the Seclusion and Restraint Policy and Involuntary Psychotropic Medication Policy to ensure that they are as closely aligned as possible with M.G.L. c. 123, sec. 21 and relevant DMH policies and regulations," DOC shared draft policies with DLC via email on January 18, 2024. DLC and DOC will be meeting in March 2024 to discuss our other feedback about the draft policy language of both policies provided – entitled Use of Seclusion and Restraint and Use of Involuntary Psychotropic Medication.

During this reporting period, Wellpath indicated that it was providing monthly in-service training to front line nursing department staff that includes restraint and seclusion policy, procedures and processes with a highlight on de-escalation. The BSH Psychiatry Department reported on partnering with Clinical Services and Nursing with the hopes of developing an "educational series on patient engagement and de-escalation in an effort to continue" to reduce seclusions, restraints and manual holds. DLC encourages additional training, but must emphasize that improvements in adherence to legal standards for all forms of restraint and seclusion remain urgent at BSH. DLC also notes that staff training alone is insufficient, as PS consistently report that they do not have enough access to recreational programming (outdoor time, gymnasium, library), they do not have enough privacy, and the area around their room is not quiet. Each of these deprivations may lead to exacerbating symptoms and escalating behavior throughout BSH and, if addressed, could prevent PS escalating in the first place.

Also during the reporting period, Wellpath reported internally comparing medication restraint data to Centers for Medicare & Medicaid Services (CMS) data for other public state hospitals across the country. Although the comparison showed that BSH is at the high end in medication restraint use, DLC is encouraged by the tracking of medication restraint, and comparing, that Wellpath is currently developing.

<sup>&</sup>lt;sup>12</sup> Id. at 5.2.8. 5.2.9.

<sup>&</sup>lt;sup>13</sup> DLC, Public Report on the Efficacy of Service Delivery Reforms at Bridgewater State Hospital (BSH) and Continuity of Care for BSH Persons Served (January 2022) at 30-32. <a href="https://www.dlc-ma.org/wp-content/uploads/2022/02/DLC-BSH-January-2022-Public-Report-2.9.2022.pdf">https://www.dlc-ma.org/wp-content/uploads/2022/02/DLC-BSH-January-2022-Public-Report-2.9.2022.pdf</a> [hereinafter "DLC January 2022 Report"]

<sup>&</sup>lt;sup>14</sup> App. B at 4.

<sup>&</sup>lt;sup>15</sup> *Id.* DOC had previously committed in its June 7, 2023 response to DLC's January 2023 report to "revising BSH policies to utilize the terminology [DLC] feels is required by M.G.L. c. 123 and regulations." DLC, *Public Report on the Efficacy of Service Delivery Reforms at Bridgewater State Hospital (BSH) and Continuity of Care for BSH Persons Served* (July 2023), App. B at 3, <a href="https://www.dlc-ma.org/wp-content/uploads/2023/08/DLC-BSH-Public-Report-7.31.2023.pdf">https://www.dlc-ma.org/wp-content/uploads/2023/08/DLC-BSH-Public-Report-7.31.2023.pdf</a> [hereinafter "DLC July 2023 Report"].

<sup>&</sup>lt;sup>16</sup> Nursing Services Report, BSH Governing Body (September 2023).

<sup>&</sup>lt;sup>17</sup> Psychiatry, Medicine and Dental Report, BSH Governing Body (December 2023).

<sup>&</sup>lt;sup>18</sup> Person Served Survey Spring 2023 Environment of Care, BSH Governing Body (September 2023).

## A. <u>Long Overdue Changes to BSH Medication Restraint Policy and Practice</u> Require Continued Monitoring

#### i. BSH Medication Restraint Policy

DLC is encouraged that much of the amended language in the draft policies DOC provided is responsive to DLC recommendations – not the least of which is removal of ETOs from the categories of involuntary medication sanctioned by BSH policy. Because the Seclusion and Restraint Policy and Involuntary Psychotropic Medication Policy are both in draft form and DLC has a pending meeting with DOC to provide input, we focus below on Wellpath practices during the reporting period ending in December 2023.

#### ii. BSH Medication Restraint Form

In September 2023, Wellpath began reporting involuntary medication that would have formerly been labeled as ETOs as Medication Restraints in anticipation of its revised Involuntary Psychotropic Medication Policy. In early November 2023, DOC trained Wellpath nursing leadership on the "review/submission process for seclusion, restraint, and emergency treatment orders." DLC began receiving Wellpath Medication Restraint orders toward the end of the reporting period, which utilize a new form entitled "S/R - Medication Restraint" – reproduced in **Figure I** below with partial redactions – developed by Wellpath and approved by DOC. DLC was not consulted prior to implementation of this form and received it as part of our monitoring of restraint orders. It is unclear if DOC and/or Wellpath consulted DMH in formulation and implementation of this form.

Upon review of the forms received, DLC has concerns that, though ETOs may be removed from Wellpath's policy, practices around involuntary medication may still not comply fully with Massachusetts law. Of note, Wellpath now uses one set of forms for seclusion/mechanical restraint/manual hold, and this newly developed separate form for medication restraint. In contrast, DMH has only one form for all seclusion and restraint orders – available below at **Figure II**.<sup>20</sup> DLC believes that DMH's singular form is much more efficient and clearer from a record-keeping perspective, more reflective of applicable legal standards, and more indicative of individualized and trauma informed care.

<sup>&</sup>lt;sup>19</sup> Superintendent's Dashboard, Governing Body (December 2023).

<sup>&</sup>lt;sup>20</sup> DMH's Emergency Restraint or Seclusion (R/S) Forms are available at: <a href="https://www.mass.gov/lists/emergency-restraint-or-seclusion-rs-forms">https://www.mass.gov/lists/emergency-restraint-or-seclusion-rs-forms</a>.

Figure I.

Bridgewater State Hospital Bridgewater State Hospital 20 Admín Rd Bridgewater , MA02324	D3113/K - Medicadon Resulant			Bridgewater State Hospital
Resident Name Residen	nt Number	Booking Number	Birth Det	e Date Of Service
Resident Allergies:				
Observed Type Date	Allergy	/	Reaction	
ORDER for Medication Restrains	t			
Date of order:	(8 (2			
Time of order: hour		(required) I	min 🔳	(required)
Type of Emergency: (choose at least one)				
☐ Potential harm to self:				
☐ Actual harm to self:				
☑ Potential harm to others:				
☐ Actual harm to others:				
Indication for Emergency Medication Order:	☑ Treatmei	nt of Acute Sympt	toms 🗹 Restra	int to prevent harm
(choose at least one)				
Patient's Condition:				
Disorganized Behavior				
☑ Disorganized Thinking				
☐ Disorientation				
☐ Compelling Hallucinations				
☑ Paranoia				
☑ Delusional Beliefs				
☐ Goal Directed Behavior				
Describe Situation Creating the Ri	sk:			
Describe the Risk if Medication is	Not Adminis	tered:		
				e

Bridgewater State Hospital Bridgewater State Hospital 29 Admin Rd Bridgewater, MA02324

#### BSH S/R - Medication Restraint

### Bridgewater State Hospital

Resident Name	Resident Number	Sooking Number	Birth Deta	Date Of Service
Describe the Risk if	Medication is Not Admini	stered:	(4	
Least Restrictive I	Means Attempted:			
▼ Verbal de-esca	egine terretering operation to the second of the second o			
☑ Taking space/				
☐ Relaxation exer				
✓ Low stimulation	settina			
☐ Comfort room	•			
Sensory modul	ation intervention			
☑ PRN medication				
☐ Other:				
Response: (or reas	son not attempted)			
Medication Prescri	ibed: (include name, dose	. route)		
		, ,		

Figure II.

COMMONWEALTH OF MASSACHUSETTS---DEPARTMENT OF MENTAL HEALTH

EMERGENCY RESTRAINT OR SECLUSION (R.S) FORM – PART A – Revised 102022

NEW ORDER PAINT DEBRIEFING & COMMENT FORM
Use new forms for each renewal

Gender: M

Med. Rec.#

DOB

NAME

Facility	Unit	Primary Language	ge Race		
Date this Admission	Date R/S Started	Time R/S Started	Time R/S Ended	Total R/S Time (at end of R/S)	d of R/S)
WHAT TRIGGERED THE INCIDENT?	(CIDENT?		DESCRIBE BEHAVIOR REQUIRING EMERGENCY USE/CONTINUANCE OF R/S:	KG EMERGENCY USE/CON	TINUANCE OF R/S:
DESCRIBE ALTERNATIVES TRIED FROM INDIVIDUAL CRISIS) PLAN (SAFETY TOOL) BEFORE RESTRAINT/SECLUSION USED:	S TRIED FROM INDIVIDUA ORE RESTRAINT/SECLUSI	OM INDIVIDUAL CRISIS PREVENTION AINT/SECLUSION USED:	EMERGENCY INTERVENTION(S) USED: Number interventions in the order used. This form covers all interventions used in response to the emergency situation covered by this order. Also place check mark beside intervention used for the most amount of time during an episode.	USED: Number interventions i sponse to the emergency situatio ion used for the most amount of	in the order used. This ni covered by this order. Time during an episode.
CHECK/DESCRIBE OTHER INTERVENTIONS ATTEMPTED: Ask HALTT (are you Hungry? Angry? Lonely? Thirsty? Tri Sensory Interventions Activity change Separate from situation Other:	Ask HALIT (are you Hungry? Angry? Lonely? Thirsty? Tred?) Sensory Interventions Activity change  Separate from situation Offer a PRN medica Offer a Of	ATTEMPTED: sly/ Thirsty/ Tired?) Offer quiet space Offer a PRN medication One-on-one intervention	TIME MEDICATION DOS.	nformation below)  DOSAGE	ROUTE
	18: history, R/S preferences incl	uding position & staff gender	NURSE signature for medication restraint:	straint:	
			STAFF MONITOR	TITLE	TIME: FROM/TO
RISK FACTORS: SIGNIFICANT MEDICAL PROBLEMS, PHYSICAL DISABILITIES:	NT MEDICAL PROBLEMS	, PHYSICAL DISABILITIES:			
Legally Authorized Representative (LAR)/Family Notified, at Time of R/S Yes By	ative (LAR)/Family Notified, 5	rt Time of R/S	SIGNATURES/PRINT Authorized Staff Person' Initiating R/S:		DATE/TIME SEEN
Patient/LAR requests no notification	ication OR	8	Examining Authorized Clinician:		date time
Check if details of LAR/Family notification *See: 104 CMR 27.12(8)(a)	y notification will be documen	will be documented in Progress Note	Authorized Staff Person Authorizing Release:	Release:	date time
					date time

## The BSH Medication Restraint Form Presents Continuing Concerns About Compliance with M.G.L. c. 123, § 21:

- 1. "Types of Emergency." As indicated above, the new BSH S/R Medication Restraint form contains four checkboxes for the Wellpath staff ordering the restraint to indicate rationale under "Type of Emergency": Potential harm to self"; "Actual harm to self"; "Potential harm to others"; and "Actual harm to others." The use of "potential harm" as justification for medication restraint is more permissive than the language of M.G.L. c. 123, § 21 limiting use of restraint to "cases of emergency, such as the occurrence, or serious threat of, extreme violence, personal injury or attempted suicide". Despite a proposed change in policy and the new form, BSH PS remain subject to medication restraint under far more lenient standards than the law of the Commonwealth permits.
- 2. "Indication for Emergency Medication Order." Though framed as a form for medication restraint, the new BSH form includes a section for staff ordering the restraint to indicate what they determine to be the "Indication for Emergency Medication Order" with two checkboxes: "Treatment of Acute Symptoms" and "Restraint to Prevent Harm." DLC presumes that this refers to a clinical indication, but the form is unclear. Nevertheless, the language is misplaced on a form recording the circumstances surrounding a medication restraint. While all restraint is intended in some way "to prevent harm," that intention should not be confused for a justification. In addition, "treatment," as discussed extensively in previous DLC reports covering ETO administration, is not a legal basis for medication restraint under state law. Inclusion of past language used to justify illegal restraint in the guise of ETOs should be struck from the current form to prevent staff confusion and a continuation of illicit restraint practices.
- 3. "Describe Situation Creating the Risk" and "Describe the Risk if Medication is Not Administered." The BSH form provides space for providers to describe what gave rise to the medication restraint and why it needs to be administered. Unfortunately, the form's language suggests that a situation creating "risk" is sufficient to justify medication restraint. As already discussed, M.G.L. c. 123, § 21 does not permit any form of restraint based on risk alone there must be, at the least, a serious threat of extreme violence, personal injury or attempted suicide. The DMH form, on the other hand, clearly calls for the providers to "Describe Behavior Requiring Emergency Use/Continuation of R/S."
- 4. "Least Restrictive Means Attempted." The BSH form provides eight checkboxes of "Least Restrictive Means Attempted" prior to the administration of medication restraint on a PS: "Verbal de-escalation," "Taking space/time-out," "Relaxation exercise," "Low stimulation setting," Comfort room," "Sensory modulation intervention," "PRN Medication," and "Other." DLC's review of the forms completed indicated that, in practice, as on the redacted form above, some of these options are underutilized and those commonly checked off are not, in actuality, indicative of meaningful interventions. "PRN medication" is almost always checked, as are "Taking space/time-out" and "Low stimulation," euphemisms for the seclusion in the PS' room or in a seclusion room that generally takes place prior to medication restraint at BSH. While "Verbal De-escalation" is also often utilized, this is the only mode of verbal engagement offered, and one which, in DLC's observations, can merely amount to telling someone to stop a behavior. Accordingly, DLC has concerns that medication restraint of PS is not limited to use when it "is the least restrictive, most appropriate alternative available," as § 21 mandates.

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<sup>&</sup>lt;sup>21</sup> M.G.L. c. 123, §21 (emphasis added).

DMH's form includes two fields for capturing information to reflect compliance with the least restrictive requirement. First, the one-page form requires providers to "Describe Alternatives Tried from Individual Crisis Prevention Plan (Safety Tool) Before Restraint/Seclusion Used." It then provides a space for providers to "Check/Describe Other Inventions Attempted" from eight more person-focused and: "Ask HALTT (are you Hungry? Angry? Lonely? Thirsty? Tired?)"; "Sensory Interventions"; "Activity Change"; "Separate from situation"; "Offer quiet space"; "Offer PRN medication"; One-on-one intervention"; and "Other."

Omissions from the BSH Medication Restraint Form Indicate Failures to Provide Individualized, Trauma Informed Care When Administering Medication Restraint:

- 1. Unlike the DMH form ("What Triggered the Incident?"), the BSH form lacks any space to identify what triggered the incident that gave rise to the medication restraint, which is key to allowing the PS and Wellpath to attempt to address these triggers and prevent future uses of restraint.
- Unlike the DMH form ("Describe Alternatives Tried from Individual Crisis Prevention Plan (Safety Tool) Before Restraint/Seclusion Used"), the BSH form makes no reference to consultation with or utilization of alternatives to restraint from PS' individualized treatment or crisis prevention plans.
- 3. Unlike the DMH form ("Trauma Considerations: history, R/S preferences including position and staff gender"), the BSH form does not call for staff to consider or record PS trauma histories when determining how to administer medication restraint. Indeed, as discussed below, BSH continues to utilize a team of security staff in riot gear in most medication restraints.
- 4. Unlike the DMH form ("Risk Factors: Significant Medical Problems, Physical Disabilities"), the BSH form does not call for staff to consider or record significant medical conditions or physical disabilities of PS when determining how to administer medication restraint. The BSH has only one field for "Resident Allergies": DLC understands that this is to record medication allergies.

Omissions from the BSH Medication Restraint Form Show a Failure to Prioritize Disparities Based on Race, Ethnicity, and Primary Language:

 The DMH form includes fields for the "Primary Language" and "Race" in the identifying information for the individual involved in the restraint or seclusion. The BSH form does not, missing another opportunity to track any disparities in the administration of medication restraint and other quality of care issues for PS of color. See below 1.E. Section.

#### B. ETO/Medication Restraint Data

Table X. ETOs/Medication Restraints by Month (Jun 16	c 15, 2023)	
Month	Number of Days	Number of Administrations
June (16-30)	15	15
July (1-31)	31	42
August (1-31)	31	40
September (1-30)	30	30
October (1-31)	31	48
November (1-30)	30	34
December (1-15)	15	22
Total (Jun 16-Dec 15)	183	231
Unique PS Receiving ETO/Medication Restraint	118	

#### C. Staff Violence During the Administration of Involuntary Medication

DLC continued to review video footage of involuntary medication administration on PS, viewing footage of 16 incidents provided by DOC during this 6-month reporting period. <sup>22</sup> Based on the similarity of videos viewed across reporting periods, <sup>23</sup> DLC finds that regular use of violent force by staff in the administration of involuntary medication and the foreseeable likelihood for PS traumatization caused by Wellpath's practices are a fixture at BSH. <sup>24</sup> Under DOC's control, involuntary medication and prison practices merge to produce violent, often dehumanizing, experiences for PS of a team of Wellpath security staff, known as Therapeutic Safety Technicians (TST), entering their cells dressed in riot gear, forcing them to the bed with a plexiglass shield, and holding them face-down to expose their buttocks for a nurse to administer intramuscular injections.

Just as the administration of involuntary medication may be violent, the apprehension of PS on the unit for the purpose of placing them in seclusion to facilitate the administration may be too.

In one video viewed by DLC, PS "Abdul" was held in a locked interview room on the unit. When he was ordered into seclusion, 4 TSTs entered the room and chased Abdul as he ran away from the door, terrified and cowering in the confined space. The TSTs pulled Abdul by his arms as his shirt lifted over his chest, and dragged him by the arms out of the interview room, through the hallway, and to the main entrance area of the unit. There, 9 staff members stood watching the incident with 1 recording it using a handheld camera. Once out of the interview room, the TSTs stopped to apply handcuffs, then dragged Abdul to a seclusion room. In the seclusion room, the 4 TSTs held him face down on the 4-point restraint bed while he was still in handcuffs. They pulled down Abdul's pants and he screamed as a nurse administered multiple intramuscular

<sup>&</sup>lt;sup>22</sup> These included extremely delayed productions of footage of 10 incidents DLC requested in the last reporting period.

DLC July 2022 Report at 11-14; DLC January 2023 Report at 20-25; DLC July 2023 Report at 20-26.
 Wellpath is cognizant of the traumatic impact that violent interactions may have on staff. It has created safe spaces for staff on units and a newly renovated staff café and offers access to a therapy dog for staff.

injections into his buttocks. The TSTs then stood Abdul up, his pants still around his ankles, and pressed him against the wall as they removed the handcuffs. TSTS put Abdul back on the restraint bed and secured 4-point restraints around his limbs, where he remained for over an hour. Throughout the altercation, Abdul often screamed and cried. Abdul sustained multiple cuts to his back from being dragged and showed DLC cuts and abrasions on his hands and arms.

These violent practices disrupt the milieu and escalate trauma for both PS and staff. In Wellpath's Fall 2023 Person Served Survey, PS were given 36 statements to rate on a Likert scale from 1 (strongly disagree) to 5 (strongly agree) and 82 PS turned in a usable survey. Notably, the statement that received the highest number of "1's" of all 36 questions was "I feel safe to refuse medication or treatment during my hospital stay. Twenty-two PS rated the question a "1" (strongly disagree); 16 PS rated it a "2" (disagree); and 11 PS rated it a "3" (neutral). This alarming snapshot finds nearly half (38/82) of PS who returned the survey do not feel safe refusing medication at BSH.

Wellpath hosts a monthly PS Governance meeting for select PS to discuss their concerns amongst select PS and Wellpath administrators. During one recent meeting, a PS spoke up to share something quite different that the typical facility or program issues. He said that "IM teams" – referring to the riot gear clad TSTs – should be trained to be more peaceful and to "not overdo the force." He bravely shared that this was not only his experience, but also that of other PS. DLC concurs, as dozens of PS we have interviewed over the course of monitoring shared remarkably consistent accounts.

One recently discharged PS with whom DLC spoke described when administering forced medication, saying staff at BSH "hit you with the shield" and "use mad force on you." Another PS described the confrontations with TSTs in PS cells as being like "a fight with 4 to 5 people." Others describe staff not taking PS seriously, and arguments with staff leading directly to intramuscular injections without any attempts at intermediate interventions. They also talk about the physical pain and psychological trauma of handcuffs and 4-point restraints. One former PS who was forcibly medicated reported that "I still think about it even now."

PS describe sustaining injuries from these experiences, like PS Abdul above – injuries that are often ignored. One PS who reported receiving intramuscular injections 4 times while at BSH told DLC that the last time he received forced medication, a TST had "cracked his head" against a wall. He remained in pain for some time afterward, but rather than provide him access to a doctor, staff locked him in his cell; DLC found no evidence of a head injury assessment in his medical records.

Multiple PS also described Wellpath's violent imposition of forced medication as "unnecessary." One reason underlying this characterization is that, as discussed in DLC's July 2023 report, <sup>26</sup> PS report that Wellpath staff fail to offer oral medication prior to resorting to intramuscular injection; or, if staff do offer oral medication, they often fail to inform the PS that refusal will result in an intramuscular injection by force. One PS with whom DLC spoke described having refused an oral medication offer without any understanding of the consequences. When TSTs arrived, he requested the oral medication in order to avoid a traumatic forced injection, only to be told by staff that it was "too late." To date, Wellpath documentation rarely shows whether PS were offered involuntary medication via oral administration. DLC has serious concerns about

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<sup>&</sup>lt;sup>25</sup> An additional 22 PS returned completed surveys but were given the wrong survey to complete. Patient Survey Report, Governing Body (December 2023).

<sup>&</sup>lt;sup>26</sup> DLC July 2022 Report at 27-28.

this practice as well as DOC's and Wellpath's lack of respect for PS bodily autonomy and their inability to operationalize use of the least intrusive/restrictive measures in the application of forced medication.

## D. <u>Inappropriate Medication Administration Delays and Lack of Justification</u> for Chemical Restraint

Consistent with findings in previous reporting periods, video footage DLC reviewed included multiple instances when there was significant delay between the incident that gave rise to the involuntary medication order and the forceful implementation of the order on PS secluded in their cells. These significant delays call into question the necessity of the original order as well as the necessity and legality of the ultimately administered medication. If the "emergency" justifying the restraint has passed and it is no longer the "least restrictive" option available, medication restraint is not sanctioned by M.G.L. c. 123, § 21.

In particularly striking video footage, PS "Andre" received involuntary medication after he had been secluded in his room for an hour. The manual hold order for the precipitating incident described Andre as "aggressively postur(ing)" towards his peer, who then "aggressively assaulted" him. TSTs used a manual hold to separate them and bring them to their respective cells. During the ensuing hour-long seclusion, Andre was served breakfast, drank a box of milk, ate an apple, and spent time reading in bed. The ETO progress note for the incident indicated that the only "least restrictive option" attempted was offering PRN medication. When the TSTs in riot gear arrived and entered his cell, he stood facing the cell wall, pulled his own pants down, and raised his hands above his head in surrender. Still, the ETO administration proceeded with no reassessment or regard for the fact that the circumstances did not meet legal standard for medication restraint. TSTs held Andre as he remained standing against the wall while the nurse gave him the intramuscular injections in his buttocks.

In another saddening video, a small, older man, PS "Frank," was walking around his room, gesturing and talking to himself for 20 minutes. He then kicked his room door, sat down on his bed and, after 5 minutes, got under his covers facing the wall in a fetal position. Three large TSTs then enter Frank's room and talk to him as he remains under his covers. A TST lifts up the sheets to expose his buttocks. Frank appears upset but remains still. Another TST enters and all 4 TSTs reposition Frank onto his side and hold him as a nurse administers intramuscular medication. Frank appears to be crying and in distress, and he lies there coiled up in bed after he is left alone in his room.

Whatever Wellpath staff's initial rationale for involuntary medication order in the above examples, the delay and unthreatening behavior of the PS require reconsideration of the order. Cases like these raise serious questions about DOC's and Wellpath's medication restraint practices that demand answers.

#### E. Data Re: Race/Ethnicity of PS Subjected to Medication Restraint

As DLC has previously reported, it has long been the case that individuals who identify as Black and/or African American are greatly overrepresented in the BSH population, but demographic data concerning the PS population has been incomplete due to PS categorized as "unknown" race/ethnicity. DOC Institutional Fact Cards present demographic information of the population of all DOC facilities, including BSH. The July 2023 DOC Institutional Fact Cards showed that 23% of the BSH population had and "unknown" race/ethnicity.<sup>27</sup> This was an improvement from the 33% "unknown" in DOC's January 2023 data, but was still out of line with other DOC facilities and reflects an alarming trend of BSH failing to gather key statistics about PS. Indeed, in the July 2023 statistics, BSH accounted for 53 of 99 total individuals in custody with "unknown" race/ethnicity in all DOC's 13 institutions.<sup>28</sup>

Table 1. BSH Population and MA Population by Race/Ethnicity (July 2023)					
Race/Ethnicity	BSH Population <sup>29</sup>	Massachusetts Population <sup>30</sup>			
White	42% (98)	70%			
Black or African American	21% (49)	10%			
Unknown	23% (53)	N/A			
Hispanic	12% (28)	13%			
Asian or Pacific Islander	2% (4)	8%			
Other (American Indian and Alaska Native, two or more					
races)	N/A	3%			

The significant number of "unknowns" has made DLC's tracking efforts regarding racial equity and the incidence of restraint, seclusion and, involuntary medication at BSH difficult and may have serious implications for access to and quality of treatment for BSH PS, as discussed at length in DLC's July 2023 report.<sup>31</sup> Wellpath provides DLC the raw data that includes the race/ethnicity of those PS who are subjected to these extreme interventions, but assessing proportionality – i.e. whether Black/African-American PS or other groups are disproportionately subject to them – requires accurate race/ethnicity index figures from DOC.

DLC analyzed involuntary medication administration data based on Medication Restraint and ETO documentation from the recent reporting period to create the chart below, comparing the total number of involuntary medication administrations by race/ethnicity, as well as the unique number of individuals receiving them by race/ethnicity.

<sup>29</sup> Id.

<sup>&</sup>lt;sup>27</sup> DOC, July 2023 MA DOC Institutional Fact Cards, <a href="https://www.mass.gov/doc/institutional-fact-cards-july-2023/download">https://www.mass.gov/doc/institutional-fact-cards-july-2023/download</a>.

<sup>&</sup>lt;sup>28</sup> *Id*.

<sup>&</sup>lt;sup>30</sup> U.S. Census Bureau, *QuickFacts: Massachusetts* (July 1, 2023), https://www.census.gov/quickfacts/fact/table/MA/PST045223.

<sup>&</sup>lt;sup>31</sup> DLC July 2023 Report at 33-35. For instance, without knowledge of racial/ethnic makeup of its nearly 250-person census, BSH cannot feasibly provide culturally competent mental health care or medical care to its PS population. Further, failure to gather race/ethnicity information could mean similar failures in gathering other complete or accurate information about PS, including their primary languages and medical histories. *Id.* 

Table 2. ETOs/Medication Restraints by Race/Ethnicity (June 16, 2023 – December 15 2023)						
Race/Ethnicity	BSH Population <sup>32</sup>	Number of Administrations	Unique PS Receiving ETO/MR			
White	42% (98)	128 (55%)	64 (54%)			
Black or African American	21% (49)	94 (41%)	48 (41%)			
Unknown	23% (53)	2 (1%)	1 (1%)			
Hispanic	12% (28)	1 (0%)	1 (1%)			
Asian or Pacific Islander	2% (4)	6 (3%)	4 (3%)			
Other (American Indian and Alaska Native, two or more races)	N/A	N/A	N/A			
Total	100%	231	118			

According to the DOC's data, Black and African American PS are overrepresented at BSH and even more overrepresented in ETO and Medication Restraint administration at BSH. Black and African American PS receive 39% of all administrations and made up 41% of the unique PS receiving ETOs and Medication Restraint during this reporting period.

Though released after the reporting period, DLC was pleased to see a marked improvement in the BSH demographic data in DOC's January 2024 Institutional Fact Cards, with PS designated has having an "unknown" race/ethnicity fell to 8%. Noticeably, Table 2 below illustrates that the only category that increased in percentage with the reduction of the "unknown" percentage is "Black or African-American." While that may be coincidence, DLC intends to explore what changes in Wellpath or DOC practices led to this improved data collection.

Table 3. BSH Population and MA Population by Race/Ethnicity				
Race/Ethnicity	BSH Population <sup>34</sup>	Massachusetts Population <sup>35</sup>		
White	44% (111)	70%		
Black or African American	34% (85)	10%		
Unknown	8% (20)	N/A		
Hispanic	11% (27)	13%		
Asian or Pacific Islander	3% (7)	8%		
Other (American Indian and				
Alaska Native, two or more				
races)	N/A	3%		

<sup>33</sup> DOC, January 2024 MA DOC Institutional Fact Cards, <a href="https://www.mass.gov/doc/institutional-fact-cards-january-2024/download">https://www.mass.gov/doc/institutional-fact-cards-january-2024/download</a>. DLC had to adjust the percentages in the BSH Fact Cards to reflect the total number of PS per the Race/Hispanic Ethnicity groups – 250.

<sup>34</sup> Id

<sup>32</sup> Id

<sup>&</sup>lt;sup>35</sup> U.S. Census Bureau, *QuickFacts: Massachusetts* (July 1, 2023), <a href="https://www.census.gov/quickfacts/fact/table/MA/PST045223">https://www.census.gov/quickfacts/fact/table/MA/PST045223</a>.

# 2. Ongoing Physical Plant Conditions Posing Health and Safety Risks to Persons Served and Staff

DLC monitoring activities this reporting period again confirmed that environmental contamination and concomitant risks to the health and safety of PS and staff continue. For the fourth time, DLC engaged expert Gordon Mycology Laboratory, Inc. (Gordon Mycology) to conduct an onsite visual inspection and gather culturable surface swab samples at BSH. As discussed below, Gordon Mycology confirmed there has been little change in the presence of mold throughout BSH. Thus, DLC repeats, as we have in each semi-annual report since May 2018, that the state of BSH's physical plant as well as the economic inefficiency of the Commonwealth sinking money into its aged, failing infrastructure warrant the facility's closure.<sup>36</sup>

DLC's monitoring efforts first encompassed mold inspections in 2018. Based on reports from BSH staff and PS alike of symptoms consistent with exposure to poor air quality and information about mold blooms in certain areas, DLC first called upon DOC to conduct comprehensive mold surface sampling. DOC refused. DLC next found probable cause to initiate an investigation into the mold contamination pursuant to our authority as the P&A for the Commonwealth, but DOC then refused to allow DLC to inspect areas DOC deemed inaccessible to PS<sup>37</sup> – such as BSH's mechanical rooms housing the HVAC systems and basement areas that were known to be infested with mold. DLC sought assistance from the Legislature to ensure that we would be able to fulfill our mandate of guarding against abuse and neglect of persons with disabilities at BSH.

Equipped with the authority of Budget Line Item #8900-0001 covering infrastructure issues and the use of "methods including, but not limited to, testing and sampling the physical and environmental conditions, regardless of whether they are utilized by patients," DLC has retained Gordon Mycology to conduct mold inspections that include expert observations and surface swab sampling in December of 2019, 2021, 2022, and 2023. Every inspection has revealed mold in almost every area swabbed by the expert, including HVAC systems and housing unit vents. Gordon Mycology has consistently provided extensive mold remediation and maintenance recommendations. In response, DOC reported in 2022 completing mold removal and repairs; adopting new cleaning methods and products; entering into a contract to conduct a quarterly facility cleaning program; purchasing UVS light and HEPA filtration units for areas including housing unit common areas, "staff critical areas," and mechanical rooms; and beginning a Division of Capital Asset Management and Maintenance (DCAMM) project with a projected cost of \$2,496,000 to replace underground and steam condensate lines at BSH.<sup>38</sup> Unfortunately, Gordon Mycology found little to no meaningful change in mold presence in the December 2022 or December 2023 inspections despite the significant expense to the Commonwealth. DLC did not receive any updates concerning additional remediation efforts or testing during this reporting period beyond receiving confirmation from DOC that the contract for quarterly facility cleaning was still in place and unchanged.

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<sup>&</sup>lt;sup>36</sup> All DLC's past public reports concerning investigation and monitoring activities at BSH are available at: https://www.dlc-ma.org/monitouing-investigations-reports/.

<sup>&</sup>lt;sup>37</sup> DLC's federal P&A authority provides "reasonable unaccompanied access to facilis, including all areas which are used by residents, are accessible to residents, and to programs and their residents as reasonable times...." 42 C.F.R. § 51.42.

<sup>&</sup>lt;sup>38</sup> January 2023 DLC Report at 9-10.

#### A. December 2023 Mold Expert Site Inspection

DLC returned to BSH with Gordon Mycology on December 19, 2023. Gordon Mycology's details its findings from the site inspection in the February 12, 2024 Mold Inspection Report, attached hereto with the laboratory results as **Appendix C**. In it, Gordon Mycology concluded as follows:

Many of the sources of mold growth identified during the 2019, 2021, and 2022 inspections of the Bridgewater State Hospital buildings and HVAC systems were confirmed to still be present (visually and with laboratory data) during the current 2023 inspection. This indicates that the necessary mold remediation, cleaning, and maintenance actions have not been performed (or kept up with as regularly as they need to be). HVAC systems observed during the inspection continued to be in deplorable condition, some with air handlers in wet and flooded basements with rampant mold growth and asbestos. The black dust/debris inside HVAC system air handlers and supply diffusers remained, seemingly untouched, along with unacceptable levels of mold growth; the air coming through these systems is what persons served and building staff members must breathe on a daily basis. Even sections of HVAC systems that had been professionally cleaned were confirmed to be filthy and riddled with active mold growth after the cleaning.

Significant and long-term basement water problems have been and were still occurring at the time of this inspection. The leaks have gone, for the most part, unnoticed and/or were ignored [(] based on the amount of rust, water damage, corroded pipes, and widespread mold growth). HVAC system air handlers in wet basements and systems with major problems (absence of filters, unfiltered and unconditioned outdoor air coming directly into the systems, absence of regular maintenance and specialized cleaning, etc.) have resulted in significant mold growth within the systems that provide air to people living and working in the buildings. There has been neglect of critical building systems. Mold remediation performed by an unqualified company who did not follow industry standards and procedures was proven to be inadequate, unsuccessful, deficient. There also are remaining questions regarding the completeness of the asbestos abatement; there appeared to be potentially asbestos-containing materials in the basements that should be investigated by an independent (not Arcadis) asbestos inspector.

Overall, this inspection suggests that inappropriate and harmful actions pertaining to the control and remediation of mold growth in the buildings of Bridgewater State Hospital continue and many of the 2019, 2021, and 2022 recommendations were largely ignored. These inactions have caused the mold problems to become worse in certain areas observed and potentially more harmful to those who work and live in the facility. Based on 4 years of Bridgewater State Hospital inspections by [Gordon Mycology], 27 years of professional mold/indoor air quality inspection history and experience, and industry accepted guidelines for indoor spaces contaminated with mold, [Gordon Mycology] is concluding that the facility should not be occupied until these problems have been fully resolved and the buildings retested to verify that the moisture and mold sources have been removed and resolved, respectively.<sup>39</sup>

<sup>&</sup>lt;sup>39</sup> App. C at 17-18 (emphasis added).

To allow for comparison with previous site inspections, Gordon Mycology visually inspected and gathered samples in the Administration Building; Attucks, housing the cafeteria, library, gym, and other program space; the Lighthouse Building, which houses BSH's medical services, admissions, and the medical housing unit; and three housing unit buildings – Lenox, Carter, and Adams. Select photographs taken by Gordon Mycology during the site inspected are provided in **Appendix D**.

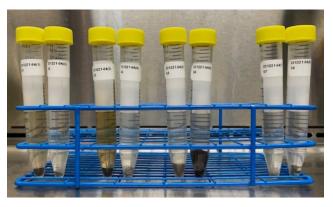
This reporting period, Gordon Mycology inspected the Lighthouse medical housing unit and the unit's dedicated HVAC room for the first time. DLC highlights the inspection findings from the Lighthouse medical housing unit, in particular, due to its novelty in this report and the known medical vulnerabilities of residents of the unit. Additionally, DOC informed DLC that contractor Select Demo had just cleaned the HVAC room as part of the quarterly cleaning program within weeks of the site inspection. Keeping this in mind, Gordon Mycology's findings set forth below are both astounding and indicative of the overall troubling state of HVAC diffusers in housing units and HVAC rooms, air handlers, and filters that serve BSH PS and staff:

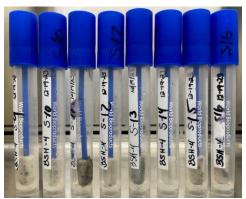
- Lighthouse (Medical) Building First Floor
  - Supply air diffusers were filthy, containing the same black dust/debris as in all the inspected years
  - Supply air diffusers with condensation drip marks
  - Supply air diffusers had been painted but the filth and rust could be seen on surfaces that were missed by the paint; painting over rusty, dirty diffusers is unacceptable...
  - HVAC room (not previously inspected)
    - The room had reportedly been professionally cleaned/remediated since
    - the 2022 inspection
    - The painted concrete walls were filthy with some mold growth
    - There was trash and debris on the floor
    - Potential asbestos containing materials on heating pipes next to the
    - HVAC air handler
    - Heavy mold growth on paper-covered fiberglass and potential asbestos
    - covering heating pipes
    - HVAC air handler
      - Two inch filters were dirty, darkly discolored
      - Air handler with handfuls of accumulated organic debris sitting in its base; debris was on both sides of the filters Internal components were rusted
      - Beneath the accumulated debris, there was a thick layer of stuck on dust/debris because it has gotten wet, which matted it down
      - This unit has not been cleaned in a very long time and is overdue for specialized cleaning and component replacement/upgrade as needed
      - This is a medical building with sick, and some chronically ill, people who need to be breathing clean air; this HVAC system is not providing that quality of clean air.

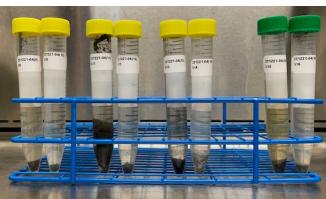
#### i. Surface Swab Laboratory Testing

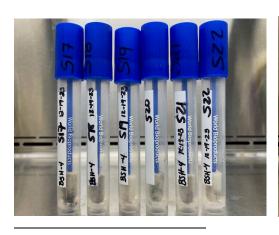
In total, Gordon Mycology gathered 22 culturable surface swabs, pictured below, and sent them to QLab for processing and analysis for the presence, quantity, and type of mold. 40 These swabs were taken from a small fraction of the surfaces that Gordon Mycology visually inspected and either observed visible mold or conditions of chronic moisture "more than sufficient to support mold growth."41 In addition, Gordon Mycology took samples of black dust on an HVAC system supply air diffuser and from an HVAC system return air duct for processing by MicroVision Laboratories, Inc. "to determine the components of the black dust within the ductwork in occupied areas of the buildings. 42

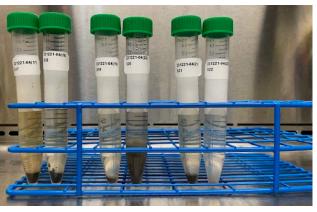












<sup>&</sup>lt;sup>40</sup> App. C at 1.

<sup>&</sup>lt;sup>41</sup> App. C at 11.

<sup>&</sup>lt;sup>42</sup> App. C at 2.

#### Mold Findings:

Cultured surface samples taken from the following surfaces found living mold levels that far exceeded levels "expected on the same materials if they had not been exposed to chronic moisture from multiple sources that have not been changed since the last inspection":

- Administration Building basement room AD-11 HVAC system supply air diffuser
- Administration Building Roll Call Room HVAC system supply air diffuser
- Lighthouse basement main room Visible mold on painted HVAC duct seam
- Lighthouse basement boiler room visible mold on HVAC system ductwork wrap
- Lighthouse basement IT room Visible mold on electrical panel plywood
- Lighthouse basement IT room Visible mold on underside of particleboard table
- Lighthouse HVAC supply air diffuser outside Admissions Office
- Lighthouse dormitory hallway HVAC system supply air diffuser
- Lighthouse mechanical room supply side of HVAC system air handler
- Lenox supply air diffuser in shower hallway
- Lenox basement Visible mold on HVAC system ductwork wrap
- Lenox basement Visible mold on mesh ductwork wrap patch
- Attucks dining hall HVAC system supply air diffuser, at water damaged ceiling
- Carter Building HVAC system supply air diffuser in day room (game room)
- Carter Building hallway HVAC system return air grille
- Adams Building Day Room HVAC system supply air diffuser
- Adams Building basement Visible mold on HVAC system ductwork wrap<sup>43</sup>

Gordon Mycology noted that "[s]ome of these surfaces have been professionally 'remediated,' however, if visible mold growth remains on the surface, it is automatically concluded that the remediation has failed." With respect to surfaces that have reportedly been professionally remediated, "[t]hese samples show that mold is still alive and actively growing year after year even with the cleaning and remediation efforts that have been performed." As stated above, the presence of visible mold growth on a surface shows remediation has failed. 45

Five samples Gordon Mycology collected from surfaces with visible mold, resulted in low or no detectable live mold. Gordon Mycology requested that these samples be analyzed using light microscopy because dead mold "would not grow in culture but would still be present visible under the microscope." Mold was confirmed visually and with microscope analysis on:

- Administration Building basement mechanical room Visible mold on pipe insulation
- Lighthouse basement boiler room Visible mold on pipe insulation wrap
- Carter Building basement Visible mold on HVAC system ductwork wrap<sup>47</sup>

The absence of high levels of culturable mold indicates that "the remediation company soaked/heavily sprayed surfaces with a sanitizer or the mold has died on its own," though the latter is not typical.<sup>48</sup> Nevertheless, "dead mold spores and structures contain the same harmful

<sup>46</sup> App. C at 1.

<sup>&</sup>lt;sup>43</sup> App. C at 10.

<sup>&</sup>lt;sup>44</sup> App. C at 10.

<sup>&</sup>lt;sup>45</sup> *Id*.

<sup>&</sup>lt;sup>47</sup> App. C at 10-11.

<sup>&</sup>lt;sup>48</sup> App. C at 11.

components and chemicals as those that are alive."<sup>49</sup> "There cannot be visible mold growth (dead or alive), dust and debris, or water damaged materials after professional mold remediation has been completed," as Gordon Mycology observed in areas throughout BSH.<sup>50</sup>

Laboratory testing of Gordon Mycology's samples identified the following mold types growing on the tested BSH surfaces: *Aspergillus niger*, *Aspergillus ochraceus*, *Aspergillus sydowii*, *Aspergillus ustus*, *Aspergillus versicolor*, *Aureobasidium*, *Chaetomium*, *Cladosporium*, *Epicoccum*, *Memnoniella*, *Penicillium*, *Pithomyces*, *Stachybotrys*, and *Trichoderma*.<sup>51</sup>

It is, of course, well understood that mold exposure can be harmful to people's health. Gordon Mycology noted that *Stachybotrys* – also known as black mold – found in the Lenox basement mechanical room "produces satratoxin, a powerful mycotoxin that is neurotoxic and inflammatory" and *Aspergillus*, a mold type confirmed to be present on most of the tested surfaces at BSH, including HVAC systems, can cause a host of health issues.<sup>52</sup>

Aspergillus can cause chronic lung and sinus infections, produces mycotoxins, and is a common allergenic mold. Chronic exposure to these and the other molds confirmed in the buildings can cause a myriad of health problems, many of which may not initially be attributed to mold; colds that take longer to clear, chronic sinus infections, persistent coughing, itchy and runny eyes, sore throats, exhaustion, lethargy, mental fogginess, etc. People with underlying health conditions and weaker immune systems are most affected by chronic mold exposure.<sup>53</sup>

While life-threatening respiratory infections and infections of other organs are less common, individuals with respiratory conditions like asthma, autoimmune diseases, and conditions that may disrupt the functioning of the immune system, such as diabetes, are at heightened risk.<sup>54</sup> As discussed in previous DLC reports, many PS have co-occurring chronic and/or serious medical conditions, including diseases that impact their immune systems (e.g., lupus, hepatitis C). Moreover, studies indicate that exposure to mycotoxins may also be associated with "fatigue, musculoskeletal pain, headaches, anxiety, mood, cognitive impairments, and depression." Many of these symptoms may readily be treated and medicated as mental health symptoms if not properly screened and addressed.

<sup>50</sup> App. C at 11.

2918(18)30229-7/fulltext.

<sup>&</sup>lt;sup>49</sup> *Id*.

<sup>&</sup>lt;sup>51</sup> App. C at 11; *see* Centers for Disease Control and Prevention (CDC), Fungal Diseases: Aspergillosis, <a href="https://www.cdc.gov/fungal/diseases/aspergillosis/index.html">https://www.cdc.gov/fungal/diseases/aspergillosis/index.html</a>.

<sup>&</sup>lt;sup>52</sup> App. C at 11.

<sup>&</sup>lt;sup>53</sup> App. C at 11.

<sup>54</sup> See, e.g., L. Fernandez-Trujillo, et al., *Invasive Aspergillosis in a Patient with Diabetes Mellitus as the Only Risk Factor: Case Report and Literature Review*, J. Investigative Medicine High Impact Case Reports, Vol. 11, (May 19, 2023), <a href="https://www.ncbi.nlm.nih.gov/pmc/articles/PMC10201002/">https://www.ncbi.nlm.nih.gov/pmc/articles/PMC10201002/</a>; J. Seemiller, et al, *Diagnostic Dilemma of Aspergillus Meningitis in Patients With Hepatitis C Virus Co-Infection: A Case Series*, Vol. 12, No. 1, J. Neurology Research, <a href="https://www.neurores.org/index.php/neurores/article/view/706/688#:~:text=Life%2Dthreatening%20infections%20from%20Aspergillus,increase%20susceptibility%20to%20cerebral%20aspergillosis; CDC, *Fungal Diseases: Aspergillosis*, <a href="https://www.cdc.gov/fungal/diseases/aspergillosis/index.html">https://www.cdc.gov/fungal/diseases/aspergillosis/index.html</a>.

55 A. Ratnaseelan, et al., <a href="https://www.cdc.gov/fungal/diseases/aspergillosis/index.html">https://www.cdc.gov/fungal/diseases/aspergillosis/index.html</a>.

Clinical Therapeutics, Vol. 40, No. 6, 912 (2018), <a href="https://www.clinicaltherapeutics.com/article/S0149-">https://www.clinicaltherapeutics.com/article/S0149-</a>

#### Particulate Matter Findings:

The two samples of black dust/debris Gordon Mycology gathered from HVAC system supply and return ductwork for particulate matter testing contained, in order of occurrence:

- B1 Organic debris, cellulose and synthetic fibers, minerals, glass fibers, opaque particles
- S22 (B2) Minerals, organic debris, opaque particles, glass fibers, cellulose fibers<sup>56</sup>

Gordon Mycology explained that "[t]he glass fibers come from the deteriorated fiberglass linings inside the air handlers," which can irritate people's lungs, sinuses, eyes, and mucus membranes when released from air handling systems into the air, cause exacerbate asthma, and give rise to other health problems.<sup>57</sup>

The organic debris is continually coming from the air handlers which were filthy and full of trash and debris, including dirt, leaves, mold, etc. Supply diffusers should be delivering clean air that is free from all of these particle types to the occupied spaces.<sup>58</sup>

#### ii. Experiences of PS Impacted by BSH Conditions

The contamination described above undeniably impacts PS. Even since Gordon Mycology's site inspection in December, DLC has been in contact with PS impacted by the conditions of the physical plant:

- PS "Albert," in his 50s with a 35-year history of asthma, began reporting to DLC in January that he was having respiratory symptoms consistent with past experiences in environments with mold and mildew. While his asthma had previously been in remission, Albert quickly started sneezing, coughing up phlegm, and having difficulty breathing and catching his breath with physical activity upon his transfer to the Hadley Unit. Once Albert was provided with an inhaler—reportedly, roughly 3 weeks after he arrived on Hadley—nursing staff reported that Albert was requesting it for his symptoms up to 4 times per day, including during overnight shifts. He has requested to be transferred to a different unit repeatedly, but remains in the Hadley unit.
- PS "Jimmy," a recently admitted PS in Bradford 1 Unit reported to DLC in February that he could see the dust and mold blowing out of the vent in his room and feel it exacerbating his asthma symptoms: a tightening in his chest, pain when breathing, and coughing up phlegm. Jimmy said that staff typically provide him with a pump of his asthma inhaler when he is let out of his room, but that, unlike at the county correctional facility he was transferred from, BSH did not allow him to keep it on his person or stored in his cell. Jimmy said that he twice had asthma attacks at night due to the poor air quality in his room; in both instances, when he attempted to get staff attention to bring his inhaler, it took an inordinate amount of time, placing him at great risk.

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<sup>&</sup>lt;sup>56</sup> App. C at 11-12.

<sup>&</sup>lt;sup>57</sup> App. C at 12.

<sup>&</sup>lt;sup>58</sup> *Id*.

# 3. Improper Practices in Provision of Medications for Opioid Use Disorder to Persons Served

Over the past year, DLC has received multiple accounts of PS committed for evaluation or treatment to BSH who: (1) despite receiving medication for opioid use disorder (MOUD) prior to their arrival, were not prescribed MOUD upon admission; (2) were prescribed reduced dosages of MOUD while at BSH that they found to be subtherapeutic; and/or (3) had their MOUD prescription discontinued and/or changed without taper during their commitment. DLC raised our concerns about this issue in our public report issued last January. DLC obtained medical records of 5 PS to review quality of MOUD care provided at BSH. While DLC reviewed these records, we also retained Dr. Evan Gale, Associate Medical Director of the Addiction Consult Team and Director of Inpatient Training of the Addiction Medicine Fellowship at Massachusetts General Hospital, to conduct an expert review to determine whether Wellpath's MOUD practices comport with the medical standard of care. Dr. Gale's expert review of the 5 PS cases and conclusions make clear that BSH care for PS with opioid use disorder raises significant concerns.

Dr. Gale found BSH providers conflate mental health symptoms with withdrawal symptoms and, based on the stigma of both and lack of management of medication options, provide substandard care. His review of the 5 cases revealed the following common themes:

- BSH's prevailing concerns around methadone leads to a lack of management that is substandard even when taking the most conservative commonly accepted methadone management approaches.
- BSH is not comfortable managing methadone for opioid use disorder in patients who are prescribed it outpatient, and avoids utilizing it for opioid use disorder despite its status as an FDA approved first-line medication for opioid use disorder that should be strongly considered if buprenorphine at maximum doses plus non-medication therapies does not control opioid cravings. There does not seem to be any provider or service at BSH that is either comfortable managing methadone as a treatment for opioid use disorder or is able to effectively seek timely consultation with addiction experts for ongoing management and adjustment of methadone.
- BSH seems more comfortable with use of buprenorphine for opioid use disorder, but again does not respond to reports of opioid withdrawals or cravings with adjustments in buprenorphine.
- BSH does not follow the general recommendation that for therapeutic effect, buprenorphine daily doses should be 16-24mg for patients for those who tolerate these doses, and so often has patients on substandard doses for opioid use disorder treatment.
- Both with methadone and buprenorphine, availability of medication is an issue. There were multiple instances where medication delays occurred due to awaiting methadone or buprenorphine from the pharmacy. This is

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<sup>&</sup>lt;sup>59</sup> DLC January 2023 Report, at pp.38-49,

concerning given that both of these medications are not only useful for opioid use disorder maintenance treatment, but also for acute opioid withdrawal management (especially when utilized to later transition patients on to these medications). In addition to forcing patients to endure symptoms of withdrawal, the immediate stoppage of such medications can lead to dangerous medical complications. <sup>60</sup>

In addition, the individual case studies presented PS-specific issues of concern, ranging from failures to follow accepted best practices to failure to meet the standard of care.

#### Case Study 1 – PS "Matthew":

The first case study involved Matthew, a PS who "had been on suboxone chronically for a documented diagnosis of severe opioid use disorder," "has psychiatric diagnoses including antisocial and borderline personality disorders, and has chronically struggled with self-harm including life threatening attempts." <sup>61</sup> With Matthew, Dr. Gale found that:

Strangely, the BSH team attributed a number of behaviors of the patient to his opioid use disorder when they would be better attributed to personality disorders, and in doing so they likely amplified their own fears and judgements around medication use (suboxone and methadone).<sup>62</sup>

Records revealed instances in which the BSH Director of Medicine conflated a first-line medication for opioid use disorder with a high-affinity short-acting opioid agonist used for pain. <sup>63</sup> This lumping of together different opioid medications was "extremely concerning" and led to a biased narrative that Matthew's "motivation is to get high", which impacted BSH treatment decisions related to his MOUD. <sup>64</sup> In this way, BSH's lack of appropriate expertise may easily lead to PS being labeled as 'malingering' or 'drug-seeking,' rather than being treated for the very illnesses that brought them to BSH.

In several instances noted by Dr. Gale, BSH failed to appropriately adjust Matthew's medication dosages or suddenly stopped dosages resulting in Matthew's destabilization in contravention of the standard of care. <sup>65</sup> BSH pursued a mode of treatment that Matthew did not consent to and was contra-indicated due to his chronic self-harming behaviors. <sup>66</sup> During this period, Matthew was experiencing opioid withdrawal symptoms that were intensified by the stoppage of the medication he had been taking. <sup>67</sup> Dr. Gale found that, in a person who had been maintained on Matthew's daily buprenorphine dosage,

[i]t is substandard care to suddenly stop the dose and the only outcome we should expect when doing so is withdrawal and destabilization. If a taper was

<sup>&</sup>lt;sup>60</sup> Evan Gale, M.D., *Findings – Disability Law Center MOUD Expert Consultation* (February 15, 2024) [hereinafter "Gale Report"].

<sup>&</sup>lt;sup>61</sup> Gale Report at 1.

<sup>62</sup> Id.

<sup>63</sup> *Id*.

<sup>&</sup>lt;sup>64</sup> *Id*.

<sup>65</sup> *Id.* at 2.

<sup>&</sup>lt;sup>66</sup> *Id*.

<sup>&</sup>lt;sup>67</sup> *Id*.

going to be in place, it should have been done over a period of weeks, assessing whether the patient could tolerate each dose reduction based on behavioral response. It is not surprising that the patient had a notable escalation of self-harm attempts over the next week, with the patient asking to be resumed on suboxone and endorsing opioid withdrawal symptoms during these episodes.<sup>68</sup>

Further, according to Dr. Gale, BSH chose to prescribe a second-line therapy that Matthew did not consent to, over a first-line therapy that he was being transitioned off of in contravention of the standard of care. This second-line therapy was a terrible choice of medication for someone with Matthew's chronic self-harming behaviors because it was solely an opioid antagonist, blocking the effects of opioids, including those required for sedation and pain management if/when the patient would hard himself to the point of needing any significant medical procedure, surgery, or even pain management alone. Moreover, had Matthew not ultimately refused it, the antagonist effects would have significantly worsened any withdrawal symptoms he was experiencing at the time the second-line therapy was ordered.

When Matthew was ultimately returned to a first-line therapy, he "expressed gratitude, and his self-harm episodes slowed in both intensity and frequency." Matthew was initiated on methadone at a dosage of 30mg daily. When he expressed a desire to increase his dosage with providers, Matthew reported significant stigma. Dr. Gale found, with respect to these circumstances:

Again, this case is seriously concerning because it displays a lack of BSH to appropriately offer initiation and adjustment of methadone, one of two first-line medications for OUD that are available. A quick search of quidelines for opioid use disorder treatment, such as those found in SAMHSA's TIP 63, would show that methadone's effective doses are generally 80-120mg, but for many patients they require higher dosing for both craving control, and secondarily the increased opioid blockading effect of methadone at higher doses can help patients who have a high risk for continued intermittent opioid use. Adjustment of methadone when initiating in the outpatient setting routinely happens at a speed of 10mg increases every 3 days. Even in a complex case where other factors favor a slower initiation (e.g., use of multiple other sedating psychiatric medication), it is appropriate to increase methadone by at least 5mg every 5 days as tolerated by the patient until cravings and withdrawal symptoms resolved. It is particularly striking that the psychiatry notes document that the patient had been underdosed on methadone in 2018, when it appears from all data that he was on methadone between 55-60mg daily, and yet from records he remains even further underdosed at BSH, on 30mg daily, the starting dose of methadone that is not expected to control opioid cravings in the majority of patients with opioid use disorder, much less a person who is documented to have severe opioid cravings greater than other patients with opioid use disorder.<sup>74</sup>

<sup>68</sup> Id

<sup>&</sup>lt;sup>69</sup> *Id.* Per the FDA, first-line medications for opioid use disorder are methadone and buprenorphine, and injectable naltrexone is second line agent. *Id.* 

<sup>&</sup>lt;sup>70</sup> *Id.* at 2.

<sup>&</sup>lt;sup>71</sup> *Id*.

<sup>&</sup>lt;sup>72</sup> *Id*.

<sup>&</sup>lt;sup>73</sup> *Id.* at 3.

<sup>&</sup>lt;sup>74</sup> *Id.* at 3

#### Case Study 2 - PS "George":

PS George arrived at BSH from a county house of correction experiencing symptoms of psychosis. At the sending facility, George was receiving 16mg of suboxone daily, which was not continued at BSH. "No documentation from admission shares a reasoning for holding [the MOUD] entirely," but psychiatry notes suggest they were concerned the MOUD was "negatively affecting his mental status."75 Even accepting this rationale, the "more appropriate step" would have been to dose reduce the suboxone "by no more than 50% in order to avoid inducing opioid withdrawal, symptoms of which would include restlessness and anxiety that would have exacerbated some of the troublesome behaviors noted by BSH," like banging on his door.<sup>76</sup> George complained of "upset stomach and that he had vomited multiple times daily" symptoms consistent with withdrawal - but BSH ordered an anti-nausea medication, rather than resuming his MOUD. After psychiatry notes recognized his foreseeable symptoms of withdrawal, BSH put George back on suboxone at one-quarter of the dose he had been receiving at his sending facility. 77 After several more days, he was increased to half of his home dose and half of the therapeutic dose for a person with a history of opioid use disorder.<sup>78</sup> Dr. Gale found that, "[w]hile taking a measured approach towards dose increases is not unreasonable, never resuming a therapeutic dose particularly when the patient was on that dose chronically, is substandard care."79

#### Case Study 3 – PS "Edgar":

The third case study presented PS Edgar, who presented upon admission as having an extensive history of opioid use disorder and being on methadone maintenance treatment. Edgar's access to methadone was delayed because it was "in transit from the pharmacy"; Dr. Gale notes that, as a first-line MOUD, methadone should be available 24/7.80 Medical records indicate that, when Edgar requested medical management of his methadone for ongoing symptoms at least twice, records do not indicate that he received any response.81 Medical records likewise indicate no effort on the part of BSH to get Edgar's permission to speak with his community opioid treatment program. Given that Edgar was reporting ongoing opioid cravings, it would have been appropriate to increase his dosage gradually as tolerated by Edgar until the cravings and withdrawal symptoms resolved, or at least until 120mg, per Substance Abuse and Mental Health Services Administration guidance – SAMHSA TIP 63, section 3, p. 32.82

#### Case Study 4 – PS "Tony":

PS Tony was tapering from methadone and transitioning to buprenorphine when he arrived at BSH from a county correctional facility, and taking 8mg of suboxone daily, with a plan of increasing to 16mg per day within 4 days of his admission. BSH providers did not timely increase his dosage in keeping with FDA guidelines and SAMHSA TIP 63, section 3, p. 67.83 In the interim. Toney experienced withdrawal symptoms.

<sup>&</sup>lt;sup>75</sup> *Id.* at 3-4.

<sup>&</sup>lt;sup>76</sup> *Id.* at 4.

<sup>&</sup>lt;sup>77</sup> Id.

<sup>&</sup>lt;sup>78</sup> *Id*.

<sup>&</sup>lt;sup>79</sup> *Id*.

<sup>80</sup> *Id.* at 5.

<sup>81</sup> *Id*. 82 *Id.* at 4.

<sup>83</sup> *Id.* at 5.

#### Case Study 5 – PS "Max":

The fifth case study presented another instance of BSH failure to provide Max the MOUD he had been receiving at the county correctional facility in a timely manner. Here, BSH failed to promptly order his suboxone after admission and the dose was further delayed because BSH, again, did not have suboxone onsite thereafter. In the meantime, Max suffered symptoms of withdrawal.

As discussed in DLC's January 2023 report, it is well-established that people with mental health issues often have co-occurring substance use disorder.<sup>84</sup> The BSH population is not different and, yet, the expert findings above make clear that BSH PS are at risk of receiving substandard MOUD care by Wellpath providers. Failure to adhere to the standard of care may not only constitute malpractice, but may have significant deleterious effects on the mental and physical health of PS, most of whom are already in a fragile state. At the same time, denials of appropriate access to MOUD may also contravene Title II of the Americans with Disabilities Act<sup>85</sup> and fail to comport with the program components to which DOC agreed to adhere in the course of an investigation by the U.S. Department of Justice.<sup>86</sup>

More training concerning the appropriate standard of care for people with opioid use disorder is necessary for all BSH providers, including the Director of Medicine. Moreover, DOC and Wellpath must address underlying bias and stigma BSH providers attach to PS with opioid use disorder. Finally, the delays in prescribing medication and in the arrival of medication are deeply concerning and warrant ongoing attention.

# 4. Inadequate Access to Appropriate Medical Care for Persons Served

In accordance with DLC's longtime recommendation, Wellpath implemented sick call procedures. During the reporting period, Wellpath also formed its BSH 2023/2034 Strategic Plan that includes an expansion of onsite medical services to PS with a stated objective to "obtain new, in-house services and telehealth visits." As of December, Wellpath's fill rate of medical doctors is 33% (1 out of 3.2 FTE contracted positions). Wellpath is also implementing a FDA approved device not used in other public hospitals in the Commonwealth, the Athelas One device, which uses a finger stick rather than venous blood draw for procuring blood samples for Clozapine ANC. Wellpath reported in December 2023 that it was focusing on education to

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<sup>84</sup> DLC January 2023 report at 38-40.

<sup>85</sup> See, e.g., Pesce v. Coppinger, 355 F. Supp. 3d 35, 45-47 (D. Mass. 2018).

<sup>&</sup>lt;sup>86</sup> See U.S. Department of Justice, U.S. Attorney Rollins Announces Correctional Facilities Statewide to Maintain All Medications for Opioid Use Disorder (April 1, 2022), <a href="https://www.justice.gov/usao-ma/pr/usattorney-rollins-announces-correctional-facilities-statewide-maintain-all-medications">https://www.justice.gov/usao-ma/pr/usattorney-rollins-announces-correctional-facilities-statewide-maintain-all-medications</a> (linking to a letter of resolution with DOC outlining a program that: does not change or discontinue a medication to treat opioid use disorder "except upon an individualized determination made by a qualified specialist that the treatment is no longer appropriate based on the person's condition"; does not use incentives, rewards, or punishments to encourage or discourage a person to receive any particular medication to treat opioid use disorder; and does not deny health or drug rehabilitation services based an individual's current illegal use of drugs if the person is other entitled to such services.).

<sup>&</sup>lt;sup>87</sup> 2023/2024 Strategic Plan, BSH Governing Body (December 2023).

<sup>88</sup> Human Resources Report, BSH Governing Body (December 2023).

<sup>&</sup>lt;sup>89</sup> Psychiatry, Medicine and Dental Report, Governing Body (December 2023).

ensure sociodemographic equity and "increase healthcare engagement for typically disenfranchised populations"<sup>90</sup>; Wellpath also implemented a plan to bring medical record audits up to date, as they had fallen behind.<sup>91</sup>

While DLC commends all of these advancements, there have been difficulties with Wellpath's implementation of the sick call procedure and access that warrant continued monitoring. For most of the reporting period, sick slips were kept solely at the nurse's station on each unit, available to PS only by requesting them from a nurse when the station was open. After discussions with DLC, Wellpath made sick slips and grievance forms accessible to PS in hanging folders in the halls of each unit, allowing PS to obtain them while out of their cells without needing to speak and identify themselves to a staff member, thus minimizing fears about interference and potential retaliation. Notably, the number of grievances also increased drastically during the reporting period, was higher than the previous 2 years, and in August there was at least one grievance filed from every unit – something that has not happened in three (3) years. From July to November 2023, there were 64 medical grievances filed, even with the new sick slip procedures in place.

Throughout this reporting period, despite the newly implemented sick call system, DLC continued to find examples indicative of Wellpath's lack of responsiveness to PS health concerns. DLC has addressed concerns about quality of PS medical care consistently in public reports. Medical access issues have involved delays in and denial of appropriate medical care. Some brief examples:

#### A. Examples of Delays and Denials of Medical Care

DLC obtained and reviewed medical records of PS with severe and/or chronic conditions who had particularly concerning experiences with Wellpath medical care at BSH. These records, along with multiple interviews, provide substantive testimony to significant concerns about access to adequate medical care for PS, including delays in treatment, a lack of responsiveness to PS complaints, and inadequate responses to less common medical issues. DLC reviewed medical records and conducted interviews that substantiated the ongoing nature of these issues that put both the physical and mental wellbeing of PS at risk, as pain and poor physical health are well understood to negatively impact mood and behavioral health. The issues presented in the below examples should not be occurring in any state-run facility, let alone a facility labeled as a hospital:

#### PS "Carl":

PS Carl was admitted to BSH approximately 6 months after having significant orthopedic surgery to treat his right leg, still severely disfigured after being struck by a truck. He primarily relied upon a wheelchair to get around BSH. Carl also has Lupus, an autoimmune disease with serious complications that include an increased vulnerability to infection. Prior to his BSH admission, his surgeons recommended further procedures – skin grafts and a revision surgery

<sup>&</sup>lt;sup>90</sup> Clinical Services Report, Governing Body (December 2023).

<sup>&</sup>lt;sup>91</sup> Performance Improvement & Compliance Report, Governing Body (December 2023).

<sup>&</sup>lt;sup>92</sup> Grievance Report, Governing Body (December 2023).

<sup>&</sup>lt;sup>93</sup> DLC January 2022 Report at 35-36; DLC, *Public Report on the Efficacy of Service Delivery Reforms at Bridgewater State Hospital (BSH) and Continuity of Care for BSH Persons Served* (January 2023) at 42. <a href="https://www.dlc-ma.org/wp-content/uploads/2023/02/DLC-BSH-Public-Report-1-31-2023.pdf">https://www.dlc-ma.org/wp-content/uploads/2023/02/DLC-BSH-Public-Report-1-31-2023.pdf</a> [hereinafter "DLC January 2023 Report"]; DLC July 2023 Report at 36-37.

on his tendons. Alarmingly, Wellpath did not obtain Carl's medical records from the hospital where his most recent surgery had been performed until more than 2 months after his arrival.

From his admission to BSH, Carl reported that Wellpath medical staff were telling him that he would be able to get the procedures that his surgeons recommended if he was committed for treatment. Of course, the notion of denying necessary medical care to PS who are temporarily committed for evaluation is entirely unacceptable. DOC and Wellpath are responsible for providing all BSH PS with both mental health and medical care. To make matters worse, after Carl was committed, BSH's long term Director of Medicine informed him that BSH would not be sending him to surgical consultation. He was ultimately discharged after 4 months without these consultations even being scheduled.

In our meetings with Carl throughout his admission, DLC observed indicia of infection – swollen reddish purple tissue on his leg, his right ankle noticeably larger than his left, and sores that were not healing or were very slow to heal. Carl informed DLC that he developed the first sores shortly after his admission and was experiencing shooting pain and skin sensitivity and was unable to extend his leg fully. Despite his obvious injury and intense pain, Wellpath denied Carl his pain medication prescribed in the community for over a month; in the interim, he received only ibuprofen and acetaminophen. DLC notes that bacterial infections for people who are immunocompromised, have diminished skin integrity, or have open wounds are not uncommon at BSH or other DOC facilities. BSH medical records from various appointments note that his leg appeared infected and had drainage, open lesions "healing slow" and "recurrent skin wounds in chronically poorly vascularized skin with laceration." Records stated that Wellpath providers would "consider wound clinic." Living in the Lighthouse unit, Carl did receive regular dressing changes. Wellpath did not book him an appointment with pain management and wound care specialists until nearly 4 months after his admission.

Because of his Lupus, Carl's prompt access to antibiotics to treat bacterial infection is important. He was extremely concerned that his leg was infected and would have to be amputated below the knee, despite all of the efforts of his doctors in the community and the procedures he endured to save it. DLC shared these concerns. Although he reported requiring IV antibiotics in the past to combat infection and Lupus attacks, he did not receive them while at BSH. Early in his admission, he received one course of Bactrim – Bactrim, a "sulfa" antibiotic, however, is known to "lower blood counts in people with lupus, resulting in lupus flares." A couple months later, records state that he was given a course of Amoxycillin, but only to treat a "possible lung infection"; Carl reported feeling that his symptoms were improving during this antibiotic treatment, but returned once it ended. According to Carl, when he asked for appropriate antibiotic treatment to treat his persistent symptoms, BSH providers, at times, declined based on concerns about antibiotic resistance despite observing signs of infection.

In keeping with deficiencies in access to medication assisted treatment in **Section 3** above, Carl was also denied suboxone, which he reported having received successfully during recovery from his surgery. He reported being told that he could not be re-induced on suboxone unless he

information/avoid/#:~:text=However%2C%20it%20is%20very%20important,lupus%2C%20resulting%20in %20lupus%20flares; The Lupus Encyclopedia, *Good Advice on Lupus and Bactrim [per sulfa antibiotic research]*, https://www.lupusencyclopedia.com/why-include-sulfa-antibiotic-allergies-in-your-lupus-medication-list/.

<sup>&</sup>lt;sup>94</sup> See, e.g., Johns Hopkins Lupus Center, *5 Things to Avoid if You Have Lupus*, <a href="https://www.hopkinslupus.org/lupus-info/lifestyle-additional-">https://www.hopkinslupus.org/lupus-info/lifestyle-additional-</a>

was being discharged. He was discharged from BSH after 4 months, without ever having been induced on suboxone.

#### PS "Amos":

PS Amos has a chronic systemic inflammatory skin condition that causes painful skin lesions. When he arrived at BSH, his Intake Summary noted that he had large cysts on various part of his body – one so large that he could barely sit down – and was in need of immunosuppressant infusions. Despite his BSH providers acknowledging that Amos could develop sepsis without successful treatment, Wellpath did not obtain the immunosuppressant infusion therapy recommended by his specialist until nearly 5 months after his admission, and, even then, the infusions were not set at intervals his treating dermatologist recommended. Wellpath initially provided Amos with a therapy listed as a second option if the first choice was not available and failed to provide the appropriate dosage and complete medication regimen. This treatment proved ineffective, and Amos developed more and more prominent cysts. These made sitting and lying down excruciating, particularly when trying to sleep on BSH's thin mattresses and hard plastic beds, the pain and lack of sleep resulting in further negative consequences for his mental health. BSH would not allow PS to see his regular dermatologist at Beth Israel, who is an expert in the treatment of his condition. Rather, BSH required him to go to Lemuel Shattuck Hospital for care due to Wellpath's contract with the public hospital. At the same time, Wellpath staff were mistreating Amos as a result of his skin condition; he was suffering regular insults concerning the odor of the cysts and physical abuse from a now-terminated Wellpath staff member who sprayed him with industrial cleaning fluid. 95

#### PS "Jake":

PS Jake arrived at BSH with a long-term condition resulting from nerve damage in the pelvic area causing chronic pain in the urethra and rectum, which causes constant discomfort and difficulty sitting and using the toilet. Although Wellpath received confirmation of his condition via medical records, Jake reported being treated with suspicion or disbelief when he sought pain management and other accommodations, as if he was drug-seeking. He was not allowed to use a special medical cushion he had in his property at BSH to ease the pain of sitting until 2 weeks after his admission. Jake described every medication he had been taking for his condition prior to his admission and how nearly every one of them was inexplicably discontinued at BSH – all the while he was started on other medications that were never discussed with him. For instance, DLC reviewed his medical records and found that an anti-anxiety medication he reported helping considerably with his nerve condition was never prescribed to him. To add to his pain and frustration, when Jake asked staff about obtaining the other medications he had been on prior to his admission, he recounted them telling him that it "would be too much hassle" given how soon he was expected to be discharged. As a result, he went without them for over a month.

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<sup>&</sup>lt;sup>95</sup> DLC became aware of this incident through our monitoring and reported the incident to Wellpath administrators as abuse. Although other staff witnessed the RTA spray Amos with cleaner, administrators were not aware of it prior to DLC's report. After confirming the PS account through video footage, Wellpath terminated the RTA.

#### PS "Daniel":

ISOU PS Daniel has a host of medical issues, including asthma and sleep apnea. Daniel's CPAP machine became unusable when the strap on the machine's mask broke, preventing a suction from forming. This caused Daniel to wake up 3 to 4 times per night coughing and choking; several times he woke because staff saw him convulsing and knocked on his cell door. Daniel tried in vain to repair the strap with glue and tape. Despite his life-preserving CPAP machine malfunctioning, Daniel reported that Wellpath failed to consistently keep him on a 1:1 observation at night and took more than 9 days to provide him with a replacement mask.

#### B. <u>Ignored Requests and Indifference:</u>

Numerous PS cited submitting repeated sick call slips or making multiple verbal requests to members of their treatment team for medical or psychiatric appointments, only to receive no response. One PS, who had arrived 1½ weeks prior to being interviewed by DLC, reported submitting 3 sick call slips and repeatedly speaking to staff to request an x-ray for injuries to his leg that he sustained a county jail prior to his admission. He had received no response in regard to an appointment, and also reported having not spoken to a doctor since his arrival at BSH. Another individual told DLC about a painful neck injury he had, but when asked about what care he has received at BSH he said he has had none because he is ignored by staff and "no one believes me here."

Even when seen by Wellpath doctors, many PS report having their concerns minimized or ignored. One PS reported having a seizure so severe that he almost choked to death on his tongue. He said the BSH Director of Medicine arrived a half hour later, blamed his seizure on his anxiety, and prescribed him only Benadryl. Another PS was injected with an antipsychotic to which he had an allergic reaction during a previous hospitalization, causing him to have a feeling of his muscles locking, pain, and what he described as seizure symptoms. Wellpath provided him with medications to address the side effects, but rather than find a medication that didn't cause such a reaction, they continued to give him the same medication over his objections.

# 5. Poor Access to Treatment and Conditions for New Admissions in the Bradford Units

The vast majority of individuals admitted to BSH, whether sent from a courthouse, a county correctional facility, police station, or DMH, are admitted to Bradford Building. Comprised of two units, Bradford 1 and Bradford 2, the two-story building has a capacity to hold 68 PS. Most of these admissions are at BSH for competency evaluations. From June through November 2023, Wellpath forensic evaluators completed 311 competency evaluations out of a total of 682 total evaluations that included forensic evaluations, changes in legal status, and recommitment evaluations. <sup>96</sup> It is common for newly admitted PS to be disoriented, frightened, and in the midst of mental health crisis. On the Bradford Units, people at BSH for the first time are confronted with the reality that they are in a DOC facility rather than a psychiatric hospital. From

<sup>96</sup> Forensics Department Report, BSH Governing Body (September 2023); Forensics Department Report, BSH Governing Body (December 2023).

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July to November 2023, Bradford Units had the highest number of PS grievances submitted.<sup>97</sup> Along with the two BSH Maximum Units (Hadley and Lenox), Bradford 1 has often had among the highest incidence of involuntary medication at BSH.<sup>98</sup>

Conditions in the Bradford Building are particularly difficult and reports from PS indicate that they are being subjected to excessive isolation in their cells, which may constitute unwarranted seclusion in violation of M.G.L. c. 123, § 21.

It is important to keep in mind that, unlike in DMH and other hospitals, as a rule, PS are locked inside of their cells for significant periods of time each day. Each night, PS lock in from 9:20pm to 7:20am. As a DOC facility, BSH must conduct "Count," which requires staff to account for the location of every PS, 3 times each day. The duration of Count varies, but it may add up to PS spending at least an additional hour or more per day locked inside their cells. Thus, because BSH is a DOC facility, every PS is in their cell for a minimum of 11 hours per day – 11 hours that would have to be reported as seclusion in a DMH hospital.

Based on PS reports, it appears that Bradford Building staff do not regularly abide by the unit schedules with respect to ensuring or even offering out-of-cell time, leaving PS in their cells well beyond those 11 hours. DLC received numerous reports from PS that it was difficult to get staff to let them out of their cells for as little as 3 to 5 hours. This is inconceivable in a supposed psychiatric hospital setting.

On monitoring visits during this reporting period, DLC frequently encountered PS standing at the doors of their rooms, locked in, craving interaction, asking basic questions around when they can take a shower, when they can see a doctor or their treatment team, when they can get fresh air, when anyone will have time for them. For instance, on a recent visit, a PS locked in his room, staring out at nowhere in particular in the hallway, quietly repeated over and over with desperation in his voice, "Can you let me out? I've been here for 30 days. Can I go home and rest?" DLC retrieved a staff member to let him out of his room; it was unclear how long he'd been standing waiting for someone to speak with him.

As of December 2023, the psychology department was still working with the rehabilitation department on "refining the individual therapy referral process to ensure that [they] optimize individual services and are able to provide them to the greatest number of patients. <sup>99</sup> Historically, and in many instances today, many PS on Bradford are not referred for individual therapy and receive no individual therapy during the length of their BSH admission. Almost seven (7) years since Wellpath stepped in, Wellpath has still not refined individual therapy service referrals and service delivery.

Along with inadequate access to staff assistance, out-of-cell time, and mental health treatment for newly admitted PS in crisis, stress levels and interpersonal conflict can foreseeably occur in the Brandford units. These incidents – which could be seen as the product of an improper treatment environment – can lead to seclusion, restraint, and other force being used upon PS.

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<sup>&</sup>lt;sup>97</sup> Grievance Report, BSH Governing Body (September 2023); Grievance Report, BSH Governing Body (December 2023).

<sup>98</sup> DLC January 2023 Public Report at 26-27.

<sup>&</sup>lt;sup>99</sup> Clinical Services Report, Governing Body (December 2023).

Recently, a PS who was discharged from BSH after a couple of months on Bradford told DLC that BSH is the "worst of the worst," and "the lowest you can ever be." Below are stories of PS who spoke with DLC in the Bradford 1 Unit and recounted their experience of vulnerability, isolation, and hopelessness after entering BSH for their very first time.

- PS "Jamie", a young man in his late teens, had been at BSH for 11 days. He had arrived from a county jail; he had been arrested for assault based on allegations of a staff member at the group home for individuals with developmental disabilities where he lived. In his time at BSH, Jamie had been to only one on-unit group and had been off the unit only twice to go to the cafeteria. Jamie identified himself as on the autism spectrum to DLC and BSH, but said he had never been offered access to the Developmental Services Program, despite having an assessment by Wellpath when he first arrived. During his interview with DLC, Jamie stood at the door of his locked room, stiff and seemingly nervous, quietly telling DLC that it was so loud here he couldn't sit still, and that staff was unfriendly and ignored him.
- PS "Emmanuel" had never received psychiatric treatment in his life before coming to BSH. When he arrived at BSH, he reported being kept locked in his cell for an entire month on Bradford 1, and then being taken to Hadley Unit and kept locked in his cell for another 3 weeks. He told DLC that while stuck in his cell in Bradford 1, he did not receive a shower and was not allowed to have clothes or a safety smock saying, "for 2 weeks I was ass-naked just as I was born." At one point, he ripped open his mattress so he could cover himself for warmth and decency. He reported that staff never explained to him why he was secluded. Like all BSH PS, he was photographed for safety checks every 15 minutes. During this time, Emmanuel was also subject to documented involuntary medication (then Emergency Treatment Orders). Disturbingly, however, no record of seclusion orders or 1:1 status appears in the daily BSH reports or his medical records, suggesting that his in-cell isolation was not clinically approved and violative of both BSH policies and state law concerning seclusion, M.G.L. c. 123, § 21. Given the lack of seclusion or 1:1 orders, DLC is not able to independently confirm this seclusion.
- When DLC interviewed PS "Hugo," he had been at the facility for 5 days. He had been at county jail for 2½ months prior to his transfer to BSH. As a result of losing his liberty, he lost his apartment and car due to his inability to keep up with payments. Hugo reported being unable to make phone calls because he still had no PIN number. Worse, he had not yet met with a doctor or member of his treatment team. Since his arrival, Wellpath had not been providing Hugo the medication for sleep that he took consistently in the community and in jail, nor had he been offered an explanation for its discontinuation. Hugo was unclear on how to go about getting anything he needed at the facility, who to speak with, or what to expect in terms of his ability to attend his upcoming court dates.
- PS "Antonio" was locked in his cell on Bradford 1 when he told DLC about the concerning voices and visions he had been experiencing for months and about which he had been too embarrassed to tell friends and family. Sent to BSH for a competency evaluation 5 days earlier, Antonio explained that he wanted to be there to get treatment, to receive medication, to change his life because he was expecting his first child. While he was trying to do his part at BSH, his mother was working on getting him access to DMH services in the community. Unfortunately, BSH was not at all what Antonio expected rather than helping, coming to BSH was harming him. Antonio tearfully reported that he had not spoken directly with a doctor of his treatment team since he

arrived. He was mentally deteriorating being cooped up in his small cell without access to meaningful treatment or even a meeting with his treatment team. He was getting out of his cell only 2 to 3 hours per day. He reported seeing other PS on his unit who were worse off – some who had not gotten out of their cells at all for multiple days in a row. He saw their isolation as a consequence of conveying complaints staff, so he was afraid to make waves. Antonio had been prescribed Haldol for his hallucinations in previous days, but it was discontinued due to the involuntary leg twitches he developed. While at the door, DLC observed a nurse decline Antonio's request for PRN medication to address his symptoms and, when he requested to see crisis, she informed him that she would "look into" that. This young man came to BSH believing it was a hospital only to find that he could not access treatment or kindness on Bradford 1 and would ultimately leave BSH worse than when he arrived – robbed of hope, further destabilized, and still experiencing serious symptoms of a mental health condition.

While the above accounts are only a sampling of those shared with DLC by individuals on the Bradford units, they present typical challenges PS experience during their first weeks at BSH: a lack of time outside their small cells and outside the unit; delays and discontinuity in medical and psychiatric care; and a lack of communication around care, basic necessities, communication with loved ones, and their legal status. BSH's intake unit should prioritize stabilization, clinical and other staff support, and treating PS with dignity and respect for their rights. Instead, new admissions are largely warehoused in Bradford while evaluations are completed. Wellpath's emphasis on initial evaluation without opportunities for meaningful, robust treatment, may preserve the corporation's resources but fails to improve the mental health of all individuals with mental health disabilities and behavioral health conditions admitted to BSH. Failing to do so means that many PS who leave BSH following their initial evaluation period – returning to county correctional facilities or to the community or who are committed to other BSH units - are no more, and in some cases considerably less stable, than when they came to BSH. This is a recipe for climate and safety issues in county correctional facilities and BSH alike, and fails to take advantage of a key opportunity to improve public safety.

# 6. Disparate Treatment and Conditions for Persons Served in the BSH Units at Old Colony Correctional Center

During this reporting period, DLC continued to receive reports of the lack of access to mental health care and concerning treatment of PS on OCCC BSH units. These Units – the ISOU, where PS are held during the evaluation period, and the RU, for PS who have been committed to BSH - were designed to serve as an annex to BSH for PS who are sentenced state prisoners living in DOC facilities designated for men. Both units are staffed with DOC corrections officers (CO) for security, as opposed to Wellpath security staff. Treatment staff as well access to medical and mental health care provided by Wellpath fall under DOC's BSH contract with Wellpath, rather than DOC's contract with Wellpath to provide medical and mental health care in all DOC facilities.

In our last report issued in July 2023, DLC raised concerns about persistent issues in the OCCC BSH Units, including extreme heat in ISOU cells, lack of access to treatment and programing for

PS in the ISOU and RU, and a reliance on intimidation and force by corrections officers in both units, including use of chemical agents on PS.<sup>100</sup> DOC has not responded to these issues.

#### A. Insufficient Staffing and Access to Clinical Care

PS in both the ISOU and RU described limited access to clinical care and little to no opportunity for talk therapy. PS typically report meeting with their clinicians, at most, once per week, which PS describe as insufficient for a mental health unit and not contributing to any notable improvement in their wellbeing. As DLC has emphasized previously, the level of support is particularly troubling in the ISOU, where PS are often actively, or were recently, experiencing acute mental health crises involving self-harm or a suicide attempt. At the same time, PS in the ISOU reported minimal therapeutic programming offerings.

This insufficient access is likely due, at least in part, to understaffing. As of December 2023, the OCCC BSH Units had a Recovery Treatment Assistant (RTA) fill rate of 65% (10 hired out of 15.4 FTE required by contract), as compared to BSH RTA fill rate of 88% (121 hired out of 137 FTE required by contract). OCCC nursing had 45% fill rate and social services staff has 50% fill rate. Overall, OCCC BSH Units had 3 times as many vacancies than BSH. During this reporting period, the 2 clinicians working on the OCCC BSH Units – one of whom was the unit director – resigned from their positions. These resignations prompted Wellpath to share a unit director with the already understaffed BSH primary facility with OCCC, as the interim director of both the ISOU and RU. Although clinicians from the BSH were also assigned to part-time roles in the OCCC BSH Units, an ISOU PS informed DLC that, during this period, the interim unit director was the sole clinician available to the typically more than 30 individuals housed on the OCCC BSH Units. By December 2023, Wellpath was able to retain 3 clinicians, including a full-time unit director, on the ISOU and RU. Still, PS reported that they could not access clinicians when they needed them. In particular, PS noted the complete lack of designated crisis clinicians to work evening hours after the primary clinicians are gone.

DLC also has concerns about limited access to psychiatrists on the unit and the quality of that access. Wellpath has employed a psychiatric nurse practitioner who works remotely from California and has reportedly not been physically on the unit for years. Despite being available for virtual appointments with PS, PS have reported that he routinely refuses to assess PS in crisis, instead opting to order forced medication based on accounts provided by unit staff. DLC has reviewed records confirming this practice. Multiple PS also noted the understaffing in the rehabilitation department, reporting that there are only 2 rehab staff for the BSH Annex Units and who are described as "burned out" and stretched thin.

DLC encourages Wellpath to use OCCC Companions, and Peer Specialists at BSH as much as possible for PS support, particularly given persistent staffing fluctuations. Bazelon Center for Mental Health Law issued a new report describing how people who have lived experience with mental health challenges, mental health services, or other relevant experience working as "peer specialists" make mental health crisis services both more effective and more cost-effective. 102

<sup>100</sup> DLC July 2023 Public Report at 37-38.

<sup>&</sup>lt;sup>101</sup> One of those new clinicians has now left.

<sup>&</sup>lt;sup>102</sup> Bazelon Center for Mental Health Law, *When There's a Crisis, Call a Peer: How People with Lived Experience Make Mental Health Crisis Services More Effective* (January 9, 2024), <a href="https://www.bazelon.org/wp-content/uploads/2024/01/Bazelon-When-Theres-a-Crisis-Call-A-Peer-full-01-03-24.pdf">https://www.bazelon.org/wp-content/uploads/2024/01/Bazelon-When-Theres-a-Crisis-Call-A-Peer-full-01-03-24.pdf</a>.

#### B. Troubling Corrections Officer Interactions and Abuse

Consistent with previous reporting periods, ISOU and RU PS frequently reported that unit COs are antagonistic, verbally abusive, and aggressive. While this is certainly not true of all COs, PS reported that the COs who do behave appropriately do not intervene to stop concerning behavior by other COs. Notably, unlike Wellpath staff at BSH, manual holds by COs are not recorded as physical restraints so physical contact with PS is not easily tracked and/or monitored, unless it is deemed a Use of Force. PS reported experiences ranging from COs engaging in demeaning name-calling to infliction of physical harm on PS. Below are two examples:

- One ISOU PS described COs getting in the face of a PS experiencing acute symptoms
  of his mental health disability and not fully aware of his surroundings, when suddenly the
  COs "slammed him," "twisting his legs." He ended up with one leg swollen to the point
  that it impaired his ability to move around the unit. The PS who reported this incident
  said that this is not unusual every time he is on the ISOU, he sees COs "jump on"
  multiple PS for no reason.
- Another PS reported that while he was in the ISOU in November, DOC placed him in handcuffs, which, despite him voicing his pain, were kept do tight they made red indentations in his wrists. DLC observed these marks still present during an onsite visit to OCCC several days later. This PS also reported to DLC that, while he was being held in a manual restraint on the ground, a CO painfully pushed on his eye.

These continuing issues may be related, in part, to the fact that, as DLC understands it, COs assigned to the OCCC BSH Units are not required to have any specialized training or qualifications to work with individuals with mental health disabilities. Moreover, the OCCC Superintendent informed DLC that COs can only be removed from their post upon a finding of "just cause," equating reassignment from a specialized mental health unit for the benefit of its residents with employee discipline under 102 CMR 230 and the Massachusetts Correction Officers Federated Union (MCOFU) Collective Bargaining Agreement.

Against this backdrop, DLC received reports concerning a particular CO who had reportedly been removed from the RU for "yelling at and picking on" PS, only to be given regular shifts on the ISOU. Multiple ISOU PS reported observing or experiencing mistreatment by this CO on the ISOU. This included the CO yelling at PS with frequency and, on one occasion, calling a PS a "retard" and asking him, "do I have to slam you?" when a PS exited his room wearing a shirt and underpants. Sadly, another CO joined in on this occasion. Fortunately, an RTA intervened and deescalated the situation. However, according to PS DLC interviewed, this is one of many instances of conflict instigated by COs used to justify use of force.

#### C. Conditions Causing Additional Strain for OCCC BSH Unit PS

Consistent with their reports of inadequate access to care and CO misconduct, many PS in the OCCC BSH Units find little difference between their experience in these intensive mental health units and in other DOC units. In some ways, PS feel even more marginalized because both OCCC and BSH Administrators rarely visit the units to hear their concerns. In most facilities, there are regular staff access hours for this purpose. This and other practices and conditions on the OCCC BSH Units cumulatively add to the strain for individual PS, many of whom are in or

recovering from acute crises. The issues below are among those that negatively impact PS in the OCCC BSH Units:

- Interruptions in access to the law library PS and Wellpath staff reported that the only computer in the dedicated ISOU law library was not functional for several months during the reporting period, leaving PS unable to access resources needed to research legal claims in keeping with their constitutional right of access to the courts.<sup>103</sup>
- Inconsistent access to clean laundry and difficulty getting enough state-issued clothing in the right sizes.
- Inconsistent enabling of closed captioning on unit televisions for deaf and hard of hearing PS.
- Lack of access to haircuts ISOU policy dictates that PS must be on the unit 30 days before being able to get a haircut, despite the fact that most PS are admitted to the ISOU for a 30-day evaluation. Many PS often come to the ISOU after spending time on mental health watch, where they are also unable to get haircuts, or go to mental health watch after discharge. As a result, PS may be denied access to services necessary to maintain their personal hygiene for months. This can have physical and mental health consequences.

## 7. Challenges in Persons Served Continuity of Care

DLC monitors continuity of care for PS and any barriers thereto through onsite visits to BSH, OCCC Units, DMH facilities, and county correctional facilities, PS interviews, and document review. During this reporting period, DLC conducted site visits at the Bristol County Jail and House of Corrections and 4 DMH facilities – Worcester Recovery Center and Hospital (WRCH), Lemuel Shattuck Hospital, Tewksbury State Hospital, and Mountain View Unit at Valley Springs Behavioral Health Hospital. <sup>104</sup> Some impediments to successful continuity of care for former PS remain unchanged since DLC's last report and others have improved.

In a positive change from previous reporting periods, most former PS reported that they were notified of their transfer from BSH to a DMH hospital or county correctional facility about 1 to 2 weeks before their transfer. Only a few former PS reporting being informed of their transfer on the same day or a couple days before; this used to be the typical PS experience.

#### A. Continuity of Care: DMH Hospitals

In 2023, 202 PS stepped down from BSH to DMH units – reportedly, a record for the most step downs in a given year. <sup>105</sup> During the reporting period, Wellpath conducted a site visit at WRCH for a "discussion of each facility's management of behavioral emergencies, staffing patterns, quality assurance" and other topics. <sup>106</sup> DLC encourages this collaborative process and, as monitor to DMH operated psychiatric units and BSH, believes this will enhance PS care and treatment as BSH adopts a recovery treatment model. These meetings are particularly

<sup>&</sup>lt;sup>103</sup> See, e.g., Bounds v. Smith, 430 U.S. 817 (1977).

<sup>&</sup>lt;sup>104</sup> The Mountain View Unit is a contracted DMH unit for Western Massachusetts. The unit was formerly located at Vibra Hospital.

<sup>&</sup>lt;sup>105</sup> BSH/DMH Quarterly Meeting (January 2024).

<sup>&</sup>lt;sup>106</sup> Psychiatry, Medicine and Dental Report, BSH Governing Body (December 2023).

important as the DOC/BSH/DMH memorandum of understanding has not been updated in over a decade.

#### i. Challenges with Facilitating BSH Transfers

#### **BSH Transfer Arrival Times**:

After years of difficulties caused by BSH step-downs arriving at DMH facilities during the hospital's second shift, DMH hospital administrators shared that the majority of BSH transfers now arrive in the morning. While there are still late arrivals, individuals now typically arrive in the morning. This earlier arrival time allows treatment teams an opportunity to conduct the initial assessments of new patients rather than delegating to second shift staff and on-call doctors. It is DLC's understanding that this positive change was the result of extensive collaboration between BSH, DMH, and the courts.

#### Clinical Coordination and Documentation:

DMH hospitals have reported that they need more involvement in the discharge and step-down process for BSH transfers, particularly if the step-down falls within an "enhanced step-down." <sup>107</sup> An "enhanced step-down" is utilized for PS who are deemed to require additional support, such as those who have had long stays at BSH, particularly serious charges, or have been found "not guilty by reason of insanity." It may consist of additional time for BSH and DMH clinical team consultations prior to discharge, and sometimes also meetings with the PS and the DMH clinical team or heightened observation when the PS arrives at the DMH hospital.

DMH hospital administrators again reported difficulties in getting complete PS medical records prior to or upon PS transfer. Medical records that do arrive with the transferred PS can be disorganized and occasionally inaccurate. While doctors at DMH hospitals continue to utilize direct conversations with doctors at BSH ahead of PS transfer, DMH hospitals would benefit from receiving documentation of critical medical issues in advance, such as respiratory and ambulatory needs. County correctional facilities have emphasized the same problems with the late transfer of medical records.

#### Transfer of PS Funds:

Significant delays in transferred PS receiving their funds from BSH remains is common complaint. DLC interviewed multiple former BSH PS who had been housed at DMH facilities for months – one for 10 months – who had still not received their funds. This is an area of particular concern as individuals begin to receive supervised community time and plan a more permanent transition into the community where those funds will be necessary.

#### PS MassHealth Benefits Coverage:

DMH hospital administrators again report that the majority of BSH step-downs arrive at their facilities with deactivated MassHealth coverage or no MassHealth coverage at all. They explain that this is caused in part by the fact that BSH typically transfers PS without a discharge summary or other proof of release from incarceration. MassHealth thus considers them to be ineligible for full benefits and their status to be a "continuation of incarceration." This can require

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<sup>&</sup>lt;sup>107</sup> BSH/DMH Quarterly Meeting (July 2023).

DMH hospitals to obtain a release from transferred BSH PS to request discharge summaries from BSH to MassHealth as proof of release from incarceration.

#### **DMH Applications:**

DMH hospitals report that BSH transfers typically arrive with no DMH application completed or submitted, and that they need to prompt BSH to begin working on these with PS likely to qualify and need DMH services. Administrators felt that starting to work on DMH applications while at BSH might help to cut down on delays in discharge to the community.

<u>High Census in BSH and DMH Facilities Hinders Access to Treatment and Less</u> Restrictive Environments:

The DMH system continued to deal with a high census statewide through the reporting period. Across DMH hospitals and units at the end of the reporting period in December 2023, there was a total adult census of 706 and only 685 operational beds. <sup>108</sup> By January 31, 2024, the census was up to 715. <sup>109</sup> Worcester Recovery Center and Hospital and Tewksbury State Hospital have now both opened new adult psychiatric units, after converting them from an adolescent mental health unit and medical unit, respectively.

As highlighted above, DMH was able to take in a record number of 202 BSH PS transfers in 2023; DLC applauds DMH's and BSH's work in making these transfers happen. Of the 202 BSH transfers to DMH, 55 were involuntarily civilly committed with no forensic status. <sup>110</sup> It is crucial to point out that, that over the same calendar year, DMH had a total of 1,015 total forensic admissions. Thus, even in a banner year, BSH transfers accounted for less than 14% of DMH forensic admissions.

#### B. Continuity of Care: County Correctional Facilities

## i. Mental Health Watch Practices in County Correctional Facilities

Mental health watch in county correctional facilities in integral to PS continuity of care because it is typically the last stop before leaving county correctional facilities for a BSH evaluation and may be where PS go when they are transferred back. Mental health watch practices vary widely, with some presenting significant concerns about lack of access to mental health care and inhumane conditions. DLC renews our calls for greater consistency in mental health watch practices and enhanced oversight by DMH to ensure adequate treatment is available across all Massachusetts counties.

In our July 2023 report, DLC presented information about mental health watch usage, physical spaces, and policies in 5 different county correctional facilities run by 4 Sheriff's Departments: Suffolk County Jail at Nashua Street; South Bay House of Correction; Middlesex Jail & House of Correction; Worcester County Jail & House of Correction; and Plymouth County Correctional

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<sup>&</sup>lt;sup>108</sup> DMH, *DMH Section 114 Report – December 2023*, <a href="https://www.mass.gov/doc/section-114-report-december-2023/download">https://www.mass.gov/doc/section-114-report-december-2023/download</a>. Section 114 of Chapter 24 of the Acts of 2021 requires the DMH to post on a monthly basis, data on the availability of beds at inpatient continuing care facilities that are under the supervision or control. The reports also include the number of forensic admissions per month.

<sup>109</sup> DMH, *DMH Section 114 Report – January 2024*, <a href="https://www.mass.gov/doc/section-114-report-january-2024/download">https://www.mass.gov/doc/section-114-report-january-2024/download</a>.

<sup>&</sup>lt;sup>110</sup> BSH/DMH Quarterly Meeting (January 2024).

Facility. 111 Of those 5 facilities, the Plymouth County Correctional Facility summary presented the most concerning picture of an individual's experience on mental health watch. To date, DLC has received no response to the egregious conditions we reported in our July 2023 report.

In November 2023, DLC conducted a site visit at the Bristol County Jail and House of Correction and viewed mental health watch spaces. The Bristol County Sherriff's Office reported that the facility operates 14 mental health watch cells, consisting of 4 cells on the Health Services Unit (HSU); 2 cells on the female Special Management Unit (SMU); and 8 cells on the Dartmouth Behavioral Unit (DBU). The 4 watch cells on the HSU are suicide resistant and cameraequipped, with a CO watching from a station in the hallway. Individuals are held there are on either 15 minute rounds or constant observation. Those on MHW are typically moved to one of the two 11-person wards on the HSU before transitioning back to general population. The DBU is a restrictive unit of 8 cells primarily for individuals with personality disorder diagnoses and utilizes a phased incentive-based program. It is considered to be an extension of the HSU, so its cells double as watch cells. Bristol County Sheriff's Office administrator staff stated that mental health watch is initiated and discontinued by mental health staff and lasts between 24 to 72 hours. DLC looks forward to returning to the facility and accessing additional information concerning mental health watch policies at this site.

During the next reporting period, DLC intends to pursue direct input from the Sheriff's Departments and DMH regarding the information that we have gathered and presented to date and continue our factfinding about this crucial topic.

## 8. Other Important Issues DLC Is Following

In the course of monitoring, DLC identifies many issues that warrant our attention and, often, further investigation. Some of the issues on our current list are:

- 1. Implementation of M.G.L. c. 123, § 18(a1/2);
- 2. PS access to due process in commitment and substituted judgement proceedings:
- 3. Mental health watch or therapeutic supervision practices and conditions in county correctional facilities and state prison facilities that send and receive BSH PS;
- 4. The prevalence of and BSH screening for head injuries in the PS population.

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<sup>&</sup>lt;sup>111</sup> DLC July 2023 Report at 41-44.

### **Conclusion and Recommendations**

Based on the discussion above, DLC calls upon DOC, Wellpath, DMH, and the Commonwealth of Massachusetts to follow the recommendations set forth below to protect the rights, health, and safety, of current and former PS.

- 1. To protect the health of individuals confined to, working in, and visiting BSH, the Commonwealth must commit to shuttering BSH and constructing a modern facility designed to provide all individuals in need of "strict security" psychiatric evaluation and/or treatment in a safe, therapeutic environment.
- 2. The Commonwealth must immediately place BSH operations as well as the planning, construction, and oversight of a new hospital facility under the authority of DMH to ensure current and future PS access to trauma-informed, personcentered mental health treatment.
- 3. Both BSH policy and practice concerning the use of medication restraint must strictly comply with the requirements of M.G.L. c 123, § 21. Administration of medication restraint in non-emergency circumstances, including when prior emergency circumstances have ceased cannot be permitted.
- **4.** DOC and Wellpath must cease, as a rule, using teams of security staff in riot gear to implement by force involuntary medication orders, including medication restraint. To the extent such a practice would ever be acceptable, it must be reserved for exceptional circumstances.
- **5.** DOC and Wellpath must not tolerate the use of unnecessary and/or disproportionate force on PS in BSH or the OCCC BSH Units by staff.
- **6.** DOC must immediately begin fully remediating mold within BSH, in accordance with expert recommendations and industry standards. DLC recommends that DOC contract with a qualified vendor to conduct thorough regular visual inspection and surface swab sampling at BSH in order to adequately identify and resolve environmental toxins throughout the facility. Air sampling is not an adequate substitute.
- 7. Based upon Gordon Mycology's expert recommendations and, given the serious potential health and safety risks BSH conditions present to PS, DLC recommends that the Commonwealth urgently take measures to move current PS and divert new admissions to alternative psychiatric facilities until persistent moisture and most sources have been resolved.
- 8. DOC and Wellpath must improve regular oversight and training of BSH providers, including the Director of Medicine, to ensure that PS MOUD treatment complies with the medical standard of care, recognized guidelines for opioid use disorder treatment, and requirements of state and federal antidiscrimination law. To bridge any existing gaps in MOUD expertise that may exist among BSH provides, DLC recommends that DOC and Wellpath engage an expert clinician in opioid use disorder for consultations regarding PS MOUD care.

- **9.** DOC and Wellpath should enhance BSH staff and provider training to combat bias and stigma that PS with opioid use disorder particularly, those experiencing symptoms of withdrawal experience.
- **10.** DOC and Wellpath must ensure that FDA approved first-line MOUDs are available at all times at BSH to meet the needs of PS with opioid disorder.
- **11.** DOC and Wellpath must provide timely responses to PS requests for medical care and provide appropriate medical treatment, including consultations with qualified specialists for PS with serious medical conditions.
- **12.** DOC and Wellpath must improve conditions for new admissions to BSH to prioritize incoming PS stabilization through access to clinical and other staff support.
- **13.** DOC and Wellpath must ensure that PS in the Bradford Units are not subjected to unauthorized isolation and seclusion in their cells by enhancing oversight of unit staff.
- **14.** DOC and Wellpath must improve access to mental health clinicians and therapeutic programming in the ISOU.
- **15.** DLC recommends that DOC engage with the Massachusetts Correction Officers Federated Union and attempt to come to an agreement that assignment to the ISOU and RU should be based on a COs qualifications and expertise working with individuals with mental health disabilities, rather than seniority.
- **16.** DLC recommends that the staffing model in the ISOU and RU be changed to maximize PS access to clinicians and program staff and minimize correctional officer interactions.
- 17. DLC recommends that DOC and Wellpath take the necessary steps to ensure that, upon discharge, MassHealth is promptly notified of any change in incarceration status and PS funds are transferred in a timely manner to receiving facilities.
- 18. DLC recommends that DMH resources be committed to further DMH engagement with all county correctional facilities to enhance access to mental health care for county prisoners, including recently discharged BSH PS. Such engagement must include reviewing current care available and mental health watch practices, enforcing minimum standards, promoting best practices, and creating working groups to ensure a collaborative approach to care and responsiveness to the needs of this population.

## Appendix A: Glossary of Acronyms Used in the Report

BSH Bridgewater State Hospital

DLC Disability Law Center

DMH Department of Mental Health

DOC Department of Correction

DOJ U.S. Department of Justice

ETO Emergency Treatment Order

IM Intramuscular

ISOU Intensive Stabilization and Observation Unit in the Bridgewater Units

located at Old Colony Correctional Center

ISU Intensive Stabilization Unit

MOUD Medication for Opioid Use Disorder

OCCC Old Colony Correctional Center

PS Person(s) Served

RH Restrictive Housing

RTA Recovery Treatment Assistant

RU Residential Unit in the Bridgewater Annex located at Old Colony

**Correctional Center** 

TST Therapeutic Safety Technician

**Appendix B:** Department of Correction Response to July 2023 Disability Law Center Report on Bridgewater State Hospital (January 4, 2024)



MAURA T. HEALEY

Governor

The Commonwealth of Massachusetts

Executive Office of Public Safety & Security

Department of Correction

50 Maple Street, Suite 3

Milford, MA 01757

Tel: (508) 422-3300

www.mass.gov/doc



CAROL A. MICI

SHAWN P. JENKINS Chief of Staff

KELLEY J. CORREIRA ROBERT P. HIGGINS MITZI S. PETERSON THOMAS J. PRESTON Deputy Commissioners

KIMBERLEY DRISCOLL
Lieutenant Governor

TERRENCE M. REIDY
Secretary

January 4, 2024

Barbara L'Italien Executive Director Disability Law Center 11 Beacon Street, Suite 925 Boston, MA 02108

Re: Disability Law Center's July 2023 Public Report: Efficacy of Service Delivery Reforms at Bridgewater State Hospital (BSH) and Continuity of Case for BSH Persons Served

Dear Director L'Italien,

The Department of Correction is in receipt of DLC's July 31, 2023 report on Bridgewater State Hospital (BSH). The Department has reviewed the recommendations set forth in the report and, as you know, has retained Dr. Debra Pinals as an independent expert on forensic mental health care to review the current practices, procedures and policies at BSH. I understand that Dr. Pinals has met with representatives of DLC on several occasions and is in the process of reviewing Wellpath policies and patient charts. The Department looks forward to the completion of Dr. Pinals' review, and to receiving input from DLC on Dr. Pinals' recommendations. I know that our ongoing dialogue about the future of BSH will be enhanced by Dr. Pinals' findings and recommendations. I am also aware that DLC conducted its annual tour and environmental assessment of BSH with its designated expert on December 19, 2023 and I look forward to DLC sharing information from that assessment.

While a more detailed conversation concerning DLC's most recent recommendations should await the completion of Dr. Pinals' work, I do wish to draw attention to several updates at BSH since the last reporting period:

Additional measures have been employed to further ensure that uses of restraint as defined in M.G.L.
 c. 123, sec. 21 are both accurately tracked and utilized appropriately. These include daily video review of all events (seclusions, physical restraint, and involuntary medication) both for appropriateness and for completion of documentation. Events during the daily video review that

are deemed to require further review are reviewed by Executive Leadership in Tuesday's Serious Clinical Episode Committee meeting. If these reviews identify situations where a deviation from the dictates of M.G.L. c. 123, sec. 21 may have occurred, then appropriate investigation and action are undertaken, including interviews of those involved in the event, re-training of staff if indicated and, where warranted, staff discipline.

The Department has retained a Qualified Mental Health Professional (QMHP) as a fourth Health Service Division Regional Administrator to oversee the delivery of services on a day-to-day basis. This QMHP has extensive behavioral health experience and is dedicated to those currently being treated at BSH.

- Wellpath has submitted revisions to the Seclusion and Restraint Policy and Involuntary Psychotropic Medication Policy to ensure that they are as closely aligned as possible with M.G.L. c. 123, sec. 21 and relevant DMH policies and regulations. These revisions are currently under review by Department leadership as well by Dr. Pinals. The Department will seek DLC's feedback prior to implementation of these policies.
- A significant emphasis on new employee and annual training has been placed on person served engagement, de-escalation techniques and reducing the need for the use of seclusion, restraint and involuntary medication. BSH is always looking to improve its practices and is open to developing supplementary trainings to ensure that all practices are aligned with the highest standards of care, best practices and Massachusetts laws.

As I have stated in the past, the Department, Wellpath and DLC all share a common goal, which is to ensure the wellbeing and safety of the persons served at BSH. I look forward to continuing our joint efforts towards this common goal in the new year.

Respectfully,

Carol A. Mici Commissioner

**Appendix C:** Gordon Mycology Laboratory, Inc. Mold Inspection Report (February 12, 2024) and Laboratory Results



P.O. Box 310, Groton, MA 01450 Phone: 978-448-9954 www.moldtestimgma.com

#### **Mold Inspection Report**

#### Bridgewater State Hospital 20 Administration Road Bridgewater, MA

Project ID: 23-094GML Inspection Date: December 195, 2023

February 12, 2024

Tatum A. Pritchard, Director of Litigation Disability Law Center 11 Beacon Street, Suite 925 Boston, MA 02108

Dear Ms. Pritchard:

The following report details observations, laboratory results, and recommendations from a mold inspection performed by Gordon Mycology Laboratory, Inc. ('GML') on December 19, 2023 in several buildings of Bridgewater State Hospital located at 20 Administration Road in Bridgewater, MA. The goal of the inspection was to evaluate areas in which mold remediation, general cleaning, professional HVAC system cleaning, asbestos abatement, and upgrades were performed within the last year as well as several other buildings/areas that had been previously inspected by GML for mold growth sources. Appropriate recommendations for any confirmed problems are provided in this report.

#### **Inspection and Laboratory Procedures**

GML inspected and tested several areas of the property in December 2019, 2021, and 2022. Most of the same areas inspected in those years were re-inspected visually and with testing during this inspection. Photographs were taken in all inspected areas. A calibrated Delmhorst Moisture Check moisture meter was used to measure moisture content in building materials and a calibrated Extech RH390 psychrometer was used to measure relative humidity levels.

Culturable surface swab samples were collected using sterile sampling supplies and industry-standardized sampling procedures from HVAC system components and basement building materials/surfaces in the Administration, Lighthouse, Lenox, Carter, Attucks, and Adams Buildings to determine if mold growth was present and if so, what types and to what extent. Samples were sent to QLab in Metuchen, NJ (AIHA EMPAT Laboratory ID: 178794) for processing and analysis where they were cultured until mold types and quantities could be determined. Five of the samples collected from visibly moldy surfaces resulted in low or no detectable mold activity and GML requested that these samples be analyzed using light microscopy to identify the presence and type (if possible) of mold; if the mold had died, it would not grow in culture but would still be present visibly under the microscope. It is not acceptable to

kill mold but leave it behind, so it is important to confirm that mold growth that either died on its own or was sprayed with a chemical by the remediation company was still physically present.

Airborne mold samples were not collected, as they were not warranted at this time. There was visible mold growth in many of the inspected areas, water/dampness in the basements, and a mold odor in the basements all of which are confirmation of mold growth sources and, therefore, airborne mold spores and mVOC's (microbial volatile organic compounds). The main goal of the inspection was to identify mold growth sources that may be remaining or may have recurred since the last GML inspection.

A bulk sample of black dust on an HVAC system supply air diffuser and a swab sample collected from an HVAC system return air duct were brought to MicroVision Laboratories, Inc. located in Chelmsford, MA to determine the components of the black dust within ductwork in occupied areas of the buildings. MicroVision is accredited to the ISO/IEC 17025:2017 standard and follows their in-house standard operating procedure #MVL02 for general polarized light microscopy or PLM.

#### **Background Information**

GML has inspected the buildings of Bridgewater State Hospital yearly since 2019, skipping 2020 due to Covid 19. Since 2019, there have been updates made, professional mold remediation in selected areas, HVAC system cleaning, and some other actions to correct maintenance and plumbing issues.

#### **Inspection Observations**

- Administration Building Basement
  - No mold odor detected
  - The basement had a few items stored there currently but for the most part, the basement was empty and reportedly unused
  - Remaining evidence of accumulated/chronic moisture was noted by rusted metal surfaces, rust staining on floors where metal items had been stored, and water damaged wall materials at their base; none of these stained materials appeared to have been cleaned or removed
  - o Most surfaces had been painted but it was noted that in some areas, rust and mold growth had been painted over (this condition remained unchanged from the 2022 inspection)
  - Self-contained modular air filtration unit in the ceiling of the Room AD11 was filthy (<u>this condition remained unchanged from the 2022 inspection</u>); the unit is not in operation any longer, but based on its condition, it should be removed
  - Men's and women's bathrooms, not in use currently, were clean and free from visible mold growth except for the men's shower (see next bullet); rust was noted on metal surfaces from chronically elevated relative humidity levels presumably from when the showers were used and compounded by the steam release event several years ago
  - Men's shower
    - Current leak (<u>same location as in 2022</u>) at what appeared to be a vent pipe through the wall
    - Water was running down the tiled wall onto the same piece of wood that
      was there and wet in 2022 and then onto the concrete floor, which
      contained debris and trash that can grow mold when wet
    - The same pile of trash/debris remained on the floor beneath the leak and has at least been getting wet since 2022 when GML first found the leak
    - The same moldy and water damaged materials remained as in 2022

- Wood door framing and baseboard trim was water damaged and moldy; wood door trim and baseboards should be replaced with metal and tile, respectively (this condition remained unchanged from the 2022 inspection)
- HVAC system supply diffusers were filthy and still contained a significant amount of accumulated black dust/debris; this condition remained unchanged from the 2022 inspection
- No dehumidifier was present in any basement room; <u>this condition remained unchanged from the 2022 inspection</u>
- Relative humidity levels averaged below 36%, which is typical during the heating season
- Hallway by the mechanical room and custodian's closet
  - Metal doors rusted at their base
  - Wood doors were water damaged, delaminated, and moldy at their base this condition remained unchanged from the 2022 inspection
  - Small patch of water damaged ceiling in an already patched area remained unchanged from the 2022 inspection
  - Custodian closet with the same old, moldy record books stored on a rusty shelf that were reportedly being discarded after the 2021 inspection but they remained as of the 2023inspection; the ceiling vent was still blocked with dust
  - HVAC filters were being stored on the top shelf of the rusty metal shelf in the Custodian closet; the filters were unwrapped and, therefore unprotected from the mold and humidity in the closet

#### Mechanical room

- Wet areas and standing water on the floor; the room reportedly flooded with the recent heavy rain and was cleaned up by inhouse personnel
- Wet cardboard, trash, and other debris was observed on the floor; some items had not been moved after the flood as trapped moisture was seen beneath them
- Ripped fiberglass pipe wrap; some insulation appeared to have been retaped or replaced, but not all
- Large, open sump with wastewater (tampons and other wastewater components visible in the sump and on the surrounding floor) in 2022 remained unchanged, allowing potentially pathogenic contaminants (fungal, bacterial, viral) to continually get into the basement air; there cannot be any open wastewater sources indoors
- Water damage on many surfaces, including pipe insulation wrap, walls, and external surfaces of HVAC system ductwork
- Visible mold growth on pipe wrap outer covering
- Visible mold growth on wall materials, both porous and painted concrete; when compared with photos from 2022, the same mold is on the same surfaces, not having been removed with the reported mold remediation
- Significant amount of rusted surfaces
- Many areas of rusted pipes/fittings this condition remained unchanged from the 2022 inspection
- Metal door framing was rusted out at its base
- Bucket with a flexible tube draining into it contained standing water during this inspection (the moldy bucket was present in 2022 but was dry during that inspection); there should not be any open containers of standing water

- Adjacent electrical/tech room
  - Mold growth on the walls
  - Wood materials housing utilities were moldy
  - Walls were water stained up at least 2 feet from the floor
  - Accumulated debris on the floor had been wet and was moldy
  - Large piece of mechanical equipment on the far wall was rusted out at its base; there were black trash bags covering the unit allowing water to run down the plastic into containers on the floor
- Most of the above described conditions remained unchanged from the 2019, 2021, and 2022 inspections
  - The room (and small adjacent room) did not appear as if they had been professionally remediated
  - Comparison photos from the previous three inspections confirm that most of the current water and mold damaged materials were not removed or remediated
  - Professional mold remediation in the mechanical room and small adjacent room are therefore, concluded to have been unsuccessful
  - The ongoing/chronic/unresolved water issues have promoted and supported continued growth of the mold already confirmed and documented during the previous inspections
- Administration Building Roll Call Room
  - HVAC system supply air diffusers contained heavy black dust/debris as did the ceiling around the diffuser; this condition remained unchanged from the 2022 inspection
  - o Modular air filtration unit in the ceiling remained filthy as it was in 2022
  - A small air purifier was being used
  - o Relative humidity was 30.3% and temperature was 73.7°F
- Lighthouse (Medical) Building Basement
  - o Mold odor detected; this condition remained the same as in 2022
  - Large puddle of standing water in the main room and first room on the left from the recent rain; file cabinets were sitting in water and cardboard boxes on shelves were sitting just above the wet floor
  - Basement was mostly empty; what was present during this inspection was the same as in 2022 however: rusty, moldy file cabinets, plastic shelf with the same cardboard boxes of files, equipment and tools, etc.
  - A 5 gallon bucket of standing water was sitting on the floor; there should not be any sources of standing water in basements
  - o An older, small dehumidifier was sitting in the puddle of water in the first room
  - o The same moldy, wooden pallet was sitting on the floor of the main room
  - o Storage rooms and the main room had been painted; some mold growth was noted beneath the paint and on surfaces where the paint had not fully covered
  - Bubbling and peeling ceiling paint in the green storage rooms appeared to be from water (no current evidence found) but could also be due to calcimite ceilings and there was mold growth above the peeling paint; this condition remained unchanged from the 2019, 2021, and 2022 inspections
  - HVAC ductwork in the main room had been painted in the past but the paint
    was peeling and visibly moldy throughout this condition remained unchanged
    from the 2022 inspection
  - Light fixtures were rusty and moldy

- Considerable evidence of accumulated/chronic moisture was noted by rusted metal surfaces, rust staining on floors where metal items had been stored, water damaged building materials, peeling foundation paint, and visible mold growth; many of these conditions remained unchanged from 2019, 2021, and 2022 inspections
- O HVAC vents in the green rooms were dirty with black dust and debris; this condition remained unchanged from the 2022 inspection
- o Remaining pipe insulation was visibly moldy in the main room; <u>this condition</u> remained unchanged from the 2021 inspection
- Door frames were rusted along the bottom few inches
- Door casings with peeling paint and visible mold growth beneath the paint
- The filter on the high capacity, commercial grade dehumidifier installed in 2021 was filthy and in need of replacement; the unit was not running during the inspection although there had been a large water event
- Mechanical room
  - Largely, the mold and moisture condition of this room remained the same as during the 2019, 2021 and 2022 inspections although mold and asbestos abatement had been performed
  - Visible mold growth on building materials, both porous and painted concrete; when compared with photos from 2022, the same mold is on the same surfaces, not having been removed with the reported mold remediation
  - Large sump now had a cover
  - Paper-covered fiberglass insulation on the right exterior wall had been removed
  - The open vent (to the outdoors) currently had a flexible vent attached to it but the other end was sitting on the floor; the purpose of this was unknown, but there was still undesirable outdoor air coming into the basement as there was in 2022
  - Ceiling was still moldy
  - Pipe insulation was water stained and covered in mold growth; several areas of iron pipes were missing insulation and were badly rusted from chronic condensation
  - Wet, sludgy material on the floor along with numerous other wet areas and dripping pipes
  - One pipe was actively sending out steam that was reaching the ceiling where it was condensing
  - Several sections of pipes were significantly corroded and at high risk for breaking and leaking/flooding the room
  - The floor, walls to the right of the HVAC system air handler, and top of the air handler were saturated and dripping with condensation; the still, and unnecessarily, open outdoor air intake for the unused air handler has been bringing in air of widely varying temperatures and humidity, causing excessive amounts of condensation resulting in significant mold growth
  - Questionable asbestos containing materials although asbestos abatement had previously been conducted in this room
  - Surfaces were rusted throughout from chronic dampness
  - Evidence of chronic moisture on the walls, particularly at their base
  - Accumulated trash and debris strewn about on the floor, some of which was moldy

- Unused HVAC system located in this room
  - Outdoor air was blowing through the unit still, causing the blower wheel to turn
  - Ductwork remained and vents were open causing moldy air from the room (and potential asbestos fibers from loose/ripped sections of pipe wrap still present) to be drawn into the system and spread into the rooms/areas supplied by the ductwork (even if the system is not running)
  - The filthy and moldy air handling unit remained open allowing moldy, damp air into the system and, subsequently into the occupied spaces above where vents remained open
  - Some significantly moldy ductwork wrap/tape remained exactly as it had been in 2022 even though professional mold remediation had been performed in this room
  - Moldy rags sitting on top of the air handler
- o Electrical/IT room (condition remained unchanged from 2022)
  - The room had old paint on the walls, which was moldy
  - Significant evidence of chronically elevated relative humidity levels was noted by rusted metal surfaces, water damaged building materials, peeling foundation paint, and visible mold growth
  - Drip marks and water stains from ceiling to floor
  - Heavy mold growth on the painted plywood housing electrical panels (exactly as it had been during the 2022 inspection)
  - Heavy mold growth on the underside of a particleboard table; the table edge was swollen and delaminated from exposure to moisture
  - Piles of trash and debris on the floor
- o Relative humidity/temperature measurements:

Main Room 35.4% / 71.3°F
 First Room on Left 36.6% / 70.0°F

- Lighthouse (Medical) Building First Floor
  - Supply air diffusers were filthy, containing the same black dust/debris as in all the inspected years
  - Supply air diffusers with condensation drip marks
  - Supply air diffusers had been painted but the filth and rust could be seen on surfaces that were missed by the paint; painting over rusty, dirty diffusers is unacceptable
  - o Showers were leaking/running water, which was causing high humidity, mold growth, and rust stains; there was standing water on the floor as well, an indication that the floor is not pitched properly towards the drain
  - o Relative humidity level in the dormitory hallway was 28.2% at 72.1°F
  - HVAC room (not previously inspected)
    - The room had reportedly been professionally cleaned/remediated since the 2022 inspection
    - The painted concrete walls were filthy with some mold growth
    - There was trash and debris on the floor
    - Potential asbestos containing materials on heating pipes next to the HVAC air handler
    - Heavy mold growth on paper-covered fiberglass and potential asbestos covering heating pipes
    - HVAC air handler
      - Two inch filters were dirty, darkly discolored

- Air handler with handfuls of accumulated organic debris sitting in its base; debris was on both sides of the filters
- Internal components were rusted
- Beneath the accumulated debris, there was a thick layer of stuck on dust/debris because it has gotten wet, which matted it down
- This unit has not been cleaned in a very long time and is overdue for specialized cleaning and component replacement/upgrade as needed
- This is a medical building with sick, and some chronically ill, people who need to be breathing clean air; this HVAC system is not providing that quality of clean air

#### • Lenox Building

- HVAC vents were filthy containing significant black dust/debris that was also accumulating on the adjacent ceiling material; this condition was <u>unchanged</u> from 2019, 2021, and 2022
- Supply air diffusers had been painted but the filth and rust could be seen on surfaces that were missed by the paint; painting over rusty, dirty diffusers is unacceptable
- Shower heads were leaking/running water still, which was causing high humidity, mold growth, a strong mold odor, and rust stains; there was standing water on the floor as well, an indication that the floor is not pitched properly towards the drain
- Basement
  - Large grate over the access opening, as with the other basements; it was unclear why these basements containing HVAC systems and other mechanical equipment were open to the elements, but it is strongly not recommended
  - Standing water on the floor
  - Water beneath the air handler
  - Potential asbestos containing materials on heating pipes
  - Pipe insulation was ripped, falling off, and missing altogether in areas; the missing areas of insulation resulted in rusted pipes/fittings
  - All metal surfaces were rusted, some completely corroded
  - Widespread mold growth, particularly on the external HVAC system ductwork wrap and pipe insulation
  - Accumulated trash and other debris on the floor, most of which was wet and moldy
  - Several sections of pipes/fittings were almost rusted through
  - Solid black mold growth on the ductwork wrapping on one side of the air handler; other sections were covered in actively growing mold (hyphal mat was observed)
  - HVAC system
    - Air handler was filthy, covered inside and out with accumulated organic debris that was or will be growing mold (leaves, dirt, dead insects, trash, etc.)
    - Visible mold growth on several components
    - Internal components were rusted
    - Filter compartment was open to the basement, which can allow the damp, moldy air to enter the system; return air from the building will also bypass the filters
    - Two inch filters were filthy and black with accumulated dust, debris, and mold growth; cardboard filter frames were damp

- Copper pipes were oxidized from chronic moisture exposure
- Pipe and ductwork insulation wrap was ripped, deteriorated, and moldy

#### Attucks Building

- Areas of water damaged ceilings from chronic roof leaks; it was not known if the leaks had been repaired or were ongoing
- o A bucket in the lobby was catching roof leak water during this inspection
- o The dining hall HVAC vents were rusty, filthy with black dust/debris, and were visibly moldy; this condition was unchanged from 2019, 2021, and 2022
- o The dining hall ceiling was still water damaged in several areas
- o The dining hall floor was filthy, although reportedly cleaned often
- Self-contained modular air filtration units remained in the ceiling and were filthy
- o HVAC vents in all inspected areas were filthy, all containing the heavy black dust/debris; this condition was unchanged from 2019, 2021, and 2022
- Library had a large water stain in the ceiling from a roof leak; the stain was present in 2022 but was much smaller, indicating and ongoing roof leak that requires immediate attention
- The technology room no longer had visible mold on the ceiling, although the water damage remained but was painted
- o Library relative humidity was 35.7% at 65.8°F
- Developmental Disabilities room had been converted to a storage room in 2022 but was now also being used as an employee break room
  - The significantly moldy window air conditioner that caused so much mold growth in the room (because it was running on high in December of 2021) remained in the window, but was not currently running (but was still covered in mold growth); this unit needs to either be discarded or professionally cleaned if it is worth the cost
  - Mold growth on the surface of the ceiling was removed but the water damaged, peeling/bubbled calcimite ceiling remained; the ceiling should have been removed due to the roof leak and excessive mold growth
  - The room had a stale, unpleasant odor

#### Carter Building

- Second floor common rooms with filthy HVAC system ductwork, <u>unchanged</u> from 2019, 2021 and 2022; exposed surfaces of the diffusers had been painted but the inner surfaces remained rusted, filthy, and moldy
- Common room self-contained modular air filtration unit remained and was filthy
- Water stain in the ceiling of the trash room was new
- o Basement (remained unchanged from, if not in worse condition than, the condition during the 2022 inspection)
  - Open access grate
  - Large amount of standing water on the floor
  - Numerous leaks were occurring, hot water was dripping at a fast rate from several fittings and pipes onto the floor and other plumbing components
  - Pipe insulation was ripped, falling off, and missing altogether in areas
  - All metal surfaces were rusted, some completely corroded
  - Widespread mold growth, particularly on the external HVAC system ductwork and pipe wrap/insulation that looked exactly as it had in 2021 and 2022
  - A lot of trash and other debris on the floor, most of which was moldy

#### HVAC systems

- Air handlers were filthy, covered inside and out with accumulated organic debris that was or will be growing mold (leaves, dirt, dead insects, trash, etc.)
- Visible mold growth on several components
- Internal components were badly rusted
- Filter compartments were open, introducing wet and moldy basement air into the already filthy system; the combination of chronic moisture and organic dirt/debris provides conditions that promote and support unacceptable mold growth inside an actively used air handling system
- Two inch filters in the bottom unit were filthy and black with accumulated dust, debris, and mold growth; cardboard filter frames were wet
- Copper pipes were oxidized from chronic moisture exposure
- Pipe and ductwork insulation wrap was ripped, deteriorated, and moldy

#### • Adams Building

- Common rooms with filthy HVAC system ductwork, <u>unchanged from 2019</u>,
   2021, and 2022 although reportedly cleaned; exposed surfaces of the diffusers had been painted but the inner surfaces were rusted, filthy, and moldy
- Common room self-contained modular air filtration unit remained and was filthy
- o Basement
  - Open access grate
  - Evacuation pump sitting in a milk crate at the base of the ladder
  - Standing water on the floor
  - Leaks were occurring from some fittings/pipes onto the floor and other plumbing components
  - Pipe insulation was ripped, falling off, and missing altogether in areas
  - A large, uncovered sump with two large, corrugated pipes (which were crimped) draining into it held hot water; at regular intervals, large bursts of steam were released, which reached the ceiling and were condensing
  - Metal supports for heating system and other mechanical equipment were rusted out at their base
  - All metal surfaces were rusted, some completely corroded
  - Widespread mold growth, particularly on the external HVAC system ductwork and pipe wrap/insulation that looked exactly as it had in 2021 and 2022
  - A lot of trash and other debris on the floor, most of which was moldy
  - HVAC systems
    - Air handlers were filthy, covered inside and out with accumulated organic debris that was or will be growing mold (leaves, dirt, dead insects, trash, etc.)
    - Visible mold growth on several components
    - Internal components were rusted
    - Filter compartments were open, introducing wet and moldy basement air into the already filthy systems; the combination of chronic moisture and organic dirt/debris provides conditions that promote and support unacceptable mold growth inside an actively used air handling system

- Filters were filthy and moldy
- Copper pipes were oxidized from chronic moisture exposure
- Pipe and ductwork insulation wrap was ripped, deteriorated, and moldy
- Trash, moldy cardboard, ripped fiberglass insulation, and debris on top of the bottom air handler

#### **Laboratory Results**

#### Surface Mold Sample Results (Please refer to the two AccuScience reports)

Surface swab results are reported as colony forming units per square inch (CFU/in²), in other words, the total count of living mold spores per square inch of tested material. A colony forming unit (CFU) is a mass of growth on a culture plate large enough to see and typically begins with one spore. For example, if the mold level on a surface is found to be 500 CFU/in², and the sample contained only the mold *Penicillium*, the result can be interpreted as 500 living *Penicillium* spores per square inch of the tested material.

Swab sampling defined <u>elevated levels</u> and/or unacceptable types of active (living) mold on the following tested materials:

- Administration Building basement room AD-11 HVAC system supply air diffuser
- Administration Building Roll Call Room HVAC system supply air diffuser
- Lighthouse basement main room Visible mold on painted HVAC duct seam
- Lighthouse basement boiler room visible mold on HVAC system ductwork wrap
- Lighthouse basement IT room Visible mold on electrical panel plywood
- Lighthouse basement IT room Visible mold on underside of particleboard table
- Lighthouse HVAC supply air diffuser outside Admissions Office
- Lighthouse dormitory hallway HVAC system supply air diffuser
- Lighthouse mechanical room supply side of HVAC system air handler
- Lenox supply air diffuser in shower hallway
- Lenox basement Visible mold on HVAC system ductwork wrap
- Lenox basement Visible mold on mesh ductwork wrap patch
- Attucks dining hall HVAC system supply air diffuser, at water damaged ceiling
- Carter Building HVAC system supply air diffuser in day room (game room)
- Carter Building hallway HVAC system return air grille
- Adams Building Day Room HVAC system supply air diffuser
- Adams Building basement Visible mold on HVAC system ductwork wrap

Mold levels defined by culture analysis on these surfaces far exceed those expected on the same materials if they had not been exposed to chronic moisture from multiple sources that have not changed since the last inspection. Some of these surfaces have been professionally 'remediated', however, if visible mold growth remains on the surface, it is automatically concluded that the remediation has failed. These samples show that the mold is still alive and actively growing year after year even with the cleaning or remediation efforts that have been performed.

The visual inspection and/or secondary microscope analysis confirmed **abnormal and unacceptable mold growth** as well as large amounts of black debris (HVAC diffusers/vents) on the following surfaces, which included some that had been professionally remediated or cleaned in the last year:

- Administration Building basement mechanical room Visible mold on pipe insulation
- Lighthouse basement boiler room Visible mold on pipe insulation wrap
- Carter Building basement Visible mold on HVAC system ductwork wrap

These samples did not result in high levels of culturable molds (but mold was confirmed visually and with microscope analysis), which is an indication that the remediation company soaked/heavily sprayed surfaces with a sanitizer or the mold has died on its own (not typical, though). The sanitizer killed most of the mold on these surfaces however, even if molds are killed, they must still be removed; dead mold spores and structures contain the same harmful components and chemicals as those that are alive. There cannot be visible mold growth (dead or alive), dust and debris, or water damaged materials after professional mold remediation has been completed. The visual inspection by GML and laboratory results failed all remediated areas.

Mold types identified growing on the tested surfaces included Aspergillus niger, Aspergillus ochraceus, Aspergillus sydowii, Aspergillus ustus, Aspergillus versicolor, Aureobasidium, Chaetomium, Cladosporium, Epicoccum, Memnoniella, Penicillium, Pithomyces, and Trichoderma. Non-sporulating and xerophilic fungi (unable to mature on culture plates for identification but require similar growth conditions as molds) along with environmental yeasts were also present. The significant evidence of chronic moisture and current plumbing leaks/problems have been more than sufficient to support mold growth on these and many other not tested but visually inspected surfaces. Most of these surfaces were visually inspected and tested in previous inspections with similar results, concluding that either remediation and cleaning efforts have failed, or no work was done, leaving the mold on surfaces year after year.

The mold *Stachybotrys* was identified microscopically in the Lenox basement on the mesh-like material used to patch a section of ductwork insulation wrap. This mold has a higher moisture requirement than other molds and when present, confirms chronic water problems. *Stachybotrys* produces satratoxin, a powerful mycotoxin that is neurotoxic and inflammatory in people.

Aspergillus is one of the most clinically important mold groups that is commonly found indoors when conditions are favorable for their growth; Aspergillus growth confirmed on most of the tested surfaces in the buildings, including HVAC systems. Aspergillus can cause chronic lung and sinus infections, produces mycotoxins, and is a common allergenic mold. Chronic exposure to these and the other molds confirmed in the buildings can cause a myriad of health problems, many of which may not initially be attributed to mold; colds that take longer to clear, chronic sinus infections, persistent coughing, itchy and runny eyes, sore throats, exhaustion, lethargy, mental fogginess, etc. People with underlying health conditions and weaker immune systems are most affected by chronic mold exposure. The 2019, 2021, and 2022 inspections confirmed mold contamination sources that remained as of this 2023 inspection. Yearly visual inspections (2020 omitted due to Covid) and laboratory results confirm that there has been and still is chronic mold exposure potential for staff members and persons served.

The following samples resulted in **no detectable or negligible mold activit**y, but all HVAC system diffusers tested contained heavy black dust/debris, which in itself is unacceptable:

- Attucks Library HVAC system supply air diffuser
- Attucks Lobby HVAC system supply air diffuser

Particulate Analysis Results (Please refer to the MicroVision Laboratory Report)

Two samples of the black dust/debris inside the HVAC system supply and return ductwork were collected for particulate analysis. The black dust was already confirmed to contain abnormally

elevated levels of mold spores but the dust was full of larger particles/fibers. The samples contained the following components, listed in order of occurrence:

- B1 Organic debris, cellulose and synthetic fibers, minerals, glass fibers, opaque particles
- S22 (B2) Minerals, organic debris, opaque particles, glass fibers, cellulose fibers

The glass fibers come from the deteriorated fiberglass linings inside the air handlers; fiberglass should ideally not be inside air handling systems as the particles that are released get into the airstream and then into peoples' lungs, eyes, and sinuses. Fiberglass particles are irritating, exacerbate asthmatic conditions, cause irritation in the mucous membranes, and can cause other health problems. The organic debris is continually coming from the air handlers which were filthy and full of trash and debris, including dirt, leaves, mold, etc. Supply diffusers should be delivering clean air that is free from all of these particle types to the occupied spaces.

#### **Current Industry Guidelines**

According to the ANSI/IICRC Document S520: Standard and Reference Guide for Professional Mold Remediation (2015) the following Conditions for indoor mold have been defined:

Condition 1: An indoor environment that may have settled spores, fungal fragments, or traces of actual growth whose identity, location, and quantity are reflective of a normal fungal ecology for a similar environment.

Condition 2: An indoor environment primarily contaminated with settled spores dispersed directly or indirectly from a Condition 3 area, and which may have traces of actual growth.

Condition 3: An indoor environment contaminated with the presence of actual mold growth and associated spores. Actual growth includes growth that is active or dormant, visible or hidden.

Based on the current and pervasive mold condition in all inspected buildings (HVAC systems, basements, occupied areas), the inspected buildings of the Bridgewater State Hospital are collectively characterized as a Condition 3 Environment, as defined by the Document S520. A Condition 3 Environment warrants the work of a specialized mold remediation company to remove and clean moldy building materials and a NADCA certified HVAC system cleaning company to clean the HVAC systems according to current mold remediation and NADCA guidelines. It is not recommended for people to be working or living in the buildings until the current mold contamination sources have been appropriately remediated by qualified, specialized companies; the buildings are not currently providing healthy living or work environments due to the mold contamination sources in basements, occupied areas, and HVAC systems serving the occupied areas of the buildings. The mold condition, and environmental conditions that have caused and supported continued mold contamination in the buildings, has stayed the same or gotten worse in the four years of GML inspections. The remediation, cleaning, and maintenance work done to date has been ineffective at resolving the problems.

#### **Recommendations**

The following remediation recommendations have been adapted from current literature from the EPA, AIHA, ACGIH, IICRC/ANSI, New York City Department of Health, and other applicable organizations that have developed plans for effectively managing indoor mold growth. Mold sensitivity can develop over time and the length of time leading to mold sensitivity or symptoms related to mold exposure is not known and can vary greatly between individuals. Once indoor mold growth is confirmed, it must be removed using the appropriate procedures to

minimize/prevent potential mold exposure risks. The accepted protocol for indoor mold growth is to remove contaminated, porous building materials and remediate (described below) less porous and non-removable materials. Current standards state that mold growth must be eliminated (not fogged, sprayed, ozonated, painted over, killed but left in place, or encapsulated).

Please note that although asbestos abatement had been done in some areas there were still suspect materials in several basements that should be tested by a licensed and independent asbestos consultant. When 'insulation removal' is recommended in the mold remediation procedures below, GML is referring to non-asbestos containing insulation as the recommendations are written for a mold remediation company only.

All sources of water intrusion and accumulation need to be identified and fully resolved. The amount of water coming into/accumulating in the basements and several other areas of the buildings is unacceptable. Pipes were leaking, basements were flooding with rain and ground water, sumps were open including one with raw sewerage components and one with steaming water coming from boiler pipes, mechanical equipment draining into open buckets, unconditioned outdoor air allowed to come in where it was causing significant condensation problems, inadequate or the absence of dehumidification, etc. These moisture sources are the direct cause for abnormal and unacceptable mold growth and cannot be allowed to continue. Most of these same moisture sources were documented in 2022, 2021, and 2019.

A specialized mold remediation company is needed to remove mold growth sources and remediate remaining materials/surfaces in the basements of the Administration and Medical (Lighthouse) Buildings as well as basements of the Adams, Carter, and Lenox Buildings; isolated areas in the Attucks Building also need to be remediated (water damaged ceilings). This type of company is skilled in containment and decontamination procedures and is familiar with the currently accepted mold remediation standards, procedures, and safety guidelines. Secure engineering controls (containment barriers, negative air pressure system, HEPA filtered air scrubbers) and safety procedures (personal protective equipment—PPE) for people performing the work will be necessary to prevent cross contamination and exposure risk while the work is being conducted. A qualified remediation company knowledgeable and experienced in the field and who follows the IICRC/ANSI Document S520: Standard and Reference Guide for Professional Mold Remediation (2015) will do the necessary work using procedures and guidelines outlined in this document to achieve complete and successful remediation of contaminated areas.

Remediation recommendations are based on onsite observations and reported information. GML is presenting guidelines for amounts of materials to be removed and remediated; the remediation company may ultimately decide how much material to remove and remediate in the affected areas based on further assessment once the remediation process has begun. Many of the following steps were outlined in the 2022 report, but because they were not agreed upon by people making the decisions or the Arcadis consultant, they are being reiterated here.

The following protocols can begin only after secure engineering controls have been established and are maintained. Safety procedures and gear for personnel performing the work will be needed for everyone who goes into the contained areas. A negative air pressure system may be difficult in the basements because there were no windows; the exterior doors or access openings can possibly be used but the system must be sealed in the doorway or access opening, which will prevent people from coming into or leaving the space while the work is being done. Discuss the options with the remediation company to be sure everyone has an understanding of the process and expectations. Old record books in the Custodian's room should be moved out before remediation begins as they are presumably confidential.

#### Remediation Protocol: Administration Building Basement

- Seal all sumps but particularly the one in the Administration Building basement with hazardous raw sewerage components overflowing onto the floor
- Remove all exposed, water damaged, fiberglass pipe insulation (new and all of the original)
- Remove all HVAC system ductwork insulation and tape at seams (unless they are asbestos containing)
- Remove all paper/fabric-type wall coverings (unless they are asbestos containing)
- VCT floor tiles should be removed as they showed evidence of water damage; moisture
  was able to get beneath the tiles resulting in mold growth on the underside of the tiles as
  well as the installation adhesive
- Wood baseboard and door trim in the Women's and Men's bathroom should be discarded
- Hollow-core or laminate doors should be discarded and replaced with metal or solid wood, both of which are somewhat less likely to deteriorate or become as moldy in a water event
- Open the still water damaged/wet section of the mechanical room hallway ceiling (just outside the mechanical room door); continue removing materials 2 feet in all possible directions beyond evidence of moisture or mold
- Discard vinyl cove-base on walls that were exposed to moisture; the vinyl and adhesive readily grow mold as well as trap moisture between the vinyl and painted walls where the paint can then support mold growth
- Remove exposed wood in the Men's shower where the vents/pipes were still actively leaking; remove the tiled wall that has been exposed to the leaking pipe for years
- Discard all trash and debris on all floors
- Discard extraneous, porous building materials
- Discard the bucket and moldy drain tubing in the mechanical room; this should be replaced with a system that directly drains the water into a closed drain or pump
- Rusted shelving units or cabinets should be discarded
- Scrape off any/all loose paint on surfaces
- Abandoned/unused HVAC system equipment or air movers should be removed along with their ductwork; cleaning the ductwork of an abandoned system is not cost effective, although an alternative option is to have the ductwork sealed if it is not to be removed
- Materials to be removed should be bagged and the bags sealed and wiped down before taking out of the basement to be discarded
- Once removed materials are discarded, all remaining building materials from floor to ceiling which includes wire brushing/scrubbing/wiping (different materials require varying cleaning techniques), application of an EPA approved sanitizing agent, HEPA vacuuming, and sanding or grinding if necessary
- Materials to be remediated include, but are not limited to, the following:
  - o Concrete (floors, walls, ceilings)
  - o Porous wall materials
  - o All wood materials
  - o All pipes, particularly PVC that support mold growth
  - o Utilities, mechanical equipment, appliances, technology equipment, etc.
  - Support columns/beams
  - o Exterior surfaces of HVAC systems, particularly painted surfaces
  - o Doors and framing

- Unfortunately, there is no effective method other than sanding or ice blasting to remove top layers of paint so mold growth on the underlying layers of paint cannot be remediated; regularly monitoring and sanitizing painted surfaces will be necessary (mold growth cannot be painted over as the mold will continue to grow on the newly painted surfaces)
- Damp wipe and HEPA vacuum all other surfaces in the basement to remove settled mold spores and demolition dust released during the process
- HEPA filtered air scrubbers should run for at least 48 hours after the work is completed

#### Remediation Protocol: Medical (Lighthouse) Building

- Remove boxes of files (discard cardboard, put contents in alternative containers) in the first room; these boxes remained since 2022 and were now in a room that had standing water on the floor from recent flooding
- Seal all open sumps
- Remove all pipe insulation (unless it is asbestos containing)
- Remove all fabric/paper/absorbent/porous wall materials (unless they are asbestos containing)
- Remove all rotted/rusted out building materials
- Discard all wood pallets or other absorbent, organic materials on the floors
- Abandoned/unused HVAC equipment or air movers should be removed along with the ductwork (and outdoor air intakes permanently sealed—if needed, these should be fully ducted); cleaning ductwork of an abandoned system is not cost effective, but an alternative is to have the ductwork sealed
- Discard all trash and debris on the mechanical room and other floors
- Discard extraneous, porous building materials
- Scrape off any/all loose paint on surfaces
- Discard tables and chairs as most were visibly moldy and water damaged
- Discard or remediate file cabinets
- Discard/remove moldy plywood in the electrical/technology room
- Remove all external coverings, tape, paper, insulation, and peeling paint from HVAC system ductwork and units (if not asbestos containing)
- Once removed materials are discarded, all remaining building materials from floor to ceiling, should be remediated which includes wire brushing/scrubbing/wiping (different materials require varying cleaning techniques), application of an EPA approved sanitizing agent, HEPA vacuuming, and sanding or grinding if necessary
- Materials to be remediated include, but are not limited to, the following:
  - o Concrete (floors, walls, ceilings)
  - Porous wall materials
  - All wood materials
  - o All pipes, particularly PVC that support mold growth
  - o Utilities, mechanical equipment, appliances, technology equipment, etc.
  - o Support columns/beams
  - o Exterior surfaces of HVAC systems, particularly painted surfaces
  - Doors and framing
- Unfortunately, there is no effective method other than sanding or ice blasting to remove top layers of paint so mold growth on the underlying paint can be remediated; regularly monitoring and sanitizing painted surfaces will be necessary (mold growth cannot be painted over as the mold will continue to grow on the newly painted surfaces)
- Damp wipe and HEPA vacuum all other surfaces in the basement to remove settled mold spores and demolition dust released during the process
- HEPA filtered air scrubbers should run for at least 48 hours after the work is completed

#### Remediation Protocol: Basements of the Adams, Lenox, and Carter Buildings

- Mold remediation should take place in all of the basements of these and other buildings with wet environments
- All dirt, trash, and debris must be removed from the floors
- All HVAC system ductwork insulation/wrap/tape/paper materials must be removed (unless they are asbestos containing)
- All pipe insulation/wrap must be removed (unless it is asbestos containing)
- Once removed materials are discarded, all remaining building materials from floor to ceiling should be remediated which includes wire brushing/scrubbing/wiping (different materials require varying cleaning techniques), application of an EPA approved sanitizing agent, HEPA vacuuming, and sanding or grinding if necessary
- Materials to be remediate include, but are not limited to, the following:
  - Concrete (floors, walls, ceilings)
  - Other wall materials
  - All wood materials
  - o All pipes, particularly PVC that support mold growth
  - o Utilities, mechanical equipment, appliances, technology equipment, etc.
  - Support columns/beams
  - o Exterior surfaces of HVAC systems, particularly painted surfaces
  - Doors and framing
- HEPA filtered air scrubbers should run for at least 48 hours after the work is completed

#### Remediation Protocol: Attucks Building

- The mold remediation company should remove and discard the moldy window air conditioner in the storage/break room off the library; it could also be discarded by inhouse personnel as long as it is discarded through the window and not brought into the building
- Water damaged sections of the Technology/computer room and library ceilings should be removed and remediated
- Water damaged/stained sections of ceilings throughout the building (lobby, dining hall, etc.) should be removed, with removal extending at least 2 feet in all possible directions past visual evidence of water or mold damage
- Once removed materials are discarded, all remaining building materials from floor to ceiling, including floors, walls, and ceilings, should be remediated which includes wire brushing/scrubbing/wiping (different materials require varying cleaning techniques), application of an EPA approved sanitizing agent, HEPA vacuuming, and sanding or grinding if necessary
- HEPA filtered air scrubbers should run for at least 48 hours after the work is completed

#### **General Building Recommendations**

- Scrub and sanitize moldy wall, ceiling, and floor materials in the Lenox shower; sanitizing should be done more regularly based on the amount of shower usage and continuing leaking shower heads
- Remove and replace any water stained ceiling tiles
- Appropriately label rooms/closets with chemicals; the words "Toxic Closet" are not appropriate and can be dangerous if there is a fire (fire fighters need to know what types of chemicals are stored)

- Regularly clean and sanitize bathrooms and showers; do not run shower water excessively, particularly if no one is showering
- Avoid mopping floors so they become so wet as to rust metal surfaces at the floor level; many rooms/areas did not have reported water events but had had considerable rusted surfaces at the floor because of frequent mopping with too much water
- Water pipes must be fully insulated, including around joints and fittings; if there are gaps in insulation, condensation will occur leading to rust and mold growth
- It is strongly advised to close off the basements from the elements; all basements should be as water and air tight as possible and dehumidified or mold growth will recur
- Wastewater sumps cannot be left open or hazardous and pathogenic bacteria will enter the basements, and air handling systems; all sumps should have sealed but removable covers to prevent evaporation into the basements which must be dehumidified
- Repair all leaking pipes, fittings, valves, and equipment; any accumulating water will increase the relative humidity and be counterproductive to the dehumidification systems as well as cause mold growth on surfaces that get wet

#### **HVAC Cleaning Protocol**

All in-use HVAC systems (including mini-splits) in all buildings need to be professionally cleaned by a NADCA certified air handling system cleaning specialist; the current company should be replaced as the condition of systems that have been recently cleaned is unacceptable. HVAC cleaning can only take place once the mold remediation has been successfully completed and pipe leaks repaired. Cleaning the systems will include all components of the air-handlers (unless they are being discarded or replaced), which will likely need to be disassembled, based on their current conditions, to access all necessary parts, metal ductwork, diffusers and vents (must be removed and hand cleaned) throughout the buildings, pipes/tubing, external surfaces, etc. Replace badly rusted components. Seal all openings and gaps in air handlers or ductwork. All fiberglass linings inside air handlers and ductwork should be removed and replaced with an alternative insulating material such as Armaflex. New, allergen-trapping, high efficiency filters (highest MERV rating the systems can accommodate) should be installed after the cleaning is completed. Two inch filters are designed to be changed between 3 - 4 months, depending on their MERV rating and amount of system usage. Filter compartments must be sealed with removable covers to ensure that external air, particularly basement air, is not circumventing the filters and getting into the systems. Cleaning HVAC systems as described here is recommended every 5-7 years. Regular inspection of HVAC systems is important for early detection of problems.

#### Conclusion

Many of the sources of mold growth identified during the 2019, 2021, and 2022 inspections of the Bridgewater State Hospital buildings and HVAC systems were confirmed to still be present (visually and with laboratory data) during the current 2023 inspection. This indicates that the necessary mold remediation, cleaning, and maintenance actions have not been performed (or kept up with as regularly as they need to be). HVAC systems observed during the inspection continued to be in deplorable condition, some with air handlers in wet and flooded basements with rampant mold growth and asbestos. The black dust/debris inside HVAC system air handlers and supply diffusers remained, seemingly untouched, along with unacceptable levels of mold growth; the air coming through these systems is what persons served and building staff members must breathe on a daily basis. Even sections of HVAC systems that had been professionally cleaned were confirmed to be filthy and riddled with active mold growth after the cleaning.

Significant and long-term basement water problems have been and were still occurring at the time of this inspection. The leaks have gone, for the most part, unnoticed and/or were ignored based on

the amount of rust, water damage, corroded pipes, and widespread mold growth). HVAC system air handlers in wet basements and systems with major problems (absence of filters, unfiltered and unconditioned outdoor air coming directly into the systems, absence of regular maintenance and specialized cleaning, etc.) have resulted in significant mold growth within the systems that provide air to people living and working in the buildings. There has been neglect of critical building systems. Mold remediation performed by an unqualified company who did not follow industry standards and procedures was proven to be inadequate, unsuccessful, deficient. There also are remaining questions regarding the completeness of the asbestos abatement; there appeared to be potentially asbestos-containing materials in the basements that should be investigated by an independent (not Arcadis) asbestos inspector.

Overall, this inspection suggests that inappropriate and harmful actions pertaining to the control and remediation of mold growth in the buildings of Bridgewater State Hospital continue and many of the 2019, 2021, and 2022 recommendations were largely ignored. These inactions have caused the mold problems to become worse in certain areas observed and potentially more harmful to those who work and live in the facility. Based on 4 years of Bridgewater State Hospital inspections by GML, 27 years of professional mold/indoor air quality inspection history and experience, and industry accepted guidelines for indoor spaces contaminated with mold, GML is concluding that the facility should not be occupied until these problems have been fully resolved and the buildings retested to verify that the moisture and mold sources have been removed and resolved, respectively.

Please contact our office if you have any questions. Thank you.

Sincerely,

Deborah J. Gordon Microbiologist, Owner Gordon Mycology Laboratory, Inc.

#### **Disclaimer/Limitations:**

The conclusions presented in this report are based only on the services described in this report and not on scientific procedures beyond the scope, time, and budgetary constraints imposed by the client. The information presented in this report is based in part on the observation of conditions in the field and communications with those persons involved in the project. GML makes no conclusions regarding those areas of the site that may have been inaccessible or unavailable during the investigation.

#### **General Mold Information**

Molds are simple, microscopic organisms that have a vital role in nature of decomposing decaying organic debris (dead leaves, plants and trees, etc.). Molds originate outdoors and are found in almost every type of environment. However, abnormal mold growth indoors on a "food" source (nourishment for mold growth) is of great importance to property owners and building occupants.

Mold growth is not normal for any indoor environment and only occurs when mold spores (found everywhere, but invisible to our eyes in low levels) land on food sources that provide them with enough moisture to grow. Under ordinary circumstances, microscopic mold spores in work environments, health care facilities, homes, cars, and schools go unnoticed and do not present a problem; mold spores are inadvertently removed each day by traditional cleaning methods (dusting, vacuuming, washing surfaces).

Indoor food sources for mold include carpet materials, clothing, leather, cardboard and paper products, Sheetrock, wood, insulation, over-watered plants, plastics, paints and other surface coatings, among so many others. Mold spores left on a food source that remains wet or is simply located in a humid environment, will continue to grow, producing billions of new spores allowing mold contamination to spread. This is the primary motivation for identifying and quickly resolving moisture issues. If building materials or belongings are not dried within 48 hours, mold growth begins to develop.

Because mold spores are so small, a surface can be contaminated without visual evidence of the growth; once mold growth becomes visible, it has already become a larger problem. Contrary to the stereotype, moisture that can promote and support mold growth is not limited to 'flooding' or 'wet basement' situations. Chronically elevated relative humidity, roof leaks, foundation seepage, washing machine leaks, carpets wicking moisture from foundation floors, steam production in kitchens and bathrooms, slow-drip pipe leaks, and window condensation are examples of moisture sources that often result in mold growth if they are not managed quickly and appropriately.

#### **General Basement Recommendations**

#### Foundation Floors and Walls

Breaches in foundation floors and walls must be sealed/made as watertight as possible. Cracks in floors and walls should be filled/sealed with an appropriate product. Gaps and holes around where pipes exit the foundation should be sealed. Areas with efflorescence indicate moisture penetration from outdoors; evaluate for problems with gutters, drainage, and landscaping. Consult with a foundation specialist, engineer, or mason on the problems and solutions. Sumps should have concrete bottoms and be covered at all times with plastic or metal well-fitted covers to prevent evaporation. Dirt floor crawlspaces or sections of exposed dirt must be permanently sealed with either a thick, corrugated plastic system sealed to the walls or layer of concrete.

#### **Exterior Systems**

Evaluate landscape, drainage, walkways and patios, and the gutter system and have work done to prevent/minimize water from accumulating at the foundation, where it can potentially come into the basement. The ground and artificial surfaces (walkways, driveways, patios, etc.) should pitch away from the house, the gutter system must have effective downspout extenders and be monitored to be sure sections remain connected and clear of debris, different types of fill and

exterior drainage pipes can be installed if warranted, and dense vegetation and shrubs against the house should be cut back to prevent water from splashing and accumulating along the foundation. Basement window wells should remain clear of vegetation and organic debris.

#### **Basement Dehumidification**

Consistent and effective dehumidification in all basement rooms/areas is essential to provide continuous drying, which will significantly decrease the chances for mold growth in the future. The target relative humidity level in basements is below 50% throughout the year and can be monitored with hygrometers (relative humidity meters). It is recommended to put hygrometers in several areas to be sure the dehumidification system is keeping all areas below 50%. If hygrometers read above 50% for prolonged periods, additional dehumidification will be needed. GML strongly recommends the use of high capacity, self-draining dehumidifiers (i.e. Santa Fe Classic by Thermastor) to provide uninterrupted and effective drying; energy efficient models with evacuation pumps are now available so they can be put where they are needed (not simply near the drain location as is usually the case with the types that do not have pumps). Ducted dehumidification systems are also available for finished basements with multiple rooms. Dehumidifiers should ideally have a back-up battery system to prevent spikes in relative humidity in the event of power failures. While dehumidifiers are running, basement windows and exterior doors should remain closed.

#### **Basement Storage**

It is recommended to store contents whenever possible in plastic containers with lids that can be taped shut, or plastic bags that can be sealed, and all contents should be stored off the floors, away from foundation walls, and on metal or plastic shelves and racks with legs that hold them off the floor. Furniture in particular, should be pulled away from walls several inches to allow for air circulation, preventing moisture build-up; having furniture that sits on raised legs rather than directly on the floor is important as well. Cardboard boxes should be emptied, their contents switched to plastic containers that are sealed, and the cardboard discarded. Air circulation around and under belongings in the basement is essential for preventing mold growth.

#### **Basement Flooring**

It is recommended to install only non-absorbent flooring, such as ceramic or stone tile, directly on foundation floors. Raised flooring (even small areas in closets or platforms at the base of staircases), carpeting, hardwood, cork, laminate, Dri-Core, and other absorbent materials are strongly discouraged in basements because they trap moisture, supply food sources for mold and bacteria, and provide a substrate for trapped particulates such as food, house dust, skin cells, pet hairs, etc. that even the best vacuum cleaners cannot remove. Linoleum and rubber-type flooring including rubber-backed mats are not recommended because of their water resistant nature; moisture will be trapped beneath promoting mold growth on the underside of the material itself as well as the adhesive used for installation. Natural moisture migration through the concrete slab should be allowed to occur, the moisture will pass through the non-absorbent yet porous tiles and grout, and then be removed by the dehumidification system instead of being absorbed or trapped by other flooring types. Area rugs with pads that can be discarded if they become wet or moldy can be used on top of the tile floors; these can even be as large as the room itself to emulate wall-to-wall carpeting but are much more easily and cheaply replaced if needed. Be sure to ventilate the raised platform at the base of the staircase during the reconstruction.

#### **Basement Wall Materials**

Mold growth may be avoided on the base of walls if wallboard is not in contact with the concrete floor. Traditional gypsum board acts like a sponge and will wick moisture up from the concrete, promoting and supporting mold growth on the painted and paper sides. Gypsum board should be replaced with a cement board-type or other non-absorbent product (fiberglass wallboard, fiber-rock, etc.) that does not contain a mold food source, at least along the bottom 4 feet of basement walls. Leaving wall materials at least ½ inch off the concrete floor can effectively prevent moisture wicking (mold can grow on finished painted surfaces of even the products mentioned above). Baseboards will hide this gap, which can also be made out of a material that is less or non-absorbent (plastic, composite, vinyl) further decreasing the risk for mold growth. Metal wall framing cannot absorb water or support mold growth and is, therefore, an excellent choice when finishing or renovating a basement.





QLAB, 256 Bridge St, Metuchen, NJ 08840 info@qlabusa.com www.QLABusa.com AIHA EMPAT Lab ID: 178794

ME231221-04

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## Mycologix™ Culture Media and Methods

Analysis: Culturable Fungi (FC-12MEA+) - <u>Surface/Bulk</u> QLAB Job No.: Client: Gordon Mycology Laboratory, Inc. Date Sampled:

Client:Gordon Mycology Laboratory, Inc.Date Sampled:12/19/2023Groton, MADate Received:12/21/2023Contact:Gordon, DebDate Reported:12/29/2023

Project ID: 23-094GML BSH-4

Reviewed by: WT Approved by: Wei-Chih Tang, Ph.D., Lab Director

	R 41	E004004-04/	4)	N 41	T004004-046	2)	NAI		2)
Lab Sample No.	MI	E231221-04(	1)	MI	E231221-04(	۷)	MI	E231221-04(	3)
Sample ID		S1			S2			S3	
Sample Location	Room A	n. Bldg. baser D-11 – HVAC air diffuser	supply	mechan p	n. Bldg. baser lical room – n ipe insulatior	nold on	- HVAC	Bldg. Roll Cal Supply air di	iffuser
Sample Type / Device	Surface	e/SpongeSW	AB (S)	Surface	e/SpongeSW	AB (S)	Surface	e/SpongeSW	AB (S)
Media (Temperature: 25°C)	Mycologi CA//Stac	MEA, DG18, an x™ Media: RD hybotrys (SCU d/or Xero-MEA	)-PDA, IM)	Mycologi CA//Stac	IEA, DG18, an x™ Media: RC hybotrys (SCU d/or Xero-MEA	)-PDA, JM)	Mycologi CA//Stac	IEA, DG18, an x™ Media: RD hybotrys (SCU d/or Xero-MEA	)-PDA, IM)
Date Analyzed		12/29/2023			12/29/2023			12/29/2023	
Amount of Sample Prepared		2	in²		2	in²		2	in²
Dilution Factor		100			100			100	
Detection Limit (DL)		DL = 50	CFU/in²		DL = 50	CFU/in²		DL = 50	CFU/in²
Culturable Fungi Conc.*		800	CFU/in²		< DL	CFU/in²		350	CFU/in²
Identification	Adj. Ct.*	CFU/in²	%	Adj. Ct.*	CFU/in²	%	Adj. Ct.*	CFU/in²	%
Major Hydrophilic Fungi**									
Acremonium									
Aureobasidium							3	150	43
Chaetomium	12	600	75						
Stachybotrys									
Memnoniella									
Yeast, non-specified									
Rhodotorula (yeast)									
Sporobolomyces (yeast)									
Trichoderma [Spreader]***	1	50	6						
Mucor [Spreader]***									
Other Fungi									
Cladosporium							2	100	29
Penicillium									
Aspergillus versicolor									
Aspergillus sydowii	1	50	6						
Aspergillus ustus	1	50	6						
Aspergillus niger									
Aspergillus fumigatus									
Aspergillus ochraceus	1	50	6						
Paecilomyces									
Alternaria									
Epicoccum							2	100	29
Pithomyces									
Curvularia									
Non-sporulating fungi									
Xerophilic Fungi Screening		ND			ND			ND	
DG18 (and/or MEA) Dilution Factor:	100	(DL = 50	CFU/in²)	100	(DL = 50	CFU/in²)	100	(DL = 50	CFU/in²)
Note									

<sup>\*:</sup> Adjusted Counts less than 1 are converted from colony counts read from lower dilutions plates. All concentrations (conc.) are rounded to two digits of significant figures. Total concentrations/percentages may not be equal to the sum of individual concentrations/percentages due to rounding. \*\*: Waterloving fungi, minimal Aw ≥ 0.89. \*\*\* Spreader: Trichoderma, Rhizopus, Mucor & Chrysonilia are fast growing fungi on MEA agar plate, which may inhibit the growth of other fungi on the same plate. Mycologix™ HR-MEA can significantly reduce the colony size of spreaders. ND: None detected





QLAB, 256 Bridge St, Metuchen, NJ 08840 info@qlabusa.com www.QLABusa.com AIHA EMPAT Lab ID: 178794

# Mycologix™ Culture Media and Methods

Analysis: Culturable Fungi (FC-12MEA+) - <u>Surface/Bulk</u>

**Client:** Gordon Mycology Laboratory, Inc.

Groton, MA Gordon, Deb

Project ID: 23-094GML BSH-4

 QLAB Job No.:
 ME231221-04

 Date Sampled:
 12/19/2023

 Date Received:
 12/21/2023

 Date Reported:
 12/29/2023

Lab Sample No.	ME	231221-04(	4)	M	E231221-04(	5)	ME	231221-04(	6)
Sample ID		<b>S4</b>			S5			S6	
Sample Location	room -	ise basemen - mold on pa AC duct seai	inted	roor	use basemen n – mold on p isulation wraj	ipe	room	ıse basemen – mold on H uctwork wrap	VAC
Sample Type / Device	Surface	/SpongeSW	AB (S)	Surface	e/SpongeSW	AB (S)	Surface	/SpongeSW	AB (S)
Media (Temperature: 25°C)	Mycologix CA//Stach	EA, DG18, an r™ Media: RD nybotrys (SCU /or Xero-MEA	PDA, IM)	Mycologi CA//Stac	IEA, DG18, an x™ Media: RD hybotrys (SCU d/or Xero-MEA	PDA, IM)	Mycologiz CA//Stacl	EA, DG18, an k™ Media: RE nybotrys (SCL l/or Xero-MEA	D-PDA, JM)
Date Analyzed		12/29/2023			12/29/2023			12/29/2023	
Amount of Sample Prepared		1	in²		4	in²		0.5	in²
Dilution Factor		100			100			1,000	
Detection Limit (DL)		DL = 100	CFU/in²		DL = 25	CFU/in²		DL = 2000	CFU/in²
Culturable Fungi Conc.*		600	CFU/in²		180	CFU/in²		26,000	CFU/in²
Identification	Adj. Ct.*	CFU/in²	%	Adj. Ct.*	CFU/in²	%	Adj. Ct.*	CFU/in²	%
Major Hydrophilic Fungi**									
Acremonium									
Aureobasidium									
Chaetomium				1	25	14	13	26,000	100
Stachybotrys									
Memnoniella									
Yeast, non-specified									
Rhodotorula (yeast)									
Sporobolomyces (yeast)									
Trichoderma [Spreader]***									
Mucor [Spreader]***									
Other Fungi									
Cladosporium	3	300	50	4	100	57			
Penicillium	1	100	17						
Aspergillus versicolor									
Aspergillus sydowii	2	200	33						
Aspergillus ustus									
Aspergillus niger				1	25	14			
Aspergillus fumigatus									
Aspergillus ochraceus									
Paecilomyces									
Alternaria									
Epicoccum									
Pithomyces									
Curvularia									
Non-sporulating fungi				1	25	14			
Xerophilic Fungi Screening		ND			ND			ND	
DG18 (and/or MEA) Dilution Facto	r: 100	(DL = 100	CFU/in²)	100	(DL = 25	CFU/in²)	100	(DL = 200	CFU/in²)
Note									

<sup>\*:</sup> Adjusted Counts less than 1 are converted from colony counts read from lower dilutions plates. All concentrations (conc.) are rounded to two digits of significant figures. Total concentrations/percentages may not be equal to the sum of individual concentrations/percentages due to rounding. \*\*: Waterloving fungi, minimal Aw ≥ 0.89. \*\*\* Spreader: Trichoderma, Rhizopus, Mucor & Chrysonilia are fast growing fungi on MEA agar plate, which may inhibit the growth of other fungi on the same plate. Mycologix™ HR-MEA can significantly reduce the colony size of spreaders. ND: None detected





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## Mycologix™ Culture Media and Methods

Analysis: Culturable Fungi (FC-12MEA+) - Surface/Bulk

Client: Gordon Mycology Laboratory, Inc.

Groton, MA Gordon, Deb

Project ID: 23-094GML BSH-4

 QLAB Job No.:
 ME231221-04

 Date Sampled:
 12/19/2023

 Date Received:
 12/21/2023

 Date Reported:
 12/29/2023

Lab Sample No.	ME	E231221-04(	7)	ME	E231221-04(	8)	ME	E231221-04(	9)
Sample ID		S7			S8			S9	
Sample Location	room -	ouse baseme mold on elecanel plywood	ctrical	_	ouse baseme nold on unde table		air	ouse – HVAC : diffuser outsi missions Offi	de
Sample Type (Device)	Surface	(SpongeSW	AB (S))	Surface	(SpongeSW	AB (S))	Surface	(SpongeSW	AB (S))
Media (Temperature: 25°C)	Mycologiz CA//Stacl	EA, DG18, an x™ Media: RE hybotrys (SCL d/or Xero-MEA	)-PDA, JM)	Mycologi: CA//Stac	IEA, DG18, an x™ Media: RD hybotrys (SCL d/or Xero-MEA	)-PDA, JM)	Mycologi: CA//Stac	EA, DG18, an x™ Media: RD hybotrys (SCU d/or Xero-MEA	PDA, IM)
Date Analyzed		12/29/2023			12/29/2023			12/29/2023	
Amount of Sample Prepared		2	in²		1	in²		1	in²
Dilution Factor		100			10,000			100	
Detection Limit (DL)		DL = 50	CFU/in²		DL = 10000	CFU/in²		DL = 100	CFU/in²
Culturable Fungi Conc.*		300	CFU/in²		350,000	CFU/in²		2,600	CFU/in²
Identification	Adj. Ct.*	CFU/in²	%	Adj. Ct.*	CFU/in²	%	Adj. Ct.*	CFU/in²	%
Major Hydrophilic Fungi**									
Acremonium									
Aureobasidium									
Chaetomium	5	250	83						
Stachybotrys									
Memnoniella									
Yeast, non-specified							3	300	12
Rhodotorula (yeast)							2	200	8
Sporobolomyces (yeast)									
Trichoderma [Spreader]***									
Mucor [Spreader]***									
Other Fungi									
Cladosporium				7	70,000	20	16	1,600	62
Penicillium									
Aspergillus versicolor							1	100	4
Aspergillus sydowii				28	280,000	80			
Aspergillus ustus									
Aspergillus niger	1	50	17				1	100	4
Aspergillus fumigatus									
Aspergillus ochraceus							1	100	4
Paecilomyces									
Alternaria									
Epicoccum									
Pithomyces									
Curvularia									
Non-sporulating fungi									
Xerophilic Fungi Screening		ND			ND		2	200	8
DG18 (and/or MEA) Dilution Factor:	100	(DL = 50	CFU/in²)	100	(DL = 100	CFU/in²)	100	(DL = 100	CFU/in²)
Note									

<sup>\*:</sup> Adjusted Counts less than 1 are converted from colony counts read from lower dilutions plates. All concentrations (conc.) are rounded to two digits of significant figures. Total concentrations/percentages may not be equal to the sum of individual concentrations/percentages due to rounding. \*\*: Waterloving fungi, minimal Aw ≥ 0.89. \*\*\* Spreader: Trichoderma, Rhizopus, Mucor & Chrysonilia are fast growing fungi on MEA agar plate, which may inhibit the growth of other fungi on the same plate. Mycologix™ HR-MEA can significantly reduce the colony size of spreaders. ND: None detected





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Mycologix™ Culture Media and Methods

Analysis: Culturable Fungi (FC-12MEA+) - Surface/Bulk

**Client:** Gordon Mycology Laboratory, Inc.

Groton, MA Gordon, Deb

Project ID: 23-094GML BSH-4

QLAB Job No.: ME231221-04

Date Sampled: 12/19/2023

 Date Sampled:
 12/19/2023

 Date Received:
 12/21/2023

 Date Reported:
 12/29/2023

Lab Sample No.	ME	231221-04(	10)	ME	231221-04(1	1)	ME	231221-04(1	2)
Sample ID		S10			S11	,		S12	,
Sample Location		thouse dormi y – HVAC sup diffuser		_	nouse mecha supply side of air handler			- supply air di shower hallwa	
Sample Type (Device)	Surface	(SpongeSW	AB (S))	Surface	(SpongeSW	AB (S))	Surface	(SpongeSW)	AB (S))
Media (Temperature: 25°C)	Mycologi CA//Stac	IEA, DG18, an x™ Media: RE hybotrys (SCL d/or Xero-ME <i>l</i>	D-PDA, JM)	Mycologiz CA//Stack	EA, DG18, an k™ Media: RD hybotrys (SCU d/or Xero-MEA	-PDA, M)	Mycologi: CA//Stac	EA, DG18, and x™ Media: RD hybotrys (SCU d/or Xero-MEA	-PDA, M)
Date Analyzed		12/29/2023			12/29/2023			12/29/2023	
Amount of Sample Prepared		2	in²		4	in²		2	in²
Dilution Factor		100			10,000			100	
Detection Limit (DL)		DL = 50	CFU/in²		DL = 2500	CFU/in²		DL = 50	CFU/in²
Culturable Fungi Conc.*		3,500	CFU/in²		330,000	CFU/in²		2,300	CFU/in²
Identification	Adj. Ct.*	CFU/in²	%	Adj. Ct.*	CFU/in²	%	Adj. Ct.*	CFU/in²	%
Major Hydrophilic Fungi**									
Acremonium									
Aureobasidium									
Chaetomium									
Stachybotrys									
Memnoniella									
Yeast, non-specified	2	100	3						
Rhodotorula (yeast)	3	150	4						
Sporobolomyces (yeast)									
Trichoderma [Spreader]***									
Mucor [Spreader]***									
Other Fungi									
Cladosporium	64	3,200	93	53	130,000	40	41	2,100	89
Penicillium				76	190,000	58	2	100	4
Aspergillus versicolor									
Aspergillus sydowii									
Aspergillus ustus									
Aspergillus niger									
Aspergillus fumigatus									
Aspergillus ochraceus									
Paecilomyces									
Alternaria									
Epicoccum				1	2,500	< 1	2	100	4
Pithomyces									
Curvularia									
Non-sporulating fungi				1	2,500	< 1	1	50	2
Xerophilic Fungi Screening		ND		1	250	< 1		ND	
DG18 (and/or MEA) Dilution Factor:	100	(DL = 50	CFU/in²)	1000	(DL = 250	CFU/in²)	100	(DL = 50	CFU/in²)
Note									
	L								

<sup>\*:</sup> Adjusted Counts less than 1 are converted from colony counts read from lower dilutions plates. All concentrations (conc.) are rounded to two digits of significant figures. Total concentrations/percentages may not be equal to the sum of individual concentrations/percentages due to rounding. \*\*: Waterloving fungi, minimal Aw ≥ 0.89. \*\*\* Spreader: Trichoderma, Rhizopus, Mucor & Chrysonilia are fast growing fungi on MEA agar plate, which may inhibit the growth of other fungi on the same plate. Mycologix™ HR-MEA can significantly reduce the colony size of spreaders. ND: None detected





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## Mycologix™ Culture Media and Methods

Analysis: Culturable Fungi (FC-12MEA+) - Surface/Bulk

**Client:** Gordon Mycology Laboratory, Inc.

Groton, MA Gordon, Deb

Project ID: 23-094GML BSH-4

 QLAB Job No.:
 ME231221-04

 Date Sampled:
 12/19/2023

 Date Received:
 12/21/2023

 Date Reported:
 12/29/2023

Lab Sample No.	ME	231221-04(1	3)	ME	231221-04(1	4)	ME	231221-04(	15)
Sample ID		S13			S14			S15	
Sample Location		asement – m C ductwork w			oasement – m uctwork wrap			ks library – H pply air diffus	
Sample Type (Device)	Surface	(SpongeSW)	AB (S))	Surface	(SpongeSW	AB (S))	Surface	(SpongeSW	AB (S)
Media (Temperature: 25°C)	Mycologix CA//Stach	EA, DG18, and c™ Media: RD nybotrys (SCU l/or Xero-MEA	-PDA, M)	Mycologi: CA//Stac	EA, DG18, an x™ Media: RD hybotrys (SCL d/or Xero-MEA	)-PDA, JM)	Mycologi CA//Stac	MEA, DG18, ar ix™ Media: RE hybotrys (SCU d/or Xero-MEA	D-PDA, JM)
Date Analyzed		12/29/2023			12/29/2023			12/29/2023	
Amount of Sample Prepared		1	in²		1	in²		2	in²
Dilution Factor		10,000			1,000			100	
Detection Limit (DL)		DL = 10000	CFU/in²		DL = 1000	CFU/in²		DL = 50	CFU/in²
Culturable Fungi Conc.*		900,000	CFU/in²		140,000	CFU/in²		350	CFU/in²
Identification	Adj. Ct.*	CFU/in²	%	Adj. Ct.*	CFU/in²	%	Adj. Ct.*	CFU/in²	%
Major Hydrophilic Fungi**		-							
Acremonium									
Aureobasidium									
Chaetomium									
Stachybotrys									
Memnoniella	87	870,000	96						
Yeast, non-specified									
Rhodotorula (yeast)									
Sporobolomyces (yeast)									
Trichoderma [Spreader]***									
Mucor [Spreader]***									
Other Fungi									
Cladosporium	3	30,000	3	1	1,000	< 1	7	350	100
Penicillium									
Aspergillus versicolor									
Aspergillus sydowii	0.4	4,000	< 1	3	3,000	2			
Aspergillus ustus									
Aspergillus niger									
Aspergillus fumigatus									
Aspergillus ochraceus									
Paecilomyces									
Alternaria									
Epicoccum									
Pithomyces									
Curvularia									
Non-sporulating fungi									
Xerophilic Fungi Screening		ND		140	140,000	97		ND	
DG18 (and/or MEA) Dilution Factor	r: 100	(DL = 100	CFU/in²)	1000	(DL = 1000	CFU/in²)	100	(DL = 50	CFU/in²)
Note									

<sup>\*:</sup> Adjusted Counts less than 1 are converted from colony counts read from lower dilutions plates. All concentrations (conc.) are rounded to two digits of significant figures. Total concentrations/percentages may not be equal to the sum of individual concentrations/percentages due to rounding. \*\*: Waterloving fungi, minimal Aw ≥ 0.89. \*\*\* Spreader: Trichoderma, Rhizopus, Mucor & Chrysonilia are fast growing fungi on MEA agar plate, which may inhibit the growth of other fungi on the same plate. Mycologix™ HR-MEA can significantly reduce the colony size of spreaders. ND: None detected





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12/29/2023

## Mycologix™ Culture Media and Methods

Analysis: Culturable Fungi (FC-12MEA+) - <u>Surface/Bulk</u>

**Client:** Gordon Mycology Laboratory, Inc.

Groton, MA Gordon, Deb

Project ID: 23-094GML BSH-4

QLAB Job No.: ME231221-04
Date Sampled: 12/19/2023
Date Received: 12/21/2023

Lab Sample No.	ME	231221-04(1	6)	ME	231221-04(1	17)	ME	231221-04(1	18)
Sample ID		S16			S17			S18	
Sample Location		ks lobby – H oply air diffus		air o	dining hall – diffuser, at wa amaged ceilin	ater	supply	r Building – H y air diffuser i om (game roo	n day
Sample Type (Device)	Surface	(SpongeSW	AB (S))	Surface	(SpongeSW	AB (S))	Surface	(SpongeSW	AB (S))
Media (Temperature: 25°C)	Mycologiz CA//Stacl	EA, DG18, an x™ Media: RD hybotrys (SCU d/or Xero-MEA	)-PDA, IM)	Mycologi CA//Stac	IEA, DG18, an x™ Media: RE hybotrys (SCL d/or Xero-ME <i>l</i>	D-PDA, JM)	Mycologi CA//Stac	MEA, DG18, an ix™ Media: RE hybotrys (SCU d/or Xero-MEA	)-PDA, JM)
Date Analyzed		12/29/2023			12/29/2023			12/29/2023	
Amount of Sample Prepared		2	in²		2	in²		2	in²
Dilution Factor		100			100			100	
Detection Limit (DL)		DL = 50	CFU/in²		DL = 50	CFU/in²		DL = 50	CFU/in²
Culturable Fungi Conc.*		200	CFU/in²		2,500	CFU/in²		1,800	CFU/in²
Identification	Adj. Ct.*	CFU/in²	%	Adj. Ct.*	CFU/in²	%	Adj. Ct.*	CFU/in²	%
Major Hydrophilic Fungi**									
Acremonium									
Aureobasidium				6	300	12			
Chaetomium									
Stachybotrys									
Memnoniella									
Yeast, non-specified	1	50	25				5	250	14
Rhodotorula (yeast)									
Sporobolomyces (yeast)									
Trichoderma [Spreader]***									
Mucor [Spreader]***									
Other Fungi									
Cladosporium	1	50	25	31	1,600	63	18	900	50
Penicillium									
Aspergillus versicolor									
Aspergillus sydowii									
Aspergillus ustus									
Aspergillus niger									
Aspergillus fumigatus									
Aspergillus ochraceus									
Paecilomyces									
Alternaria									
Epicoccum							9	450	25
Pithomyces							1	50	3
Curvularia									
Non-sporulating fungi	2	100	50	2	100	4	3	150	8
Xerophilic Fungi Screening		ND		1	500	20		ND	
DG18 (and/or MEA) Dilution Factor:	100	(DL = 50	CFU/in²)	1000	(DL = 500	CFU/in²)	100	(DL = 50	CFU/in²)
Note		ony counts read							

<sup>\*:</sup> Adjusted Counts less than 1 are converted from colony counts read from lower dilutions plates. All concentrations (conc.) are rounded to two digits of significant figures. Total concentrations/percentages may not be equal to the sum of individual concentrations/percentages due to rounding. \*\*: Waterloving fungi, minimal Aw ≥ 0.89. \*\*\* Spreader: Trichoderma, Rhizopus, Mucor & Chrysonilia are fast growing fungi on MEA agar plate, which may inhibit the growth of other fungi on the same plate. Mycologix™ HR-MEA can significantly reduce the colony size of spreaders. ND: None detected





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12/29/2023

## Mycologix™ Culture Media and Methods

Analysis: Culturable Fungi (FC-12MEA+) - Surface/Bulk

**Client:** Gordon Mycology Laboratory, Inc.

Groton, MA Gordon, Deb

Project ID: 23-094GML BSH-4

QLAB Job No.: ME231221-04
Date Sampled: 12/19/2023
Date Received: 12/21/2023

Lab Sample No.	ME	231221-04(1	19)	ME	231221-04(2	20)	ME	231221-04(2	<u>?</u> 1)
Sample ID		S19			S20			S21	
Sample Location		building base on HVAC duc wrap			Building hall C return air g	-		Building Day l supply air dif	
Sample Type (Device)	Surface	(SpongeSW	AB (S))	Surface	(SpongeSW	AB (S))	Surface	(SpongeSW	AB (S))
Media (Temperature: 25°C)	Mycologix CA//Stack	EA, DG18, ar	D-PDA, JM)	Mycologiz CA//Stacl	EA, DG18, an x™ Media: RD hybotrys (SCL d/or Xero-MEA	)-PDA, JM)	Mycologix CA//Stack	EA, DG18, an	)-PDA, JM)
Date Analyzed		12/29/2023			12/29/2023			12/29/2023	
Amount of Sample Prepared		1	in²		2	in²		2	in²
Dilution Factor		100			100			100	
Detection Limit (DL)		DL = 100	CFU/in²		DL = 50	CFU/in²		DL = 50	CFU/in²
Culturable Fungi Conc.*		< DL	CFU/in²		1,300	CFU/in²		1,300	CFU/in²
Identification	Adj. Ct.*	CFU/in²	%	Adj. Ct.*	CFU/in²	%	Adj. Ct.*	CFU/in²	%
Major Hydrophilic Fungi**									
Acremonium									
Aureobasidium							5	250	19
Chaetomium									
Stachybotrys									
Memnoniella									
Yeast, non-specified							2	100	8
Rhodotorula (yeast)									
Sporobolomyces (yeast)									
Trichoderma [Spreader]***									
Mucor [Spreader]***									
Other Fungi									
Cladosporium				12	600	46	11	550	42
Penicillium				7	350	27	3	150	12
Aspergillus versicolor									
Aspergillus sydowii				2	100	8			
Aspergillus ustus									
Aspergillus niger									
Aspergillus fumigatus									
Aspergillus ochraceus									
Paecilomyces									
Alternaria									
Epicoccum									
Pithomyces									
Curvularia									
Non-sporulating fungi							3	150	12
Xerophilic Fungi Screening		ND		5	250	19	2	100	8
DG18 (and/or MEA) Dilution Factor:	100	(DL = 100	CFU/in²)	100	(DL = 50	CFU/in²)	100	(DL = 50	CFU/in²)

<sup>\*:</sup> Adjusted Counts less than 1 are converted from colony counts read from lower dilutions plates. All concentrations (conc.) are rounded to two digits of significant figures. Total concentrations/percentages may not be equal to the sum of individual concentrations/percentages due to rounding. \*\*: Waterloving fungi, minimal Aw ≥ 0.89. \*\*\* Spreader: Trichoderma, Rhizopus, Mucor & Chrysonilia are fast growing fungi on MEA agar plate, which may inhibit the growth of other fungi on the same plate. Mycologix™ HR-MEA can significantly reduce the colony size of spreaders. ND: None detected





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12/29/2023

# Mycologix™ Culture Media and Methods

Analysis: Culturable Fungi (FC-12MEA+) - Surface/Bulk

**Client:** Gordon Mycology Laboratory, Inc.

Groton, MA Gordon, Deb

Project ID: 23-094GML BSH-4

QLAB Job No.: ME231221-04
Date Sampled: 12/19/2023
Date Received: 12/21/2023

Lab Sample No.	ME	231221-04(2	2)			
Sample ID		S22				
Sample Location		Building bas on HVAC duc wrap				
Sample Type (Device)	Surface	(SpongeSW)	AB (S))			
Media (Temperature: 25°C)	Mycologix CA//Stach	EA, DG18, and r™ Media: RD nybotrys (SCU /or Xero-MEA	-PDA, M)			
Date Analyzed		12/29/2023				
Amount of Sample Prepared		1	in²			
Dilution Factor		100				
Detection Limit (DL)		DL = 100	CFU/in²			
Culturable Fungi Conc.*		500	CFU/in²			
Identification	Adj. Ct.*	CFU/in²	%			
Major Hydrophilic Fungi**						
Acremonium						
Aureobasidium						
Chaetomium						
Stachybotrys						
Memnoniella						
Yeast, non-specified						
Rhodotorula (yeast)						
Sporobolomyces (yeast)						
Trichoderma [Spreader]***						
Mucor [Spreader]***						
Other Fungi				·		
Cladosporium						
Penicillium						
Aspergillus versicolor	1	100	20			
Aspergillus sydowii						
Aspergillus ustus						
Aspergillus niger	4	400	80			
Aspergillus fumigatus						
Aspergillus ochraceus						
Paecilomyces						
Alternaria						
Epicoccum						
Pithomyces						
Curvularia						
Non-sporulating fungi						
Xerophilic Fungi Screening		ND				
DG18 (and/or MEA) Dilution Factor:	100	(DL = 100	CFU/in²)			
Note					ns (conc.) are rol	

<sup>\*:</sup> Adjusted Counts less than 1 are converted from colony counts read from lower dilutions plates. All concentrations (conc.) are rounded to two digits of significant figures. Total concentrations/percentages may not be equal to the sum of individual concentrations/percentages due to rounding. \*\*: Waterloving fungi, minimal Aw ≥ 0.89. \*\*\* Spreader: Trichoderma, Rhizopus, Mucor & Chrysonilia are fast growing fungi on MEA agar plate, which may inhibit the growth of other fungi on the same plate. Mycologix™ HR-MEA can significantly reduce the colony size of spreaders. ND: None detected





QLab, 256 Bridge St, Metuchen, NJ 08840 info@qlabusa.com www.QLABusa.com

### Mycologix™ Hidden Mold Detection (MHMD) Technologies

AIHA EMPAT Lab ID: 178794

Analysis:Premium Quantitative Direct Exam (FD-04HP)QLAB Job No.:ME231221-04Client:Gordon Mycology Laboratory, Inc.Date Sampled:12/19/2023Groton, MADate Received:12/21/2023

Contact: Gordon, Deb

Project ID: 23-094GML BSH-4

Reviewed by: WT Approved by: Wei-Chih Tang, Ph.D., Lab Director

. 1-	-7
Lu	lu

1/11/2024

	Approv	ed by: vvei-		iig, Pii.D	., Lab Directi	JI	Lu	lu	
Lab Sample No.	MI	E231221-04(	(2)	MI	E231221-04(	4)	М	E231221-04(	5)
Sample ID		S2			S4			S5	
Sample Location	mechanic	in. Bldg. basen cal room – mole insulation	d on pipe	room – i	ouse basement mold on painte duct seam	d HVAC	room – r	ouse basement nold on pipe in wrap	sulation
Sample Type (Device)	Surface	(SpongeSW	'AB (S))	Surface	(SpongeSW	'AB (S))	Surface	(SpongeSW	'AB (S))
Date Analyzed		1/11/2024			1/11/2024			1/11/2024	
Amount of Sample Prepared		2	in²		1	in²		4	in²
Dilution & Multiplication Factors	•	1,000	39.2	1	1,000	8.52	•	1,000	8.52
Detection Limit (DL)		DL = 20000	cts./in²		DL = 8500	cts./in²		DL = 2100	cts./in²
Total Concentration		4,400,000	cts./in²		1,800,000	cts./in²		140,000	cts./in²
Identification	Raw Cts*	cts./in²	%	Raw Cts*	cts./in²	%	Raw Cts*	cts./in²	%
Small Spores (Cells):									
Ascospores									
Basidiospores									
Cladosporium	31	610,000	14	197	1,700,000		4	8,500	6
Asp/Pen/Yeast-like ##	193	3,800,000	85	4	34,000	2	63	130,000	91
Major Hydrophilic Fungi									
Stachybotrys									
Chaetomium									
Ulocladium									
Others:						<u></u>			
Hyphal fragment	2	39,000	<1	11	94,000	5			
Alternaria							1	2,100	1
Curvularia									
Drechslera/Bipolaris									
Epicoccum									
Myxomycetes/smuts/Periconia									
Pithomyces							1	2,100	1
Unidentifiable without culturing									
Note									
* Pay counts total number of struct			: <b></b>	nronoros	1 1 -	** A II	naantratio		d to two

<sup>\*:</sup> Raw counts: total number of structures observed on a portion of the prepared subsample. \*\*: All concentrations are rounded to two digits of significant figures. Total concentrations/percentages may not be equal to the sum of individual concentrations/percentages due to rounding. #: Water-loving fungi (min Aw >0.89). Absence of Water-Damage Indicator does not exclude the possibility of a water damage history. ##: Inlcudes Aspergillus, Penicillium, Acremonium, yeasts and others fungal cells with similar morphology





QLab, 256 Bridge St, Metuchen, NJ 08840 info@qlabusa.com www.QLABusa.com

### Mycologix™ Hidden Mold Detection (MHMD) Technologies

AIHA EMPAT Lab ID: 178794

Analysis: Premium Quantitative Direct Exam (FD-04HP) QLAB Job No.: ME231221-04

Client: Gordon Mycology Laboratory, Inc. Date Sampled: 12/19/2023

Groton, MA Date Received: 12/21/2023

Contact: Gordon, Deb Date Received: 12/21/2024

Project ID: 23-094GML BSH-4

Lab Sample No.	ME	231221-04(	14)	ME	231221-04(1	19)		
Sample ID		S14	,		S19	,		
Sample Location		sement – mold stwork wrap pa			ilding basemer VAC ductwork			
Sample Type (Device)	Surface	(SpongeSW	'AB (S))	Surface	(SpongeSW	AB (S))		
Date Analyzed		1/11/2024			1/11/2024			
Amount of Sample Prepared		1	in²		1	in²		
Dilution & Multiplication Factors	•	1,000	8.52	•	1,000	235		
Detection Limit (DL)		DL = 8500	cts./in²	[	DL = 240000	cts./in²		
Total Concentration		860,000	cts./in²		41,000,000	cts./in²		
Identification	Raw Cts*	cts./in²	%	Raw Cts*	cts./in²	%		
Small Spores (Cells):								
Ascospores								
Basidiospores								
Cladosporium				7	1,600,000	4		
Asp/Pen/Yeast-like ##	22	190,000	22	167	39,000,000	95		
Major Hydrophilic Fungi								
Stachybotrys	75	640,000	74					
Chaetomium								
Ulocladium								
Others:								
Hyphal fragment	4	34,000	4	2	470,000	1		
Alternaria	4	34,000	4		470,000	1		
Curvularia								
Drechslera/Bipolaris								
Epicoccum								
Myxomycetes/smuts/Periconia								
Pithomyces								
Unidentifiable without culturing								
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Note								
	<u> </u>							

<sup>\*:</sup> Raw counts: total number of structures observed on a portion of the prepared subsample. \*\*: All concentrations are rounded to two digits of significant figures. Total concentrations/percentages may not be equal to the sum of individual concentrations/percentages due to rounding. #: Water-loving fungi (min Aw >0.89). Absence of Water-Damage Indicator does not exclude the possibility of a water damage history. ##: Inlcudes Aspergillus, Penicillium, Acremonium, yeasts and others fungal cells with similar morphology





Accreditation# 1/23/2024

# **Gordon Mycology Lab**

MicroVision Labs Project #: 16376 Gordon Mycology Lab Project Name: BSH-4 Report Analyst: D.Weidler

## Scope of Work:

This report covers the methods and findings of the analysis that MicroVision Laboratories, Inc. conducted on two samples from Gordon Mycology Lab. The purpose of the analysis was to use the PLM to determine the types of particles present in each sample. The results presented in this report relate only to the samples examined and as received.

## **Equipment:**

Polarized Light Microscopy (PLM)

### Methods:

MicroVision Labs is accredited to the ISO/IEC 17025:2017 standard. This analysis follows our in house SOP #MVL02 (General PLM). This method is listed on our certificate of accreditation and has been validated.

A representative portion of each sample was affixed to adhesive tape and placed on a glass slide with optical index oil (n=1.515) and covered with a glass coverslip. These samples were analyzed using polarized light microscopy (PLM) and digital images were taken.

# **Findings**

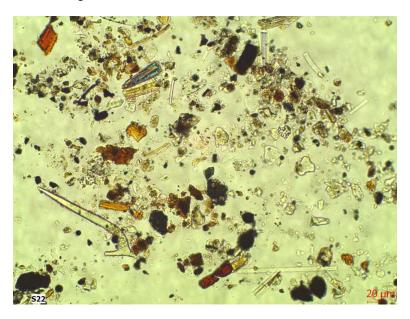
## **B1**

The major component in this sample was organic debris. Other particles seen in this sample included cellulose and synthetic fibers, minerals, a small number of glass fibers and a small number of ambiguous opaque particles.



## **S22**

The major component in this sample was minerals. Other particles seen in this sample included organic debris, ambiguous opaque particles, some glass fibers and a small number of cellulose fibers.



Please let us know if you have any questions, or need any additional assistance with this, or any other sample.

Sincerely,

Denise Weidler

**Analytical Microscopist** 

Reviewed By: AAC

Sample ID	Client Info	renation	CONTRACTOR STATES OF THE PERSON NAMED IN COLUMN NAMED IN COLUM		And the second s	The state of the s		3		
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Sample ID	ess:	6		Proje	ect Location:					
Sample ID  Sample Initial  Sample ID  Sample	10 GIOTAN,	m# 0	05/1	Proje	ect Number:	ľ				
Sample ID	3-84 .8t	4566		Proje	ect Manager.		$\vee$	1	2	-
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Sample ID  Collected	don's mold+	estingu		Д						
Sample ID  Sample ID  Collecte  Collecte  Collecte  Sample ID  Collecte  Collecte  Collecte  Sample ID  Collecte  Collecte  Cool Ash  Initials  Collecte  Sample ID  Collecte  C				Redni	ested Analys	es				
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187 Billerica Road, Chelmsford, Ma 01824	MicroVision	Laborato	ries, Inc.	01824	13					
187 Biller Phone 978-250-9909		© ≡ M   Coal Ash	© ≡ M   Coal Ash	Dest Hear Soal Ash	o ≡ M   M   M   M   M   M   M   M   M   M	MicroVision Laboratories, Inc.    By   Date/ Ime   Sem/EDS	MicroVision Laboratories, Inc.    By	MicroVision Laboratories, Inc.    By   Date/ Ime   Sem/EDS	MicroVision Laboratories, Inc.    By   Date/ Ime   Sem/EDS	MicroVision Laboratories, Inc.  Illerica Road, Chelmsford, MA 01824  MicroVision Laboratories, Inc.

**Appendix D:** Select Photographs Taken by Gordon Mycology, Inc. During December 19, 2023 BSH Site Inspection

# REDACTED