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August 1, 2019

Dr. Tom Jackson, Jr., President  
Humboldt State University  
1 Harpst Street  
Humboldt, CA 95521

Dear Dr. Jackson:

**Subject: Audit Report 19-48, Health and Safety, Humboldt State University**

We have completed an audit of *Health and Safety* as part of our 2019 Audit Plan, and the final report is attached for your reference. The audit was conducted in accordance with the Institute of Internal Auditors' *International Standards for the Professional Practice of Internal Auditing*.

I have reviewed the management response and have concluded that it appropriately addresses our recommendations. The management response has been incorporated into the final audit report, which has been posted to Audit and Advisory Services' website. We will follow-up on the implementation of corrective actions outlined in the response and determine whether additional action is required.

Any observations not included in this report were discussed with your staff at the informal exit conference and may be subject to follow-up.

I wish to express my appreciation for the cooperation extended by the campus personnel over the course of this review.

Sincerely,



Larry Mandel  
Vice Chancellor and Chief Audit Officer

c: Timothy P. White, Chancellor

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**The California State University**  
Audit and Advisory Services

**HEALTH AND SAFETY**  
**Humboldt State University**

Audit Report 19-48  
June 18, 2019

## EXECUTIVE SUMMARY

### OBJECTIVE

The objectives of the audit were to ascertain the effectiveness of operational and administrative controls related to health and safety (HS) and to ensure compliance with relevant federal and state regulations; Trustee policy; Office of the Chancellor (CO) directives; and campus procedures.

### CONCLUSION

Based upon the results of the work performed within the scope of the audit, the operational and administrative controls for HS as of May 17, 2019, were unlikely to provide reasonable assurance that risks were being managed and objectives were met.

Overall, the campus had a framework for HS in which the environmental health and safety department (EH&S) provided guidance to the colleges and departments. However, we found that, in many instances, communication of key roles and responsibilities needed improvement and the campus did not have an effective monitoring process to ensure that responsibilities were performed. As a result, we found that important components of the HS program, such as self-inspections and hazard assessments to determine the necessary personal protective equipment (PPE), were not completed as required. We also found that the campus did not implement an effective HS training program to ensure that all employees and students who handled hazardous materials (HAZMAT) and hazardous waste (HAZWASTE) were identified and completed required training. Further, the campus needed to develop laser safety and medical monitoring programs, and other existing HS programs did not include all required elements and were not reviewed annually and updated as needed.

In addition, the campus did not always ensure that HAZMAT inventories were maintained and complete, safety data sheets (SDS) for HAZMAT were maintained and readily accessible, safety equipment was inspected regularly and was readily accessible, and HAZWASTE was properly labeled and timely disposed. Further, heating, ventilation, and air conditioning (HVAC) units were not always timely inspected, and the procurement of HAZMAT using campus procurement cards did not always meet campus requirements.

Specific observations, recommendations, and management responses are detailed in the remainder of this report.

## OBSERVATIONS, RECOMMENDATIONS, AND RESPONSES

### 1. INJURY AND ILLNESS PREVENTION PROGRAM

#### OBSERVATION

The campus did not implement or monitor certain elements in the campus Injury and Illness Prevention Program (IIPP).

We found that although the IIPP included the key elements required by California Code Regulations (CCR) Title 8 §3203, *Injury and Illness Prevention Program*, the following elements were not fully implemented:

- Department-specific IIPPs were not always developed or maintained.
- Lab-specific chemical hygiene plans were not always developed and maintained.
- Departments did not always have a designated department safety liaison (DSL).

Additionally, under the campus IIPP, departments are required to ensure that a regular and systematic inspection process is scheduled and followed for all departmental areas, and that departments involved with higher hazardous operations perform inspections at least every semester. However, we reviewed ten locations, and we found that departments did not perform HS inspections for any of them. Further, we found that the campus did not have a process to track or monitor the completion of these inspections.

Implementation and monitoring of all elements within the IIPP, including regular inspections, improves compliance with regulatory requirements and helps to ensure a healthy and safe environment for employees and students.

#### RECOMMENDATION

We recommend that the campus:

- a. Implement the elements detailed in the campus IIPP noted above, including conducting regular inspections, and communicate the roles and responsibilities for these processes to the appropriate individuals.
- b. Develop and implement a written process to monitor campus performance of IIPP elements, including the above mentioned items.

#### MANAGEMENT RESPONSE

We concur.

- a. The campus will implement the elements detailed in the campus IIPP as noted, including conducting regular inspections, and communicate the roles and responsibilities for these processes to the appropriate individuals. The campus will implement the recommendation by December 18, 2019.

- b. The campus will develop and implement a written process to monitor campus performance of IIPP elements, including the mentioned items. The campus will implement the recommendation by September 30, 2019.

## 2. EMPLOYEE HEALTH AND SAFETY TRAINING

### OBSERVATION

The campus did not have an effective employee training program to ensure that all employees who handled HAZMAT and HAZWASTE completed HS trainings.

We noted that the campus IIPP created a decentralized organizational structure giving campus departments responsibility for the development and maintenance of employee training programs. However, we found that departments did not always develop and maintain employee training programs that identified all employees required to take initial and refresher HS training, monitored compliance with required trainings, and documented and maintained training records to ensure that all employees received the required HS training applicable to their job duties.

Additionally, we found that the structure for administering employee HS training did not provide a campuswide process to monitor completion of required HS training or allow for follow-up with employees and/or their supervisors when training was incomplete or overdue.

Effective administration of HS training helps to ensure compliance with program provisions, increases safety awareness, and reduces potential injuries, accidents, and liabilities to the campus.

### RECOMMENDATION

We recommend that the campus:

- a. Develop and implement an effective employee training program that includes the above-mentioned elements.
- b. Communicate the responsibility for developing and maintaining departmental employee training programs to the appropriate personnel.
- c. Develop and implement a written process to monitor employee training compliance and report completion rates to appropriate management.

### MANAGEMENT RESPONSE

We concur.

- a. The campus will develop and implement an effective employee training program that included the mentioned elements. The campus will implement the recommendation by December 18, 2019.

- b. The campus will communicate the responsibility for developing and maintaining departmental employee training programs to the appropriate personnel. The campus will implement the recommendation by September 30, 2019.
- c. The campus will develop and implement a written process to monitor employee training compliance and report completion rates to appropriate management. The campus will implement the recommendation by November 30, 2019.

### 3. STUDENT HEALTH AND SAFETY TRAINING

#### OBSERVATION

The campus did not have a documented student safety training program.

Specifically, we found that the campus did not have a program to identify training requirements and provide and document training for students in academic or research areas where hazards were present. As such, responsibility for determining the necessary student safety training was placed on the department or faculty overseeing the course or laboratory.

We reviewed the safety training provided to students for six courses in which students worked with HAZMAT and found that for four courses, documentation showing that safety training was provided to and understood by the students was inadequate or did not exist.

A defined and documented student safety training program helps to ensure that students are informed of potential hazards and that necessary safety practices and procedures will be used to reduce potential injuries, accidents, and liabilities to the campus.

#### RECOMMENDATION

We recommend that the campus establish a documented student safety training program that identifies training requirements; tracks and notifies students with overdue or incomplete training; and documents and maintains training records.

#### MANAGEMENT RESPONSE

We concur. The campus will establish a documented student safety training program that identifies training requirements; tracks and notifies students with overdue or incomplete training; and documents and maintains training records. The campus will implement the recommendation by December 18, 2019.

### 4. HAZARD ASSESSMENTS

#### OBSERVATION

The campus did not perform written hazard assessments to determine the PPE necessary for employees, as required by 8 CCR §3380, *Personal Protective Devices*.

We noted that the campus Chemical Hygiene Plan (CHP) stated that organizational units shall design safety procedures into potentially hazardous processes and that PPE would be used when engineering controls, such as the use of fume hoods and glove boxes, were determined to be insufficient in achieving permissible levels of exposure. However, we found that written hazard assessments were not performed to identify the hazards associated with campus activities and assess the appropriate engineering controls and PPE necessary to ensure the HS of students and employees.

Specifically, we performed walkthroughs of ten locations and found that written hazard assessments to determine the necessary PPE were not conducted for any of the locations. Additionally, we found that the campus did not have a process to monitor the completion of these assessments.

Performing hazard assessments to identify hazards in workplaces that necessitate the use of PPE helps to reduce potential injuries, accidents, and liabilities to the campus.

#### **RECOMMENDATION**

We recommend that the campus implement a process to ensure that hazard assessments are performed, documented, and monitored for all campus workplaces that necessitate the use of PPE.

#### **MANAGEMENT RESPONSE**

We concur. The campus will implement a process to ensure that hazard assessments are performed, documented, and monitored for all campus workplaces that necessitate the use of PPE. The campus will implement the recommendation by December 18, 2019.

## **5. HAZARD COMMUNICATION PROGRAM**

#### **OBSERVATION**

The campus Hazard Communication Program (HAZCOM) needed improvement.

HAZCOMs describe standards for labeling, SDS, and employee information and training. We found that not all elements required by 8 CCR §5194, *Hazard Communication*, were included in the campus HAZCOM, including:

- A description of procedures for hazard determination, including a list of hazardous chemicals known to be present or a description of the chemical inventory system.
- Comprehensive guidance for the labeling of HAZMAT.
- Methods the campus uses to inform employees of the hazards of non-routine tasks.
- A plan to provide employees with effective information and training on hazardous chemicals in their work area.

Additionally, we reviewed the accessibility of SDS, required by 9 CCR §5194, *Hazard Communication*, at nine locations with HAZMAT and found that SDS were not readily available for all HAZMAT present at three locations.

A complete HAZCOM program and maintenance of SDS records improves compliance with regulatory requirements and promotes a healthy and safe environment for students and employees.

#### **RECOMMENDATION**

We recommend that the campus:

- a. Review and update the HAZCOM to include the elements noted above.
- b. Communicate and distribute the updated HAZCOM to the appropriate campus administrators, staff, and faculty.
- c. Remind the appropriate campus administrators, staff, and faculty of the regulatory and campus requirements regarding the availability and maintenance of current SDS.

#### **MANAGEMENT RESPONSE**

We concur.

- a. The campus will review and update the HAZCOM to include the elements noted. The campus will implement the recommendation by September 30, 2019.
- b. The campus will communicate and distribute the updated HAZCOM to the appropriate campus administrators, staff, and faculty. The campus will implement the recommendation by October 30, 2019.
- c. The campus will remind the appropriate campus administrators, staff, and faculty of the regulatory and campus requirements regarding the availability and maintenance of current SDS. The campus will implement the recommendations by October 30, 2019.

## **6. POLICIES AND PROCEDURES**

#### **OBSERVATION**

Certain HS procedures, plans, and programs were outdated or missing required elements.

Specifically, we found that:

- The campus CHP was not evaluated annually for effectiveness and updated as needed, as required by 8 CCR §5191, *Occupational Exposure to Hazardous Chemicals in Laboratories*. As a result, certain aspects of the CHP were out of date and did not address the responsibilities of all colleges or campus departments performing activities involving HAZMAT.



- The campus Bloodborne Pathogen Program (BPP) did not include all required elements and was not reviewed annually for effectiveness and updated as necessary, as required by 8 CCR §5193, *Bloodborne Pathogens*. Specifically, the campus BPP did not include procedures for gathering information required by the sharps injury log.
- Although the campus had multiple procedures for the containment and clean-up of HAZMAT spills that addressed many elements of 8 CCR §5192, *Hazardous Waste Operations and Emergency Response*, these procedures did not clearly define the personnel responsible for these procedures and the safety training required to perform these activities.

Current and complete HS policies, procedures, plans, and programs improve compliance with regulatory requirements and promote a healthy and safe environment for employees and students.

### **RECOMMENDATION**

We recommend that the campus:

- a. Review and update HS procedures, plans, and programs to include the above-mentioned elements.
- b. Communicate and distribute the updated procedures, plans, and programs to the appropriate campus administrators, staff, and faculty.
- c. Develop and implement a written process for the periodic review and update of HS procedures, plans, and programs.

### **MANAGEMENT RESPONSE**

We concur.

- a. The campus will review and update HS procedures, plans, and programs to include the mentioned elements. The campus will implement the recommendation by September 30, 2019.
- b. The campus will communicate and distribute the updated procedure, plans, and programs to the appropriate campus administrators, staff, and faculty. The campus will implement the recommendation by October 30, 2019.
- c. The campus will develop and implement a written process for periodic review and update of HS procedures, plans, and programs. The campus will implement the recommendation by September 30, 2019.

## 7. LASER SAFETY PROGRAM

### OBSERVATION

The campus did not have a written or comprehensive laser safety program, and lasers were not always labeled with proper safety warnings.

We noted that campus units responsible for the development of HS programs were unaware of laser hazards on campus and had not developed a laser safety program to provide the campus with guidance regarding laser safety, including warning signage, equipment labeling, and other safety practices. We reviewed three locations where lasers were present and found that they were not always labeled with proper safety warnings in accordance with the American National Standards Institute (ANSI).

A written and comprehensive laser safety program reduces the risk of injuries associated with the use of lasers.

### RECOMMENDATION

We recommend that the campus:

- a. Develop and implement a written laser safety program to provide guidance for laser safety and communicate the program and its requirements to the appropriate campus personnel.
- b. Create and maintain an inventory of laser hazards.
- c. Label all lasers, and their locations, subject to the laser safety program with the appropriate warning signs.

### MANAGEMENT RESPONSE

We concur.

- a. The campus will develop and implement a written laser safety program to provide guidance for laser safety and communicate the program and its requirements to the appropriate campus personnel. The campus will implement the recommendation by October 15, 2019.
- b. The campus will create and maintain an inventory of laser hazards. The campus will implement the recommendation by October 15, 2019.
- c. The campus will label all lasers, and their locations, subject to the laser safety program with the appropriate warning signs. The campus will implement the recommendation by October 15, 2019.

## 8. MEDICAL MONITORING PROGRAM

### OBSERVATION

The campus did not have a medical monitoring program, as required by Executive Order (EO) 1039, *California State University – Occupational Health & Safety Policy*.

We noted that various HS plans and programs contained elements of medical monitoring and detailed instances where medical monitoring of employees may be required. However, these plans and programs did not specify how all aspects of the medical monitoring process would be performed, and the campus did not have a centralized, comprehensive medical monitoring program that considered:

- Responsibilities for campus units that have a role in medical monitoring.
- Methods for notifying affected employees and supervisors of medical monitoring requirements.
- Documentation and maintenance of medical monitoring activities.

A detailed and comprehensive medical monitoring program improves regulatory compliance and helps to promote a healthy and safe environment for employees.

### RECOMMENDATION

We recommend that the campus develop and implement a centralized and comprehensive medical monitoring program that includes the elements noted above, and communicate the program and its requirements to the appropriate campus personnel.

### MANAGEMENT RESPONSE

We concur. The campus will develop and implement a centralized and comprehensive medical monitoring program that includes the elements noted above, and communicate the program and its requirements to the appropriate campus personnel. The campus will implement the recommendation by November 30, 2019.

## 9. SAFETY EQUIPMENT MAINTENANCE AND INSPECTIONS

### OBSERVATION

The campus did not always conduct inspections of the working condition of safety equipment.

We reviewed ten locations to verify that safety equipment was readily accessible and inspections were performed as required. We found that:

- At six locations, there was no documented record of monthly fire extinguisher inspections.
- At two locations, eyewash and shower stations were not readily accessible.
- At one location, the eyewash and shower station was obstructed.

Regular inspections of safety equipment help to ensure that the equipment is accessible and in working condition and helps to ensure a healthy and safe environment for students and employees.

**RECOMMENDATION**

We recommend that the campus:

- a. Remind appropriate college administrators, staff, and faculty of the regulatory and campus requirements regarding safety equipment accessibility and inspections, and provide training as needed.
- b. Assess locations where HAZMAT and/or HAZWASTE is present to determine where emergency eyewash and shower stations are required, and install stations as appropriate.

**MANAGEMENT RESPONSE**

We concur.

- a. The campus will remind appropriate college administrators, staff, and faculty of the regulatory and campus requirements regarding safety equipment accessibility and inspection, and provide training as needed. The campus will implement the recommendation by August 30, 2019.
- b. The campus will assess locations where HAZMAT and/or HAZWASTE is present to determine where emergency eyewash and shower stations are required, and install stations as appropriate. The campus will implement the recommendation by September 30, 2019.

**10. HAZARDOUS AND UNIVERSAL WASTE**

**OBSERVATION**

Campus departments did not always properly label and dispose of HAZWASTE and universal waste.

We reviewed eight locations with HAZWASTE and/or universal waste and found that:

- At four locations, HAZWASTE containers were not always labeled with accumulation start dates.
- At two locations, HAZWASTE containers were not always properly labeled to identify the contents and hazardous properties.
- At two locations, HAZWASTE containers had been accumulating beyond the appropriate time period.

- At two locations, universal waste containers had not been properly labeled to identify the contents and accumulation start dates.

Proper labeling and disposal of HAZWASTE and universal waste reduces the risk of accidents and injuries from mismanagement and reduces potential liability to the campus.

#### **RECOMMENDATION**

We recommend that the campus properly label and dispose of all HAZWASTE and universal waste in accordance with regulatory requirements and remind appropriate campus personnel of these requirements.

#### **MANAGEMENT RESPONSE**

We concur. The campus will properly label and dispose of all HAZWASTE and universal waste in accordance with regulatory requirements and remind appropriate campus personnel of these requirements. The campus will implement the recommendation by August 30, 2019.

## **11. HAZARDOUS MATERIALS INVENTORY**

#### **OBSERVATION**

Campuswide HAZMAT inventory processes needed improvement.

We noted that the campus was in the process of implementing a campuswide inventory system to track and monitor HAZMAT on campus. However, implementation was still in the early phases and had only been completed in the College of Natural Resources and Sciences. Locations where the inventory system had yet to be implemented were responsible for maintaining their own HAZMAT inventory.

We reviewed the HAZMAT inventories for 12 locations and found that:

- Four locations did not maintain a HAZMAT inventory.
- Two locations did not maintain a complete inventory that included all HAZMAT on site.

We also noted that campus HAZMAT procedures did not provide adequate guidance regarding the inventory requirements for reagents prepared from stock chemicals, and reagents were not included in the chemical inventories.

A complete inventory of HAZMAT improves campus oversight and monitoring of HAZMAT activities and allows emergency responders to identify and remediate hazards when responding to emergency situations.

#### **RECOMMENDATION**

We recommend that the campus:

- a. Create and maintain a complete inventory of HAZMAT on campus.

- b. Evaluate the inventory needs for campus-prepared reagents and develop and implement inventory procedures that define campus HAZMAT inventory requirements.
- c. Communicate campus inventory requirements to appropriate campus personnel.

**MANAGEMENT RESPONSE**

We concur.

- a. The campus will create and maintain a complete inventory of HAZMAT on campus. The campus will implement the recommendation by December 18, 2019.
- b. The campus will evaluate the inventory needs for campus-prepared reagents and develop and implement inventory procedures that define campus HAZMAT inventory requirements. The campus will implement the recommendation by December 18, 2019.
- c. The campus will communicate campus inventory requirements to appropriate campus personnel. The campus will implement the recommendation by August 30, 2019.

**12. HVAC INSPECTIONS****OBSERVATION**

The campus did not always timely complete preventive maintenance (PM) of HVAC units.

We noted that the campus work order system (AIM) automatically assigned quarterly and annual PM work orders for HVAC units to facilities management maintenance personnel. However, these work orders did not have an assigned deadline and were not always timely completed due to an occasional backlog.

We reviewed the work order records for 12 HVAC units where HAZMAT was located and found that:

- Four HVAC units did not always receive timely PM, resulting in gaps in PM greater than 12 months. According to 8 CCR §5142, *Mechanically Driven HVAC Systems to Provide Minimum Building Ventilation*, HVAC systems shall be inspected at least annually, and problems found during these inspections shall be corrected within a reasonable time.
- Four HVAC units had their annual PM work orders expire in lieu of the quarterly, less extensive inspections.

Routine PM and inspection of HVAC systems helps to ensure proper equipment operation and ventilation where HAZMAT is stored and used.

**RECOMMENDATION**

We recommend that the campus implement a deadline or a heightened work order priority for the annual HVAC inspections to ensure they are timely completed.

**MANAGEMENT RESPONSE**

We concur. The campus will implement a deadline or a heightened work order priority for the annual HVAC inspections to ensure they are timely completed. The campus will implement the recommendation by September 30, 2019.

**13. PROCUREMENT OF HAZARDOUS MATERIALS**

**OBSERVATION**

Purchases of HAZMAT did not always align with the requirements in the campus *Procurement Card Guidelines*.

We noted that additional requirements for purchasing HAZMAT using a campus procurement card in the campus *Procurement Card Guidelines* included tagging the purchase with “HAZ” on the monthly procurement card reconciliation and submitting written approval from the program administrator to accounts payable with the monthly reconciliation.

In our review of procurement card purchases, we identified three instances where HAZMAT was purchased using a campus procurement card. We reviewed these purchases for compliance with the campus *Procurement Card Guidelines* and found that none of the purchases followed the required procedures noted above.

Consistent enforcement of campus HAZMAT procurement procedures allows for improved oversight and monitoring of HAZMAT present on campus.

**RECOMMENDATION**

We recommend that the campus remind cardholders and transaction approvers of the campus requirements regarding the purchase of HAZMAT with procurement cards.

**MANAGEMENT RESPONSE**

We concur. The campus will remind cardholders and transaction approvers of the campus requirements regarding the purchase of HAZMAT with procurement cards. The campus will implement the recommendations by August 30, 2019.

**14. SAFETY COMMITTEES**

**OBSERVATION**

The campus did not have a Unit 6 Joint Safety Committee as required by the Unit 6 Collective Bargaining Agreement, Article 28.10, and other campus safety committees did not always meet as required.

We noted that the campus had a facilities management safety committee that included representation from Unit 6 employees, but the committee was discontinued in 2017 following

the implementation of a campuswide EH&S committee. The campuswide EH&S committee membership included a representative from Unit 6, as well as representatives from other units and campus groups, but did not include the level of Unit 6 representation required by Article 28.10.

Additionally, we noted that in 2006, campus executive memoranda EM: P06-11, *Boat Safety Committee*, established the University Boat Safety Committee (UBSC), which would meet biannually during the academic year to provide oversight for all boating. However, we found that the UBSC did not meet biannually and did not maintain minutes to document the items discussed in the committee's meetings.

Safety committees help to facilitate communication of HS issues and requirements across campus units and recommend safety regulations, guidelines, training programs, and necessary corrective actions related to maintaining safe working conditions.

### **RECOMMENDATION**

We recommend that the campus:

- a. Form a Unit 6 Joint Safety Committee that meets the requirements outlined in the Collective Bargaining Agreement, or obtain appropriate approval to formally use the campuswide EH&S committee in place of the Joint Safety Committee.
- b. Ensure that the UBSC meets biannually, and maintain minutes to document the committee's meetings.

### **MANAGEMENT RESPONSE**

We concur.

- a. The campus will form a Unit 6 Joint Safety Committee that meets the requirements outlined in the Collective Bargaining Agreement, or obtain appropriate approval to formally use the campus wide EH&S committee in place of the Joint Safety Committee. The campus will implement the recommendation by August 30, 2019.
- b. The campus will ensure that the UBSC meets biannually, and maintain minutes to document the committee's meetings. The campus will implement the recommendation by September 30, 2019.

## **15. HEALTH FACILITIES SAFETY AND CLEANLINESS**

### **OBSERVATION**

The campus did not have a written plan addressing HS risks associated with health facility operations that included the elements required in EO 943, Section IX, *Health Facility Safety and Cleanliness*.

Specifically, we found that the campus did not have a written plan that addressed:



- Appropriate consultation with custodial staff to address health facility sanitation and safety issues and provide for the assignment of identified and trained custodial personnel to ensure appropriate cleanliness of the health facility.
- The unique conditions that determine the frequency and adequacy of cleaning of specific health facility areas.
- Orientation, continuing education, and training of custodians regarding the transmission and prevention of infectious diseases.

A complete and comprehensive plan for health facility operations helps to ensure employees are knowledgeable and adequately trained regarding the HS risks associated with operating a health facility in order to provide a safer environment for employees and patients.

#### **RECOMMENDATION**

We recommend that the campus develop and implement a written plan for health facility safety and cleanliness that includes the elements noted above.

#### **MANAGEMENT RESPONSE**

We concur. The campus will develop and implement a written plan for health facility safety and cleanliness that include the elements noted. The campus will implement the recommendation by September 30, 2019.

## **16. ACCESS TO HAZMAT**

#### **OBSERVATION**

Access to HAZMAT was not always adequately limited and supervised.

We found that electronic locks and keycards were used by the campus as the primary method to control access to buildings, classrooms, and other campus facilities. However, we noted that some campus buildings and facilities are automatically unlocked during certain hours. Specifically, during the review of one location with HAZMAT, we found that the external doors to the facility were automatically unlocked and remained unlocked beyond business hours. Additionally, we found that the HAZMAT at this facility was not secured, and campus employees were not always supervising the activities at the facility during the extended hours.

Appropriate safeguards and supervision reduce the risk of inappropriate and/or unauthorized access to campus facilities and misuse of HAZMAT.

#### **RECOMMENDATION**

We recommend that the campus review the hours in which unsupervised access is permitted to campus buildings and facilities, assess and document the risks associated with the unsupervised access for each building, and adjust building access hours, as necessary, to obtain acceptable levels of risk.

**MANAGEMENT RESPONSE**

We concur. The campus will review the hours in which unsupervised access is permitted to campus buildings and facilities, assess and document the risks associated with the unsupervised access for each building, and adjust building access hours, as necessary, to obtain acceptable levels of risk. The campus will implement the recommendation by December 18, 2019.

**17. ANNUAL REPORTING**

**OBSERVATION**

The campus did not provide annual HS program reports to the chancellor's office (CO).

We found that the campus did not prepare and submit the required annual HS program reports to the CO Systemwide Office of Risk Management for fiscal years 2016/17 and 2017/18, as required by EO 1039, *California State University – Occupational Health & Safety Policy*.

Annual HS program reports provide necessary information to the CO to provide systemwide oversight to campuses.

**RECOMMENDATION**

We recommend that the campus annually prepare and submit an HS program report to the CO.

**MANAGEMENT RESPONSE**

We concur. The campus will annually prepare and submit an HS program report to the CO. The campus will implement the recommendation by November 1, 2019.

## GENERAL INFORMATION

### BACKGROUND

California state regulations require all employers, including the California State University (CSU), to provide a safe and healthy work environment. Each campus has a designated EH&S program administrator that is responsible for developing and maintaining a campus HS program.

All CSU campuses purchase HAZMAT for both instructional and research purposes, most prominently in colleges that focus on the sciences, fine arts, and liberal arts. In addition, campus maintenance departments such as custodial services, facilities, and auto shops may use materials that are known to have properties that are harmful to humans and the environment. Nearly all of the areas that use HAZMAT generate HAZWASTE that is subject to strict regulations for safe and proper storage, transport, and disposal.

California regulations relating to HS are primarily codified in the California *Health and Safety Code* (HSC) and in Titles 8 and 22 of the CCR. California's Division of Occupational Safety and Health (Cal/OSHA) is primarily responsible for the enforcement of the state's occupational HS laws and regulations. Title 8 of the CCR addresses HAZMAT safety, including, but not limited to, training, communication, storage, and safety. Specific to laboratory environments, the *Occupational Exposure to Hazardous Chemicals in Laboratories* standard (8 CCR 5191) requires that the employer designate a chemical hygiene officer and have a written CHP that includes, among other things, provisions for worker training, criteria for the use of PPE and engineering controls, and standard operating procedures for handling HAZMAT. Title 22 of the CCR addresses HAZMAT waste management.

The primary CSU HS policy is EO 1039, *Occupational Health and Safety*. This policy requires campuses to develop, implement, and maintain a HS program and also addresses student HS training. EO 1069, *Risk Management and Public Safety*, delegates systemwide administration oversight and programmatic responsibility for environmental HS to Systemwide Risk Management.

At Humboldt State University (HSU), the responsibility for establishing and maintaining the campus IIPP and effective EH&S programs is delegated to the director of risk management and safety services (RMSS), who reports directly to the vice president for administration and finance. RMSS is composed of multiple functions, including EH&S. EH&S oversees the HS program at the campus and the Telonicher Marine Lab; works to promote environmental stewardship; protects the HS of the HSU faculty, staff, and students; and provides technical expertise and support through the development of EH&S programs, training, and consultations.

In 2017, due to HS concerns at two CSU campuses, the Joint Legislative Audit Committee directed the California State Auditor (CSA) to review HS compliance at four campuses (Channel Islands, Sacramento, San Diego, and Sonoma), as well as oversight by the CO. The review noted several issues, including observations relating to the annual evaluation of chemical plans; monitoring and documenting of student and employee HS training; and consistent and timely inspections of safety equipment. Based on the nature and trends of the observations

noted in the CSA review, Audit and Advisory Services informed the Board of Trustees that it would perform reviews at all CSU campuses in 2019.

## SCOPE

We visited the HSU campus from April 2, 2019, through May 17, 2019. Our audit and evaluation included the audit tests we considered necessary in determining whether operational and administrative controls are in place and operative. The audit focused on procedures in effect from January 1, 2016, through May 17, 2019.

Specifically, we reviewed and tested:

- Oversight and administration of the campus HS program, including clearly defined roles and responsibilities; appropriate safety and chemical committees; departmental self-audits and monitoring practices; and current policies and procedures.
- The adequacy and availability of safety equipment, including evaluation of the chemical hygiene plan; provision of personal protective equipment; and regular inspections and monitoring of key safeguards and engineering controls.
- Proper storage and safety of hazardous materials, including procurement; maintenance of accurate inventories; appropriate labeling and storage practices; and access controls.
- Communications and training processes, including evaluation of the hazard communication plan; availability of material safety data sheets; asbestos notifications and signage; and documentation and monitoring of student and employee training.
- Whether appropriate safety programs were in place, when applicable, for radiation sources; laser safety; bloodborne pathogens; respiratory protection; and spill containment.
- Appropriate identification, storage, and monitoring of accumulated hazardous waste.

As a result of changing conditions and the degree of compliance with procedures, the effectiveness of controls changes over time. Specific limitations that may hinder the effectiveness of an otherwise adequate system of controls include, but are not limited to, resource constraints, faulty judgments, unintentional errors, circumvention by collusion, and management overrides. Establishing controls that would prevent all these limitations would not be cost-effective; moreover, an audit may not always detect these limitations.

Our testing and methodology, which was designed to provide a review of key operational and administrative controls, included interviews, walkthroughs, and detailed testing on certain aspects of the HS program. The review was limited to gaining reasonable assurance that essential elements of the HS program were in place and did not examine all aspects of the program.

**CRITERIA**

Our audit was based upon standards as set forth in federal and state regulations and guidance; Trustee policy; Office of the Chancellor directives; and campus procedures; as well as sound administrative practices and consideration of the potential impact of significant risks. This audit was conducted in conformance with the Institute of Internal Auditors' *International Standards for the Professional Practice of Internal Auditing*.

This review emphasized, but was not limited to, compliance with:

- ANSI Z136.1, *Safe Use Of Lasers*
- ANSI Z358.1-1981, *Emergency Eyewash and Shower Equipment*
- 10 Code of Federal Regulations (CFR) Part 20, *Standards for Protection Against Radiation*
- 29 CFR Part 1910, *Occupational Safety and Health Standards*
- California HSC Division 20, *Miscellaneous Health and Safety Provisions*
- CCR Title 8, *Industrial Relations*
- CCR Title 17, *Public Health*
- CCR Title 19, *Public Safety*
- CCR Title 22, Division 4.5, *Environmental Health Standards for the Management of Hazardous Waste*
- EO 1031, *Systemwide Records/Information Retention and Disposition Schedules Implementation*
- EO 1039, *California State University - Occupational Health & Safety Policy*
- EO 1069, *Risk Management and Public Safety*
- Collective Bargaining Agreement, Unit 6, Article 28, *Health and Safety*
- HSU *Bloodborne Pathogen Program*
- HSU *Chemical Hygiene Plan*
- HSU EM: P06-11, *Boat Safety Committee*
- HSU *Hazard Communication Program*
- HSU *Injury and Illness Prevention Program*
- HSU *Procurement Card Guidelines*
- HSU *Radiation Safety Manual*
- HSU *Respiratory Protection Program*

**AUDIT TEAM**

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