January 15, 2019

BARUCH D. KUPPERMANN, MD, PHD
CHAIR, DEPARTMENT OF OPHTHALMOLOGY
DIRECTOR, GAVIN HERBERT EYE INSTITUTE

Re:  Gavin Herbert Eye Institute Audit
   Audit No. I2019-208

Internal Audit Services has completed the review of the Gavin Herbert Eye Institute and the final report is attached.

We extend our gratitude and appreciation to all personnel with whom we had contact while conducting our review. If you have any questions or require additional assistance, please do not hesitate to contact me.

Mike Bathke
Director
UC Irvine Internal Audit Services

Attachment

C: Audit Committee
   Dana C. White – Chief Administrative Officer, Gavin Herbert Eye Institute
I. MANAGEMENT SUMMARY

In accordance with the fiscal year (FY) 2018-19 audit plan, Internal Audit Services (IAS) reviewed certain business operations within the Gavin Herbert Eye Institute (GHEI). Many internal controls within GHEI business operations are functioning satisfactorily. However, opportunities exist to strengthen certain internal control processes to ensure compliance with University policies and procedures and/or best business practices. The following opportunities were noted.

EPIC Charge Capture – Additional training may assist physicians responsible for entering charges into the EPIC electronic medical record (ERM) system. Charges that contain errors/omissions are sometimes entered into EPIC. In addition, charges may be entered into EPIC in a way that prevents them from being billed. As a result, billing is untimely and lost revenue may occur. This observation is discussed in section V.1.

Outside Professional Activities – Faculty members’ annual disclosure reports for outside professional activities (OPA) are not always completed and approved within the required campus timeline. In addition, annual disclosure reports do not always report OPA fully and accurately. This observation is discussed at V.2.

Payroll Certification – Payroll certification reports are not always completed in a timely manner. Seven sampled awards were submitted between 31 and 299 days after the 90-day extension allowed after the budget period end-date. This observation is discussed in section V.3.

Equipment Management – Some equipment items were not found in the location designated on the official list of inventorial equipment; other equipment items did not have a University property tag. In addition, one sampled equipment item had been transported from GHEI for use at UC San Diego (UCSD) without written pre-approval or any other documentation. This observation is discussed at V.4.

Optical Shop Inventories – Policies and procedures have not been written for inventory processes. In addition, opportunities may exist to better separate incompatible inventory duties. This observation is discussed in section V.5.
II. BACKGROUND

In 2007, a naming gift was provided by philanthropist Gavin Herbert and family to establish GHEI located on the UC Irvine (UCI) campus. This gift, combined with other funding, enabled the GHEI building to be constructed entirely through private philanthropy. The four-story, 64,000-square-foot structure opened in FY 2013-14 and features an outpatient surgery center, clinical services and patient waiting areas, an optical shop, faculty and staff offices, and conference space.

At GHEI, faculty members consisting of internationally recognized physicians, surgeons, and scientists provide highly specialized training to future ophthalmologists, access to leading-edge clinical trials as well as sight-saving treatments and therapies. In addition, eye surgeons, stem cell researchers, geneticists, infectious disease specialists and engineers are working on technologies and treatments for many eye disorders. These efforts have vaulted UCI School of Medicine (SOM) into the top echelons of US institutions receiving National Institutes of Health grants for vision research. The goal of GHEI is to spark innovation and continue to revolutionize patient care. The institute’s world-class team of ophthalmologists and researchers is dedicated to meeting the complex medical and surgical eye-care needs of residents in Orange County and the surrounding region.

The GHEI organizational structure includes two distinct operations - clinical and surgical operations reporting to the UCI Medical Center (UCIMC) and SOM operations that include research, community service, education, and business operations. Both operations share space within the GHEI building; GHEI-SOM has additional research space nearby. GHEI-SOM fosters collaboration and teamwork among 136 individuals, including 33 faculty members, six American fellows, three International fellows, 18 specialists, eight project scientists, 16 post-docs, 33 staff members, 10 limited staff members, two graduate students, and seven student workers. GHEI-SOM operations are managed by the Chief Administrative Officer (CAO) with assistance from the GHEI Medical Director and the Ophthalmology Chair. The CAO has direct responsibility for education, marketing, community services, and department operations. In addition, the CAO is supported by a Chief Financial Officer, who has responsibility for research administration, finance (billing, purchasing, and facilities), and the Optical Shop.
III. PURPOSE, SCOPE AND OBJECTIVES

The purpose of the audit was to assess GHEI-SOM business operations. The review was designed to determine whether internal controls and best practices are in place to ensure appropriate, compliant transactions, and efficient/effective business operations. The audit scope included FY 2018 and FY 2019 operations. The following audit objectives were included in the review.

1. Determine GHEI processes for capturing charges in the EPIC system and assess management concerns.
2. Verify that reporting of faculty members’ OPA is complete, accurate, timely, and compliant with UC academic policy on OPA.
3. Verify that payroll certification processes are compliant with UCI policies.
4. Verify the existence, location, and proper tagging of inventorial equipment.
5. Verify that Optical Shop inventory processes are supported by written policies and procedures and adequate internal controls.
6. Verify that processes for receiving and depositing cash/equivalents are supported with adequate internal controls and are compliant with UC policy.
7. Verify that payroll transfers are compliant with UC/UCI policies, federal guidelines, and best practices.

IV. CONCLUSION

Many internal controls within GHEI business operations appear to be functioning satisfactorily. Opportunities exist to strengthen internal controls and improve processes with EPIC charge capture, OPA, and payroll certification. Processes can also be further improved with inventorial equipment and Optical Shop inventory.

Observation details were discussed with management, who formulated action plans to address the issues. These details are presented below.
V. OBSERVATIONS AND MANAGEMENT ACTION PLANS

1. **EPIC Charge Capture**

**Background**

The EPIC EMR system was implemented in November 2017. GHEI physicians utilize EPIC to enter charge data for services performed. Data must be input into EPIC completely, accurately, and in a prescribed method to ensure that charges can be released from EPIC for billing. Therefore, it is important for physicians to have detailed knowledge of EPIC processes so that charges can be billed in a timely manner.

**Observation**

Key employees in GHEI were interviewed about concerns they have noted with certain charges entered into the EPIC system. The following concerns were discussed.

1. Management determined through an analysis of FY 2018-19 first quarter revenue that actual revenue was lower than projected revenue despite a 10 percent increase in physician resources. Some of the decline in revenue resulted from unbilled charges in EPIC.

2. The amount of lost revenue due to unbilled charges is difficult for management to determine. Currently, EPIC analytical/reporting tools are limited. Management has concluded that unreleased charge data in EPIC results from several data input errors and is working to resolve each error type as it is discovered.

3. For example, GHEI physicians sometimes input charges and other data into EPIC that contain omissions, and/or input charges in a way that prevents EPIC from releasing them for billing. Physicians are then required to make corrections so that the charges are billable. Management has indicated that additional physician training in EPIC is needed to remedy these, and other concerns.
Charges that are released from EPIC in a timely manner assists in billing timeliness, and assists in preventing lost revenue.

Management Action Plan

To address the EPIC training issues, management worked with a consulting firm who shadowed several GHEI physicians in November 2018. The consulting firm provided three recommendations that could be implemented immediately. They included in their report some items that GHEI could take advantage of with the EPIC upgrade that went into effect in December 2018. Additional hours of mandatory training for physicians, optometrists, fellows, and residents were also provided. In January 2019, department administration will review charges for December 2018 to see if the additional training has had a positive impact on revenue.

Since GHEI’s Work Relative Value Units (WRVUs) have increased but revenue has declined, GHEI believes there are additional problems with the Professional Billing Group (PBG) who is responsible for coding, billing, and working the department’s accounts receivable. Over the last 18 months, PBG has changed our account manager and our coders which we believe has had a negative effect on revenues. The Chair and Medical Director have been in communication with PBG and hospital leadership seeking possible remedies.

2. Outside Professional Activities

Background

UC Academic Policy Manual (APM) 671, is the University of California policy governing conflict of commitment and outside activities for employees covered under the Health Sciences Compensation Plan. The policy requires all affected faculty members to complete an annual disclosure report of certain compensated OPA. Information from the disclosure reports is summarized annually in a Dean’s Office Survey.

Observation

IAS reviewed the GHEI FY 2016-17 annual disclosure report for OPA, and 22 corresponding annual disclosure reports submitted by faculty members. The following opportunities for improvement were noted.
Timely Completion and Submission: OPA disclosure reports are not always prepared/approved in a timely manner to meet campus requirements. Of the 22 submitted disclosure reports, only five (23 percent) were completed and approved by the GHEI Director in time for the November 1, 2017 due date. Of the remaining 17 reports, three were prepared prior to the due date, but the approval signature was missing. The other 14 reports were prepared after the due date and were also not approved. Four of the 14 reports were not prepared until January 2018.

Description and Categorization of OPA Activities: OPA for five of 22 faculty members (22 percent) were incorrectly reported on their annual disclosure reports. Three disclosure reports submitted in October 2017 incorrectly reported OPA activities as Category I (i.e., activities requiring pre-approval from the Department Chair, Dean, and Chancellor/designee). The professional activities should have been reported as Category II or III (i.e., professional and personal activities, respectively, that do not require pre-approval). In October 2018, three revised FY 2016-17 OPA disclosure reports were submitted that reflected only Category II or III activities.

Furthermore, a disclosure report submitted in November 2017 indicated 150 days of Category I activities, which is over the maximum limit of 21 days allowed per fiscal year for OPA categories I and II. In October 2018, the faculty member submitted a revised FY 2016-17 OPA disclosure report that indicated only 10 days of Category I activities.

In addition, a disclosure report submitted in November 2017 indicated three days of Category II activities. However, management review of the disclosure report resulted in the submission of two successive revisions of FY 2016-17 OPA disclosure reports in October and November 2018. The October 2018 revised disclosure report indicated the same three days of Category II activities, and an additional 30 days in Category I activities, which was over the 21-day limit. Consequently, the November 2018 revised disclosure report indicated seven days of Category I activities, and one day of Category II activities.

Student Involvement in OPA: One faculty member incorrectly stated in the disclosure report that UCI student(s) had been involved in an OPA (which requires written pre-approval from the Department Chair). In actuality, the faculty member had given a lecture to students at a non-UC university, which
did not involve a UCI student; the faculty member had misunderstood the meaning of student involvement in OPA.

Faculty members are responsible for monitoring and obtaining pre-approvals as necessary for their reportable OPA, in accordance with APM-671. Faculty members’ annual disclosure reports should be fully and accurately completed and approved in a timely manner to ensure the timely submission of the Dean’s Office Survey.

Management Action Plan

Management concurs with the observations from the review of FY 2016-17 GHEI OPA. Faculty were not timely in their annual report submissions. The Chair was new to the process and only entered the system on the November 1, 2017 due date to approve the submissions that were present. In addition, some faculty members had difficulties distinguishing Category I activities from Category II or III activities, and determining the amount of time spent on a Category I activity.

Effective immediately, GHEI administration will work closely with the Chair and the faculty to ensure that OPA annual report submissions are complete, timely, and accurate. The CAO will also review the submissions, request clarification, and/or suggest changes to the faculty if the submission appears to be incomplete or inaccurate. Once the CAO completes this review prior to the November 1st due date, she/he will notify the Chair that the documents are ready for his/her review and approval.

This process was implemented by GHEI for FY 2018 OPA annual reports and worked well. The department CAO also reviewed all of FY 2017 reports and worked with individual faculty to correct their submissions for both fiscal years. To prevent future errors in the OPA annual reports, GHEI administration will review the process annually with the faculty during the last faculty meeting of the summer prior to the due date in the fall.

3. Payroll Certification

Background

To properly substantiate salaries charged directly to federally funded projects,
UCI uses an annual Payroll Certification System. Payroll certification is required for the salaries of all University employees who are paid from federal funds.

Observation

A review was completed of payroll certification reports for 12 sampled GHEI federal and federal flow-through awards with budget year end-dates between July 1, 2017 and June 30, 2018. For seven awards, required payroll certification reports were submitted more than 90 days after the end of the respective budget period. The number of days that the seven reports were late extended from 31 to 299 days.

In addition, as of the October 1, 2018 audit date, required payroll certification reports had not been completed for two awards. Respectively, the two payroll certification reports were 33 and 64 days late.

UCI policy states that the principal investigator must certify payroll within 70 days of the end of an award’s budget year, which provides Contract and Grant Accounting with an additional 20 days (90 days in total) to complete required financial reporting. Failure to complete payroll certifications within the required timeline is in violation of policy and may adversely impact federal funding.

Management Action Plan

GHEI management has identified the factors that have impacted our ability to perform our payroll certifications within the required period after each budget period.

Effective immediately, a process is in place by which we will create calendar reminders within three working days after the end of each budget period for federal and federal flow-through awards. The responsible administrator will start working on the certification within 48 hours from this reminder. We plan to complete our process within 45 days after the end of each budget period.
4. **Equipment Management**

**Background**

UCI inventorial equipment is defined as any tangible asset with an acquisition cost of $5,000 or more and a useful life of one year or more. UCI policy requires a uniform property control system that includes property identification through assigned numbers documented on tags that are attached to the equipment items. A record of inventorial assets must be maintained by each UC campus, which must be updated annually with input from each campus unit that has inventorial equipment.

**Observation**

Ten inventorial equipment items with designated locations at GHEI were sampled to verify the existence and location of the items and whether or not the items displayed accurate University property tags.

- Only two items (20 percent) were found in their designated GHEI locations with the correct University property tag.
- Six items (60 percent) were correctly tagged, but were found in a location other than the location designated on the official list of inventorial equipment.
- One item (10 percent) was found in its designated location, but did not have a University property tag.
- One item (10 percent), a portable auto refractor valued at $13,677, could not be found. Discussions with GHEI staff members disclosed that the equipment item had been moved to UCSD by a UCI faculty member who has similar job responsibilities at UCSD.

In addition, management disclosed that certain equipment items may move within GHEI and/or between GHEI and other UCI/Medical Center locations. As a best practice, faculty and staff should inform the GHEI Equipment Coordinator before moving equipment items from designated locations. Furthermore, before equipment is moved off-campus, an Equipment Assignment form (for University property leaving campus) should be provided to the GHEI Equipment Coordinator and the UCI Kuali Financial System (KFS) Asset Manager. As a best practice, when equipment is acquired,
notations should be added to KFS inventory records to indicate locations (other than the designated locations) where equipment items may be found.

**Management Action Plan**

By March 31, 2019, department administration will post inventorial equipment policies and share them with all SOM department employees as well as with the equipment custodians, specifically UCIMC employees who manage the clinic space and equipment. The department administration will also ask the Medical Center Administration to request that UCIMC-GHEI clinic managers agree to the processes in the inventorial equipment policies. Specifically, clinic managers should abide by the required notification to SOM department staff when equipment that resides in the clinic but is recorded on the SOM inventory list is moved or made obsolete. In addition, an Equipment Assignment form that is pre-approved by the Department Chair will be provided to the GHEI Equipment Coordinator and the UCI KFS Asset Manager before inventorial equipment is moved off-campus.

Also by March 31, 2019, property tags will be attached to equipment where it will be possible to see and verify the tag numbers. With moveable equipment, the department will use a log to identify movement and location of equipment when not in the designated storage area. Furthermore, proper policies will be in place to document when a piece of inventorial equipment is sent to salvage and removed from the inventory list. In addition, periodic audits will be conducted to reconcile the equipment inventory to actual equipment on site.

5. **Optical Shop Inventory**

**Background**

In the first four years of operation, the GHEI Optical Shop did not have an inventory system in place to monitor inventory additions, issuances, and balances. In the current fiscal year, plans were made to implement a perpetual inventory system. However, the EPIC and KFS systems utilized by the Optical Shop did not include an inventory management application. As a result, non-integrated software that includes a perpetual inventory application is being implemented to monitor Optical Shop inventories.
Observation

Observations of Optical Shop inventory processes and the completion of a management survey disclosed the following opportunities for improvement.

1. **Written Policies and Procedures** – Written internal policies and procedures are non-existent for most Optical Shop inventory operations, including inventory receiving, recording, safeguarding, issuance, reconciliation, and other inventory-related processes.

2. **Separation of Duties** – The Optical Shop’s current staffing model includes one full-time manager supported by additional part-time opticians. This staffing model may hinder management’s ability to maintain an adequate separation of duties in inventory and other key processes.

Written policies and procedures that clearly define roles and responsibilities can improve performance and management oversight of inventory processes. In addition, an adequate separation of inventory recordkeeping, physical inventory, and inventory reconciliation responsibilities strengthens internal controls over inventory processes. However, if an adequate separation of duties cannot be maintained, management may need to increase their oversight of operations as a mitigating control measure.

Management Action Plan

A reorganization of the GHEI Optical Shop is almost complete. Optical Shop management is implementing a more robust and transparent inventory management system and processes. By March 31, 2019 written internal policies and procedures for all inventory processes will be developed. In addition, effective immediately, Optical Shop management will implement the following processes and role assignments to strengthen inventory management.

- Frame inventory will be ordered by the manager or the department supervisor.
- An administrative assistant will order over-the-counter inventory and office supplies; orders will be verified by the GHEI Purchasing department.
- Opticians can order items for their patients; all invoices for patient orders must include the names of the patient and ordering optician.
All received orders should be verified by opticians or management, with verification documented on the invoice. The invoices should include initial quantity / date received / receiver’s printed name.

Inventory will be recorded in perpetual inventory software by an administrative assistant and checked by the Optical Shop manager. Invoices are reviewed by the department supervisor and filed by the Optical Shop.

A weekly frame count will be tracked into the in-store entry log, which is part of the perpetual inventory software.

A full store inventory count will be done on a bi-annual basis (June/December).