BLACKHAWK
GEOLOGIC HAZARD ABATEMENT DISTRICT

Program Budget

FISCAL YEAR 2015-2016

APRIL 2015

BLACKHAWK
GEOLOGIC HAZARD ABATEMENT DISTRICT

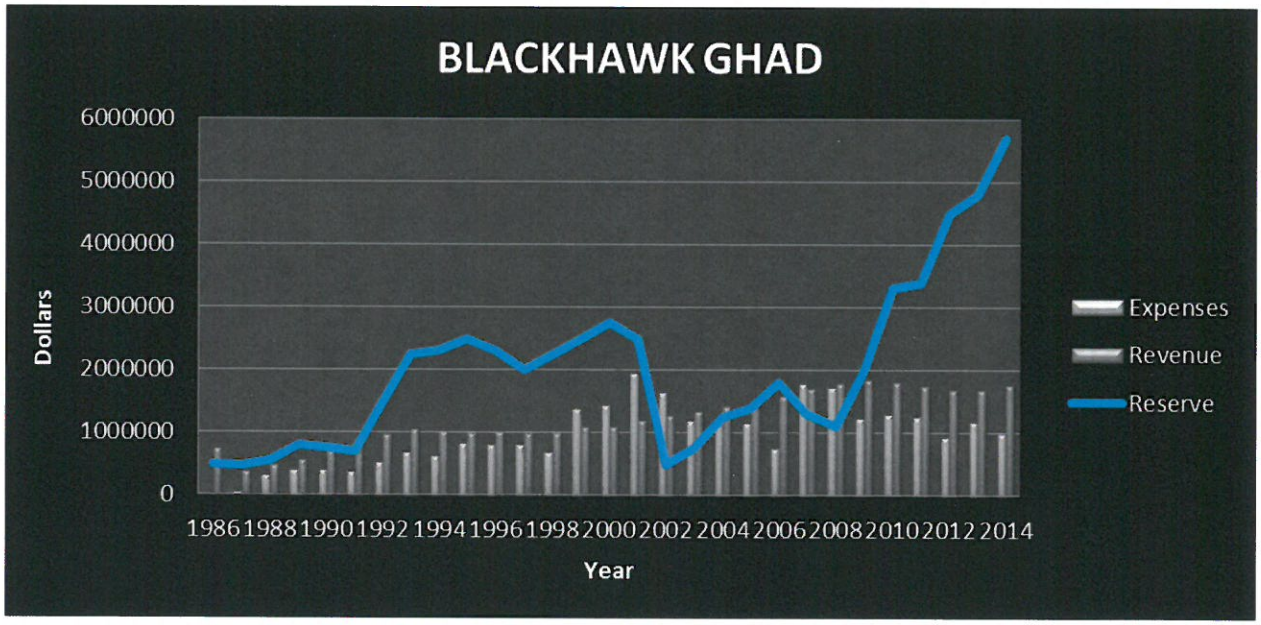
May 20, 2015

Blackhawk GHAD Board of Directors
c/o Supervisor Mary N. Piepho
3361 Walnut Boulevard, Suite 140
Brentwood, California 94513

SUBJECT: Program Budget for Fiscal Year 2015-2016
Blackhawk Geologic Hazard Abatement District

Dear Board Members:

Attached please find the proposed program budget for the Blackhawk Geologic Hazard Abatement District (Blackhawk GHAD or GHAD) for fiscal year 2015/2016. The proposed fiscal year budget totals $1,699,000, which falls within projected revenues and anticipates $116,000 contribution to the reserve fund. At the time of this publication, it is expected that the fund balance on June 30, 2015 will be approximately $6,350,000. A fund balance of $6,466,000 is projected for June 30, 2016. Please see the graphic below for Reserve Fund development.



There are four major budget categories, their respective budget expenses break down as follows:

Major Projects	50 percent
Preventative Maintenance and Operations	29 percent
Special Projects	4 percent
Administration, Legal, Accounting	17 percent

As a percentage of the annual budget, the Major Projects Program will utilize approximately fifty percent as more typically seen in previous budgets. Of the two planned Silver Oak Townhomes Slope Stabilization projects represented in the fiscal year 2014-2015 Budget, the Building 17 project has been successfully completed. As of the presentation of this budget we are seeking the remaining authorizations from the respective property owners and anticipate completing the Building 7 project during the 2015 construction season. The Major Projects program budget also incorporates the continuation of two primary studies designed to refine the Blackhawk GHAD's predictive and response capabilities by providing markers to indicate the potential for land movement.

The Preventive Maintenance Program will focus on continued efforts to complete asset site restorations. The program will continue to upgrade and analyze these sites and the associated data collection to insure all predictive features of these instrumentation and asset sites are fully realized. Specifically, we will continue to target the following program elements - Concrete Interceptor Ditch Systems (Repair and Replace Program); the Horizontal Drains (Site Maintenance Program); the Piezometers (Site Maintenance Program), and the Soil Debris Bench (Maintenance Program). The Operations Program will continue its existing monitoring profile through this period. The National Oceanic and Atmospheric Administration (NOAA) currently predict an increased likelihood of El Niño conditions for the winter months in the Southern Oscillation. Accordingly, we have anticipated higher than average Incident Response events and emergency Response needs.

The Special Projects Program will be directed at finalizing Amendment 3 to the Plan of Control which seeks to clarify the independent role of the Blackhawk GHAD and further strengthen those areas of the plan that serve to define the scope of the district's responsibilities. A study has commenced, and will continue, to analyze and confirm the boundary limits. This study is directed at comparing the existing Blackhawk GHAD boundary to that of County Service Area M-23, to insure the limits of these respective districts are coterminous. The recently completed Reserve Study review and update, which serves to test, identify weaknesses, and expose any necessary adjustments to the criteria or methodologies utilized in the program, will continue to be analyzed and acted on when necessary, in an effort to mitigate the effects of any anticipated revenue deficiencies. We have recently completed a comprehensive field inspection program to quantify asset site conditions and serviceable life of the GHAD maintained facilities. Our inspections have revealed more favorable site conditions than first anticipated. Preliminary results of our study have indicated that reserve accumulation, at the current pace, is tracking with our future financial needs. It is anticipated that the GHAD will continue to pursue additional studies in the areas of Fiscal Policy and Geologic Risk Analyses. Approximately 4% of the annual budget has been set-aside for the Special Projects Program. As stated in previous budget reports, the GHAD has been able to obtain General Liability Insurance coverage to further protect the operations within the district through the California Association of GHADs (CAGHADs). We continue to work to strengthen our communication with district constituents and stakeholders. The Blackhawk GHAD website at *www.blackhawkghad.com* has served to assist management in these efforts.

This budget anticipates continued strengthening and building efficiencies within the Administration Program. General legal counsel will continue to be provided by the Blackhawk GHAD Board appointed attorney, Patricia Curtin of Wendel, Rosen, Black & Dean, LLP, and specific litigation counsel will be provided by Timothy J. Ryan of The McNamara Firm. The Blackhawk GHAD has been sued by a number of townhome owners and the Silver Oaks HOA in litigation filed May 6, 2009, in the Contra Costa Superior Court (*Jerrold Feiger, et al. v. Blackhawk Corporation* et al., Case No. C09-01221). The case involves property damage claims arising from alleged earth movement on privately owned slopes situated below plaintiffs' townhomes. The GHAD has no liability in the case because it neither owns nor controls the slopes where movement is allegedly occurring; the slopes are owned by co-defendants Blackhawk Corporation (which filed for bankruptcy in 2013) and Blackhawk Executive Center Association (BECA). The GHAD has determined, however, through its own geotechnical investigations, that landslide activity was occurring at two separate locations along the slope. Accordingly, the GHAD designed and recently completed a slope stabilization project on the BECA slope below Silver Oaks

Building 17 and plans to perform a similar project this summer on the Blackhawk Corporation slope below Silver Oaks Building 7. No other landslide conditions are believed to exist in the area. The lawsuit, which involves a total of 19 units in 9 different buildings, has been dormant for the past one and one-half years after the parties agreed that the GHAD would install and monitor devices on certain sections of the slopes in order to establish whether any additional landslide movement is occurring. If, as expected, the data confirms the absence of further land sliding the GHAD has reason to believe that the plaintiffs will dismiss their claims against the GHAD. If, however, the data indicates active land sliding the GHAD could explore additional slope stabilization options at that time. In any event, the GHAD would still have no legal liability for the plaintiffs' claims in the litigation. This budget reflects continued defense of this litigation.

A summary of the expenses is shown on Table 1, pages 4 and 5, followed by brief descriptions of each of the budget items on pages 6 through 14.

Respectfully yours,

Blackhawk Geologic Hazard Abatement District

Michael D. Sands
Sands Construction Company, Inc.
General Manager

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Upon Execution: The following entities will be noticed that management will post approved Budget at www.blackhawkghad.com

Blackhawk Homeowners Association
4125 Blackhawk Plaza Circle, #230
Danville, CA 94506
Attention: Mark Goldberg

Hidden Oaks at Blackhawk
c/o Community Care Property Management
P.O. Box 269
Oakley, CA 94561

Tennis Villas at Blackhawk
c/o CMJ Associates, Inc.
P.O. Box 190
Pleasanton, CA 94566

Saddleback at Blackhawk
c/o Jean Bates & Associates
70 Railroad Avenue
Danville, CA 94506

Silver Oak Townhomes at Blackhawk
Canyons at Blackhawk
c/o Bridgeport Company
1 Annabel Lane #217
San Ramon, CA 94583
Attention: Bill Bavelas

Blackhawk Country Club
599 Blackhawk Club Drive
Danville, CA 94506
Attention: Kevin Dunne, General Manager

Blackhawk Geologic Hazard Abatement District
Program Budget
Fiscal Year 2015/2016

The following proposed line item program budget (Table 1) summarizes the anticipated expenditures for fiscal year 2015/2016 for the Blackhawk Geologic Hazard Abatement District (Blackhawk GHAD or GHAD). Through an ongoing assessment the GHAD manager evaluates and addresses geologic risk through the implementation of an annual program budget consisting of four major categories. Preceding Table 1, and directly below, please see a general overview description of the four major program elements within the budget.

Major Projects Program

The annual Major Projects Program includes, landslide repair projects, drainage improvement projects and capital improvement projects necessary to either control, mitigate, or prevent landslide activity. Other large program responses necessary to implement the Plan of Control, including specific purpose studies and investigations may also be included in the Major Projects Program.

Generally, for consideration of inclusion into the Major Projects Program, a project or study would represent a level of complexity requiring plans, specifications, and comprehensive engineering analysis including modeling and research, or a project with a protracted scope such as those requiring multiple regulatory agency approvals. Most Major Projects have a projected cost that exceeds $50,000.

Historically, the Major Projects Program has been comprised of significant landslide repair projects and other responsive large projects; at other times, it has included programmatic studies and investigations useful in generating proactive responses. This diversity of projects demonstrates the importance of a flexible Major Projects Program structure that adapts between responsive and proactive needs and capabilities to manage the dynamic nature of larger scale geologic events.

Preventative Maintenance and Operations Program

The annual Preventative Maintenance and Operations Program includes all minor repairs, cleanup, maintenance, monitoring and replacement of drainage structures and other assets that degrade over a serviceable life. The goal of preventative maintenance is to keep assets in operational condition and identify potential slope stability risks before they manifest, allowing measures to be taken to either prevent, or mitigate the impact of these hazards as defined in the Blackhawk GHAD Plan of Control.

Typical Blackhawk GHAD assets include concrete lined ditches, subdrainage systems, groundwater measuring instrumentation, slope inclinometers and moisture gauges, and slope debris catchment features.

The Preventative Maintenance Program also includes preparations for emergency response, winterization measures including erosion protection and slope stabilization supplies, and instrument maintenance.

The Operations Program is primarily populated with scheduled instrument monitoring events. Data from these instruments are evaluated to establish risk and trends in an effort to avert landslide activity. In addition to the instruments monitoring program, the Operations Program contains the Incident Response and Community Relations Program, which incorporates comprehensive first response capabilities, and fosters community incident interaction.

Special Projects

The Blackhawk GHAD pursues ongoing and new activities identified as "Special Projects". Special Projects include activities requested by the Board such as the Communications Program, or projects and studies designed to improve the District's operational effectiveness and insure financial solvency. Special Projects also include utilizing new technologies to increase the efficiencies of the day-to-day operations. Establishment, testing and placing into service a new Geographic Information System (GIS) has been one of many successful fruitions of the Special Projects Program.

Administration

Administrative expenses are required to operate the Blackhawk GHAD and implement projects. Administrative expenses include personnel and consultants to manage the operations including; the General Manager, Administrative Manager, Construction Services Manager, certain clerical and accounting staff, consultants, and legal support.

With respect to the General Management of the Blackhawk GHAD - The Blackhawk GHAD Board of Directors through Resolution 2014/02, among other business, established a Consulting Services Agreement with Sands Construction Company, Inc. to act as General Manager. The payment limit established for a term through Jun 30, 2015 is $163,000. The scope of services for the General Manager include, managing the day-to-day operations through implementation of the necessary financial recordkeeping and reporting; updating and maintaining governing documents, such as the Plan of Control; and managing and updating administrative tools such as the Reserve Study, Communications Plan, Work program and Monthly Incident Log. The General Manager Consulting Services Agreement provides for certain administrative positions including, but not limited to, a General Manager, an Administrative Manager, a Construction Services Manager and a Network Administrator as well as overhead costs, such as office space rent, office supplies and postage. The General Manager will retain the necessary professionals, including without limitation, engineers, accounting professionals, and vendors to facilitate the operations of the GHAD. The General Manager Consulting Services Agreement, and associated budget, allows for the conditional use of subcontractors such as administrative sub-consultants, engineering or construction sub-consultants, within the payment limits of the Consulting Services Agreement.

With respect to the Operations Management of the Blackhawk GHAD, the Operations Manager payment limit is set at $261,680 for a term through June 30, 2015. The scope of services for the Operations Manager include implementing the Major Projects and Preventive Maintenance Programs through forecasting work schedules and priorities; and preparing Requests for Proposals and managing maintenance and repair operations within the Major Projects and Preventive Maintenance Programs, including project management and construction management; preparing for and responding to emergency incidents. The Operations Manager Consulting Services Agreement provides for certain operational positions including, but not limited to, an Operations Manager, Construction Services Manager and Construction Services Technician, as well as certain overhead costs, such as, office supplies, and electronic monitoring devices testing apparatus rental. The Operations Manager Consulting Services Agreement, and associated budget, allows for the conditional use of subcontractors such as contractors, engineers, and special inspectors, within the payment limits of the Consulting Services Agreement.

A summary of the proposed Fiscal-Year 2015-2016 Budget is presented in Table 1 on the following pages.

Table 1 – Summary of Fiscal Year 2015/2016 Budget

Budget Item	Budget Amount	% of Total Budget
Major Repairs		
Silver Oak Townhomes Slope Stabilization Proj. (Bldg. 7)	575,000	
Study – Instrument Restoration/Replacement	70,000	
Study – Slope Stability Analyses	85,000	
Unanticipated Sites	40,000	
Landscape Replacement (associated with repairs)	70,000	
Total Major Projects	**$840,000**	**50%**
Preventive Maintenance/Operations		
Preventive Maintenance		
Drainage		
Storm Drain Facilities	10,000	
B-58 Concrete Lined Ditches		
Maintenance/Clean/Map	27,500	
Repair and Replace	80,000	
Retention Basins	10,000	
Subdrain Systems	10,000	
Horizontal Drains	50,000	
Subdrain Outlets/Pumps	5,000	
Piezometers	20,000	
Settlement Monitors	20,000	
Minor Repairs	50,000	
Winterization	20,000	
Emergency Response	70,000	
Debris Benches	20,000	
Subtotal	**$392,500**	
Operations		
Piezometer Monitoring	5,000	
Horizontal Drain Monitoring	5,000	
Subdrain Monitoring	5,000	
Settlement Monitoring	10,000	
Incident Response/Community Relations	75,000	
Project Monitoring	2,000	
Subtotal	**$102,000**	
Total Preventive Maintenance/Operations	**$494,500**	**29%**

Budget Item	Budget Amount	% of Total Budget
Special Projects		
Plan of Control	18,000	
Reserve Study Update	1,000	
Special Studies	17,000	
Information Technology	16,500	
Accounting Systems Upgrade	2,000	
Procedures Manual	5,000	
Communications Program	5,000	
CA Association of GHADs – Membership/Insurance	6,000	
Total Special Projects	**$70,500**	**4%**

Administration		
Legal fees		
General Counsel	50,000	
Special Counsel		
Litigation/Legal Concerns		
Feiger vs Blackhawk Corp, et al*	85,000	
Staffing/Administrative Support	80,000	
Accounting/Bookkeeping	60,000	
Training/Education	3,000	
Office – Rent/Supplies/Equipment/Lease	16,000	
Total Administration	**$294,000**	**17%**

TOTAL PROPOSED BUDGET FY2015/2016	**$1,699,000**	**100%**

Available Funds	
Estimated Beginning Fund Balance – July 1, 2015**	6,350,000
Estimated Contributions from M-23 (M-23 Surplus)	1,750,000
Estimated Interest on Investments	65,000
Other Income	00
Total Available Funds	**$8,165,000**
Uses of Funds	
Major Projects	840,000
Preventive Maintenance	494,500
Special Projects	70,500
Administrative	294,000
Total Use of Funds	**$1,699,000**
Estimated Reserve Available/Ending Fund Balance June 30, 2016	**$6,466,000**

* Feiger vs Blackhawk Corp, et al aka: Silver Oak Townhomes

** Includes estimated accrued true-up revenue payment (Sept 2015) of $93,750; Projected Fund Balance date of publication

DESCRIPTION OF BUDGET ITEMS

Major Projects

Silver Oak Townhomes Slope Stabilization Project (Building 7)

Over several years the Blackhawk GHAD has been involved in numerous risk reduction efforts including monitoring, evaluating, and when appropriate, repairing areas of the hillside below the Silver Oak Townhomes on Silver Oak Lane. Within the last several years, significant distress has occurred in the southernmost residential four-plex building (Building 7) on Silver Oak Lane. The GHAD has responded by installing several slope inclinometers and conducted an ongoing evaluation of lateral movement detected in the instrumentation.

In early January 2011, after a significant study of the subject area, it was determined by Blackhawk GHAD experts that a landslide existed on the hillside below the four-plex residential building on Silver Oaks Lane. It was further determined that the upslope properties may be at risk for additional damage and consulting engineers have completed a slope stabilization design. The design includes the placement of a tied-back soldier pile structural wall established near the top of the hillside and adjacent to the building properties. At the time of completion of the repair design agreements to allow the work were drawn and submitted to the impacted property owners for execution. However, on February 15, 2013 the property owner, Blackhawk Corporation, filed for Chapter 7 Bankruptcy protection, which from that time forward has made securing the proper authorizations to proceed with the repair work problematic for the GHAD. Recently, the GHAD has secured the necessary License from Blackhawk Corporation to allow the work to move forward. All additional involved properties have been provided Licenses for execution. It is anticipated that the work will proceed during the summer of 2015.

It is also noteworthy to acknowledge that a complaint has been filed by the residents of the subject upslope property, and subsequently others along the common hillside. The defense costs relative to this litigation are represented in the Administration Program Budget under "Special Counsel – Litigation", and therefore not included in the landslide repair project budget as indicated below.

Estimated Cost $575,000

Study – Instrument Restoration and Replacement

Typically, instrument replacement and maintenance falls within the Preventive Maintenance program; however, for several years the Blackhawk GHAD has conducted independent regional studies to identify trending patterns of groundwater and instrument and drainage efficacy. This study, in progress, will build on previous studies by further identifying potential sites for remedial installations, or provisions. Preliminary studies have identified several sites for restoration work or new replacement installations. Many of these sites have been restored. This budget anticipates continuation of a large-scale restoration program to the horizontal drain systems (also see Preventive Maintenance Program – Horizontal Drain Maintenance)

Estimated Cost $70,000

Study – Slope Stability Analyses

Slope weathering and changes in groundwater levels over time can contribute to slope instability. It is important for Blackhawk GHAD management to make dynamic assessments to insure design thresholds are met in slope stability. This study, initiated in FY 2014-2015 will continue to address several potential sites and analyze conditions. Previous studies have identified potential sites for additional study.

Estimated Cost $85,000

Unanticipated Sites

During heavy rain years unexpected repairs are necessary to avert or control landslides that may threaten property within the District. It is vital for the manager to retain the availability of funds within the Major Repair Program to address just such an event.

It is also common to experience a change in the planned construction schedule to include additional sites. Known sites can rise in priority throughout the year and additional sites may emerge.

Estimated Cost $40,000

Landscape Replacement

Typically, remedial landscaping is either included in the scope of work for major projects or eliminated completely from the repair scheme; however, on occasion the associated License Agreements executed in preparation of the work will address a reimbursement or allowance to the property owner for remedial landscaping installation. Such an agreement exists and is outstanding with the Blackhawk Executive Center Association (BECA) relative to the work on the Building 17 slope stability measures project. Additionally, it is anticipated that other agreements may be necessary during this budget term.

Estimated Cost $70,000

Preventative Maintenance and Operations

Preventive Maintenance

Preventative maintenance generally consists of those measures taken to prevent an incident or landslide event, including asset maintenance, drainage structures, instrument sites and winterization measures. Operations include ongoing monitoring programs and responses to community requests. Details of the proposed budget for each of these categories are listed below.

Storm Drain Facilities (Major Repairs)

In addition to other drainage systems such as Concrete Interceptor Ditches, Subdrains, and other surface and subsurface drainage systems, the Blackhawk GHAD maintains an inventory of concrete drainage structures that from time to time are in need of refurbishment or repairs. A

budget has been established to inspect these facilities and make any necessary repairs, not covered within the established *"B-58 Drain Systems – Repair and Replacement Program"* scope.

Estimated Cost $10,000

B-58 Drain Systems

Maintenance – Allows for one major annual cleaning and mapping. In addition, District staff periodically walks the B-58 systems to get a first-hand account of the current conditions and project serviceable life. This information, along with other empirical data, is utilized in our Reserve Study updates. This year will represent the completion of a video survey of all 14-miles of the Blackhawk GHAD B-58 Drain Systems.

Estimated Cost $27,500

Repair and Replacement – As a result of intensified efforts in fiscal year 2013/2014, and 2014/2015 a total of 510 lineal feet of B-58 was replaced and several-hundred lineal feet of B-58 was repaired. The district now currently lists approximately 1282 lineal feet of significantly damaged B-58 to be repaired throughout the district, with other damage assessments costs (repair or replace) have been estimated (in 2015 dollars) at approximately $1,000,000. A priority has been established, based on the degree of damage and associated risk to improved properties, and a percentage of these replacement projects will be budgeted throughout the upcoming years. This year's budget will be utilized on repairs to existing B-58s on a site-by-site basis.

Estimated Cost $80,000

Retention Basins

There are seven retention basins within the district boundaries. Three of these facilities are maintained exclusively by the Contra Costa County Flood Control District through CSA M-23, and the Blackhawk GHAD performs certain periodic maintenance operations at the other four locations, as well as the property owner. In a collective agreement with the Homeowners Association, the Country Club (landowner) and the GHAD, de-siltation efforts have been completed in two retention basins during fiscal year 2012/2013. It is not anticipated that the GHAD will participate in additional de-siltation projects during fiscal year 2015/2016; however, the GHAD has been working with the Blackhawk Country Club to develop a Memorandum of Understanding that directs the maintenance and management efforts at these locations, moving forward. During FY 2014/2015 the GHAD management engaged the Contra Costa County Public Works Department (Public Works) in discussions to help develop clarity as to the relative responsibilities for drainage maintenance within the GHAD. Those discussions are ongoing and have been expanded beyond the retention basin maintenance to incorporate more of the total network of storm drain systems within the district. We are greatly encouraged as these trilateral discussions continue and anticipate a more comprehensive and clear understanding of storm drain maintenance moving forward.

Additionally, protracted drought conditions in northern California have resulted in significant reduction in water levels in many dual purpose storm water retention facilities in the area, including within the Blackhawk development. The GHAD manager is actively working with local Homeowners Associations, Country Club management and other jurisdictional agencies to further explore the potential risk ramifications in an effort to collectively plan.

Estimated Cost $10,000

Subdrain Systems

Outlet sites for subdrain systems must be monitored and maintenance provided to insure outlets have not been damaged or impeded. This budget will allow for an inspection and minor maintenance of these sites.

Estimated Cost $10,000

Horizontal Drains

The District Manager has placed a high priority on verifying the condition of and restoring as many existing horizontal drains throughout the development as possible. A definitive list of sites requiring repairs has been determined and work continues on restoring the sites and installing identification markers. The work this year has been expanded to continue implementation of a multi-year cleaning program.

Estimated Cost $50,000

Subdrain Outlets/Pumps

The Blackhawk GHAD conducts ongoing efforts to identify, locate and make determinations about the effectiveness of the network of subdrains throughout the District. It is anticipated that on-site restoration work may be necessary at some sites. This additional work as well as the additional introduction of the subdrain systems into the District GIS system has been incorporated into this budget item.

The GHAD maintains a subdrain pumping facility located adjacent to Hole #1 of the Lakes Course, Country Club. Periodic site checks for operation are required. In recent years the equipment, instrumentation and electronics have been updated. This year, maintenance will be performed at this site to insure the continued reliability of this system and facility.

Estimated Cost $5,000

Piezometers

The District reads and maintains in excess of 100 piezometers measuring ground water elevations. A definitive list of sites requiring repairs has been determined and work begun on restoring the sites and installing identification markers. The work this year has been expanded to include a greater number of sites and inclusion of the sites into the GIS, and to maintain site locations.

Estimated Cost $20,000

Settlement Monitors

Over time, a number of settlement monitors have been placed throughout the development. These monitors were, in large part, installed as part of one specific study or another and therefore are not continually monitored. Currently ongoing monitoring programs exist in several areas of the District.

Estimated Cost $20,000

Minor Repairs

A budget is established annually for minor projects establishing a provision for unanticipated minor projects within the Preventive Maintenance Program.

Estimated Cost $50,000

Winterization

The District provides an annual budget for procuring and storing an inventory of winterization materials and to provide for the costs of site installation.

Estimated Cost $20,000

Emergency Response

During the winter rainy season the Blackhawk GHAD responds to a range of urgent, active and threatening landslides as well as drainage issues where property damage is threatened. These incidents typically involve mud or debris flows, plugged storm drains at the base of slopes or flooded properties due to the overflow of runoff from plugged or damaged facilities. In severe cases these responses can require the initiation of temporary slope stabilization measures in preparation for a major repair.

Estimated Cost $70,000

Debris Benches

Numerous earthen debris benches exist throughout the district. It is essential that these facilities are inspected to insure capacities and drainage have not been compromised. Annual inspections are made and periodic debris removal plans are initiated. This year's budget allows for geotechnical evaluations and the periodic removal of accumulated debris from several of those benches identified during the study and routine monitoring events.

Estimated Cost $20,000

Operations

An inventory of on-site instrumentation including hundreds of piezometers, inclinometers, horizontal drains, subdrains and settlement monuments are monitored periodically throughout the year as a preventative measure. Collected data from these sites is analyzed and aggregated into the GIS system for further analysis to establish trends.

Monitoring sites can be established for a variety of uses. Often completed repair sites require monitoring to confirm that the slope has been stabilized. Other sites have been utilized to

indicate signs of unstable conditions developing and have been instrumental in determining slope conditions prior to the activation of a landslide.

Through the use of collected data such as groundwater depth, magnitude of slope movement, depth of movement and ground surface movement, the District has been able to arrest slope movement in advance of an incipient failure. Archiving of historical data is currently being integrated into the GHAD GIS system.

Throughout the year the District receives incident response or assistance calls from property owners regarding slope stability or drainage issues. Community relations, including incident responses through the annual Operations Program has been institutionalized as a role of Blackhawk GHAD management. All incidents are recorded within the GIS and move through the district response mechanisms as is appropriate and consistent with the Blackhawk GHAD Plan of Control.

The GHAD manager receives updates in long range weather and oceanic temperature changes through the National Oceanic and Atmospheric Administration (NOAA) and other scientific and atmospheric agencies that track data and produce probabilistic assessments on the likelihood of a recurrence of El Niño conditions. Statistical tables currently indicate an increasingly stronger possibility of El Niño conditions for the late months of 2015 and early months of 2016[1]. Accordingly, the budget for Incident Responses has been increased to allow for more activity in property owner requests for GHAD assistance during these conditions.

Estimated Cost $102,000

Special Projects

During fiscal year 2015-2016 the District will continue several special projects. Brief descriptions of the special projects are presented in Table 1 and further described below:

Plan of Control

It is anticipated that Amendment 3 to the Plan of Control will be presented to the Board which will contain certain minor, but necessary, clarifications in the language. This was not completed in FY 2014-2015.

Estimated Cost $18,000

Reserve Study Update

The Blackhawk GHAD reserve fund study was originally completed in FY2002-2003. An extensive update to the plan was completed in fiscal year 2012-2013. The reserve study functions as a pro-forma analysis of the financial needs of the Blackhawk GHAD. It serves as a tool to calculate the annual contribution required by the GHAD to build and maintain sufficient funds for emergencies and capital replacement programs based on past weather patterns, landslide repair costs, and general attrition. Historically, as a result of severe winters, draws

[1] NOAA – "El Niño/Southern Oscillation (ENSO) -Diagnostic Discussion" - May 6, 2015

have been necessary on the reserve fund. Work has been completed on an independent analysis of the fund health and methodologies. This analysis has been used in updating the pro-forma plan and provides instruction to GHAD management as to the necessary reserve demands over time.

Estimated Cost $1,000

Special Studies

The Blackhawk GHAD intends to continue targeted studies in the areas of fiscal policy and geologic risk. The GHAD, now in its 29th year, has the unique opportunity to address many of the issues surrounding long-term viability and sustainability, within a changing environment and financial conditions. Using empirical data we can assess potentially increasing financial loads and geologic risks that may accompany the maturation process of this district. We are confident that these studies have produced, and will continue to produce beneficial results.

Estimated Cost $17,000

Information Systems and Technology

The Blackhawk GHAD has completed its upgrade to its GIS system to include all of the GHAD's data collection and monitoring operations. The system is now fully operational and is run from internal servers, combined with secure and private "cloud" storage. The record and tool that this system offers facilitates the General Manager's ability to locate past repairs and assist in a variety of risk assessments within the District. Upgrades have now provided additional state-of-the-art security and redundancy features not historically available.

As a result of an independent evaluation of the Blackhawk GHAD's information systems conducted in 2012 and again in 2015, the GHAD has modernized its IT systems and security. Additionally, the GHAD website www.blackhawkghad.com has continued to provide a mechanism to disseminate information to our constituents.

It is anticipated that work will continue on enhancements to the GHAD GIS during this term. Work will include, incorporating access features to data and graphic representations and improving the performance and usability of the site.

Estimated Cost $16,500

Accounting System Upgrade

Periodic upgrades are necessary to enhance accounting system capabilities. The Blackhawk GHAD utilizes expense accounting software to assist in reporting and the day to day operation of the District. Continued accounting systems enhancements will be implemented allowing more data entry streamlining, enhanced reporting, and quality control assurance procedures, augmenting the current systems.

Estimated Cost $2,000

Procedures Manual

The Blackhawk GHAD continually upgrades procedures and modifies plans to incorporate new technologies that assist the GHAD in delivering the highest level of services. Procedures require certain modifications and enhancements as new methodologies are introduced and incorporated into the GHAD Standard Operation Procedures. Certain financial and operations procedures have been institutionalized within the program. Additional procedures will be incorporated to further define and standardize the following areas:

- Preventive Maintenance/Operations
- Communications
- Administrative Procedures

Estimated Cost $5,000

Communications Plan

The Blackhawk GHAD maintains a communications plan designed to keep constituents up to date on GHAD operations and developments. The plan addresses several venues and mediums in which to disseminate information within this district, and to other concerned parties, and to establish clear and accessible channels for community interaction. The GHAD has now implemented a web page for public information and a multi-page informational brochure has been completed and distributed to interested Homeowner Associations (HOA) that describes the GHAD and its responsibilities and limitations. Additionally, the General Manager writes periodic articles for the HOA newsletter.

Estimated Cost $5,000

Outreach/Legislative Review
California Association of GHADs (CAGHADs) Membership/Insurance

The proliferation of new GHADs within California has resulted in new legislation and adopted procedures. The Blackhawk GHAD Manager, in association with others, shares information and knowledge through a consortium of GHAD managers known as the California Association of GHADs (CAGHADs). The CAGHAD has recently obtained General Liability policies for its member GHADs. Policy premium costs for the Blackhawk GHAD are approximately $3,500[2]. Additionally, the GHAD manager participates in the CAGHADs as the organization pursues other financial instruments that may provide the Blackhawk GHAD additional options for extraordinary event financial planning.

Estimated Cost $6,000

Administration

The administration of the Blackhawk GHAD includes all costs associated with legal support, office expenses, staffing, and accounting. Brief descriptions are presented below.

[2] Nominal increases in unit costs are expected in 2016

Legal

General Counsel – Blackhawk GHAD management must interact regularly with GHAD Counsel. The day-to-day operations of the GHAD present myriad opportunities and issues to work directly with GHAD counsel, in the areas of contracts, agreements, issues or new business to present to the Board, legislation, property owner issues, etc.

Estimated Cost $50,000

Special Counsel – Blackhawk GHAD management requires the services of special counsel from time to time in the areas of litigation and other legal concerns. Currently special legal counsel is representing the GHAD in a claim involving the Silver Oak Townhomes Development.

Estimated Cost $85,000

Staffing/Administrative Support

The Blackhawk GHAD staff includes the General Manager, a Construction Services Manager, an Administration Manager and frequently other support staff and consulting professionals. The General Manager administers all GHAD day-to-day operations, including financial budgeting and communications regarding its activities. The Construction Services Manager, among other tasks, administers the Major Projects and Preventive Maintenance Programs and associated work schedules, consulting and construction contracts, and documents. The administrative staff is responsible for accounting/bookkeeping, contract administration, clerical, and construction management support. Additional management staff costs are also applied to specific projects as appropriate. Authorized business expenses such as rent, office supplies and leases are included in Staffing.

Estimated Cost $159,000