STATE OF HAWAII
DEPARTMENT OF ACCOUNTING AND GENERAL SERVICES
ANNUAL REPORT ON
THE ENHANCED 9-1-1 BOARD
FOR THE PERIOD OF
JULY 1, 2014 THROUGH JUNE 30, 2015

SUBMITTED TO
THE TWENTY-EIGHT LEGISLATURE
IN RESPONSE TO SECTION 138-6, HAWAII REVISED STATUTES
Pursuant to Section 138-6, HRS, the Enhanced 9-1-1 Board (the Board) is required to submit an annual report to the legislature no later than twenty days prior to convening of each regular session. The Enhanced 9-1-1 Fund is comprised of monthly surcharges imposed on every commercial mobile radio and VoIP service connection. For the purposes of this report, the Enhanced 9-1-1 Fund will be referred to as “the Fund”, the Public Safety Answering Points as “PSAPs”, the Wireless connection service providers as “WSPs”, and the Voice over Internet Protocol connection service providers as “VoIPs”.
Table of Contents

I. Executive Summary .............................................................................................................................. 1
II. The total aggregate surcharge collected by the Fund in FY 2015 .......................................................... 2
III. The amount and recipient of the disbursements from the Fund in FY2015. .......................................... 3
IV. Projects for which the money was disbursed in FY2015. .................................................................. 4
V. Project Descriptions .............................................................................................................................. 5
VI. The conditions, if any, placed by the Board on disbursements from the Fund. ................................. 9
VII. The planned expenditures from the Fund for FY2016. .................................................................. 10
VIII. The planned recipients of disbursements from the E9-1-1 Fund in FY2016. ................................. 11
IX. The amount of any unexpended funds carried forward for FY2016. ............................................... 12
X. A cost study to guide the legislature towards necessary adjustments to the fund and the monthly surcharge. .......................................................................................................................... 12
XI. A status report of jurisdictional capabilities for enhanced 9-1-1 services, including public safety answering points and communications service providers. .................................................. 13
XII. FY2015 Independent Audit Report Summary .................................................................................. 14
I. Executive Summary

Act 168/SLH 2011 (the Act) created an Enhanced 9-1-1 Board (the Board) on June 27, 2011 which is administratively attached to Department of Accounting and General Services (DAGS). The Enhanced 9-1-1 Board supersedes the Wireless Enhanced 9-1-1 Board created by Act 159/SLH 2004.

The purpose of the Enhanced 9-1-1 Board is to manage, administer, provide technical expertise and perform fiscal duties necessary for the collection of 9-1-1 surcharge tax revenue. The Board manages distribution of the Fund in accordance with the law to the eight primary and three secondary county public safety answering points in Hawaii and the wireless carriers providing service to the public. The Enhanced 9-1-1 Fund is established outside the state treasury as a special fund.

The Enhanced 9-1-1 Board is comprised of thirteen members appointed by the Governor. The members of the Board represent each county PSAP, three wireless service providers, one VoIP representative, Hawaiian Telcom, City & County of Honolulu and two permanent seats consisting of the State Department of Consumer Affairs and the State Chief Information Officer. The current board members are:

- Paul Ferreira, Deputy Chief, Hawaii County Police Department, Board Chair.
- Roy Irei, General Manager T-Mobile, Board Vice-Chair.
- John Jakubczak, Assistant Chief, Molokai.
- Kiman Wong, Director, Oceanic Time Warner, Finance Committee Chair.
- Mark Begley, Kauai County.
- Ryan Freitas, Director Network Reliability, Hawaii Telcom.
- Mark Wong, City & County of Honolulu, Chief Information Officer.
- Thalia Burns, Honolulu Police Department, Technical Committee Chair.
- Steven Schutte, Government Account Executive, Verizon Wireless, Communications Committee Chair.
- Jeffrey Ono, Director, State of Hawaii, Department of Consumer Affairs.
- Todd Nacapuy, State of Hawaii, Chief Information Officer.
- Jeffrey Riewer, Hawaii Lead Engineer Network Sales Support, AT&T.
- Dean Rickard, Deputy Chief, Maui County PSAP.
II. The total aggregate surcharge collected by the Fund in FY 2015.

**FY2015 Revenues Collected - $9,303,340**

- **Wireless**
  - $8,409,547
  - 90.39%

- **VoIP**
  - $892,587
  - 9.59%

- **Interest**
  - $1,206
  - 0.01%
III. The amount and recipient of the disbursements from the Fund in FY2015.
IV. Projects for which the money was disbursed in FY2015.

**FY2015 Projects - $8,799,280**

- **Maintenance** $3,325,301 36%
- **CAD Upgrade/Replacement** $2,313,472 25%
- **Communications** $1,817,920 19%
- **Computer Equip** $383,400 4%
- **DB&F Assessments** $611,829 .6%
- **Exec. Dir. & Staff** $387,467 4%
- **WSP Cost Recovery** $76,026 1%
- **Other Board Expenses** $(266,270) -2.85%
- **Conferences & Training** $150,137 2%
V. Project Descriptions
<table>
<thead>
<tr>
<th>Item</th>
<th>Amount</th>
<th>Description of Disbursements</th>
<th>Recipient</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Computer Hardware and Software</strong></td>
<td><strong>$ 2,696,871</strong></td>
<td>Hawaii, Kauai and Honolulu Counties are undergoing modernization of its CAD systems for its PSAP to continue to provide first responders with the services necessary to assist in the rescue of its endangered citizens and visitors.</td>
<td>Hawaii PSAP, Kauai, PSAP and Oahu PSAP</td>
</tr>
<tr>
<td><strong>Maintenance</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Program Mgt Consulting Services</td>
<td><strong>$ 1,244,094</strong></td>
<td>Akimeka, LLC provides continued Enhanced 911 Program Management Services and Geographic Information Systems Services for the counties of Hawaii, Maui, Honolulu and Kauai. The services rendered include: 1. Program mgmt support. 2. PSAP Day-to-Day Operational support. 3. Geographic Information System (GIS) services. 4. Master Street Address Guide (MSAG) services. 5. Database synchronization. Benefits include: 1. Up-to-date location information on emergency calls received by the respective dispatch center. 2. Current GIS information. 3. Coordination for implementation and testing of new additions to the network with wireline, wireless, VoIP and Telemetric service providers. 4. Dealing with only one company with which to coordinate activities and issues.</td>
<td>Hawaii, Maui, Kauai and Oahu PSAPs</td>
</tr>
<tr>
<td>Logging Recorder</td>
<td><strong>$ 60,775</strong></td>
<td>Logging recorders seamlessly retrieve audio and data from radio and telephony communications recreating communications around an incident just as it happens.</td>
<td>Oahu PSAP</td>
</tr>
<tr>
<td>Imagery DataBase</td>
<td><strong>$ 1,621,322</strong></td>
<td>Pictometry software is a powerful tool for the first responder which provides detailed imagery of every square foot of a region and can navigate quickly and easily between views of a map to images associated with its specific features contained within images such as doors, manholes, fences, and fire hydrants. With this capability, first responders may be directed to the emergency in the most direct route and in the case of high rise buildings, the software will acknowledge any obstacles that may impede a rapid response.</td>
<td>Kauai, Hawaii, Maui and Oahu PSAPs</td>
</tr>
<tr>
<td>Computer Hardware and Software Maintenance</td>
<td><strong>$ 399,110</strong></td>
<td>Maintenance support from vendors is essential to keeping hardware and software running efficiently and providing immediate troubleshooting support.</td>
<td>Hawaii, Maui, Kauai and Oahu PSAPs</td>
</tr>
<tr>
<td></td>
<td><strong>$ 3,325,301</strong></td>
<td>Subtotal Maintenance</td>
<td></td>
</tr>
</tbody>
</table>
### FY2015 Annual Report on the E9-1-1 Board

<table>
<thead>
<tr>
<th>Item</th>
<th>Amount</th>
<th>Communications</th>
<th>Recipient</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Telecom Service Connections</strong></td>
<td>$1,817,920</td>
<td>Hawaiian Telcom tariff, network and equipment costs necessary to receive Enhanced 911 calls by the PSAPs</td>
<td>Hawaii, Maui, Kauai and Oahu PSAPs</td>
</tr>
<tr>
<td><strong>EMS Tower Lease</strong></td>
<td>$(3,770)</td>
<td>EMS tower lease and network connection between EMS facility at the airport to the City's data center at the PASI Municipal Building to connect the EMS PSAP with other Oahu PSAPs in the sharing of data and information.</td>
<td>Oahu PSAP</td>
</tr>
<tr>
<td><strong>Conferences &amp; Training</strong></td>
<td>$1,814,150</td>
<td>Conferences &amp; Training provide the PSAPs with an effective opportunity to stay abreast of national standardization efforts and training in regards to day-to-day operational 9-1-1 issues impacting their PSAPs, specifically in regards to new and emerging technologies. In addition, it provides networking opportunities with subject matter experts and fellow PSAPs in the US and worldwide.</td>
<td>Hawaii, Maui, Molokai, Kauai, and Oahu PSAPs</td>
</tr>
</tbody>
</table>

**Subtotal Communications**

**Subtotal PSAP Expenses**

$7,959,877
<table>
<thead>
<tr>
<th>Item</th>
<th>Amount</th>
<th>Description</th>
<th>Recipient</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Revenue Assessment</strong></td>
<td>$460,000</td>
<td>Dept. of Budget &amp; Finance Revenue Assessment: Authorized under §36-27, HRS.; 5% of total revenue.</td>
<td>State of Hawaii General Fund</td>
</tr>
<tr>
<td><strong>Administrative Assessment</strong></td>
<td>$151,829</td>
<td>Dept. of Budget &amp; Finance Administrative Assessment: Authorized under §36-30, HRS; 1.95% of total E911 Fund disbursements.</td>
<td>State of Hawaii General Fund</td>
</tr>
<tr>
<td><strong>Dept. of Budget &amp; Finance Assessments</strong></td>
<td>$611,829</td>
<td>Subtotal DB&amp;F Assessments</td>
<td></td>
</tr>
<tr>
<td><strong>WSP Cost Recovery</strong></td>
<td>$76,025</td>
<td>WSP Cost Recovery: Authorized under §138-5 HRS, requires that 1/3rd of the net proceeds of the WSP surcharge revenue (after Board administrative expenses) are to be set aside for potential cost recovery claims by the WSPs and VoIPs.</td>
<td>Sprint</td>
</tr>
<tr>
<td><strong>Board &amp; Committee Member Travel Expenses</strong></td>
<td>$25,483</td>
<td>Board &amp; Committee Member Travel Expenses (interisland) for required attendance of neighbor island PSAPs at the Board and sub Committee meetings held in Honolulu.</td>
<td>Hawaii, Maui, Molokai, Kauai PSAPs</td>
</tr>
<tr>
<td><strong>Reimbursement from Oahu PSAP</strong></td>
<td>(302,238)$</td>
<td>Reimbursement from Oahu PSAP for prior period reimbursement requests made but not expended were returned to the E911 Fund.</td>
<td>E911 Fund</td>
</tr>
<tr>
<td><strong>Independent CPA Audit services</strong></td>
<td>$13,025</td>
<td>Independent CPA Audit services to perform an annual audit in accordance with generally acceptable accounting principles (GAAP).</td>
<td>EGAMI &amp; ICHIKAWA, CPAs, Inc.</td>
</tr>
<tr>
<td><strong>Office supplies for Executive Director and Staff</strong></td>
<td>$548</td>
<td>Office supplies for Executive Director and Staff.</td>
<td>Misc. Office Supply Vendors</td>
</tr>
<tr>
<td><strong>New &amp; Emerging Technologies Conference expenses necessary to keep administrative personnel abreast of current and future issues regarding public safety and administration.</strong></td>
<td>$26,583</td>
<td>New &amp; Emerging Technologies Conference expenses necessary to keep administrative personnel abreast of current and future issues regarding public safety and administration.</td>
<td>NENA, APCO, NASNA</td>
</tr>
<tr>
<td><strong>Parking permits for Board and Committee members to attend meetings at State buildings.</strong></td>
<td>$400</td>
<td>Parking permits for Board and Committee members to attend meetings at State buildings.</td>
<td>Automotive Div., State of Hawaii</td>
</tr>
<tr>
<td><strong>Electronic Signature Software to allow Board authorized signatories to approve disbursements or other documents remotely.</strong></td>
<td>$240</td>
<td>Electronic Signature Software to allow Board authorized signatories to approve disbursements or other documents remotely.</td>
<td>Docsign</td>
</tr>
<tr>
<td><strong>E911 Fund Bank Charges for additional services.</strong></td>
<td>$42</td>
<td>E911 Fund Bank Charges for additional services.</td>
<td>First Hawaiian Bank</td>
</tr>
<tr>
<td><strong>Subtotal Board Administrative Expenses</strong></td>
<td>$839,403</td>
<td>Subtotal Board Administrative Expenses</td>
<td></td>
</tr>
<tr>
<td><strong>Total Disbursements</strong></td>
<td>$8,799,280</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
VI. The conditions, if any, placed by the Board on disbursements from the Fund.

The Board has implemented policies and procedures for the PSAPs, WSPs, VoIPs, and approved vendors seeking reimbursement from the Fund. The Board requires the following for disbursements:

1. Be permitted under Hawaii State statute.
2. Have sufficient funds available for disbursement.
3. Be reviewed and approved by the Technical and/or Finance Committee(s), subject to final approval by the Board.
4. Final approval by the E9-1-1 Board.
5. Approval for payment by the Board Chair, Finance Committee Chair and Executive Director. Signed approval from two of the three individuals mentioned.
6. A valid invoice or receipt of payment approved by the appropriate PSAP authorized official(s).
7. The disbursement check must be signed by two Board approved signatories.
8. All disbursements are subject to audit.
VII. The planned expenditures from the Fund for FY2016.

**FY2016 Planned Expenditures - $8,704,163**

- **Computer Equip** $2,719,400 31%
- **Communications** $2,146,289 25%
- **Maintenance** $2,474,524 28%
- **DB&F Assessments** $617,625 7%
- **Exec. Dir. & Staff** $198,000 2%
- **WSP Cost Recovery** $70,000 1%
- **Conferences & Training** $252,650 3%
- **Other Board Expenses** $218,075 2.51%
- **Lease** $7,600 0%
VIII. The planned recipients of disbursements from the E9-1-1 Fund in FY2016.

FY2016 Planned Recipients of Disbursements $8,704,163

- **Kauai County** $3,072,729 (35%)
- **City & County of Honolulu** $2,593,829 (30%)
- **Maui County** $1,022,708 (12%)
- Hawaii County $692,547 (8%)
- Committee & Board Members, meeting travel $25,000 (0%)
- Board Expenses $266,725 (3%)
- Board Expansion Exp. $145,000 (2%)
- Sprint, WSP Cost Recovery $70,000 (1%)
- **DB&F Assessments** $617,625 (7%)
- **Executive Director & Staff** $198,000 (2%)
IX. The amount of any unexpended funds carried forward for FY2016.

<table>
<thead>
<tr>
<th>Cash Flow:</th>
<th>FY2015 Actuals</th>
</tr>
</thead>
<tbody>
<tr>
<td>Beginning Cash</td>
<td>$ 12,504,198</td>
</tr>
<tr>
<td>Cash Receipts</td>
<td>9,303,339</td>
</tr>
<tr>
<td>Cash Disbursements</td>
<td>(5,018,321)</td>
</tr>
<tr>
<td>Ending Cash</td>
<td>16,789,216</td>
</tr>
<tr>
<td>Total Encumbrances Outstanding</td>
<td>(7,222,649)</td>
</tr>
<tr>
<td>Total Unencumbered Cash</td>
<td>$ 9,566,567</td>
</tr>
</tbody>
</table>

The total amount of unexpended E9-1-1 Funds carried forward for FY2016 was $16,789,216. However, unexpired encumbrances at the end of FY2015 amounted to $7,222,649 which reduced the unencumbered cash amount to be carried forward to FY2016 to $9,566,567.

X. A cost study to guide the legislature towards necessary adjustments to the fund and the monthly surcharge.

A majority of the E9-1-1 strategic budget plan funding is necessary to modernize the current voice-based 9-1-1 systems’ aging equipment and software in order to meet or exceed the PSAP public safety goals and the
continuing training needs of the PSAPs to keep abreast of technological changes.

The State of Hawaii is part of the national movement to transition to Next Generation 9-1-1 (NG9-1-1) system to significantly improve emergency response, saving lives and reducing property damage. NG9-1-1 enables the public to send texts, photos, videos, and other data to 9-1-1 centers just as the public is able to communicate with each other today. Consequently the Board has chosen to conserve cash in anticipation of this cash outflow as a result of the transition to NG9-1-1. Due to the uncertainty associated with the transition to this new emergency response system and the increased revenue collections due to the enactment of Act 168(11), we continue to recommend the existing rate remain at the current level for the fiscal year.

XI. A status report of jurisdictional capabilities for enhanced 9-1-1 services, including public safety answering points and communications service providers.

All requirements of FCC Order 94-102 have been met by the Public Safety Answering Point (PSAPs), Wireless Service Providers (WSPs) and the Local Exchange Carrier (LEC). The State of Hawaii is currently Phase II capable throughout the state and each PSAP has the capability to make useful the data elements being transmitted by the WSPs and delivered by the LEC. All WSPs (AT&T, Mobi-PCS, Sprint, T-Mobile, and Verizon) are providing Phase II services in all counties and jurisdictions and are only limited by coverage, RF interference, and terrain anomalies. The WSPs continue to expand their existing networks by adding additional sites in each of the jurisdictions at a steady pace. Some of the WSPs have tripled the number of communications sites and sectors on the Neighbor Islands within the State of Hawaii since the original deployment of the Phase II service. Advancements in technology in the wireless industry have also placed demands on the PSAPs by WSPs deploying new and improved networks that support broadband capabilities such as the wireless 3G, 4G, and LTE Wireless technology networks deployed by most of the WSPs.

The State of Hawaii Wireless 9-1-1 service has graduated from a wireless Phase II maintenance phase to Wireless Phase II expansion and New Wireless Technology implementation phase. This wireless expansion phase has opened the door for the PSAPs to start receiving New and Emerging Technology 9-1-1
services such as Voice over Internet Protocol (VoIP) and Telemetric emergency services. These new 9-1-1 services are already being delivered to one of the PSAPs and introduced to others within the State. The PSAPs have responded in an expeditious manner to keep pace with the demands for keeping pace with the New Technologies. As such, the primary activities being undertaken by the PSAPs have been concentrated on bringing all their 9-1-1 databases into i3 compliancy for the New Next Generation 9-1-1 service implementation. The PSAPs must perform these database synchronizations and GIS improvements in order to improve location accuracy and to improve the dispatch of 9-1-1 resources efficiently and effectively.

The Wireless E9-1-1 Board is now the Enhanced 9-1-1 Board with the passage of HB 1000 and the Governor signing Act 168 (11) into law June 27, 2011. This established a single entity to administer enhanced 9-1-1 services for the State along with expanding board membership. The broadening of scope for the Enhanced 9-1-1 Board’s responsibilities provides the leadership to improve and modernize the current 9-1-1 system improving emergency response, saving lives and reducing property damage. The E9-1-1 Board has undertaken the responsibilities associated with the investigation and recommendations of preparing the State of Hawaii Strategic Plan for the migration of the State of Hawaii’s E9-1-1 resources into the futuristic New and Emerging Technology 9-1-1 services referred to as NG 9-1-1.

XII. FY2015 Independent Audit Report Summary.

The E9-1-1 Fund has completed the transition from cash basis accounting to generally acceptable accounting principles (GAAP) or accrual basis accounting. In addition, the Enhanced 9-1-1 Board elected to undergo an annual independent CPA audit rather than a biennial audit as required by §138-7(b), HRS.

The next audit report that will cover the period from July 1, 2014 through June 30, 2015 is scheduled for completion during the 1st quarter of FY 2016.

Current and past audit reports are posted on the E911 website (http://ags.hawaii.gov/hawaii-enhanced-9-1-1-board/).
Glossary of Terms

ALI – Automatic Location Identification
CAD- Computer Assisted Dispatch
CDMA-Code Division Multiple Access
GIS-Geographic Information Systems
GSM-Global System for Mobile
iDEN-Integrated Digital Enhanced Network
LEC-Local Exchange Carrier
NG9-1-1-Next Generation 9-1-1
PSAP-Public Safety Answering Point
VoIP-Voice over Internet Protocol
WBB-Wireless Broadband
WSP-Wireless Connection Service Provider
VoIP – Voice over Internet Protocol Connection Service Provider
I have reviewed and approved the FY 2015 Annual Report on the Enhanced 9-1-1 Board for the period of July 1, 2014 to June 30, 2015:

___________________________________________
Paul Ferreira, Chair, E9-1-1 Board

___________________________________________
Kiman Wong, Chair, E9-1-1 Finance Committee

___________________________________________
Courtney Tagupa, Executive Director, E9-1-1 Board