



JIM JONES  
Director

# County of Los Angeles INTERNAL SERVICES DEPARTMENT

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*"To enrich lives through effective and caring service"*

March 4, 2014

## ADOPTED

BOARD OF SUPERVISORS  
COUNTY OF LOS ANGELES

14 March 4, 2014

*Sachi A. Hamai*  
SACHI A. HAMAI  
EXECUTIVE OFFICER

The Honorable Board of Supervisors  
County of Los Angeles  
383 Kenneth Hahn Hall of Administration  
500 West Temple Street  
Los Angeles, CA 90012

Dear Supervisors:

**REQUEST FOR DELEGATED AUTHORITY TO ENTER INTO AGREEMENT  
WITH HARRIS CORPORATION TO UPGRADE THE COUNTYWIDE  
INTEGRATED RADIO SYSTEM (CWIRS) AND TO APPROVE AN  
APPROPRIATION ADJUSTMENT TO ACCEPT NEW GRANT REVENUE  
(ALL DISTRICTS – 4 VOTES)**

### **SUBJECT**

The Internal Services Department (ISD) seeks delegated authority to enter into an agreement with Harris Corporation (Harris) to further upgrade the Countywide Integrated Radio System (CWIRS) to a Project 25 Phase 2 mobile radio standard (P25-Phase 2), using approximately \$1.4 million in available and repurposed Urban Area Security Initiative (UASI) 2010 grant funds, at no cost to the County. ISD also seeks approval of an Appropriation Adjustment to recognize the grant funding.

If your Board authorizes the foregoing, the CEO will exercise its delegated authority to amend the UASI 2010 Subrecipient Agreement with the City of Los Angeles and accept the pass-through of grant funds.

### **IT IS RECOMMENDED THAT YOUR BOARD:**

1. Authorize the Director of ISD to approve and execute the 800MHz System Upgrade Agreement with Harris (the Upgrade Agreement), in a form substantially similar to Attachment 1, to upgrade the CWIRS to a Project 25-Phase 2 radio standard.
2. Authorize the Director of ISD or his designee to exercise change orders under, or execute amendment to, the Upgrade Agreement, as needed, as long as none result in an increase in the maximum contract sum.
3. Approve the Appropriation Adjustment (Attachment 2) in the amount of \$1,373,000 to increase the Services and Supplies appropriation and revenue budget for ISD to reflect the acceptance of the pass-through UASI grant funds

## **PURPOSE/JUSTIFICATION OF RECOMMENDED ACTION**

### **Background**

On May 14, 2013, your Board approved the *800 MHz System Rebanding Agreement* with Harris, under which Harris is currently providing radio reconfiguration services to move CWIRS to new radio frequencies using the nationwide Project 25-Phase 1 radio standard (P25-Phase 1) at no cost to the County (the "Rebanding Agreement").

CWIRS is a countywide radio system used for mobile communications by a number of departments, including Health Services, Public Works, Probation, Animal Care & Control, and ISD. In addition to serving the day-to-day operations of its user departments, CWIRS is the County's primary disaster recovery mobile communications system for major emergency incidents.

About fifteen years ago, public agencies using the 800 MHz radio band frequency started to experience radio interference caused by adjacent frequency use by Nextel Communications, Inc. (now Sprint). To eliminate this interference and allocate frequencies for more efficient use, the FCC issued orders in 2004 requiring all 800 MHz licensees, including the County, to move to new frequencies. The FCC also ordered Sprint to provide funding to all licensees for such reconfiguration.

The Rebanding Agreement includes a Frequency Reconfiguration Agreement with Sprint, which provides \$20 million, as well as certain radio equipment and infrastructure hardware, to replace and upgrade CWIRS as part of the FCC's frequency re-banding mandate.

### **The Proposed Upgrade Agreement**

The Rebanding Agreement, which is currently being performed, is upgrading CWIRS to the state-of-the-art P25-Phase 1 radio standard. Unfortunately, further upgrading CWIRS to the P25-Phase 2 standard does not qualify for funding under the FCC rebanding program, and therefore could not have been part of the County's no-cost Rebanding Agreement.

However, recently, approximately \$1.4 million in Urban Area Security Initiation (UASI) 2010 grant funds from the U.S. Department of Homeland Security became available for ISD to use for the Upgrade Agreement. (Attachment 3)

The proposed upgrade to P25-Phase 2 would enhance CWIRS compatibility and interoperability with existing and future state-of-the-art public safety/service communication systems, including the planned Los Angeles Regional Interoperable Communications System (LA-RICS), as well as systems now being used by the City of Los Angeles and the Port of Los Angeles. Also, the upgrade to P25-Phase 2 would allow CWIRS to make more efficient use of its available bandwidth. This efficiency is important due to the increasing demand for bandwidth industry-wide.

CWIRS' limited resource of 47 frequencies is sufficient to accommodate its current user base under regular operating conditions. But our statistical analysis concludes that CWIRS may not be able to handle peak radio traffic demands during disaster/emergency scenarios, even with optimization of the system architecture and upgrade to P25-Phase 1 under the Rebanding Agreement. This potential for traffic congestion would be exacerbated and compounded if CWIRS were to interoperate with LA-RICS or the City of Los Angeles radio network.

Fortunately, CWIRS is readily upgradeable to a more advanced level of the Association of Public-Safety Communications Officials-International (APCO) P25 standard, known as Phase 2. Upgrading CWIRS to Phase 2 will allow for two simultaneous conversations to take place on the same radio frequency, effectively doubling its total number of radio channels, or "talkpaths," and thereby mitigating the risk of communication channel congestion during peak operating hours, and especially during local and widespread emergencies and disasters.

Upgrading to P25-Phase 2 under the proposed Upgrade Agreement will:

- Enhance CWIRS' disaster preparedness for County users.
- Support interoperability with other regional services, including first and second responders, by providing the capacity to handle increased demand during emergencies.
- Allow LA-RICS users, whose radios will be Phase 2 capable, to migrate in and out of CWIRS without being concerned about CWIRS access or capacity issues.
- "Future proofing" CWIRS so that the County may add more subscribers for regular business use.
- Maximize use of CWIRS's limited frequency resource, avoiding the future need to acquire more frequencies, which, even if they were available, would require the purchase of more radio infrastructure (estimated \$4m to \$6m) as well as the allocation/cost of additional hilltop radio facility space and network circuits.

### **IMPLEMENTATION OF STRATEGIC PLAN GOALS**

The recommended contracts support County Strategic Plan Goals Number 1 for Operational Effectiveness, by providing timely delivery of customer oriented and efficient public services, and Goal Number 2 for Fiscal Sustainability, as the County will be able to upgrade its aged CWIRS radio system to current P25 standards without contributing general fund monies.

### **FISCAL IMPACT/FINANCING**

The maximum contract sum of the proposed Upgrade Agreement is \$1,372,342.50, and would be fully subvented by UASI 2010 grant funds. There is no net County cost.

On September 13, 2011, your Board approved and entered in the UASI 2010 Subrecipient Agreement with the City of Los Angeles and accepted certain UASI (Urban Area Security

Initiation) grant funds from the U.S. Department of Homeland Security. As part of that Board action, delegated authority was given to the CEO to manage and administer the grant funds for the County, including the delegated authority to enter into amendments to the subrecipient agreement.

On December 19, 2013, additional UASI 2010 grant funds became available and have been reallocated for ISD to use for the Upgrade Agreement. (Attachment 2) The Upgrade Agreement would allow ISD to spend these grant funds until their final expiration on March 31, 2014.

If your Board authorizes ISD to approve and execute the Upgrade Agreement, then the CEO would exercise its delegated authority to enter into Amendment Two to the UASI 2010 Subrecipient Agreement, and thereby accept additional grant funds. (Attachment 3)

The acceptance of the additional grant funds requires your Board to approve an Appropriation Adjustment to increase ISD's revenue and Services and Supplies appropriation to recognize the new revenue in the current fiscal year budget and to provide spending authority for the project.

#### **FACTS AND PROVISIONS/LEGAL REQUIREMENTS**

The proposed Upgrade Agreement is largely based upon the current Rebanding Agreement, which was previously approved by your Board on May 13, 2013, and incorporates the Rebanding Agreement by reference. Both agreements are based upon standard agreement forms developed by Sprint and Harris, which are approved by the FCC and unique to the rebanding program. Accordingly, standard County program clauses are not applicable

The County has retained the law firm of Schulman, Rogers, Gandal, Pordy & Ecker, P.A. as outside telecommunications counsel for the Rebanding Agreement. To ensure consistency and adequate legal protections between the current Rebanding Agreement and the proposed Upgrade Agreement, this outside counsel was involved in drafting and advised during negotiation of the Upgrade Agreement.

The proposed Upgrade Agreement has been approved as to form by County Counsel.

#### **ENVIRONMENTAL DOCUMENTATION**

The proposed upgrade is not a project pursuant to the California Environmental Quality Act (CEQA) because it is an activity excluded from the definition of a project by Section 15378(b) of the State CEQA Guidelines.

The proposed Upgrade Agreement is for a software upgrade, with only two small pieces of equipment (routers) to be purchased and installed for an adequate software platform, and accordingly will not result in potentially significant physical impact on the environment.

Further, this proposed software upgrade will be implemented concurrently with the Rebanding Agreement. On May 14, 2013, your Board found that the Rebanding Agreement project was categorically exempt from the provisions of the California Environmental Quality Act (CEQA).

The overall rebanding project under the Rebanding Agreement consists of, among other things, replacing radio system equipment at existing locations, and is within a class of projects that have been determined not to have a significant effect on the environment as it meets criteria set forth in Section 15302(c) of the State CEQA Guidelines and Class 2(e) of the County's Environmental Document Reporting procedures and Guidelines, Appendix G. The replacement equipment has the same purpose and capacity as the existing equipment, and is being located on the same sites. Further, there were no cumulative impacts, unusual circumstances, or other limiting factors that would make the exemption inapplicable based on the project records.

### **CONTRACTING PROCESS**

CWIRS was competitively procured by the County in 1993, and resulted in implementation of a radio system designed by Harris and manufactured by Ericsson GE, a predecessor to M/A-COM and ultimately Harris. CWIRS uses components, including software, that are proprietary to Harris. Replacement equipment and software upgrades for CWIRS must match and interoperate with the existing proprietary system components. They cannot be substituted without replacing the entire system, which would result in significant cost to the County.

In accordance with your Board's policy, on January 11, 2007, ISD notified the Board of ISD's intent to enter into sole source negotiations with M/A-COM (now Harris) for the Rebanding Agreement. Your Board approved that Rebanding Agreement on May 14, 2013.

Most recently, on January 16, 2014, ISD notified your Board of its intent to enter into sole source negotiations with Harris for the Upgrade Agreement. The proposed Upgrade Agreement, like the current Rebanding Agreement, can only be performed by Harris because of the proprietary nature of the software deliverables. Indeed, the proposed upgrade could be implemented by an amendment to the Rebanding Agreement, except that it is being funded by a separate source.

The Upgrade Agreement is exempt from Proposition A, as it is for software implementation and other ancillary services of an extraordinary professional, technical, and/or temporary nature (County Code 2.121.250(B)(3)), and therefore are not subject to the Living Wage Program (County Code 2.201).

### **IMPACT ON CURRENT SERVICES (OR PROJECTS)**

The implementation approach on the current Rebanding Agreement has allowed the County to maintain existing CWIRS radio functionality, and is designed to continue to do so until users are migrated to the P25 infrastructure. Upgrading from P25-Phase 1 (under the Rebanding Agreement) to a P25-Phase 2 implementation (under the proposed Upgrade Agreement) does not alter this approach.

All activity will be coordinated with departments to ensure that there is minimal or no impact on operations. There is no employee impact as a result of the Upgrade Agreement.

The Honorable Board of Supervisors  
March 4, 2014  
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**CONCLUSION**

Granting delegated authority to the Director of ISD to approve and execute the Upgrade Agreement (in a form substantially similar to Attachment I) would allow the County to upgrade its CWIRS radio system to a cutting-edge P25-Phase 2 nationwide standard. By using UASI 2010 grant funds, the Upgrade Agreement will be achieved with no net County cost. This upgrade will ensure the continued viability of CWIRS for countywide radio communications in future years, and will provide system compatibility and interoperability with other state-of-the-art public safety/service communication systems, including the planned LA-RICS.

The Executive Office, Board of Supervisors, is requested to return two stamped copies of the approved Board letter to the Director, ISD.

Respectfully submitted,

A handwritten signature in black ink that reads "Jim Jones". The signature is written in a cursive, flowing style.

JIM JONES  
Director

JJ:JLG:

Enclosures

c: Chief Executive Officer  
County Counsel  
Chief Information Officer

## **800 MHz SYSTEM UPGRADE AGREEMENT**

This 800 MHz System Upgrade Agreement (“Upgrade Agreement”) is made and entered into as of the Upgrade Agreement Effective Date by and between

the **COUNTY OF LOS ANGELES, CALIFORNIA**, a political subdivision of the State of California with a business address of 500 W. Temple St., Los Angeles, CA 90012 (the “County” or “Licensee”) and

**HARRIS CORPORATION, RF COMMUNICATIONS DIVISION**, a Delaware corporation with a business address of 221 Jefferson Ridge Parkway Lynchburg, VA 24501 (“Harris” or “Licensor”),

based upon the following recitals:

R1. On May 14, 2013, the County and Nextel West Corp., a wholly indirect subsidiary of Sprint Nextel Corp, now known as Sprint Corporation (“Sprint”), entered into a Frequency Reconfiguration Agreement (the “Sprint FRA”) in compliance with certain orders, as amended (the “Orders”), issued by the Federal Communications Commission (“FCC”) mandating the reconfiguration of the 800 MHz band to minimize harmful interference to public safety radio communication systems in the band (the “Reconfiguration”).

R2. Pursuant to the Sprint FRA, Sprint is obligated to pay County, or on County’s behalf, an amount certain to effect the Reconfiguration of County’s affected frequency allocations (the “Reconfiguration Proceeds”).

R3. The Sprint FRA is an upgrade frequency reconfiguration agreement meaning that County will migrate from its existing EDACS system and operate the new replacement frequencies on a new P25 Phase 1 system.

R4. On May 14, 2013, County also entered into that certain 800 MHz System rebanding Agreement with Harris (the “Rebanding Agreement”) to effectuate and implement County’s migration and transition to the new P25 Phase 1 system. Pursuant to the Sprint FRA, Sprint is obligated to pay directly to Harris, on behalf of County, (subject to the terms of payment set forth in the Rebanding Agreement), a portion of the Reconfiguration Proceeds in the amount of \$17,300,000.00 for the reconfiguration services to be performed by Harris to migrate County to the new P25 Phase 1 system, as more specifically described in the Rebanding Agreement and the attachments thereto.

R5. The FCC has appointed a Transition Administrator (the “TA”) to ensure that the rebanding initiative proceeds on schedule and in a planned and coordinated manner so that disruption is minimized. The Rebanding Agreement and the Sprint FRA were made pursuant to certain policies and procedures required by the TA and pursuant to its authority under the Orders.

R6. County desires to further engage the services of Harris to further enhance and upgrade its P25 system as more specifically described herein and the attachments hereto (the “P25 Phase 2”)

and to have Harris perform such additional services contemporaneously with and parallel to the services under the Rebanding Agreement.

**NOW, THEREFORE**, for good and valuable consideration, the sufficiency of which is acknowledged by the Parties hereto, and the mutual promises and agreements contained herein, the Parties mutually agree as follows:

## **1. DEFINITIONS**

The terms and phrases in this Section 1, in quotes and with initial letter(s) capitalized, shall have the meanings set forth herein below whenever and wherever used in this Upgrade Agreement. When terms or phrases are defined within other Sections of this Base Document, this Section 1 provides a cross-reference to such Sections. Singular nouns and phrases are construed to include the plural, and vice versa.

**1.1** “Base Document” means this document entitled *800 MHz Upgrade Agreement*, exclusive of the Attachments listed in *Section 2 – Incorporated Documents*.

**1.2** “Documentation” means any and all written or electronic materials provided or made available by Harris under this Agreement regarding the capabilities, operation, installation, and use of the New System or Upgraded System.

**1.3** “Funding Source” means UASI (Urban Area Security Initiation) 2010 grant funds from the U.S. Department of Homeland Security.

**1.4** “Hardware” means Infrastructure Hardware (as defined in 1.5, herein) and Terminal Hardware (as defined in Section 1.23 in the Rebanding Agreement).

**1.5** “Infrastructure Hardware” means certain fixed equipment, goods and materials for the New System Infrastructure which is P25, compliant with Phase 1, and capable of upgrade to Phase 2, that will be provided under the FRA, and for the Upgraded System is P25, compliant with Phase 2.

**1.6** “Licensed Programs” shall mean the wireless communications computer programs in software or firmware supplied under this Upgrade Agreement by Licensor in binary form to the Licensee (stand alone or in conjunction with the purchase of a Licensor wireless communications system) and as identified in Phase 2 SOW. Licensed Programs shall also include all other material and Documentation related to the Licensed Programs supplied by Licensor to Licensee hereunder, and which may be in machine readable or printed form, including but not limited to user documentation and/or manuals. “Binary form” shall mean the executable version of the Licensed Programs.

**1.7** “Maximum Upgrade Agreement Sum” has the meaning specified in Section 6.1 of *Section 6 – Maximum Agreement Sum*.

**1.8** “New System” means the system, resulting from Harris’ successful and full performance under the Rebanding Agreement, that is compliant with the Orders and P25 Phase 1.



- 1.9** “Orders” means the FCC rebanding orders referenced in recital R1.
- 1.10** “Party” refers to either Harris or the County, and “Parties” refers to them both.
- 1.11** “P25” means the standard developed in North America under federal, state, and local representative and Telecommunication Industry Association governance for the manufacturing of communication products. The P25 standards suite (TIA-102) is administered by the TIA Mobile and Personal Private Radio Standards Committee.
- 1.12** “P25 Phase 2” means the enhancements and services to the New System to be provided by Harris as more particularly set forth in the Phase 2 SOW and as referenced in R6.
- 1.13** “Reconfiguration Proceeds” means the fixed amount of funds referenced in recital R3 that are to be paid by Sprint under the FRA for the New System.
- 1.14** “Sprint FRA” means the Frequency Reconfiguration Agreement between the County and Sprint referenced in recital R2 and Section 2.2.1, and incorporated into the Rebanding Agreement as *Attachment A*.
- 1.15** “Phase 2 SOW” means *Attachment A – Statement of Work*, listed in Section 2.2.2.
- 1.16** “Third Party Software Products” shall mean software products included in the Licensed Programs specified in Attachment A – Phase 2 SOW which were licensed/purchased by Licensor from third parties.
- 1.17** “Upgrade Agreement” has the meaning specified in *Section 2 – Incorporated Documents*, and in particular, at Section 2.2.
- 1.18** “Upgrade Agreement Effective Date” means the earliest date upon which the County and Harris have both duly authorized executed this Upgrade Agreement.
- 1.19** “Upgraded System” means the New System, resulting from Harris’ successful and full performance under the Rebanding Agreement as well as this Upgrade Agreement, and that is compliant with the Orders and P25 Phase 2.
- 1.20** “Upgrade Work” means all tasks, subtasks, obligations, activities, or services to be performed by Harris under this Upgrade Agreement, including but not limited to those listed, identified, or described in the Phase 2 SOW.

## **2. INCORPORATED DOCUMENTS**

**2.1** Harris and the County acknowledge and agree that the Upgrade Work to be performed under this Upgrade Agreement shall be performed by Harris contemporaneously with the Rebanding Agreement, in accordance with all of the terms, conditions and provisions thereof and

per the interpretive priority of Section 2.2 below, and shall be completed by the Acceptance Date of March 31, 2014.

**2.2** This Base Document along with the Attachments listed below, collectively form and are referred to herein as the “Upgrade Agreement.” In the event of any conflict or inconsistency in the definition or interpretation of any word, responsibility, schedule, or the contents or description of any task, deliverable, goods, service, or other work, or otherwise between this Base Document and the Attachments, or between Attachments, such conflict or inconsistency shall be resolved by giving precedence first to this Base Document and then to the Attachments according to the following priority:

- 2.2.1 Attachment A** Phase 2 SOW [attached]
- 2.2.2 Attachment B** Phase 2 Itemized Costs [attached]
- 2.2.3 Attachment C** Rebanding Agreement [not attached]

### **3. SOFTWARE LICENSE**

#### **3.1 LICENSE GRANT FOR LICENSED PROGRAMS**

**3.1.1 License Grant.** Subject to the compliance by Licensee with the terms of this Section 3.1.1 through 3.1.4 of this Upgrade Agreement, Licensor hereby grants to Licensee, and Licensee hereby accepts from Licensor, (a) a personal, fully-paid, non-transferable, non-exclusive, perpetual license in North America to (a) use the Licensed Programs in binary form only and (b) install and execute such Licensed Programs on Licensee’s Hardware and (c) a fully-paid, personal, non-transferable, non-exclusive, perpetual sublicense in North America to use the Third Party Software Products on the Hardware and only as they are incorporated into the Licensed Programs, and not as a standalone product, in binary form only. This license does not transfer any title in the Licensed Programs. Third Party Software Products are to be used for the New System and Upgraded System purposes only, and not to be used for purposes of development or modifications. Licensee may not use Third Party Software Products for any sublicensing, timesharing, rental, facility management, or service bureau uses. Use of the Third Party Software Products, as incorporated into the Licensed Programs, shall be restricted to the number of CPU’s equal to the respective number of CPU Licenses purchased by Licensee, as indicated in the Rebanding Agreement.

**3.1.2 No Alteration.** With respect to the Licensed Programs, Licensee will not intentionally alter, deface, discard, or erase any media, documentation, or Licensor or Third Party Licensor’s trademarks or proprietary rights notices.

**3.1.3 No Modification.** Licensee will not reproduce, modify, or make derivative works of the Licensed Programs, except that Licensee may make archival, inactive backup, and/or disaster recovery copies of the Licensed Programs as is reasonably necessary. In addition, Licensee, its agents, consultants and/or its subcontractors will not attempt to reverse engineer, decompile, or reverse-compile any software contained in the Licensed Programs and any attempt to do so shall be a material breach of this Upgrade Agreement.

**3.1.4 Use Restrictions.** The Licensed Programs are for use on the New System and Upgraded System only.

**3.1.5 Additional License Terms.** Third Party Software Products may be subject to additional license terms, which, if applicable, are set out in Product Specific License Terms attached hereto as Attachment D to this Upgrade Agreement.

**3.1.6 Return Upon Termination.** If Licensee violates the terms of Sections 3.1.1 through 3.1.4 then Licensor, in addition to any other rights and remedies, is entitled to seek return of the Licensed Programs, including but not limited to any confidential material including all copies, partial copies, and/or modified copies (if any) of the Licensed Programs.

## **3.2 PROTECTION AND SECURITY OF LICENSED PROGRAMS**

Licensee acknowledges and agrees that the Licensed Programs and any materials and/or documentation related thereto, and any portion thereof, supplied by Licensor hereunder are proprietary and confidential to Licensor and are a valuable commercial asset of Licensor and its third party licensors. Licensee also acknowledges and agrees that Licensor and/or the third party licensors have and shall retain all proprietary rights in their respective portions of the Licensed Programs and any materials and/or documentation related thereto. Licensee (i) shall respect such proprietary rights, (ii) shall protect Licensor and any third party licensor's proprietary rights at least to the extent that it protects its own proprietary information, (iii) shall not use the Licensed Programs nor any materials or documentation related thereto except for the purposes for which they are being made available as set forth in the Rebanding Agreement and this Upgrade Agreement and (iv) shall not reproduce, print, disclose, or otherwise make said Licensed Programs or materials and/or documentation related thereto available to any third party, in whole or in part, in whatever form, except as permitted in the terms of this Upgrade Agreement.

## **3.4 WARRANTY**

**3.4.1 Licensor Warranty.** Seller warrants, for a period of ninety (90) calendar days commencing with the date of Licensee's acceptance of the New System under the Rebanding Agreement, that any Licensed Program furnished to Licensee under this Upgrade Agreement shall be capable of successfully operating on the Designated Equipment in accordance with the logic defined in the Operator's Manuals and Documentation when the New System and Upgraded System are supplied with correct input data. If within the warranty period any Licensed Program does not meet this warranty, Licensor will, at its option and free of charge to Licensee, either correct the defect or error in the Licensed Program, or make available to Licensee a substitute program acceptable to Licensee. The foregoing warranty is exclusive and in lieu of all other warranties whether written, oral, implied or statutory. No implied or statutory warranty of merchantability or fitness for a particular purpose shall apply. If there is any conflict between the terms of the Rebanding Agreement and this Upgrade Agreement as to the Licensed Programs, the terms of the Upgrade Agreement will prevail and govern.

**3.4.2 Third Party Licensed Programs Warranty.** Licensed Programs which have been developed or are owned by a third party licensor and which are sublicensed by Licensor to

Licensee hereunder shall be warranted to Licensee only to the extent that the licensor of such sublicensed programs warrants such sublicensed programs to Licensor.

**3.4.3 P25 Phase 2 Warranty.** Notwithstanding the foregoing, Harris warrants that the Upgraded System shall be fully P25 Phase 2 compliant and functional at final system acceptance and through the warranty period in Section 3.4.1, above. Harris shall replace third party software as is necessary to comply with this warranty at no additional cost to the County.

### **3.5 EXPORT REGULATIONS**

Licensee agrees to comply with all export and re-export restrictions and regulations imposed by the U.S. Government.

## **4. WORK TO BE PERFORMED**

Harris will perform the Upgrade Work set forth in the Phase 2 SOW.

## **5. PROJECT PLANNING**

**5.1 Project Managers.** The Parties will use the same project managers for this Upgrade Agreement as those designated in the Rebanding Agreement, unless either are changed per the process therein.

**5.2 Contractor Licenses.** Harris is responsible for obtaining all contractor licenses required for the performance of the Upgrade Work. Harris warrants that its personnel and subcontractors have the necessary experience, skills, and licenses to perform the Upgrade Work under this Upgrade Agreement.

**5.3 Schedule Continuity Warranty.** Harris warrants that it will integrate its performance under this Upgrade Agreement with its performance under the Rebanding Agreement to prevent any schedule delay on the Rebanding Agreement.

## **6. MAXIMUM UPGRADE AGREEMENT SUM**

**6.1** Subject to the terms and conditions of this Upgrade Agreement, the amount payable to Harris to provide a Phase 2 Upgrade to County is a fixed flat fee in the amount of One Million, Three Hundred Seventy-Two Thousand, Three Hundred Forty-Two Dollars and Fifty Cents (\$1,372,342.50) (the “Maximum Upgrade Agreement Sum”), all due and payable upon Harris’ successful completion of the Upgrade Work and County’s final acceptance under this Upgrade Agreement.

**6.2** Notwithstanding any provision to the contrary, whether expressly or by implication, and notwithstanding Upgrade System acceptance by the County, the Maximum Upgrade Agreement Sum shall not be paid by the County unless and until sufficient grant funds from the Funding Source are received by the County. The County shall use best efforts to effectuate receipt of sufficient UASI 2010 grant funds.

## **7. INVOICING AND PAYMENT**

### **7.1 Invoicing and Payment.**

Subject to the terms and conditions of this Agreement, Harris shall invoice the County for Upgrade Work performed under this Upgrade Agreement upon completion of the Upgrade Work and final acceptance of same by County.

### **7.2 Invoices.** In order to be paid, invoices must include the following information:

**7.2.1** Harris' name

**7.2.2** Harris' "remit to" address

**7.2.3** Harris' representative's name and contact information (for questions about the invoice)

**7.2.4** County's name

**7.2.5** County Contract Number

**7.2.6** A detailed list of goods and/or services or milestones for which Harris is requesting payment (broken out by line item) as well as the total sum

**7.2.7** Applicable sales tax

**7.2.8** Invoice date

**7.2.9** Invoice number

**7.3 Audit.** Harris, at its own cost and expense, shall comply with any audit by or on behalf of the Funding Source.

## **8. TAXES**

The Maximum Upgrade Agreement Sum to be paid by the County is inclusive of any present or future sales, use, excise, value-added, or other similar tax, if any, that is applicable to the Upgrade Work furnished hereunder.

## **9. CHANGES**

**9.1 Hardware Changes.** In the event of any change in the Hardware to be provided by Harris as a result of the imposition after the Effective Date of this Upgrade Agreement of any requirements by any federal, state, or local government, an equitable adjustment in the Maximum

Upgrade Agreement Sum shall be made to reflect any added cost and expense of such change and the Upgrade Agreement shall be modified in writing accordingly. Subject to its obligation to fulfill its obligations set forth in this Upgrade Agreement, Harris reserves the right to change or to discontinue any of the materials to be provided under this Upgrade Agreement provided that Harris agrees to make available to the County a functionally equivalent replacement item of hardware or product equal to or better than the discontinued.

**9.2** Notwithstanding anything contained in this Section 9 to the contrary, the Parties represent and warrant that to the best of their individual and mutual investigation, knowledge, information and belief, the *Attachment A – Phase 2 SOW* attached hereto reasonably anticipates and contemplates all engineering, design, and scope required for Harris to upgrade to P25 Phase 2 compliance. Without limiting the foregoing, the Parties understand and agree that there may be unanticipated and/or unforeseen events and/or circumstances that may require additional work to successfully perform the Upgrade Work that was not contemplated in the Phase 2 SOW. In the event of such unanticipated or unforeseen event or circumstance, Harris shall nevertheless fully perform all Upgrade Work at no additional cost to the County.

## **10. SUBCONTRACTORS**

Nothing herein shall prohibit Harris from subcontracting any or all of its duties and obligations hereunder, provided however, (1) Harris shall deliver to County a list of contractors Harris intends to retain and County shall have the right to advance approval, which shall not be unreasonably withheld, conditioned, or delayed, of one or more subcontractors so designated by Harris, and (2) Harris is and remains ultimately responsible for any and all duties and obligations, including those subcontracted. In no event shall the existence of a subcontract release or reduce the liability of Harris to County for any Upgrade Work. Harris shall be liable for any loss or damage to County, including but not limited to personal injury, physical loss, harassment of County employees, or violations of the Confidentiality sections of this Agreement occasioned by the acts or omissions of Harris’ subcontractors, their agents or employees.

## **11. [Intentionally Omitted]**

## **12. EXCUSABLE DELAYS**

**12.1** Neither Harris nor the County shall be liable for delays in delivery or failure to perform to the extent resulting from: (1) causes beyond Harris’ or the County’s reasonable control, (2) Acts of God, acts (including failure to act) of any governmental authority (de jure or de facto), wars (declared or undeclared), riots, revolutions, strikes or other labor disputes, fires, floods, sabotage, nuclear incidents, earthquakes, storms, epidemics, (3) Harris’ or the County’s inability to timely obtain necessary materials, items, components or services from suppliers who are affected by the foregoing circumstances, or (4) the failure of Harris or the County to perform its obligations hereunder in a timely manner (each an “Excusable Delay”). The foregoing shall not apply to any of such causes that exist at or before the Upgrade Agreement Effective Date.

### 13. INSURANCE

**13.1 Insurance To Be Provided.** Harris shall maintain in force at all times during the course of this Upgrade Agreement not less than the following insurance coverage with insurers authorized to do business in the State of California:

**13.1.1 Commercial General Liability** insurance (providing scope of coverage equivalent to ISO policy form CG 00 01), naming County and its Agents as an additional insured, with limits of not less than:

General Aggregate:	\$2 million
Products/Completed Operations Aggregate:	\$1 million
Personal and Advertising Injury:	\$1 million
Each Occurrence:	\$1 million

**13.1.2 Automobile Liability** insurance (providing scope of coverage equivalent to ISO policy form CA 00 01) with limits of not less than \$1 million for bodily injury and property damage, in combined or equivalent split limits, for each single accident. Insurance shall cover liability arising out of Harris's use of autos pursuant to this Upgrade Agreement, including owned, leased, hired, and/or non-owned autos, as each may be applicable.

**13.1.3 Workers Compensation and Employers' Liability** insurance or qualified self-insurance satisfying statutory requirements, which includes Employers' Liability coverage with limits of not less than \$1 million per accident. If Harris will provide leased employees, or, is an employee leasing or temporary staffing firm or a professional employer organization (PEO), coverage also shall include an Alternate Employer Endorsement (providing scope of coverage equivalent to ISO policy form WC 00 03 01 A) naming the County as the Alternate Employer, and the endorsement form shall be modified to provide that County will receive not less than thirty (30) days advance written notice of cancellation of this coverage provision. If applicable to Harris's operations, coverage also shall be arranged to satisfy the requirements of any federal workers or workmen's compensation law or any federal occupational disease law.

**13.1.4 Professional Liability/Errors and Omissions.** Insurance covering Harris's liability arising from or related to this Upgrade Agreement, with limits of not less than \$1 million per claim and \$2 million aggregate. Further, Harris understands and agrees it shall maintain such coverage for a period of not less than three (3) years following this Agreement's expiration, termination or cancellation.

**13.2 Certificate of Insurance.** No later than ten (10) calendar days from the Effective Date of this Agreement, Harris shall provide County with a certificate of insurance evidencing the insurance set forth in this Section 13, provided that all binders shall be effective as of the Effective Date.



## **14. GRATUITIES**

Harris and its employees shall not, with the intent to influence the recipients in the conduct of their official duties, extend any gratuity or special favor of monetary value to any officer, employee or other representative of County.

## **15. TITLE AND RISK OF LOSS**

**15.1** Except as set forth in Section 15.2 and 15.3, title and risk of loss of any equipment to be provided by Harris as part of the Upgrade Work shall pass to County upon delivery to County.

**15.2** The title and risk of loss remains with Harris for any equipment rejected by the County in good faith.

**15.3** The risk of loss remains with Harris for any equipment or Hardware that Harris will store for the County prior to delivery.

## **16. ACCEPTANCE**

**16.1 Upgrade Acceptance.** Acceptance shall occur when the Upgrade Work, including all products and equipment as described in the Phase 2 SOW, have been furnished, delivered, and installed.

**16.2 Acceptance Date.** As used in the Agreement, "Acceptance" shall mean acceptance of the Upgraded Work by the County, which shall occur no later than March 31, 2014 (the "Acceptance Date").

## **17. WARRANTIES**

**17.1 Hardware and Services Warranty.** Harris warrants for the periods of time set forth below, and commencing upon the Acceptance Date of the New System under the Rebanding Agreement, the Hardware and accessories shall be free from defects in material and workmanship, and that Upgrade Work shall be of a good and professional manner, and shall conform to its published specifications and the Documentation per the following:

**17.1.1 Infrastructure Hardware.** For a period of one (1) year commencing on Final System Acceptance of the New System.

**17.1.2 Upgrade Work.** For Upgrade Work relating to the Infrastructure Hardware, a period of ninety (90) days commencing on Final System Acceptance under the Rebanding Agreement.

**17.1.4 Accessories.** For any and all accessories, for ninety (90) calendar days from deployment, or whatever longer warranty period available from the accessories manufacturer, if any, starting on the date the applicable Infrastructure Hardware or Terminal Hardware unit Warranty Period starts.



**17.2 Warranty Remedy.** During the warranty periods in Section 17.1, for failures covered by warranty, Harris's sole obligation and County's exclusive remedy under this warranty shall be the correction by Harris of the failure at Harris's option: (i) by repairing any defective component of the Hardware, or (ii) by furnishing any necessary repaired or replacement parts, or (3) by the redoing of the faulty installation. Any such failure, or the repair or replacement of the defective component or the redoing of any installation, shall not extend the warranty period. Harris will be responsible for all charges incurred in returning defective parts to Harris's plant and shipping repaired or replacement parts to County. All warranty labor must be performed by an authorized service group approved by Harris either at its place of business, for mobile or portable equipment, or at the County's location for fixed location equipment should Harris determine that it is not feasible to return the fixed location equipment to Harris's authorized service group. While Harris is undertaking any warranty remedy, Harris shall provide loaner Infrastructure Hardware to the County to ensure that the New System and Upgraded System performance is not compromised.

**17.3** Any and all claims for breach of warranty under Section 17.2 are conclusively deemed waived unless notice of the defects or nonconformance is given to Harris in writing within the warranty period or from fifteen (15) days from discovery by the County, whichever is later, so long as the failure occurred during the warranty period. Notwithstanding the foregoing, the County retains all applicable rights and remedies after the expiration of the warranty.

**17.4** After having exhausted the remedies in Section 17.2, and notwithstanding any provision of this Upgrade Agreement to the contrary, whether expressly or by implication, the County expressly reserves its rights to full restitution of the Maximum Upgrade Agreement Sum as may be required by the Funding Source.

**17.5 Warranty for Additional Items Purchased.** Any additional purchases of items of Hardware and installation services purchased by County and delivered or performed by Harris after System Acceptance shall be warranted on the same terms and conditions set forth herein.

**17.6 Warranty Exclusions.** Harris's obligations shall not apply to: (1) Hardware or components thereof which are normally consumed in operation; or (2) defects which are the result of improper storage or improper use or improper installation, maintenance or repair services performed by persons other than Harris or an authorized service group approved by Harris; or (3) Hardware which has been subjected to any other kind of misuse or detrimental exposure or has been involved in an accident, or (4) Hardware or installations altered or repaired without Harris's prior written consent by any person other than Harris or an authorized service group approved by Harris.

**17.7 Software Warranty of Non-Infringement.** Harris warrants that the County's use of the Upgraded System, and all software and firmware therein, does not and shall not infringe on any third party intellectual property rights.

**17.8 THE WARRANTIES AND REMEDIES SET FORTH IN THIS AGREEMENT CONSTITUTE THE ONLY WARRANTIES WITH RESPECT TO THE UPGRADED SYSTEM, INCLUDING ALL HARDWARE, SOFTWARE AND UPGRADE WORK,**

**AND ARE THE COUNTY'S EXCLUSIVE REMEDIES DURING THE WARRANTY PERIOD IN THE EVENT SUCH WARRANTIES ARE BREACHED. THEY ARE IN LIEU OF ALL OTHER WARRANTIES WHETHER WRITTEN, ORAL, EXPRESS, IMPLIED, OR STATUTORY INCLUDING, WITHOUT LIMITATION, THE WARRANTY OF MERCHANTABILITY AND THE WARRANTY OF FITNESS FOR A PARTICULAR PURPOSE. IN NO EVENT SHALL HARRIS BE LIABLE TO THE COUNTY FOR SPECIAL, CONSEQUENTIAL OR INDIRECT DAMAGES INCLUDING, BUT NOT LIMITED TO, LOSS OF PROFITS OR REVENUES.**

**17.9 Rebanding Warranties.** Nothing in this Upgrade Agreement is intended to nor shall diminish the warranties under the Rebanding Agreement.

## **18. TERMINATION FOR DEFAULT**

18.1 If either Party is in material breach of this Upgrade Agreement, then other Party may declare a default by serving written notice to the other Party setting forth the basis for declaring the default (the "Default Notice").

18.2 Upon receipt of the Default Notice, the subject Party shall, as soon as reasonably possible within forty-five (45) calendar days, fully cure the default (the "Standard Cure Period").

18.3 If it will not be possible to cure the default within the Standard Cure Period, then the defaulting Party must, before expiration of the Standard Cure Period, deliver a written cure plan that contains, inter alia, a mutually-agreed extension (the "Extended Cure Period").

18.4 Notwithstanding Sections 19.2 and 19.3, in the event of a situation where public safety is at risk, then the defaulting Party shall cure immediately or as soon as possible with all deliberate speed (the "Emergency Cure Period").

18.5 If a default remains uncured at the expiration of the applicable Standard Cure Period, the Extended Cure Period, or the Emergency Cure Period, then the Party that served the Default Notice may exercise any or all applicable rights and remedies under this Upgrade Agreement, at law, and/or in equity, all of which are cumulative and not exclusive.

## **19. CONFIDENTIALITY**

**19.1 Confidentiality Obligation.** During the term of and pursuant to this Upgrade Agreement and/or the Rebanding Agreement, it is anticipated that one party (hereafter the "Disclosing Party") may disclose to the other party (hereafter the "Receiving Party") information, which the Disclosing Party considers proprietary and confidential. Accordingly, with respect to any specification, drawings, sketches, models, samples, tools, technical information, confidential business information or data, in written or other tangible form which (1) has been designated in writing by the Disclosing Party as confidential or proprietary, or (2) is of the type that the Receiving Party customarily treats as confidential or proprietary, and which is furnished by the Disclosing Party to the Receiving party in contemplation of or under this Agreement (hereinafter "Information"), the Receiving Party shall treat such Information, for a period of two (2) years

after the Effective Date of this Upgrade Agreement, as confidential information with the same degree of care as the Receiving Party affords to confidential information of its own of a similar nature and shall not reproduce any such Information, in whole or in part, except as specifically authorized in writing by the Disclosing Party.

**19.2 Exceptions.** The provisions of the preceding subsection shall not apply to any Information which:

- (i) is or shall become publicly available without breach of this Section 19 on the part of the Receiving Party;
- (ii) is already known by the Receiving Party prior to receipt from the Disclosing Party;
- (iii) is independently developed by the Receiving Party without use or reference to the information provided by the Disclosing Party;
- (iv) is rightfully obtained by the Receiving Party from third parties without restriction or obligation on such third parties to maintain the confidentiality of such information; or
- (v) although it may be Confidential Information is still required to be disclosed pursuant to any freedom of information, public records or similar laws or pursuant to any governmental or judicial subpoena or order provided, however, that in each such event the Receiving Party shall give the Disclosing Party prompt and prior written notice of such obligation to disclose and shall allow the Disclosing Party, as permitted by law, an opportunity to take such actions and steps either to oppose or to limit such obligation to disclose the information.

**19.3 Survival.** The provisions of this Section 19 shall survive the expiration or termination of this Upgrade Agreement.

## **20. INDEMNIFICATION**

**20.1 Indemnification by Harris.** Notwithstanding any provision of this Upgrade Agreement to the contrary, whether expressly or by implication, Harris shall indemnify, defend, and hold harmless the County and its board members, officials and employees (the “County Indemnified Parties,” and each a “County Indemnified Party”) from and against all third-party liability, including but not limited to claims, demands, actions, losses, damages, costs or expenses (including reasonable attorney and legal fees), to the extent arising from or in connection with willful misconduct or negligent acts or omissions of Harris or Harris’ officers, agents, employees or subcontractors. County agrees to provide Harris with reasonable notice in writing of any third party claim, demand or cause of action for which County or a County Indemnified Party will request indemnification from Harris. County and the County Indemnified Parties will provide Harris with the necessary information and assistance to defend or settle such claim, demand, or cause of action.

**20.2 Indemnification by County.** Notwithstanding any provision of this Upgrade Agreement to the contrary, whether expressly or by implication, County shall indemnify, defend, and hold harmless Harris and its board members, officers and employees (the “Harris Indemnified Parties”, and each a “Harris Indemnified Party”) from and against all third-party liability, including but not limited to claims, demands, actions, losses, damages, costs or expenses (including reasonable attorney and legal fees), to the extent arising from or in connection with willful misconduct or negligent acts or omissions of the County or County’s officials, officers, employees, agents and subcontractors. Harris agrees to provide the County with reasonable notice in writing of any third party claim, demand or cause of action for which Harris or a Harris Indemnified Party will request indemnification from County. Harris and the Harris Indemnified Parties will provide County with the necessary information and assistance to defend or settle such claim, demand or cause of action.

**20.3** Section 20.2, whether expressly or by implication, shall not constitute a waiver by the County of any governmental immunities or claims requirements, including but not limited to those under California *Government Code* section 900 *et seq.*, all of which are hereby categorically reserved.

**20.4** The obligations, rights, and remedies of this Section 20 shall survive the expiration or termination of this Agreement.

## **21. INTELLECTUAL PROPOERTY INDEMNIFICATION**

**21.1 Intellectual Property Rights.** Except as expressly and specifically set forth in this Agreement, nothing in this Upgrade Agreement shall be construed as:

- (i) Conferring a right to County to use in advertising, publicity or otherwise any trademark or trade name of Harris; or
- (ii) Granting to County by implication, estoppels, or otherwise any licenses or rights under patents of Harris.

**21.2 Intellectual Property Infringement Indemnification.** Without limiting the County’s rights of indemnity under Section 20.1, Harris further agrees as follows: Harris at its own expense shall indemnify and defend, or may settle, any suit or proceeding against County based on a claimed patent, copyright, or trademark/trade dress infringement, as well as infringement claims resulting from the County use of the software provided under this Upgrade Agreement (hereinafter, “IP Infringement”). If, in any IP Infringement claim, demand, or action relates to or effects County’s continued use of the Upgraded System, then Harris shall, at its expense and option, either: (1) procure for County the right to continue using the Upgraded System, or (2) modify the Upgraded System so that it becomes non-infringing, or (3) replace the Upgraded System or portions thereof so that it becomes non-infringing, and (4) be solely responsible for any and all liability for the County’s past infringing use of the Upgraded System.

**21.3 Notification.** If the County receives notice of an IP Infringement from a third-party claimant asserting that the Upgraded System, or any part thereof, infringes on their intellectual

property, then County agrees to provide Harris with reasonable notice in writing of any third party claim, demand or cause of action for which County or a County Indemnified Party will request indemnification from Harris. County will provide Harris with the necessary information and assistance for Harris to assume the defense or to settle such claim, demand, or cause of action, subject to County approval, which shall not be unreasonably withheld, conditioned, or delayed.

**21.4 Exclusions.** The preceding indemnification requirements in Section 21.2 shall not apply to the use of the Upgraded System in conjunction with any other apparatus or material not supplied by Harris to the extent that such conjoined use causes the alleged infringement. As to any portion of the Upgraded System or use described in the preceding sentence, Harris assumes no liability whatsoever for patent infringement.

## **22. LIMITATION OF LIABILITY**

**22.1** Except for Harris' responsibility and liability to indemnify County under this Upgrade Agreement, as set forth in Sections 20 (Indemnification) and 21 (IP Infringement Indemnification), and *Section 3. Software License*, which are not limited hereunder, the total liability of Harris on any and all claims, whether in contract, warranty, tort (including negligence or IP Infringement) or otherwise, arising out of, connected with, or resulting from the performance or non-performance of this Upgrade Agreement and any agreement resulting herefrom shall not exceed one-and-a-half times (1.5xs) the Maximum Upgrade Agreement Sum.

**22.2** IN NO EVENT, WHETHER AS A RESULT OF BREACH OF CONTRACT, WARRANTY, TORT (INCLUDING NEGLIGENCE OR IP INFRINGEMENT) OR OTHERWISE, SHALL HARRIS, OR ITS SUBCONTRACTORS OR SUPPLIERS, BE LIABLE TO THE COUNTY FOR ANY SPECIAL, CONSEQUENTIAL, INCIDENTAL, INDIRECT OR EXEMPLARY DAMAGES, INCLUDING, BUT NOT LIMITED TO, LOST PROFITS, LOST SAVINGS OR LOST REVENUE OF ANY KIND.

**22.3** The provisions of this Section 22 shall survive the expiration or termination of this Agreement.

## **23. INDEPENDENT CONTRACTOR**

Harris is and shall be an independent contractor and, subject to the terms of this Upgrade Agreement, shall have the sole right to supervise, manage, operate, control, and direct performance of the details incident to its duties under this Upgrade Agreement. Nothing contained in this Upgrade Agreement shall be deemed or construed to create a partnership or joint venture, to create relationships of an employer-employee or principal-agent, or to otherwise create any liability for the County whatsoever with respect to the indebtedness, liabilities, and obligations of Harris or any other party.

## **24. [Intentionally Omitted]**

## **25. PROHIBITED AGREEMENTS**

Harris has not entered, and agrees not to enter, into any agreement or arrangement with County: (i) pursuant to which Harris agrees, in exchange or as consideration for County's selection of Harris to perform the Upgrade Work, to pay or convey to County or any third party a kickback or anything else of value or to provide to County any services or equipment not required as part of or directly related to the Upgrade Work at non-commercial rates or at no charge; or (ii) which includes artificially inflated prices or, Harris knows or has reason to know, is based upon a false statement of work, an inaccurate inventory count or an incorrect description of the Upgrade Work, including, but not limited to, the equipment or locations to be reconfigured.

## **26. ASSIGNMENT; SUCCESSORS AND ASSIGNS**

This Upgrade Agreement shall not be assigned by either party without the prior written consent of the other party, which shall not be unreasonably withheld or delayed. Notwithstanding the above, Harris may assign this Upgrade Agreement, without consent, (a) in whole or in part, to a wholly-owned affiliate or subsidiary or (b) in the event of a change of controlling ownership interest (either directly or indirectly) in Harris or in the event of merger, recapitalization, consolidation, other business combination or sale of all or substantially all of the assets of Harris. Harris shall provide to County written notice of an assignment within thirty (30) days of its occurrence.

## **27. AUTHORITY FOR MODIFICATIONS AND AMENDMENTS**

No modification, amendment, alteration, addition, or waiver of any section or condition of this Upgrade Agreement shall be effective or binding unless it is in writing and signed by authorized officers of County and Harris.

## **28. WAIVER**

Failure or delay by either party to exercise any right or power under this Upgrade Agreement will not operate as a waiver of the right or power. For a waiver of a right or power to be effective, it must be in writing signed by the waiving party. An effective waiver of a right or power will not be construed as either a future or continuing waiver of that same right or power, or the waiver of any other right or power.

## **29. SEVERABILITY**

If a court of competent jurisdiction renders any provision of this Upgrade Agreement (or portion of a provision) to be invalid or otherwise unenforceable, that provision or portion of the provision will be severed and the remainder of this Upgrade Agreement will continue in full force and effect as if the invalid provision or portion of the provision were not part of this Upgrade Agreement.



### **30. NON-EXCLUSIVE REMEDIES**

The remedies provided for in this Upgrade Agreement shall not be exclusive but are in addition to all other remedies available under the Rebanding Agreement and/or at law.

### **31. HEADINGS AND SECTION REFERENCES**

The section and paragraph headings in this Upgrade Agreement are inserted only for convenience and are not to be construed as part of this Upgrade Agreement or as a limitation of the scope of the particular section to which the heading refers.

### **32. AUTHORITY TO EXECUTE**

Each party represents to the other party that such party has obtained all necessary approvals, consents and authorizations to enter into this Upgrade Agreement and to perform its duties under this Upgrade Agreement; the person executing this Upgrade Agreement on its behalf has the authority to do so; upon execution and delivery of this Upgrade Agreement by the parties, it is a valid and binding contract, enforceable in accordance with its terms; and the execution, delivery, and performance of this Upgrade Agreement does not violate any bylaw, charter, regulation, law or any other governing authority of such party.

### **33. GOVERNING LAW AND VENUE**

The Parties acknowledge and agree that this Upgrade Agreement is entered into and shall be performed in the State of California, County of Los Angeles. The validity, performance and all matters relating to the interpretation and effect of this Upgrade Agreement and any amendment thereto shall be governed by the laws of the State of California, excluding its rules with respect to conflict of laws. Both County and Harris agree to exclude application of the terms and provisions of the U.N. Convention of Contracts for the International Sale of Goods and the terms and provisions of the Uniform Computer Information Transactions Act (UCITA) to this Upgrade Agreement, if either were otherwise applicable.

### **34. NOTICES**

Notices required to be given by either party to the other party must be in writing and either delivered in person or sent to the address shown below by certified mail, return receipt requested and postage prepaid or by a recognized courier service (such as Federal Express, UPS, or DHL) and will be effective upon receipt:

#### **To Harris:**

Project Management Office  
Harris Corporation, RF Communications Division  
12860 Lynchburg-Salem Turnpike  
Forest, VA 24551

With a copy that shall not constitute notice to:

Senior Counsel  
Harris Corporation, RF Communications Division  
221 Jefferson Ridge Parkway  
Lynchburg, VA 24501

**To County:**

Los Angeles County – ISD  
1110 Northern Eastern Avenue  
Los Angeles, CA 90063  
c/o Ian Telfer

And with a copy that shall not constitute notice to:

Office of the County Counsel  
500 W. Temple Street, Rm 653  
Los Angeles, CA 90012  
c/o Patrice Salseda, Senior Deputy

And to:

Alan Tilles, Esq.  
Jeffrey W. Rubin, Esq.  
Shulman Rogers  
12505 Park Potomac Avenue, 6<sup>th</sup> Floor  
Potomac, MD 20854

**35. COMPLIANCE WITH APPLICABLE LAWS**

Each Party will comply with all applicable federal, state, and local laws, regulations and rules concerning the performance of this Upgrade Agreement or the use of the Upgraded System. County will obtain and comply with all required FCC licenses and authorizations.

**36. ENTIRE AGREEMENT**

This Upgrade Agreement is the complete and exclusive statement of understanding between County and Harris, and except for the Rebanding Agreement, supersedes any previous negotiations, prior discussions, representations, promises, understandings, proposals, agreements, warranties, relating to the subject matter of this Upgrade Agreement.

**[End of Text This Page]**



**IN WITNESS WHEREOF**, the parties hereto have caused this Upgrade Agreement to be signed and intend to be legally bound thereby.

**HARRIS:**

**HARRIS CORPORATION,**  
acting through its RF Communications  
Division

By: \_\_\_\_\_

Name: \_\_\_\_\_

Title: \_\_\_\_\_

Date: \_\_\_\_\_

**COUNTY:**

**COUNTY OF LOS ANGELES,  
CALIFORNIA**

By: \_\_\_\_\_

Name: \_\_\_\_\_

Title: \_\_\_\_\_

Date: \_\_\_\_\_

**APPROVED AS TO FORM:**

COUNTY COUNSEL

John F. Krattli

By \_\_\_\_\_

Patrice Salseda  
Senior Deputy County Counsel



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**P25 Phase 2 Upgrade and ISSI Expansion  
Statement of Work,  
February 12, 2014**

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# 1.P25 Phase 2 and ISSI Expansion Overview

Harris Corporation, RF Communications Division provides this Statement of Work to serve as the basis for upgrading the CWIRS P25 system to a P25 Phase 2-enabled system and expanding the current system's ISSI capacity. The project does not include subscriber radio equipment upgrades. This document presents information regarding Harris' approach and includes:

- **P25 Phase 2 and ISSI Expansion Description**—proposed software and hardware to upgrade the system infrastructure
  - Upgrade CWIRS from P25 Phase 1 to a P25 Phase 1/2 dual-mode system
  - CWIRS ISSI expansion to add one (1) new ISSI interface with 10 ISSI talk paths
- **Infrastructure Upgrade Process** – system upgrade and project management plans
- **Subscriber Radio Upgrade**—County currently has eighty (80) CWIRS radios that are P25 Phase 2 capable. As a deliverable under this Upgrade Agreement, Contractor shall upgrade these 80 radios to be P25 Phase 2 operational
- Test Plan
- Responsibility Matrix

CWIRS, as a result of the CWIRS P25 Upgrade Project, is a multizone system of simulcast cells and multicast sites that places coverage and capacity in manageable groupings. The P25 system contains four simulcast zones and five multisite zones described in Table 1.

**Table 1-- CWIRS' P25 Operational Zones**

Zone	Number of Channels	Sites
Basin Simulcast	10	Verdugo Peak (VPK) Mount Lukens (MLU) Criminal Courts (CCT) Oat Mountain (OAT)
West Simulcast	10	Baldwin Hills (BHS) Rolling Hills Transmit (RHT)
Northwest Simulcast	5	Burnt Peak (BUR) Bald Mountain (BMT) Tejon Peak (TPK) Whitaker Ridge (WTR)
East Simulcast	8	Johnstone Peak (JPK) Puente Hills Nike (PHN) San Dimas (SDM) Rio Hondo (RIH)
Lower Blue Ridge Multisite	5	Lower Blue Ridge (LBR)

Zone	Number of Channels	Sites
Castro Peak Multisite	5	Castro Peak (CPK)
Black Jack Mountain Multisite	5	Black Jack Mountain (BJM)
Hauser Peak Multisite	6	Hauser Peak (HPK)
Blue Rock Multisite	5	Blue Rock (BRK)

The proposed upgrade from P25 Phase 1-only capability to P25 Phase 2-enabled capability with an ISSI expansion will occur at the Harris factory. The only hardware components included in the upgrade are redundant Transcoders to enable seamless P25 Phase 2-to-P25 Phase 1 communications in native mode (without the transcoders, all P25 Phase 2-to-P25 Phase 1 communications occur in P25 Phase 1 mode). Note, P25 Phase 2-enabled systems are backward compatible with P25 Phase 1 subscriber radios.

The Transcoders enable Harris' unique, Enhanced Dynamic Dual Mode Technology. When it comes to mixed mode interoperability between Phase 1 and Phase 2, Harris' Enhanced Dynamic Dual Mode (EDDM) will provide CWIRS with the best performance. Dual-mode, multi-site or ISSI calls will not require all radios to revert to P25 Phase 1 mode to participate. Special mixed-mode talk groups not necessary either. Harris EDDM operation uses the intelligence of the network to minimize the number of talk paths used during a call. For a given interoperable talk group, the call will be transmitted in Phase 2 mode on cells with Phase 2 capable radios. On cells with P25 Phase 1-only capable radios, the same call will be made in Phase 1 mode. The system chooses the most efficient protocol to ensure efficient operation. The County can maximize its full user capacity on every site and cell.

All other network, dispatch console, and base station components require only software upgrades. Deployed or fielded dispatch consoles will require software upgrades in the field. The Castro Peak site equipment has shipped from the Harris factory and Harris will upgrade the Castro Peak site equipment in the field.

After the upgrade, the P25 Phase 2 coverage design will be identical to the P25 Phase 1 coverage design; no changes to MASTR V station power outputs, combiners, multicouplers, or antennas are necessary. All P25 Phase 1 talk groups and subscriber radios continue to operate on P25 Phase 1 working channels (the MASTR V base station seamlessly switches between P25 Phase 1 and P25 Phase 2 working channels on demand). The coverage maps provided during the CWIRS P25 Upgrade Project are valid for P25 Phase 2, as well. Harris designed the P25 Phase 1 coverage with P25 Phase 2 tolerances to prepare for future upgrades and minimize system and user impacts.

## 2.P25 Phase 2 and ISSI Expansion Description

### 2.1 P25 Phase 2 Software/Hardware Upgrade

This Statement of Work provides equipment to implement the P25 Phase 2 Upgrade in the quantities stated below. As evidenced in the table, the only new hardware Harris will append to the existing County P25 VIDA network is the VIDA Transcoder (Primary and Secondary). All base stations, dispatch consoles, Ethernet switches, Ethernet routers, and the VIDA Appliance servers will receive P25 Phase 2 software as appropriate. County will upgrade the Exacom Logging Recorder with SR10A and P25 Phase 2 software. Harris will perform the hardware and software upgrades in Lynchburg, VA, at the Harris factory during factory staging. Upgrading during staging will significantly reduce operational impacts compared to upgrading a fielded system.

**Table 2-- Working Channel Summary-- Pre- and Post- Phase 2 Upgrade**

Zone	Existing Number of Channels (Control Channel + Working Channels)	Existing P25 Phase 1 Working Channels (Talk Paths)*	New Maximum Working Channels (Talk Paths)**
Basin Simulcast	10	9	18
East Simulcast	8	7	14
West Simulcast	10	9	18
Northwest Simulcast	5	4	8
Castro Peak Multicast***	5	4	8
Black Jack Mtn Multicast	5	4	8
Lower Blue Ridge Multicast	5	4	8
Hauser Peak Multicast	6	5	10
Blue Rock Multicast	5	4	8

- \* Working channels in P25 Phase 1 calculated by reducing the total channel count per zone by one, accounting for the control channel
- \*\* New Maximum Working Channels determined by multiplying the P25 Phase 1 working channels by two, because P25 Phase 2 working channels use two time-slots per frequency/channel
- \*\*\* CPK shipped previously and not be part of Factory Staging and Acceptance

Table 2 describes by zone the components receiving software or hardware upgrades and the quantities, by zone, of each type of upgrade.

**Table 3-- P25 Phase 2 Hardware and Software Upgrade Summary by Zone**

Equipment	Existing Qty	Software Upgrade/Reprogram	New Hardware	Reprogram/Install By
<b>Network Switching Center</b>				
High Availability Network Switching Servers	1	1	-	Harris
EDACS Migration Gateway	1	1	-	Harris
Regional Site Manager Pro	2	2	-	Harris
Network Equipment (Routers and Switches)	2	2	-	Harris
VIDA UAS, RVM, AD Servers	Lot	Lot	-	Harris
Exacom Logging Recorder	1	1	-	Harris
VIDA Transcoders		-	2	Harris
<b>Basin Zone</b>				
Number of Repeater Sites	4	4	-	Harris
Total Number of Site Routers and Switches	5*	5*	-	-
Total Number of Trunked Channels	10	-	-	-
Total Number of Tx Combiners	8	-	-	-
Total Number of Repeaters	40	40	-	Harris
Total Number of Auxiliary Receivers	-	-	-	-
Total Number of Tx Antennas	8	-	-	-
Total Number of TTA & Multicouplers	4	-	-	-
Total number of Rx Antennas	4	-	-	-
<b>East Zone</b>				
Number of Repeater Sites	4	4	-	Harris
Total Number of Site Routers and Switches	5*	5*	-	Harris
Total Number of Trunked Channels	8	-	-	-
Total Number of Repeaters	32	32	-	Harris
Total Number of Auxiliary Receivers	-	-	-	-
Total Number of Tx Combiners	8	-	-	-
Total Number of Tx Antennas	8	-	-	-
Total Number of TTA & Multicouplers	4	-	-	-



Equipment	Existing Qty	Software Upgrade/Reprogram	New Hardware	Reprogram/Install By
Total number of Rx Antennas	4	-	-	-
<b>West Zone</b>				
Number of Repeater Sites	2	2	-	Harris
Total Number of Site Routers and Switches	3*	3*	-	Harris
Total Number of Trunked Channels	10	-	-	-
Total Number of Repeaters	20	20	-	Harris
Total Number of Auxiliary Receivers	-	-	-	-
Total Number of Tx Combiners	4	-	-	-
Total Number of Tx Antennas	4	-	-	-
Total Number of TTA & Multicouplers	2	-	-	-
Total number of Rx Antennas	2	-	-	-
<b>Northwest Zone</b>				
Number of Repeater Sites	4	4	-	Harris
Total Number of Site Routers and Switches	5*	5*	-	Harris-
Total Number of Trunked Channels	5	-	-	-
Total Number of Repeaters	20	20	-	Harris
Total Number of Auxiliary Receivers	-	-	-	-
Total Number of Tx Combiners	4	-	-	Harris
Total Number of Tx Antennas	4	-	-	Harris
Total Number of TTA & Multicouplers	4	-	-	Harris
Total number of Rx Antennas	4	-	-	Harris
<b>Hauser Peak Multicast Site</b>				
Number of Repeater Sites	1	1	-	Harris
Total Number of Site Routers and Switches	1	1	-	Harris
Total Number of Trunked Channels	6	-	-	-
Total Number of Repeaters	6	6	-	Harris
Total Number of Auxiliary Receivers	-	-	-	-
Total Number of Tx Combiners	1	-	-	-
Total Number of Tx Antennas	1	-	-	-
Total Number of TTA & Multicouplers	1	-	-	-





Equipment	Existing Qty	Software Upgrade/Reprogram	New Hardware	Reprogram/Install By
Total number of Rx Antennas	1	-	-	-
<b>Lower Blue Ridge Multicast Site</b>				
Number of Repeater Sites	1	1	-	Harris
Total Number of Site Routers and Switches	1	1	-	Harris
Total Number of Trunked Channels	5	-	-	-
Total Number of Repeaters	5	5	-	Harris
Total Number of Auxiliary Receivers	-	-	-	-
Total Number of Tx Combiners	1	-	-	-
Total Number of Tx Antennas	1	-	-	-
Total Number of TTA & Multicouplers	1	-	-	-
Total number of Rx Antennas	1	-	-	-
<b>Blue Rock Multicast Site</b>				
Number of Repeater Sites	1	1	-	Harris
Total Number of Site Routers and Switches	1	1	-	Harris
Total Number of Trunked Channels	5	-	-	-
Total Number of Repeaters	5	5	-	Harris
Total Number of Auxiliary Receivers	-	-	-	-
Total Number of Tx Combiners	1	-	-	-
Total Number of Tx Antennas	1	-	-	-
Total Number of TTA & Multicouplers	1	-	-	-
Total number of Rx Antennas	1	-	-	-
<b>Blackjack Mtn Multicast Site</b>				
Number of Repeater Sites	1	1	-	Harris
Total Number of Site Routers and Switches	1	1	-	Harris
Total Number of Trunked Channels	5	-	-	-
Total Number of Repeaters	5	5	-	Harris
Total Number of Auxiliary Receivers	-	-	-	-
Total Number of Tx Combiners	1	-	-	-
Total Number of Tx Antennas	1	-	-	-
Total Number of TTA & Multicouplers	1	-	-	-



Equipment	Existing Qty	Software Upgrade/Reprogram	New Hardware	Reprogram/Install By
Total number of Rx Antennas	1	-	-	-
<b>Castro Peak Multicast Site**</b>				
Number of Repeater Sites	1	1	-	Harris
Total Number of Site Routers and Switches	1	1	-	Harris
Total Number of Trunked Channels	5	-	-	-
Total Number of Repeaters	5	5	-	Harris
Total Number of Auxiliary Receivers	-	-	-	-
Total Number of Tx Combiners	1	-	-	-
Total Number of Tx Antennas	1	-	-	-
Total Number of TTA & Multicouplers	1	-	-	-
Total number of Rx Antennas	1	-	-	-

\* Includes simulcast control point router

\*\* Will be field-upgraded

Table 4 indicates the summary of software parts necessary for the aforementioned P25 Phase 2 upgrade. Included in the table are the licenses for 80 Phase 2 software licenses for P5500 and P7300 subscriber radios.

**Table 4-- P25 Phase 2 Upgrade Software Licenses**

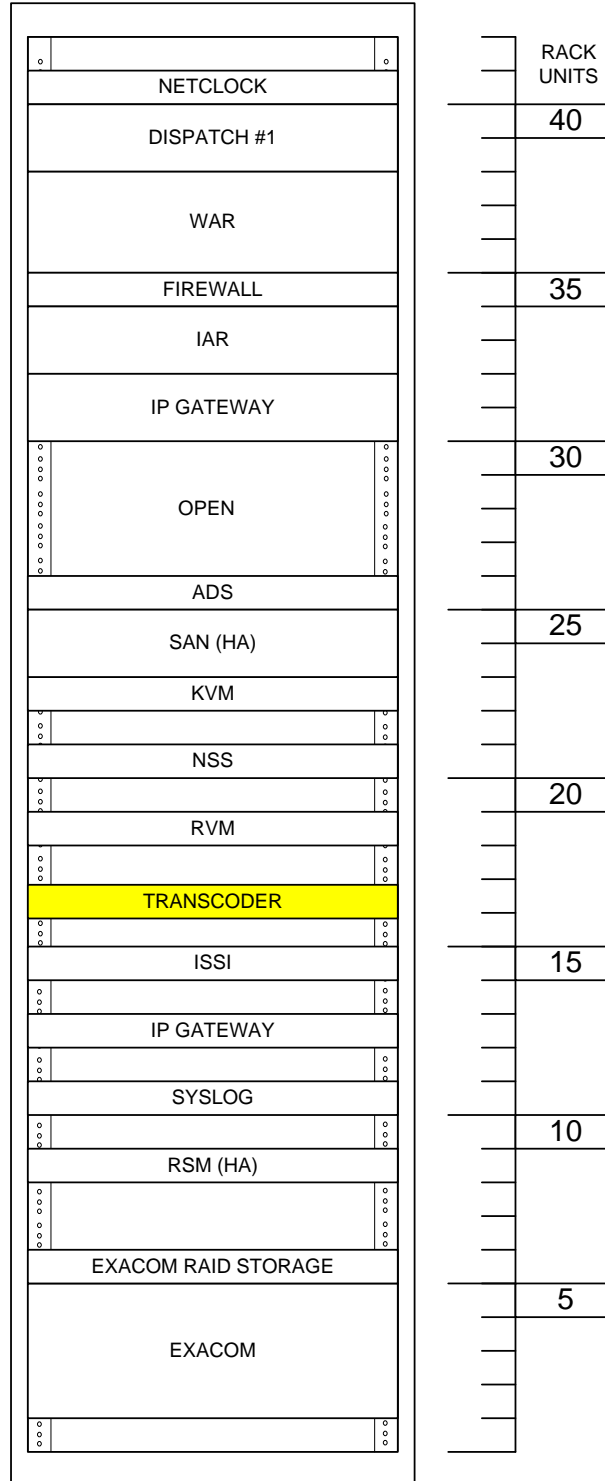
Part Number	Description	Qty
MANS-SG7D	License, Standard NSS, P25 Talkpath	59
MASV-NSG9K	Feature, Software, P25 Phase 2	138
YRPL4F	TAC Feature, Phase II TDMA	80

The Network Switching Center racks will have two additional servers installed, one for each rack. The additional servers support the Primary Transcoder and the Backup/Secondary Transcoder. Harris will install the VIDA Transcoder server in the existing VIDA Network Switching Center (NSC) racks while the VIDA NSC racks are in Lynchburg for factory staging. The equipment description and the physical location of the Transcoder server for the Primary and Secondary Racks are shown in Table 5.

**Table 5-- P25 Phase 2 Transcoder Hardware and Licenses**

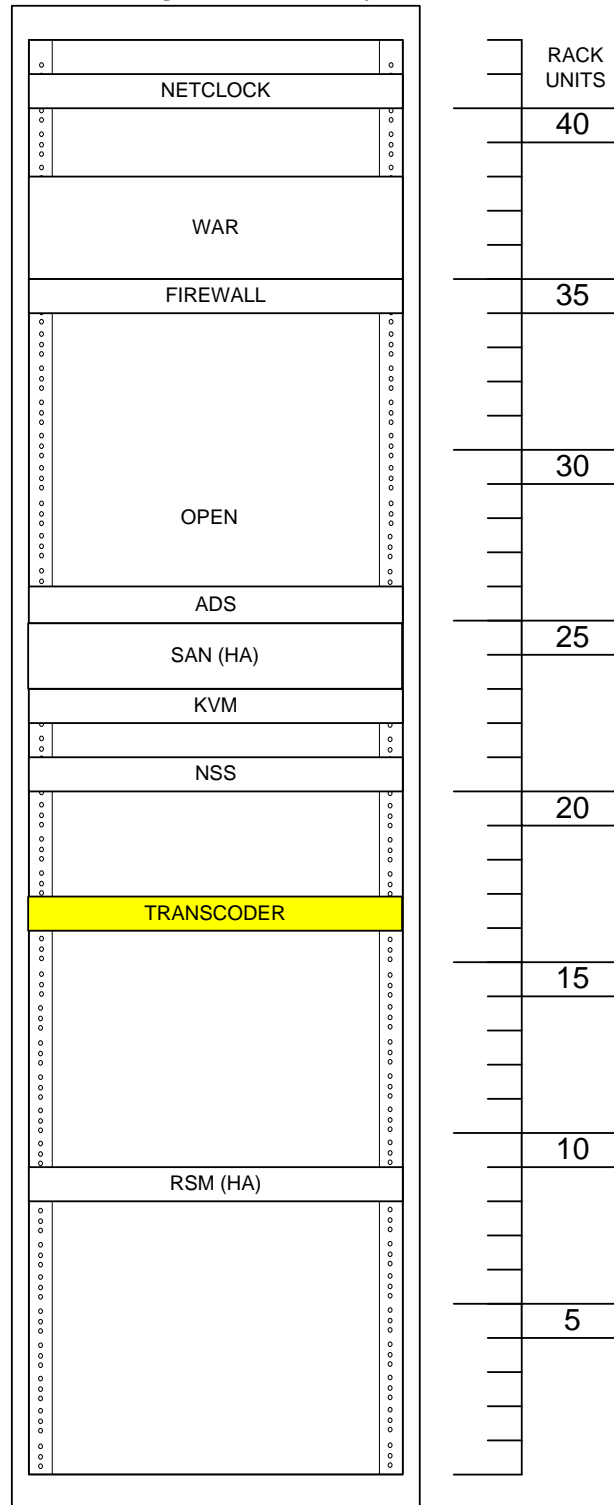
Part Number	Description	Qty
MANM-TSCDR10	Server, Transcoder, SR10A	2
MANM-NSG9C	License, Quad Mode Vocoder	2
MANM-NSG9D	License, Transcoder Talkpath	48

**Figure 1-- Primary NSC Rack**



PRIMARY NSC RACK  
 ELEVATIONS (FRONT)

**Figure 2-- Secondary NSC Rack**



SECONDARY NSC RACK  
 ELEVATIONS (FRONT)

All other racks in the P25 CWIRS system will not change, so new rack elevations and/or profiles are not included.

## 2.2 ISSI Expansion

Harris will install software licensing to provide one additional ISSI connection (CWIRS-to-Future) to the existing ISSI Server in the Primary NSC rack. In addition, Harris will provide software licensing to allow 10 talk paths to the CWIRS-to-Future ISSI connection and 10 additional talk paths between CWIRS-to-Future and CWIRS-to-STRS. The additional talk paths on the CWIRS-to-STRS link will allow conversations between the new, foreign P25 system (CWIRS-to-Future) and the CWIRS-to-STRS ISSI links without affecting the current link capacity of the CWIRS-to-STRS ISSI connection.

**Table 6—CWIRS VIDA P25 ISSI Summary-- Pre- and Post- ISSI Expansion**

System Connection	Existing Number of Talk Paths	New Talk Paths	New Multisystem Talk Paths
CWIRS-to-STRS*	10		
CWIRS-to-Future		10	
Multisystem			20

**Table 7-- ISSI Expansion License Summary**

Part Number	Description	Qty
MANM-NSG9E	License, ISSI Gateway Talkpath	30
MANM-NSG9F	License, ISSI External System Connection	1

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## 2.3 P25 Phase 2 Upgrade and ISSI Expansion Process Implementation Process

All feasible upgrades will occur at the Harris factory in Lynchburg, VA during factory staging of the CWIRS P25 Upgrade Project. Because upgrades and expansions will occur with the equipment at the Harris Factory, no disruptions to the system design or implementation plan are necessary. Remaining equipment may be installed at Eastern Ave prior to equipment commissioning to avoid service disruptions. Harris has included a Functional Acceptance Test Plan for P25 Phase 2 testing.

1. Update Network IP plan as necessary
2. Install VIDA Transcoders
3. Upgrade NSC Servers and Network Equipment with P25 Phase 2 Software
4. Upgrade MASTR V Site Equipment with P25 Phase 2 Firmware
5. Upgrade Maestro<sup>IP</sup> Consoles with P25 Phase 2 software
6. Install ISSI licenses and talk paths
7. Factory Test P25 Phase 2 and ISSI

After conducting the seven (7) steps above, the original CWIRS P25 Upgrade Project can continue as originally designed and approved in the Detailed Design Review. LA County will install the 80 P25 Phase 2 subscriber radio software licenses on 80 existing, compatible subscriber radios, e.g. P7300 or P5500.

## 3. Project Implementation

### 3.1 Schedule

The installation of the Transcoders, all P25 Phase 2-related software, and the ISSI expansion will occur during the pre-schedule factory staging time of the P25 Reconfiguration Project. No schedule changes to the CWIRS P25 Upgrade Project are expected as part of this scope of work.

### 3.2 Project Responsibilities

The table below describes the general responsibilities of both parties to perform during the upgrade and expansion.

**Table 8-- General Requirements Responsibility Matrixes**

Tasks	Harris	County	Comments
Designate a Harris project manager	X		
Designate a County project manager		X	
Manage the Harris team	X		
Establish project communications protocol, maintain communications log as required	X		
Conduct internal weekly project review meetings, submit weekly status reports	X		
Conduct weekly project update calls	X		
Participate in weekly project update calls		X	
Manage and control the flow of products and equipment from the factory to meet the project schedule	X		
Review change orders with customer, complete the change request form, update change register	X		
Review change orders with Harris project manager, provide approval		X	
Monitor and manage risks using the Harris Risk Management Plan	X		
Provide written approval for major milestones such as Staging and ATP		X	
Provide timely responses to issues and questions		X	

### 3.3 Design Considerations

#### 3.3.1 Detailed Design Review

No additional Detailed Design Review is necessary beyond that included in the CWIRS P25 Upgrade Project.

### 3.3.2 Microwave

No additional microwave circuits are required beyond those already provided for the CWIRS P25 Upgrade Project.

### 3.3.3 Site Preparations

No additional Site Preparations are necessary for the hardware and software expansion.

### 3.3.4 Site Power and Cooling Requirements

The Network Switching Center will have two additional servers installed, one for the Primary Transcoder and one for the Secondary Transcoder. Each server requires <250W of power. Existing AC power and cooling solutions are adequate for the additional load.

### 3.3.5 Manufacturing & Staging

Harris will install the Transcoders and software at the Harris factory in Lynchburg, VA during the CWIRS P25 Upgrade Project factory staging of the MASTR V P25 site equipment and Network Switching Center. No additional staging requirements beyond factory testing of the new hardware and software are necessary if the new software and hardware upgrades take place during the CWIRS P25 Upgrade Project factory staging.

### 3.3.6 Shipping and Storage

This project will encumber no additional shipping and storage costs if the software and hardware upgrades take place during the CWIRS P25 Upgrade Project factory staging at the Harris factory in Lynchburg, VA.

**Table 9-- Manufacturing & Staging Responsibility Matrix**

Tasks	Harris	County	Comments
Insert equipment delivery dates into the enterprise resource planning system	X		
Place orders with the Harris factory	X		
Place orders with key suppliers	X		
Place orders for vendor items	X		
Manufacture all infrastructure equipment	X		
Assemble equipment in staging area on a per site basis	X		
Run Factory Acceptance Test (FAT)	X		
Break down equipment, ship to County	X		
Provide storage	X	X	Per CWIRS 800MHz Rebanding Project
Inventory equipment	X		Customer witness
Validate Harris Equipment Inventory		X	



### 3.3.7 Equipment Installation

**Table 10-- System Installation Responsibility Matrix**

Tasks	Harris	County	Comments
Install Primary and Secondary VIDA Transcoders	X		
Upgrade Site Equipment Software to P25 Phase 2	X		
Upgrade NSC Software to P25 Phase 2	X		
Update IP Plan as necessary	X		
Upgrade C3 Maestro <sup>IP</sup> dispatch console software to P25 Phase 2	X		
Upgrade Exacom Logging Recorder to P25 Phase 2		X	
Upgrade Ethernet switches and routers for P25 Phase 2	X		

### 3.3.8 Infrastructure Equipment

No additional infrastructure modifications are necessary beyond the VIDA transcoder hardware and the P25 Phase 2 system software aforementioned.

### 3.3.9 User Equipment

**Table 11-- System Installation Responsibility Matrix**

Tasks	Harris	County	Comments
Install P25 Phase 2 Subscriber Radio Software Licenses on 80 existing, P25 Phase 2 compatible subscriber radios		X	

### 3.3.10 System Optimization

Once all infrastructure equipment is installed, Harris' system engineer(s) will work with the on-site technicians to optimize the equipment in preparation for acceptance testing.

**Table 12-- System Optimization Responsibility Matrix**

Tasks	Harris	County	Comments
Prepare all installed sites for site inspections	X		Per CWIRS P25 Upgrade Project
Verify microwave backhaul system is functional, and meets reliability spec	X		Per CWIRS P25 Upgrade Project
Verify P25 Phase 2 system levels and parameters are set	X		
Verify ISSI Expansion and Talk Paths are Operational	X		
Verify system database is installed and operating correctly	X		
Verify proper dispatch operation	X		
Verify proper P25 system operation (Phase 1 and Phase 2)	X		
Verify proper network switching operation	X		
Provide access to customer owned sites		X	

## 4. Acceptance Testing and Coverage Characterization

. This expansion does not expand upon the site inspections, coverage characterizations, and voice quality testing performed as part of the CWIRS P25 Upgrade Project.

The tests fall into the following categories:

- **Functional Acceptance Test Procedures:** designed to test all new major features of the P25 Phase 2 system after sites have been installed and optimized.
- **Coverage Characterization verification:** One (1) day of coverage testing to verify no negative effects to P25 Phase 1 coverage after enabling P25 Phase 2 mode on the system.

The Acceptance Test Procedures are functional in nature and contain a short description, test methodology, and a record form for logging results and acceptance signatures for each test. The Harris and County teams will meet prior to the initiation of Acceptance Testing and come to a mutually agreeable Acceptance Test Plan. Upon satisfactory completion of the functional test, the Harris program manager will present documentation for system acceptance to the County's project manager.

**Table 13-- Acceptance Testing Responsibility Matrix**

Tasks	Harris	County	Comments
Provide appropriate team members to participate in test, site		X	CWIRS P25 Upgrade Project

Tasks	Harris	County	Comments
inspections, functional test			
Inspect each RF site, noting discrepancies on the punch list	X		Per CWIRS P25 Upgrade Project
Inspect each dispatch center noting discrepancies on the punch list	X		Per CWIRS P25 Upgrade Project
Perform functional ATP on P25 Phase 2 radio system and dispatch consoles	X		Customer witness. Harris will provide up to 6 sample radios to test P25 Phase 2
Submit functional ATP results	X		
Approve functional ATP results		X	

## 5. Cutover

The cutover process for the P25 Phase 2 Upgrade and ISSI Expansion described in this statement of work will not require Harris or County to deviate from the cutover described by the CWIRS P25 Upgrade Project cutover.

## 6. Training

No additional training is necessary as part of this Scope of Work. P25 Phase 2 is transparent to the end users and the system administrators. Moreover, the System Administration training County received as part of the CWIRS P25 Upgrade Project included Transcoder training.

## 7. Final Acceptance

With the completion of the Functional Test Procedures, cutover, and submission of the final drawing package, the Harris project manager will submit the final system acceptance letter for the County to sign. The functional acceptance for the scope included in this Scope of Work will append the acceptance information in Attachment C required by the CWIRS P25 Upgrade Project. With the final acceptance, the Harris project manager will arrange a meeting with the field service team to review maintenance support during the warranty period. The team will provide the contact information and procedures that will be used to obtain service during the warranty period. Contact numbers and procedures will be provided for normal working hours and after hours call out.

**Table 14-- Final Acceptance Responsibility Matrix**

Tasks	Harris	County	Comments
P25 system installation complete and punch list items resolved	X		Per CWIRS 800MHz Rebanding Project
Successfully complete Functional Acceptance Test Plan	X		
Accept functional test results		X	
Submit final as built package	X		
Submit letter of final system acceptance	X		
Provide warranty and contact information	X		
Accept final as built package		X	
Sign letter of final system acceptance		X	



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CWIRS P25 Phase 2 Upgrade and  
ISSI Expansion Quotation  
For  
County of Los Angeles ISD

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## Overview

Harris Corporation is pleased to provide a quotation to the County of Los Angeles to upgrade CWIRS infrastructure from P25 Phase 1 to P25 Phase 2

This quote provides pricing to upgrade all CWIRS VIDA equipment to P25 Phase 2 at the factory during staging, provide redundant Transcoders to enable Enhanced Dynamic Dual Mode (EDDM), and expand the ISSI server to support one additional system connection to LA-RICS.

- P25 Phase 2 Upgrade on 138 Base stations
- Enhanced Dynamic Dual Mode with Redundant Transcoders
- ISSI Expansion for 1 Additional System Connection
- 24 Transcoder Talk Paths
- 10 Additional Concurrent ISSI Calls
- ISSI Integration Services

## Enhanced Dynamic Dual Mode Advantages

When it comes to mixed mode interoperability between Phase 1 and Phase 2, Harris' Enhanced Dynamic Dual Mode (EDDM) will provide CWIRS with the best performance. Dual-mode, multi-site or ISSI calls will not require all radios to revert to P25 Phase 1 mode to participate, nor are special mixed-mode talk groups necessary. Harris EDDM operation uses the intelligence of the network to minimize the number of talkpaths used during a call. For a given interoperable talkgroup, the call will be transmitted in Phase 2 mode on cells with Phase 2 capable radios. On cells with Phase 1 only capable radios, the same call will be made in Phase 1 mode. The system chooses the most efficient protocol to ensure efficient operation. LA County can maximize its full user capacity on every site and cell.

# Pricing Summary

## County of Los Angeles Internal Services Department

### *CWIRS Phase 2 Upgrade and ISSI Expansion*

**22-Jan-14**

<b>Item</b>	<b>Part Number</b>	<b>Description</b>	<b>Qty</b>	<b>Ext List</b>	<b>Ext Sale</b>
<b><u>EQUIPMENT &amp; SOFTWARE</u></b>					
<i>NSC Licenses</i>					
	10 MANS-SG7D	License,Standard NSS,P25 Talkpath	59		
<i>Subtotal: NSC Licenses</i>					
<i>Phase 2 Base Station Software</i>					
	20 MASV-NSG9K	Feature,Software,P25 Phase 2	138		
<i>Subtotal: Phase 2 Base Station Software</i>					
<i>Transcoder</i>					
	30 MANM-TSCDR10	Server, Transcoder SR10A License,Quad Mode	1		
	40 MANM-NSG9C	Vocoder License,Transcoder	1		
	50 MANM-NSG9D	Talkpath	24		
<i>Subtotal: Transcoder</i>					
<b><u>SERVICES</u></b>					
<i>Phase 2 Services</i>					
	80 YASP1C	Service,Harris System Engineering	30		
	90 YBSP1M	Service,Harris Project Management	10		
	100 YBSP1N	Service,Harris Project Management T&L	2		
<i>Subtotal: Phase 2 Services</i>					
<b>P25 PHASE 2 TOTAL</b>				<b>\$ 1,537,045.00</b>	<b>\$ 1,168,286.25</b>

### ***OPTIONAL EQUIPMENT & SERVICES***

#### **EQUIPMENT & SOFTWARE**

##### *Redundant Transcoder*

110	MANM-TSCDR10	Server, Transcoder SR10A License,Quad Mode	1		
120	MANM-NSG9C	Vocoder	1		
130	MANM-NSG9D	License,Transcoder	24		



		Talkpath	
<i>Subtotal: Redundant Transcoder</i>			
<i>Optional ISSI Gateway Licenses</i>			
140	MANM-NSG9E	License,ISSI Gateway Talkpath	30
150	MANM-NSG9F	License,ISSI External System Connection	1
<i>Subtotal: Optional ISSI Gateway Licenses</i>			

**SERVICES**

*Redundant Transcoder Services*

160	YASP1C	Service,Harris System Engineering	2
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*Subtotal: Phase 2 Services*

*Optional ISSI Services*

170	YASP1C	Service,Harris System Engineering	10
180	YASP1L	Service,Harris System Engineering T&L	4
190	YBSP1M	Service,Harris Project Management	5
200	YBSP1N	Service,Harris Project Management T&L	2

*Subtotal: Optional ISSI Services*

**OPTIONAL EQUIPMENT & SERVICES TOTAL**

<b>\$ 261,565.00</b>	<b>\$ 204,056.25</b>
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**P25 Phase 2 + Options Total**

<b>P25 PHASE 2 TOTAL</b>	<b>\$ 1,537,045.00</b>	<b>\$ 1,168,286.25</b>
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<b>OPTIONAL EQUIPMENT &amp; SERVICES TOTAL</b>	<b>\$ 261,565.00</b>	<b>\$ 204,056.25</b>
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<b>TOTAL</b>	<b>\$ 1,798,610.00</b>	<b>\$ 1,372,342.50</b>
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Company Confidential

Notes:

1. Upgrades 138 Base Stations (19 Sites) to P25 Phase 2
2. Services include Factory install for hardware and software to support P25 Phase 2
3. ISSI Services include field time to integrate ISSI link to LA-RICS (not to exceed 15 work days)
4. Pricing is valid for 90 days from date of quotation
5. Payment Terms are Net 90 days on Special Discount
6. Key Management Facility (KMF) is not included, but recommended for Link Layer Authentication and AES encryption on capable terminals
7. County is responsible for appropriate Phase 2 upgrades of Exacom logging recorder software





COUNTY OF LOS ANGELES

REQUEST FOR APPROPRIATION ADJUSTMENT

DEPARTMENT OF INTERNAL SERVICES

DEPT'S. NO. 300

February 11, 2014

AUDITOR-CONTROLLER:

THE FOLLOWING APPROPRIATION ADJUSTMENT IS DEEMED NECESSARY BY THIS DEPARTMENT. PLEASE CONFIRM THE ACCOUNTING ENTRIES AND AVAILABLE BALANCES AND FORWARD TO THE CHIEF EXECUTIVE OFFICER FOR HIS RECOMMENDATION OR ACTION.

ADJUSTMENT REQUESTED AND REASONS THEREFOR

FY 2013-14

4 - VOTES

SOURCES

INTERNAL SERVICES DEPARTMENT
A01-IS-90-9031-13100
FEDERAL GRANT
INCREASE REVENUE - \$1,373,000

USES

INTERNAL SERVICES DEPARTMENT
A01-IS-2000-13100
SERVICES & SUPPLIES
INCREASE APPROPRIATION - \$1,373,000

SOURCES TOTAL: \$ 1,373,000

USES TOTAL: \$ 1,373,000

JUSTIFICATION

Request an increase in appropriation to further upgrade the Countywide Integrated Radio System (CWIRS) to a Project 25 Phase 2 mobile radio standard. This upgrade will enhance CWIRS' disaster preparedness for County users, provide the capacity to handle increased demand during emergencies, and allow the County to add more subscribers in the future. The costs of this upgrade will be fully reimbursed under the Urban Areas Security Initiative (UASI) 2010 grants funding.

ADOPTED BOARD OF SUPERVISORS

AUTHORIZED SIGNATURE DAVE YAMASHITA, ADMIN DEPUTY

BOARD OF SUPERVISOR'S APPROVAL (AS REQUESTED/REVISED)

#14 MAR 04 2014

SACHI A. HAMAI EXECUTIVE OFFICER

REFERRED TO THE CHIEF EXECUTIVE OFFICER FOR ---

- ACTION
RECOMMENDATION

- APPROVED AS REQUESTED
APPROVED AS REVISED

AUDITOR-CONTROLLER

BY [Signature]

CHIEF EXECUTIVE OFFICER

BY [Signature]

B.A. NO. 093

Feb 13 20 14

12/13 20 14



**Cal OES**  
GOVERNOR'S OFFICE  
OF EMERGENCY SERVICES

December 19, 2013

Alisa Finsten  
Office of Mayor Eric Garcetti  
200 North Spring Street, M175  
Los Angeles, CA 90012

SUBJECT: **APPROVAL OF EHP/NEPA SUBMITTAL**  
FY 2010 Homeland Security Grant Program (HSGP)  
Grant #2010-0085 Cal OES ID #037-95050

Dear Ms. Finsten:

The California Governor's Office of Emergency Services (Cal OES) and the U.S. Department of Homeland Security/FEMA have received, reviewed, and approved your EHP/NEPA request for the following:

- AEL# 06CP-02-BRDG, 06CP-04-WADN: Servers, software, services and licenses for CWIRS upgrade; 1318 N. Eastern Ave., Los Angeles, CA 90063; \$1,777,000

For further assistance, please contact your Cal OES Program Representative, Joseph Anderson, in Grants Management at [Joseph.Anderson@calema.ca.gov](mailto:Joseph.Anderson@calema.ca.gov) or 916-845-8426.

Thank you for your work in protecting California. We look forward to your continued collaboration towards our homeland security strategy and appreciate your cooperation and support.

Sincerely,

A handwritten signature in cursive script that reads "Ursula Harelson".

Ursula Harelson, Supervisor  
Homeland Security Grants Unit



**Cal OES**  
GOVERNOR'S OFFICE  
OF EMERGENCY SERVICES

December 19, 2013

Alisa Finsten  
Office of Mayor Eric Garcetti  
200 North Spring Street, M175  
Los Angeles, CA 90012

**SUBJECT: APPROVAL OF SOLE SOURCE CONTRACT REQUEST**  
FY 2010 Homeland Security Grant Program (HSGP)  
Grant #2010-0085, Cal OES ID #037-95050

Dear Ms. Finsten:

The California Governor's Office of Emergency Services (Cal OES) has received, reviewed, and approved the your Sole Source contract request dated December 18, 2013, based on the information your office provided regarding the proposed purchase of:

- Upgrades to the County Wide Integrated Radio System (CWIRS) from the Harris Corporation

Thank you for your work in protecting California. We look forward to your continued collaboration towards our homeland security strategy and appreciate your cooperation and support.

Sincerely,

A handwritten signature in cursive script that reads "Ursula Harelson".

Ursula Harelson, Supervisor  
Homeland Security Grants Unit

SECOND AMENDMENT TO CONTRACT NUMBER C-119731 OF  
CITY OF LOS ANGELES CONTRACT  
BETWEEN  
THE CITY OF LOS ANGELES  
AND  
THE COUNTY OF LOS ANGELES

THIS SECOND AMENDMENT to City Contract Number C-119731 ("Second Amendment") is made and entered into by and between the City of Los Angeles, a municipal corporation (the "City"), and the County of Los Angeles, a political subdivision of the State of California (the "Subgrantee" or "Subrecipient").

WITNESSETH

WHEREAS, the City and the Subrecipient entered into that certain City of Los Angeles Contract Number C-119731 (the "Agreement") related to the Fiscal Year ("FY") 2010 Urban Areas Security Initiative Grant ("UASI 10" or the "Grant"), whereby the City agreed to disburse UASI 10 grant funds to the Subrecipient in accordance with the UASI 10 approved budget and Subrecipient agreed to use the grant funds to address the unique planning, equipment, training, organization and exercise needs of the area, to assist in building an enhanced and sustainable capacity to prevent, protect against, respond to, and recover from threats or acts of terrorism, such Agreement having an initial term of October 28, 2010 through April 30, 2013; and

WHEREAS, on or about July 19, 2011, the Los Angeles City Council authorized the execution of said Agreement between the City and Subrecipient, with a term of October 28, 2010 through April 30, 2013 and an original allocation of UASI 10 grant funds to the Subrecipient in the amount of Eight Million Nine Hundred Forty-Nine Thousand Three Hundred Thirty Dollars (\$8,949,330.00) (C.F. #10-1166, dated July 19, 2011); and

WHEREAS, pursuant to delegated authority from the Board of Supervisors on September 13, 2011, the Agreement was executed by the County's CEO on October 6, 2011. The Agreement was executed by the City's Major on October 25, 2011.

WHEREAS, the First Amendment to the Agreement reduced the allocation of UASI 10 grant funds to the Subrecipient, resulting in a total allocated amount of Eight Million One Hundred Seventy-Nine Thousand Seven Hundred Ninety-Three Dollars (\$8,179,793.00), and extended the performance period deadline for UASI 10 for Subrecipient to March 30, 2014 ("Final Extension");

WHEREAS, this financial assistance is administered by the City of Los Angeles and is overseen by the California Emergency Management Agency, or its successor agency ("CalEMA"); and

WHEREAS, the City warrants and represents that on or about December 18, 2013, CalEMA approved the reallocation of UASI 10 funds from the Los Angeles Regional Interoperable Communications System Authority ("LA-RICS") in the amount One Million Three Hundred Seventy-Two Thousand Three Hundred Forty-Three Dollars (\$1,372,343.00) to Subrecipient for the upgrade of Subrecipient's County Wide Interoperable Radio System ("CWIRS") ("Fourth Modification"); resulting in a total allocated amount of UASI 10 funds to Subrecipient of Nine Million Five Hundred Fifty-Two Thousand One Hundred Thirty-Four Dollars (\$9,552,134.00) said Fourth Modification having been authorized under Section 14.8; and

WHEREAS, Section 505 of the Agreement provides for amendments to the Agreement; and

WHEREAS, the City, through its Office of the Mayor, Office of Homeland Security and Public Safety ("Mayor's Office"), and the Subrecipient each desire to enter into this Second Amendment for the purpose of amending and/or modifying the Agreement to (a) modify Subrecipient's total allocation of UASI 10 funds as set forth in the Agreement to reflect the Fourth Modifications, and (b) make any such other changes as are required in connection with the foregoing, all as detailed elsewhere in this Second Amendment and as authorized by the Los Angeles City Council (C.F. #10-1166, dated March 27, 2013) and Section 14.8; and

WHEREAS, this Second Amendment is necessary and proper to continue and/or complete certain activities authorized under the Agreement.

NOW, THEREFORE, the City and Subrecipient hereby covenant and agree that the Agreement be amended as follows:

1. Paragraph A of Section 301 of the Agreement entitled "Payment of Grant Funds and Method of Payment" is hereby amended in its entirety to read as stated within the quotation marks in the following 2 paragraphs:

"The City of Los Angeles shall disburse to Subrecipient its allocated Grant Amount of Nine Million Five Hundred Fifty-Two Thousand One Hundred Thirty-Four Dollars (\$9,552,134.00) to be used for purchase of equipment, planning, exercises, organizational activities, and training as described in Section 202 above. Such Grant Amount represents the amount allocated to Subrecipient in the FY10 UASI grant and budget, as may be amended. The disbursement shall be made on a reimbursement basis only.

Subrecipient shall maintain procedures to minimize the time elapsing between the award of Grant Funds and the expenditure of funds to be reimbursed by such Grant Funds"

The foregoing amendment decreases Subrecipient's original allocation of UASI 10 grant funds under the Agreement to reflect the Fourth Modifications. The Budget (as such term is defined in the Agreement) shall be amended accordingly to reflect such modifications and Subrecipient's use of grant funds in connection thereto.

3. Except as herein amended, all terms and conditions of the Agreement, as modified by the First Amendment, remain unchanged and in full force and effect by way of this Second Amendment.
4. This Second Amendment may be executed in one or more counterparts, each of which will be deemed an original, but all of which together will constitute one and the same instrument. This Second Amendment includes five (5) pages which constitute the entire understanding and agreement of the parties hereto in connection with the matters set forth herein.

IN WITNESS WHEREOF, the City and Subrecipient have caused this First Amendment to be executed by their duly authorized representatives.

<p>APPROVED AS TO FORM AND LEGALITY:</p> <p>MICHAEL N. FEUER, City Attorney</p> <p>By _____ Deputy City Attorney</p> <p>Date _____</p>	<p>For: THE CITY OF LOS ANGELES</p> <p>ERIC GARCETTI, Mayor</p> <p>By _____ Eric Garcetti, Mayor Homeland Security and Public Safety, Mayor's Office</p> <p>Date _____</p>
<p>ATTEST:</p> <p>HOLLY WOLCOTT, Interim City Clerk</p> <p>By _____ Deputy City Clerk</p> <p>Date _____</p>	
<p>APPROVED AS TO FORM:</p> <p>John F. Krattli County Counsel</p> <p>By _____ Principal Deputy County Counsel</p> <p>Date _____</p>	<p>For: The County of Los Angeles, a political subdivision of the State of California</p> <p>By _____</p> <p>Date _____</p> <p>[SEAL]</p>
<p>ATTEST:</p> <p>By _____ City Clerk</p> <p>Date _____</p>	

City Business License Number: \_\_\_\_\_  
Internal Revenue Service ID Number: \_\_\_\_\_

Council File/OARS File Number: 10-1166 Date of Approval: July 19, 2011  
City Contract Number: C-119731