MEMORANDUM OF UNDERSTANDING (MOU)

Whereas Tulare County HHSA wishes to provide access to excellent cost-effective vision care for its patients and clients and,

Whereas UC Berkeley Optometric Eye Center is a recognized provider of excellent vision care and seeks to provide public service to the people of California by conducting a program utilizing Telemedicine techniques in screening for diabetic retinopathy.

Now, therefore, in consideration of the mutual covenants, conditions, and terms hereinafter set forth, and for other good and valuable consideration, the parties hereto agree as follows:

This MEMORANDUM OF UNDERSTANDING is entered into this May 23, 2006 by and between the University of California, Berkeley Optometric Eye Center, hereinafter referred to as UCBOEC, and Tulare County HHSA, hereinafter referred to as TCHHSA. EyePACS, as discussed in this MOU, is a platform for clinical communication, which includes a web-based application to retrieve, send, and manipulate data between a database and browser clients. EyePACS is a registered Trademark. It is owned by Jorge Cuadros, O.D., Ph.D., CTEC Project Director, University of California. Use of the "EyePACS" name will require the approval of Jorge Cuadros if any modifications to the program are made beyond the term of the MOU.

The purpose of this MOU is to establish a non-exclusive agreement between UCBOEC and TCHHSA.
Both parties agree to be collaborative partners in the diabetic retinopathy screening project as described in Exhibit A and agree to fulfill the MOU in accordance with the following terms and conditions:

A. Operational dates:

1. The term of this MOU is effective beginning May 23, 2006 through June 15, 2007, unless earlier terminated by either party, without cause, upon thirty (30) days written notice to the other party. In the event of early termination, UCBOEC will remove retinal camera from TCHHSA premises.

B. EyePACS:

1. During the period of this MOU, UCBOEC will provide the EyePACS software as is, training in its use, modifications and coding of the software, and provide development support in the initial installation of the software free of charge to TCHHSA. During this time, UCBOEC will provide trouble-shooting, recommendations, and on site consulting.

2. TCHHSA will have complete access and license to use and modify all codes used in EyePACS, however, any use of EyePACS must acknowledge UCBOEC, the California Telehealth and eHealth Center, and the California Health Care Foundation.

3. Upgrades to the EyePACS software will be provided free of charge throughout the period of this MOU.

4. During the time in which TCHHSA has access to EyePACS system or any modified version of the EyePACS system, TCHHSA agrees not to sell or distribute any portion of the software.

5. During TCHHSA's use of the EyePACS software, TCHHSA agrees that the UCBOEC may have access to eye images and data collected through the EyePACS system that will only be used in strict compliance with HIPAA regulations.

C. Equipment/Location:

1. UCBOEC will place, UC Berkeley equipment, One Canon DGi digital fundus camera (or equivalent) to be installed at the TCHHSA site in an appropriate location to be recommended by TCHHSA.

2. TCHHSA will provide connection between the digital fundus camera and a computer terminal with 128K bits/second or faster connectivity to the Internet. Telephone voice access will be available at this workstation.

D. Personnel:

1. TCHHSA staff will be trained by UCBEOC to capture and transmit images, and to download reports and make necessary referrals to specialists.

2. TCHHSA shall assign sufficient staff to process retinopathy screening cases (as trained by UCBEOC) of up to 20 patients per week in each participating clinic.

E. Payment for services:

1. Implementation of this term will begin with the certification of the first staff photographer and end on June 30, 2007, or when the screening program is halted, whichever is sooner. In consideration of the costs incurred for processing retinopathy screening cases, UCBOEC will provide interpretations and reports at no cost for the first three months of this term. UCBOEC will provide interpretations and reports at no cost for 17 cases per month for each clinic which has ongoing retinopathy screening through EyePACS from TCHHSA commencing three months after the beginning of the term and ending at the end of the term. These services have an economic value of two hundred and fifty-five dollars ($255) per month.

2. Retinopathy screening performed at TCHHSA and interpreted by UCBOEC may be billed by TCHHSA to patients or third party providers. UCBOEC will collect monthly a fee of $15.00 per patient from TCHHSA for reading, interpretation, and report beyond the first three months and subsequently beyond the first 17 cases as indicated in section E1.

F. Notice:

1. Any notice required or permitted hereunder this MOU shall be written and delivered to:

Tulare County HHSA
5957 S. Mooney Blvd.
Visalia, CA 93277
Attn: Cheryl Smith

University of California, Berkeley,
Optometric Eye Center, Minor Hall
Berkeley, CA 94720
Attn: Jorge Cuadros

G. OIG Contraction Exclusion:

1. UCBOEC represents that UCBOEC is not on the General Services Administration's list of parties excluded from federal procurement programs and is not debarred by the U.S. Food and Drug Administration. TCHHSA shall not knowingly form a contract with, purchase from, or enter into any business relationship with, any individual or business entity that is publicly listed by a federal agency as debarred, suspended, or proposed for debarment. In the event that UCBOEC is on the excluded list or is debarred, this MOU is hereby terminated for breach.

This MOU is valid pending final signatures of the authorized representatives of the parties hereto.

THE PARTIES, having read and considered the above provisions, indicate their agreement by their authorized signatures below.

COUNTY OF TULARE

Date:_____

BY_____
Chairman, Board of Supervisors
"County"

ATTEST: C. BRIAN HADDIX
County Administrative Officer/Clerk of the Board
of Supervisors of the County of Tulare

By_____
Deputy Clerk

UC BERKELEY OPTOMETRIC EYE CENTER

Date: June 6, 2006

By _____

TITLE Dr. Edward J. Revelli
Associate Dean
UC School of Optometry

Approved as to Form
County Counsel

By _____
Deputy

Date 05/23/06

Exhibit A
Abstract

Central Valley Open EyePACS Program

Background:

Store-and-forward telemedicine can be a viable and less expensive alternative to real-time telemedicine for specialties such as ophthalmology and dermatology. In ophthalmology, store-and-forward telemedicine has been widely used for diabetic retinopathy screening over the past 14 years, and is perhaps the most successful use of telemedicine in eye care.
Diabetic retinopathy (DR) is the leading cause of blindness among working age adults in the United States. Early detection and treatment of sight-threatening DR can prevent blinding complications, but nearly half of all diabetics do not receive timely eye examinations. This problem is worse in the California Central Valley where the incidence of diabetes is significantly higher than the rest of California.

UC Berkeley Optometric Eye Center has developed EyePACS, a store-and-forward clinical communication system that has been used successfully for DR screening in diverse clinical settings. By performing near real-time interpretation of retinal images, clinicians at UC Berkeley specifically trained in diabetic retinopathy detection can provide:

1) detection and referral of patients with sight-threatening DR at the time of their primary care visit
2) training for primary care physicians and staff in retinal image interpretation, and
3) education for patients about their condition

Objectives:

1. Develop a network of 13 self-sustaining DR screening sites in existing primary care clinics that serve rural and agricultural communities in the California Central Valley. This network will be tied via EyePACS to the University of California, Berkeley Optometric Eye Center's distributed network of clinicians.
2. Develop a web-based clinical communication site to allow other Central Valley primary care clinicians and specialists to collaborate freely using digital images and clinical information about their patients, regardless of location.
3. Use this platform to expand to other store-and-forward telemedicine applications, such as glaucoma screening, dermatology consults, and ultrasound interpretation.

This system will interface with other telemedicine and PACS systems as well as standards-compliant electronic medical records and registries. Ultimately, any California community clinic that wishes to provide store-and-forward telemedicine services should be able draw on this open-source and open-access program to create a low-cost, effective, and sustainable program.