

ATTACHMENT A

Scope of Work

A. SENSITIVE INFORMATION HANDLING

US Imaging must comply with the County Code of Ethics (Attachment E) and County confidentiality policies and practices. In addition to other privacy and security requirements, Contractor shall maintain efficient and effective processes in place to approve access to systems containing County data upon hire and transfer, promptly remove access upon relevant personnel action (termination, transfer, contract ending, etc.), and monitor access accounts for dormant or inactive accounts.

US Imaging will ensure that any media identified for disposal shall have all County data erased, whether by degaussing activities, file re-write, physical destruction of the media (shattering) or other industry approved disposal methods, such as DoD 5220.22-M, IRS Media Sanitation guideline, etc.

US Imaging must take adequate precautions to ensure that identifying information (i.e. name, date of birth, address, social security number, parcel number, etc....) of another person, business, government, or other entity remains confidential. US Imaging shall have in place a system for immediate notification to the County of any suspected or actual incident involving the improper access, use, disclosure, or loss of County data, or as soon as it is known that County data potentially has been exposed or compromised.

US Imaging will be required to obtain signed non-disclosure agreements from all personnel providing services pursuant to an awarded contract in a form substantially similar to that included as Attachment D to this Contract. Non-disclosure forms must be completed by an employee prior to accessing County data.

B. SCOPE OF WORK – MICROGRAPHICS, FILM CONVERSION, INDEXING, AND OTHER SERVICES

Converting Digital Images to Film

The County currently has a daily process of electronically transferring digital images to a vendor for the purposes of creating microfilm. 2023 volumes averaged 162,000 microfilm images per month (low-137,000, high-196,000) with the number of documents transferred daily ranging between 1,500 and 2,500 with 1-25 pages per document. NOTE: Multiple times per year document volume may surge up to as many as 18,000 documents for the day.

- a. Digital images will be submitted in TIFF CCITT T6/Group 4 format at 300DPI.
- b. Film and Silver must be created as instructed by the County.
- c. Film and Silver halide rolls must be packaged in plastic storage boxes that meet ISO standards for a life expectancy of 500 years. Labels must be affixed to each box with the County Department Name, Document Type, Document Number range and Date range.
- d. Filmed images shall meet current ANSI and ISO standards including image type (TIFF), film roll length, page orientation, blipping scheme, labels, frame annotation, and type of enclosure.
- e. Images must be rotated so they appear in Cine Mode (Portrait Orientation) unless requested by County.
- f. Images must be sized to fit on the 16mm film unless requested by County.
- g. Digital images must be sorted and archived in Document Number order to silver microfilm, 16mm x 215', at a 32x reduction ratio.
- h. Each roll of film must contain approx. 8000 images.

- i. Documents must not be split between 2 different rolls.
- j. Each image must have a single level blip at the start of each document, unless otherwise requested.
- k. All first-generation rolls must be inspected for ANSI microfilm standards of 3' of leader, 100 lines of resolution, 0.9-1.2 density and 3' of trailer, visible defects and missing pages.
- l. Resolution and density targets will be included at the beginning of each roll. No splices will be utilized.
- m. Brown Tone application must be applied to all rolls.
- n. Certification must be at the beginning and end of the film that states the information is true and correct.
- o. Quality control checks of the digital image files to determine:
 - i. All of the document numbers are accounted for and are in sequential order.
 - ii. All of the pages for each document are present.
 - iii. All of the pages meet a minimum length and width (validates if a page was cut short).
 - iv. All of the pages, other than maps, do not exceed the maximum length and width (8.5" W x 14" H).
 - v. All of the pages are 300 DPI TIFF images.
 - vi. All digital copies are uncorrupted and valid.
- p. Film must be processed, and quality control checked utilizing ANSI, AIIM, ARMA, PRIA and CA specifications.
- q. Film must be visually inspected and corrected to ensure the following:
 - i. Clarity, contrast, frame spacing, blip placement and title targets are correct and within specifications.
 - ii. Excessive skewing could affect the content of the image.
 - iii. Anomalies
 - a. If anomalies cannot be fixed then the County will be notified immediately.
- r. Film must be tested to ensure compliance with ISO standards for residual fixer.
- s. Film must be returned in a scanner friendly format. The reduction ratio, character, frame formatting and blipping scheme on the film will be conducive to efficiently creating indexed, digitized images if the film needs to be scanned in the future.
- t. Media must be returned within 7 days of image retrieval.

US Imaging will utilize ANSI quality 16mm x 215' microfilm with archival quality LE-500 and create an FTP directory, with username and password, on their server for the County to submit images for archiving. The directory will only be accessed by the County and US Imaging's film lab staff, unless otherwise directed.

Digital images can become corrupt during the copy process or FTP process. The files will be present, and have a valid name, date, and byte size, but the image may not open and display properly during the archiving process. US Imaging utilizes a software program to open 100% of the files received to guarantee that they are not corrupt and will display properly. If corrupt images are discovered, the County will be notified, and a new file will be requested.

US Imaging will review the digital images for sequential Document Numbers to ensure that no documents are missing. If an export list or Excel is provided, US Imaging will compare the list of documents and number of images to the list and report any mismatches. If missing documents or images are discovered, the County will be notified, and the document/image will be requested prior to proceeding with the film writing.

US Imaging will sort and archive the digital files in Document Number order. US Imaging has a software program that calculates the page quantity within each multi-page TIFF and automatically creates a new directory for each range of multi-page TIFF rolls without exceeding the per roll limit. This quickly maximizes the number of images archived to each roll without splitting a document onto two separate rolls.

US Imaging will rotate 100% of the images so that they appear in Comic Mode (Portrait Orientation) and will resize images larger than 8.5" x 14" images so they will fit on the 16mm film.

US Imaging will archive designated TIFF images to 215', 16mm silver roll film at a 32x reduction ratio (approximately 8,000 images per roll). Each image will have a single-level blip at the start of each document unless otherwise requested.

All first-generation rolls will be inspected for ANSI microfilm standards of 3' of leader, 100 lines of resolution, 0.9-1.2 density, 3' of trailer, visible defects, and missing pages. Resolution and density targets will be included at the beginning of each roll. No splices will be utilized.

All new silver halide rolls will be packaged in plastic storage boxes that meet ISO standards for preservation. Labels will be affixed to each box with the County Department Name, Document Type, Document Number range, and Date range.

Media will be stored in climate-controlled conditions (>50% humidity/70 degrees F).

US Imaging will ship new rolls via UPS, with tracking and signature confirmation, to the County. Per the County's request, US Imaging will ship the new rolls weekly.

US Imaging will maintain copies of the images for thirty (30) days; after which the images will be purged from their servers. All images are the exclusive property of the County. US Imaging will not reproduce or distribute San Bernardino County images to any other entity without the County's express permission.

Daily Indexing Services

The County currently has a real time daily process of electronically transferring digitized images to a vendor for the purposes of capturing indexing information to be utilized in the management and tracking of recorded documents. 2020-2022 volumes averaged approximately 258,000 keystrokes per day/ 5,800,000 strokes per month.

Contractor shall provide the following indexing services to the County:

- a. ".Out" control data must be used as a quality control mechanism. Contractor must compare the out data with actual images received and report any discrepancies or corruptions.
- b. ".Out" control data to verify during the indexing process:

- a. Page Count
 - b. Document Type/Titles
 - c. Document Code
- c. Digital images must be submitted in TIFF CCITT T6/Group 4 format at 300DPI.
- d. Documents must be indexed in a "Key As You See" methodology and must match the document.
- e. Contractor must use the current California Document Reference Indexing Manual (DRIM) as the guide to stay within the federal, state & local laws that define the recording index requirements. Note: The DRIM can be purchased from the County Recorders Association of California (CRAC) - www.craonline.org.
- f. Contractor must use County specified keying instructions.
- g. Contractor must index the following fields on each document in accordance with the DRIM:
- i. All Grantors: Multiple lines
 - ii. Assessor Parcel Number: Multiple lines
 - iii. Tract No. for specified documents: Single line
 - iv. County reserves the right to modify the field list with at least a 10-business day notice.
- h. Contractor must duplicate index data for multi-title documents. Multi-title documents will be flagged for separate pricing.
- i. Contractor's Team Lead must communicate about any documents needing clarifications to the County appointed Team Lead within 12 hours of receipt.
- j. Contractor must utilize a blind key verification process, meaning that the verifier is unaware of the entries by the encoder.
- k. Response data must be returned to the County via Tyler's Eagle Recorder's web services tool and/or standard FTPS service. A web service XML ".in" response consist of control+ indexed data. A FTPS services response must include an index data file.
- l. Response data must be at a 99.95% accuracy rate at the character level.
- m. Contractor must maintain the file names for the indexed images with the original image file name.
- n. Response data must account for every document recorded that is contained in the ".out" submission or manifest.
- o. Contractor must return the index data within 24 hours of pickup and return daily summary reports by 6:00 p.m. Pacific Standard Time the next business day.
- p. The County must be notified of any discrepancies via email and/or telephone. The County shall respond with instruction on how to address the discrepancies before indexing of the document(s) in question.
- q. Daily reports must consist of the following:
- i. Statistical report that includes, but is not limited to the following information:
 - a. Recording date
 - b. Start and end document number

- c. Total number of documents in recording date
- d. Total number of missing documents
- e. Number of mismatched TIFFs
- ii. Exception report that includes, but is not limited to the following information:
 - a. Document numbers for documents with no Grantor/Grantee information
 - b. Document numbers for documents that have special characters
 - c. Document numbers for documents with missing pages
 - d. Documents that are missing
 - e. Gaps in the sequence of recording numbers
 - f. List of keyed Trust documents and their Grantee and Grantor entries
 - g. List of mismatched document numbers and TIFF names
 - h. Indexing issues such as excessively skewed pages, legibility problems, etc.
- iii. In the event of discrepancies, Contractor must work with the County to reconcile the differences.
- r. Archival copies of ".in" data must be maintained for 30 days. After 30 days, the images must be purged per Section V, Paragraph A.1 above.

US Imaging will coordinate with both the County and Tyler Technologies for document retrieval and uploading. US Imaging has experience using Tyler Technologies Eagle Recorder System Web Services tool and have created an in-house web-based program for indexing the transferred images.

Documents within Tyler Eagle will be transferred to US Imaging once the documents enter the pre-assigned workflow queue. The US Imaging Team Lead will assign the transferred documents to multiple experienced, project dedicated, personnel for indexing. The indexers are required to complete their documents within 24 hours of assignment. The indexer will sight verify and index the required fields below as they appear on the originally recorded document in accordance with the DRIM:

- a. All Grantors: Multiple lines
- b. All Grantees: Multiple lines
- c. Assessor Parcel Number: Multiple lines
- d. Tract No. for specified documents: Single line

To achieve the County's requested accuracy rate of 99.95%, US Imaging will perform a blind rekey double pass indexing technique (\$0.0036 per keystroke, per pass). Multi-title documents will be duplicated appropriately and flagged for separate pricing (\$0.012 per title).

If there are any issues with the images or documents, the Team Lead will immediately notify the County. If there are any indexing questions or delays in returning the files, the US Imaging Team Lead will promptly e-mail, or call the County. Daily reports will be submitted by 6:00 pm PST the next business day.

Scanning and Image Conversion Services

Stage 1 – Inventory, Prep, and Scan Media

The project will begin with the US Imaging team conducting a thorough inventory of the County's books and/or microfilm. US Imaging will create an online Production Report for tracking the location of the media and the status of the images throughout the entire project.

US Imaging recommends that the projects be scanned on-site with 24/7 access, and post-processing completed at their Saginaw, MI facility. US Imaging's on-site Project Manager will manage the equipment and staff, and ensure all processes are working correctly.

If the County elects to scan microfilm off-site, US Imaging will provide boxes and pelican cases for shipping. All pelican cases are tracked both via GPS Trakdot and via UPS.

US Imaging will scan all Bound and Mechanical books at 300 dpi in color to capture all 16,777,216 colors that are present and save the color images in JPEG format. US Imaging's staff will inspect 100% of the images on-site to ensure that no pages are missing, cut off, or out of focus before they leave the premises.

US Imaging will inspect and scan all microfilm at 300 dpi in grayscale to capture the 256 shades of gray that are present and save the grayscale images in JPEG format.

During off-site post-processing, US Imaging will extract individual pages and save each as a new single-page image. All grayscale JPEG images will be converted to black and white TIFF images. Images will be automatically deskewed and automatically cropped to remove any black borders. Images will be portrait right reading position and TIFF images will be white background with black text, unless dual polarity exists. Sometimes Photostat images contain dual polarity and marginal notations, these images will be manually reversed and corrected for polarity during Stage 3. All JPEG and TIFF images will be named as sequentially zero-filled 8-digit numbers for each book and stored in logically named directories named by Document Type\Image Type (JPEG or TIFF)\Book #. JPEG and TIFF images will be shipped to the County approximately one month after scanning is complete.

The County can access JPEG and TIFF images via US Imaging's proprietary software, *ImageXpress*, which enables the County or Public to easily access images by the Book-Image # or Roll-Image # prior to Stage 2 inspection and Stage 3 enhancement and formatting. Users can easily browse through the pages of each document, view both TIFF & JPEG images, adjust JPEG grayscale contrast, crop, skew, redact, mask, print, save or e-mail individual pages or multiple pages of a document. *ImageXpress* is provided during Stage 2 and 3 processing at no additional charge.

Stage 2 - Inspect, Crop, Group, Index and Verify

US Imaging's Production Manager and Account Manager will work together to ensure the processes within Stage 2 are performed to the County's specifications and timeline.

The automatic cropping provided in Stage 1 removes solid black borders that surround a page or camera copy board. Manual cropping will be performed just outside the edge of each page to provide a more accurate original page size, fewer bytes per image, better system performance, and overall appearance of every image. No data or marginal notations will be removed from the image during this process.

Each black and white TIFF (2 colors) image will be visually compared to each grayscale JPEG (256 colors) image on two side-by-side 27" Portrait monitors simultaneously as full size up to 12" W x 18" H. Each image will be checked for sequential order, missing pages, duplicate pages, "A" pages, retakes, redox spots, and image quality. Particular attention is to be given to the party names, legal description, Book and Page #'s, Document #'s, date and time stamps, and signatures during this process. If any part of the image is considered illegible it will be added to the Poor-Quality Image Report. The poor-quality issues that will be identified in the report are image too dark, image too light, blurry, redox spots, white spots, black spots, poor original, out of order, missing, duplicate, "A" page and retake. Poor quality images will be reported in an Excel Spreadsheet and can be visually inspected in our free software utility called *ImageReview*.

ImageReview will allow the County to easily sort the Poor-Quality Report by Book-Image # or the Issue (light, dark, blurry, redox spots, etc.). *ImageReview* can also auto select a random percentage set of images (10%, 20%, etc.) or filter the images by poor quality issue to isolate specific issues of concern and minimize the number of images that need to be reviewed. *ImageReview* will display the poor-quality image so the County can see the problem with the image. Images can be deselected from the list if the image is of acceptable quality to the County. *ImageReview* highlights images on the list after the County has inspected them so multiple inspectors know if an image has already been inspected or not. Once County review is complete, *ImageReview* exports an approved list of images to be enhanced that can be easily e-mailed to US Imaging and provides approval for specific images to proceed to Stage 3. This tool dramatically reduces the number of images that need to be inspected by the County and provides the County with complete control over the quality and budget. US Imaging's Poor-Quality Image Report provides proof that they have inspected 100% of the images with human eyes and allows the County to quickly inspect the poor-quality images that have been flagged if desired.

Since image quality is subjective and identifies 98% of the poor-quality images, US Imaging always presents an optional double inspection process where a second team of operators can inspect and report image quality a second time. The reports would be consolidated to deliver the highest image quality possible.

Land Records prior to 1947 are typically comprised of handwritten and typed pages that contain multiple documents on a single page. Land Record Management Systems require one set of images per document. Therefore, US Imaging will duplicate images with multiple documents on them, so that each document can be indexed individually and have its own set of images within the imaging system. These pages will be electronically duplicated during the grouping process so that they do not need to be scanned twice.

Our staff will manually group individual pages together for each document and name each document by both the document number (when available) and Book-Page number. Single-level grouping and indexing will deliver 98% accuracy.

Manual grouping and naming are prone to human errors, and US Imaging highly recommends their double grouping and naming process to eliminate them. 100% of the images will be grouped and named a second time by a second team of operators. The documents and names identified by the first operator and the second operator will be compared electronically and any mismatches will be inspected, verified, or corrected by a third operator to deliver the highest accuracy possible. This is commonly referred to as double key and verify in the indexing industry.

Stage 3 – Enhancement & Formatting

US Imaging's Production Manager and Account Manager will work together to ensure the processes within Stage 3 are performed to the County's specifications and project timeline. Stage 3 can be delivered in one batch, or multiple, depending on the County's budget needs.

US Imaging can adjust the poor contrast of an entire page or any specific area on a page to provide the most legible TIFF images possible. If the County is not satisfied with the legibility of any image, at any time, US Imaging will enhance the TIFF image from the JPEG backup image without having to physically rescan the original media at no additional charge.

Land Records prior to 1947 have handwritten and typed pages with multiple documents on a single page. US Imaging offers an optional masking service in Stage 3, so that only the document that is being indexed is displayed in the image.

Land Records from 1947-1965 are black Photostats with dual polarity and marginal notations with large black areas that dramatically increase TIFF file size and waste a tremendous amount of toner when printed. US Imaging's staff will reverse the polarity, so the entire page is white with black writing.

US Imaging will format the images and indexes to the specifications required by Tyler Technologies. All formatted images will be copied to a new set of USB Hard Drives and shipped to the County for review and

import into Eagle Recorder. The County is able to import all of the images in a single import or spread out as many imports as they like.

If the County elects to perform Full Indexing of records, this service will begin after image enhancements are completed so that the indexing information is not compromised by a poor-quality image.

Additional Services as requested by the County

Periodically, the County requires services on an as needed basis. The County currently has in excess of 50 years of historical records that could potentially need some level of service. The following are the tasks and requirements for these services:

- a. US Imaging shall perform the following functions as requested by the County:
 - i. Scanning - Inventory and Preparation
 - ii. Scanning - Paper to Digital Images
 - iii. Scanning - Paper to Film
 - iv. Scanning - Paper to Fiche
 - v. Scanning - Fiche to Film
 - vi. Scanning - Fiche to Digital Images
 - vii. Scanning - Film to Digital Images
 - viii. Scanning to Grayscale
 - ix. Conversion - TIFFs to PDF & Bookmark
 - x. Conversion - TIFF images from multipage to single page
 - xi. Special Analysis - Remediation of missing or inaccurate index data
 - xii. Special Analysis - Document identification
- b. General requirements for creating digital images:
 - i. US Imaging shall make arrangements to pick up media from County in a County-provided containers and transported in a climate-controlled conditions (>50% humidity/ 70 degrees F).
 - ii. US Imaging shall inventory documents.
 - iii. US Imaging shall scan to TIFF files and enhance the image legibility
 - iv. US Imaging shall Crop and Clean scanned images
 - v. US Imaging shall create silver microfilm of the images (Vital and Official Records).
 - vi. US Imaging shall create an index as requested of the information as specified in Section V- Paragraph B.
 - vii. US Imaging shall upload the data to County and notify them of the transfer.
 - viii. US Imaging shall make arrangements and return the original media to the County.
 - ix. US Imaging shall resolve any issues for any rejected documents and then perform the scanning process as stated above.
 - x. US Imaging shall prepare reports as specified in Section V, Paragraph A.3(r) and deliver them to the County.
- c. US Imaging shall copy film to film as requested by the County.
 - i. US Imaging shall make arrangements for pickup of film from the County.
 - ii. US Imaging shall copy the film in accordance with Section V, Paragraph A.2 — Converting Digital Images to Film; Creating Silver Copies.
- d. Preservation of electronic records – US Imaging shall provide backup of electronic storage of scanned images on their systems as specified in Section V, Paragraph A.3– Indexing. US Imaging shall provide the information upon request of the County.
- e. Photostat Restoration – US Imaging shall reproduce, enhance, and preserve old County Photostats of historical information.
- f. Miscellaneous Data Entry/Indexing – US Imaging shall provide other data entry or indexing service not covered by other areas of this contract.

All special project efforts are by request only. Unless specified by the County, these requests must follow the requirements outlined within this SOW. All special requests must be listed within the approved pricing sheet (Attachment B of the Contract). Any work requested that is not listed on an approved pricing sheet is considered outside the scope of this Contract and cannot be performed hereunder. Requests for such work must follow the County's procurement process and be authorized by the applicable approving authority prior to commencement of work.