

## Use Case: Hard copy directory to Excel conversion

**Client:** Professor from a recognized US university

**Scope of work:** To convert hard copy directory in digital format (Excel spreadsheet)

### Challenges found:

1. 900+ hard copy pages in directory
2. Client's limitation to provide us scanned copies of directory
3. Tight timeline of 10 working days including shipping time from US to India

### Solutions provided:

1. Confirmed with the client that he would not require hard copy directory back.  
Removed binding of the pages to ease document scanning process.  
Scanned the documents in PDF format in high speed document scanner with auto document feeder.
2. Shared PDF copies of all the scanned pages with client through FTP server for his record. It was client's requirement to have the scanned copies to audit the data delivered by our team.
3. Planned the end to end work process proactively to complete the data conversion in 4 working days.
  - **Scanning:** 1 hour, no resources required (ADF scanner)
  - **OCR:** Assigned 4 resources for 2 consecutive days to OCR the scanned PDF documents. It took around 70+ man-hours to OCR and check spellings of all the 900+ pages at the average productivity of 13 pages per hour.
  - **Quality control (QC):** Assigned 3 dedicated quality controllers. The QC process was running in parallel with OCR process to ensure errors are immediately discussed, rectified and monitored by the team members. QC process was done thoroughly using check lists to check errors from the data. It took around 30 hours for quality control process.
  - **Audit:** 10% random audit was performed in the QCed file by the auditor to spot check error. If any critical errors (as defined) were found, the entire batch was sent back for revision. Errors were highlighted and sent back for revision to concerned team member.
  - **Dispatch:** The Excel spreadsheet was emailed to the client and also uploaded on FTP server.
  - **Paper shredding:** All the hard copy pages of the directory were shredded and informed to the client once the data was approved by the client.

### Process optimization efforts:

- We used OCR to capture required data points from scanned PDF documents to Excel. It enabled us to increase our productivity greatly and deliver the output to the client in tight deadline.
- We used Excel macros to automate some steps in our quality control process.
- We used US names (First name and Last name) database to verify names in data file.
- We verified the US postal codes with an application which verified all the postal codes with USPS.

**Benefits to the client:**

1. The client could transform physical directory in accurate digital format in short time period. He could utilize the data in his multi-purpose business objectives.
2. Overcame the risk of loss and damage to your physical documents.
3. Enhanced information mobility and could easily share electronic data to all the stakeholders.
4. He could easily search and locate specific page from 900 pages
5. By outsourcing the project to Infobizz IT Solutions, he could save ample of time, cost and could focus on his core business objectives.

**Applications used:**

OCR application, PDF Reader, MS Excel, FTP client, MS Outlook, VBA Excel macros