

## **Automation of Digital Intake with MS 365 – CareLink of Georgia**

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Project ID: P26-T1-Automation of Digital Intake

Project Type: Industry Capstone

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Project Website: <https://cs4850-26.github.io/carelink/>

Github Repository: <https://github.com/CS4850-26/carelink.git>

Project Status: 90% Complete (Prototype Fully Functional)

Lines of Code: Low-code automation (Power Automate + Forms + SharePoint)

Total Man Hours: To be finalized

NDA: Signed and allowed to share project information

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# 1. Introduction

This project focuses on improving how CareLink of Georgia handles patient intake forms by moving from a **paper-based process to a fully digital one**. Before this project, most intake tasks at CareLink required patients to fill out paper forms, which then had to be scanned, uploaded, and stored manually by staff. While this system worked, it required a lot of time, effort, and repeated steps, which often slowed down the overall intake process.

To help improve this, our team designed and built a **digital intake automation system using Microsoft 365, Adobe Sign, SharePoint, and Power Automate**. With this system, intake forms can now be sent electronically, signed digitally, and stored automatically in a secure SharePoint location. This removes many of the manual steps that staff previously had to complete and helps keep all patient forms organized in one central place.

This final report explains the full journey of the project, including how the system was **planned, designed, developed, tested, and documented**. It also includes the training materials and test results that show how the system works in real use. These materials will help CareLink continue using and expanding the system even after the semester is over.

By the end of this project, CareLink now has:

- A **working digital intake workflow**
- A **step-by-step** training guide for staff
- A **reusable process** for adding more digital forms in the future

## 1.1 Background

**CareLink of Georgia** is a nonprofit healthcare organization that serves patients who may not have consistent access to healthcare services. Their mission is focused on helping individuals get the care and support they need, often working with patients who face financial or access-related challenges.

Before this project began, CareLink relied heavily on paper-based intake forms. When patients arrived at the clinic, they were given physical forms to complete. Staff then had to scan those forms, rename files, and upload them into their system. This process required multiple steps for every patient and depended heavily on staff time and attention.

Because everything was handled manually, the process could become slow and difficult to manage, especially during busy clinic hours. Staff had to juggle patient check-in, paperwork, scanning, and file storage all at the same time. Over time, this created challenges with organization, efficiency, and consistency.

CareLink approached this project with the goal of modernizing this process without overcomplicating their workflow. They wanted a **solution** that:

- **Reduced** the amount of paper being used
- **Saved time** for staff during patient check-in
- Kept all intake records in one **secure** digital location
- Was **easy** for staff to learn and continue using

Our team designed the digital intake system specifically around these needs. Instead of creating something brand new or complex, we focused on using tools CareLink already had access to, mainly Microsoft 365 and Adobe Sign. This allowed the new system to fit directly into their existing environment while still making a major improvement to how intake forms are handled.

## 1.2 Purpose

The main purpose of this project is to create a digital intake system that improves how CareLink of Georgia collects, signs, and stores patient intake forms. The goal is not to completely change how CareLink operates, but to improve one important part of their workflow by making it faster, more organized, and easier to manage.

Instead of relying on paper forms that must be printed, scanned, and manually uploaded, this project introduces a secure digital process using Microsoft 365, Adobe Sign, SharePoint, and Power Automate. This allows CareLink to move intake paperwork into one central digital system while still keeping their existing clinic operations intact.

The purpose of this project includes the following key goals:

- **Reduce manual work for staff**  
Staff no longer need to scan, email, or file paper forms since everything is handled digitally and stored automatically.
- **Improve organization of patient records**  
Completed forms are saved in SharePoint using consistent naming and metadata so they are easy to find later.
- **Create a reliable digital signing process**  
Patients can sign forms electronically using Adobe Sign, which removes the need for physical signatures.
- **Build a system that CareLink can reuse and expand**  
The workflow is designed so that CareLink can digitize and add more forms in the future without starting over.
- **Provide clear documentation and training**  
Staff receive a full training guide and walkthrough so they can use the system confidently and correctly.

Overall, the purpose of this project is to give CareLink a practical, easy-to-use digital intake solution that fits into their current environment, saves time, and prepares them for future digital improvements.

## 1.3 Scope

The scope of this project explains exactly what is included in our digital intake system and what is not included. Our goal was to build a working, reliable system for CareLink without making it overly complex or outside the limits of the tools and time we had.

This project focuses only on the patient intake process. It does not try to replace CareLink's full medical or billing system. Instead, it improves one specific part of their workflow and makes it easier for staff to manage intake paperwork digitally.

### In Scope

The following features and tasks are included in this project:

- **Digitizing one full intake form**
  - One of CareLink's existing paper intake forms is converted into a digital format.
  - All required fields from the original form are kept.
  - The form can be completed and signed electronically.
- **Electronic signatures using Adobe Sign**
  - Patients can sign forms digitally using typed, drawn, uploaded, or mobile signatures.
  - Signed forms are treated as official records.
- **Automated workflow using Power Automate**
  - Sending the form from the Form Selection Tool.
  - Waiting for the patient to sign.
  - Automatically saving the signed form to SharePoint.
  - Sending notifications when a form is completed.
- **Secure storage using SharePoint**
  - All completed forms are stored as signed PDFs.
  - Files are named in a clear and organized way.
  - Basic metadata such as patient name, staff name, and date is saved with each form.
- **Staff training and documentation**
  - A full written training guide with screenshots.
  - A step-by-step process staff can follow.
  - A guide for digitizing future paper forms.
- **Planning for legacy form digitization**
  - High-level steps for converting older paper forms into digital versions.
  - Use of scanning, OCR, and structured data storage.

These features together make up the complete digital intake workflow for this project.

## **Out of Scope**

The following items are **not included** in this project:

- **Direct integration with Methasoft**
  - The system does not automatically send data into Methasoft.
  - Any upload into Methasoft would still be a manual step done by staff.
- **Billing, insurance, or clinical charting**
  - This project does not handle payments, insurance processing, or medical charting.
- **Use of real patient data**
  - Only test and sample data are used during development and testing.
- **Mobile app development**
  - The system is web-based and designed to work through browsers only.

By clearly defining what is and is not included, we were able to focus on building a strong and reliable digital intake system that CareLink can actually use and expand later without being overwhelmed by extra features.

## **2. Requirements**

This section explains what the digital intake system is required to do in order to meet CareLink's needs. These requirements were created based on the current intake process, feedback from the sponsor, and what would realistically work within the tools being used (Microsoft 365 and Adobe Sign). The requirements help guide the design, development, and testing of the system so that it stays focused on what is actually needed.

The project requirements are divided into two main parts:

- **Functional Requirements** – what the system must be able to do
- **Non-Functional Requirements** – how the system must perform and operate

Both types of requirements are important to make sure the system is not only working correctly, but is also secure, reliable, and easy for staff to use.

### **2.1 Functional Requirements**

The functional requirements describe the main features and actions the digital intake system must support. These are the core tasks that allow the system to replace the paper intake process with a digital one.

At a high level, the system must allow staff to send forms electronically, allow patients to sign forms digitally, and store all completed forms automatically in SharePoint. Each part of the workflow must work together smoothly, so staff do not have to manually move files around.

The main functional requirements include the following:

### **Digital Form Selection and Submission**

- Staff must be able to choose which intake form to send using the Form Selection Tool.
- Staff must enter basic information such as:
  - Staff name
  - Staff email
  - Patient name
  - Selected form
- Once the form is submitted, the system must automatically start the intake workflow.
- Staff should not have to manually attach PDFs or email forms to patients.

This requirement is important because it simplifies the process for staff and removes unnecessary steps like printing, scanning, and emailing files manually.

### **Electronic Signatures (Adobe Sign)**

- The system must send the selected form to Adobe Sign for digital signing.
- Patients must be able to:
  - Open the form from a secure link
  - Fill in required fields
  - Sign using a typed, drawn, image, or mobile signature
- The form must not be considered complete until it is signed.
- Once signed, Adobe Sign must return the completed document to the system.

This ensures that all forms are legally signed and no paper signatures are needed.

### **Automated Workflow Execution**

- Power Automate must:
  - Detect when a Form Selection Tool submission is made
  - Send the correct form to Adobe Sign
  - Wait for the patient to complete the signature
  - Retrieve the signed document
  - Store it in SharePoint
- The flow must run without staff having to monitor it.
- The workflow must handle delays in signing without failing.

Automation is what makes the system efficient and prevents staff from having to track each form manually.

### **Document Storage in SharePoint**

- All signed forms must be automatically saved in a SharePoint library.
- Files must follow a consistent naming format (patient name, form type, and date).
- Staff must be able to:
  - Search by patient name
  - Filter by date or form type
  - Open and download completed forms
- Each submission should also generate a structured data file (JSON).

This keeps records organized and easy to retrieve when needed.

### **Email Notifications**

- Staff must receive an email notification when a form is successfully signed and stored.
- The email should confirm:
  - The patient name
  - The form type
  - That the intake is complete

This helps staff stay updated without needing to constantly check SharePoint.

### **Legacy Form Digitization Support (Future Use)**

- The system must support adding new digital forms later.
- Staff should be able to:
  - Scan older paper forms
  - Convert them into digital versions
  - Add them into the existing workflow
- The same automation process should apply to both new and legacy forms.

This allows the system to grow without needing major redesign.

## **2.2 Non-Functional Requirements**

The non-functional requirements describe how the system should perform rather than what specific features it has. These requirements focus on security, usability, performance, reliability, and maintenance. Since this system deals with patient data, these requirements are especially important.

### **Security and Privacy**

- The system must follow HIPAA guidelines for handling patient information.
- All documents stored in SharePoint must be protected using:
  - Microsoft 365 authentication
  - Role-based permissions
- Only authorized staff should be able to view intake forms.
- Patients should only access forms through secure Adobe Sign links.
- No real patient data is to be used during testing.

Security is a top priority because intake forms contain sensitive personal and medical information.

## **Usability**

- The system should be simple and easy for staff to use.
- The Form Selection Tool should:
  - Have clear labels
  - Use required fields to reduce mistakes
  - Be quick to complete
- The patient signing process should be easy to understand with:
  - Simple instructions
  - Clear signature options
- The system should not require advanced technical knowledge.

Usability is important so that staff can confidently use the system without needing constant technical help.

## **Performance**

- Forms should load quickly on clinic computers, tablets, and kiosks.
- The workflow should:
  - Send the form to Adobe Sign quickly
  - Store signed forms in SharePoint within a few minutes
- The system should handle multiple form submissions without crashing or slowing down.

A slow or unreliable system would defeat the purpose of improving the intake process.

## **Reliability**

- The system must:
  - Ensure forms are not lost
  - Store both PDF and JSON copies of each submission
- If something fails:

- A backup of the signed form should still exist in Adobe Sign
- SharePoint version history should allow recovery
- Power Automate should handle delays and retry when needed.

This ensures that staff can trust the system to work consistently.

## Maintenance and Future Use

- CareLink staff should be able to:
  - Add new forms
  - Adjust SharePoint views
  - Manage access permissions
- The system should not require a developer for small changes.
- Documentation and training materials must support long-term use.
- After the semester ends, CareLink should be able to maintain the system on their own.

This makes the solution realistic and sustainable for CareLink beyond the class project.

## 3. Analysis & Design

This section provides an overview of how the digital intake automation system was analyzed, planned, and designed before implementation. Much of this design is based on the earlier **Software Design Document (SDD)** completed earlier in the semester, but this report condenses and refines that material to reflect the final working system. The goal of this section is to describe how the major components work together, how data flows through the system, and how the design supports CareLink's operational needs.

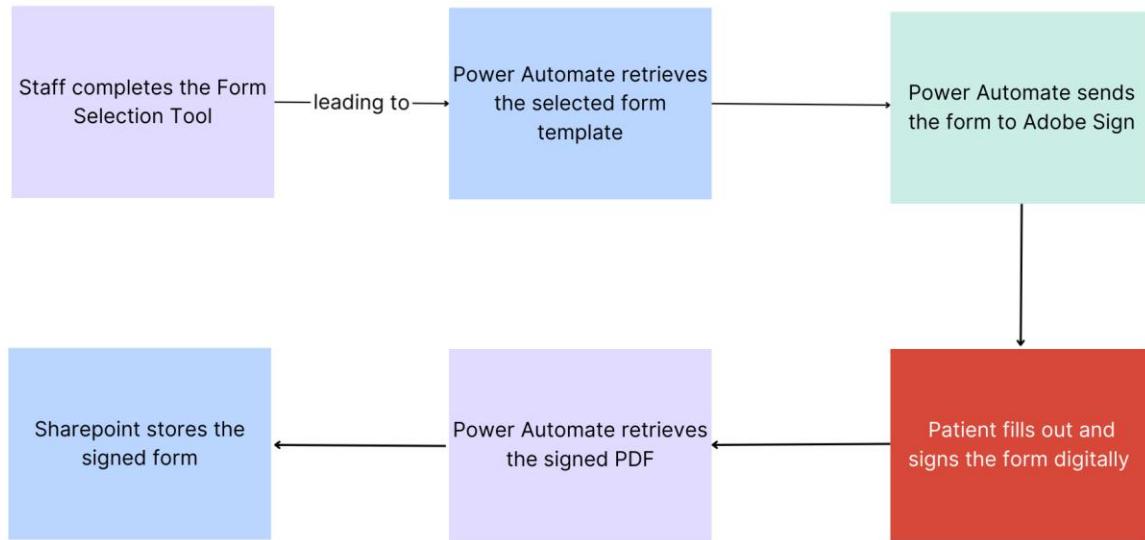
### 3.1 System Overview

The digital intake system replaces CareLink's paper-based intake workflow with a fully automated, low-code solution built using Microsoft 365 and Adobe Sign. Instead of giving patients paper packets and manually scanning completed forms, staff now initiate the process using an online Form Selection Tool. From there, Power Automate sends the correct form to Adobe Sign, waits for the patient to complete and sign it, and then stores the finalized PDF securely in SharePoint.

The system was intentionally designed to be simple, modular, and maintainable. CareLink staff can easily add new forms in the future by uploading a new template to SharePoint and updating the selection dropdown in Microsoft Forms. No coding is required.

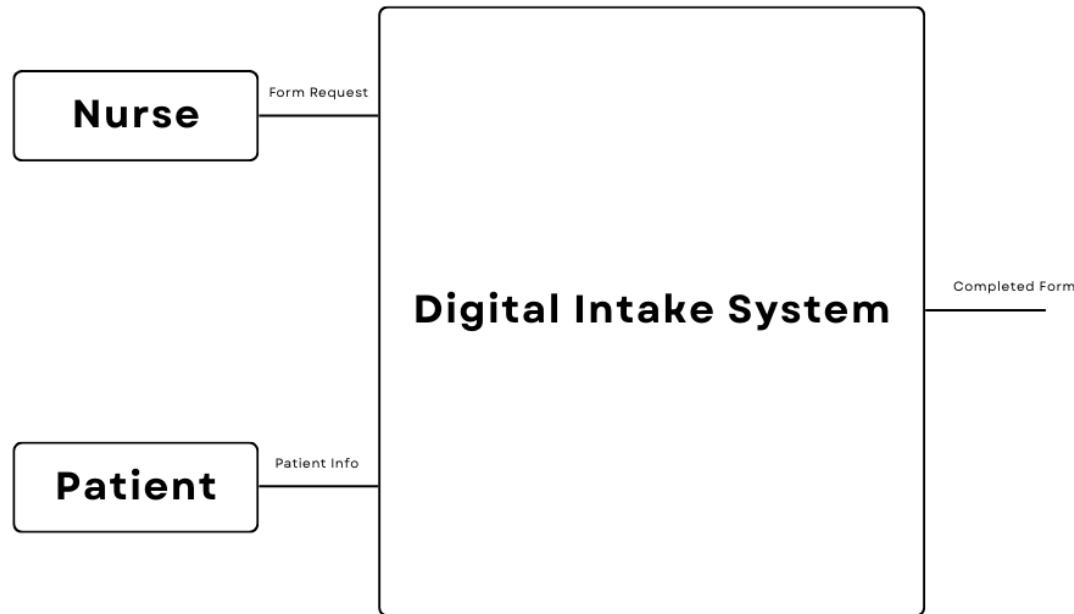
This modular approach was part of the original architectural strategy outlined in the SDD, which emphasized the use of Microsoft 365 native services, role-based security, and repeatable workflows.

## 3.2 High-Level Workflow



The high-level workflow diagram illustrates the complete digital intake process from form submission to secure storage. Once a staff member selects a form through Microsoft Forms, Power Automate automatically identifies the correct template and sends it to Adobe Sign for completion. Patients then fill out and sign the form within Adobe Sign's secure digital environment. After the signing process is finished, Power Automate retrieves the finalized PDF and stores it in the designated SharePoint list, where it becomes accessible for record-keeping, analytics, and reporting. This streamlined workflow eliminates manual handling, reduces errors, and ensures consistent tracking across the entire intake lifecycle.

### 3.3 Data Flow



The Data Flow Diagram provides a high-level overview of how information moves through the Digital Intake Automation System. The entire solution is represented as one central process that receives intake selections and staff information from CareLink Staff, generates and routes Adobe Sign documents through Adobe Sign Services, and ultimately stores completed and signed forms in SharePoint. The diagram highlights the major data exchanges such as form selection data, signature workflow packages, and completed PDFs. This top-level perspective clarifies how external actors interact with the system and how the system maintains a continuous flow of information from intake initiation to final form of storage.

### 3.4 Architectural Design and Explanation

The final architecture was shaped by four major constraints identified early in the project:

#### Limited Budget

- We were required to work with the tools that CareLink already owned such as Microsoft 365 and Adobe Sign.

## HIPAA Considerations

- Required to follow industry standards in terms of data storage, access permissions, and minimizing external use of data.

## Easy Future Modification

- Required a low-code system that staff could modify without programming experience.

## 3.5 Subsystem Design Summary

The system is composed of four key subsystems, each responsible for a distinct part of the intake workflow:

### Digital Intake Form (Microsoft Forms + Adobe Sign)

- Collects staff metadata.
- Routes to Adobe Sign for completion and signature.
- Includes validation for required fields.

### Workflow Automation (Power Automate)

- Extracts form metadata.
- Sends correct template to Adobe Sign.
- Waits for form completion.
- Retrieves signed PDF and stores it in SharePoint.
- Sends notification emails.

### Document Storage (SharePoint)

- Stores form templates (“Blank Forms”).
- Stores completed submissions (“Form Submissions”).
- Provides metadata filtering and sorting.
- Integrates with Power BI for analytics.

### Legacy Form Digitization (Future Expansion)

- Uses OCR and structured extraction tools.
- Includes a process for converting older paper files into digital templates.
- Not fully implemented due to scope, but design documented.

## 4. Development

Development for this project was a low-code approach since it will be managed by a team with low technical expertise. The goal was to make the system easy to manage by CareLink staff, and that goal was made possible using Microsoft and Adobe products and their simple user interfaces. There was no database connection needed for this project.

### 4.1 Tools & Technology

The project is developed using four different tools and technologies which include:

- Microsoft Power Automate
- Microsoft Forms
- Adobe Sign
- Microsoft SharePoint

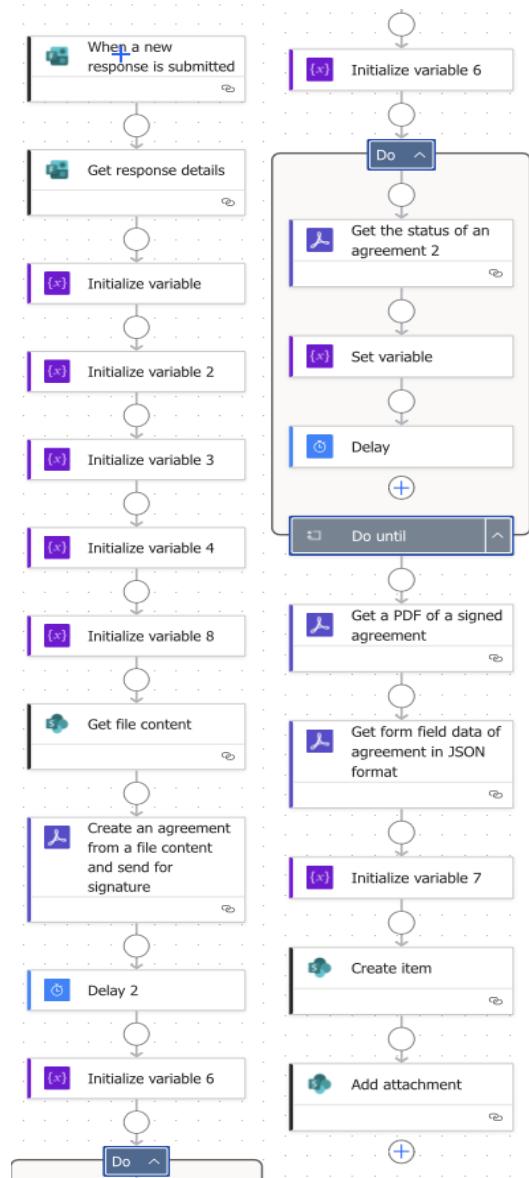
### 4.2 Development Approach

The team decided to develop the digital intake system using a modular development approach. During the development phase, the team developers would manage one part of the system. For example, one developer would focus on the project SharePoint while the other would focus on the electronic signature component. Later, the developers would come together to combine the components into a single working system. This development approach allowed for:

- Faster development
- Independence in development
- Making testing each component easier
- Easier collaboration

### 4.3 Automation Workflow Development

The entire automation will begin once the “Form Selection Tool” is submitted inside Microsoft Forms. This form asks for the staff name, email address, patient name, and type of form. After submission of this form, the flow in Power Automate is automatically executed. Below is the CareLink Intake Flow developed in Power Automate.

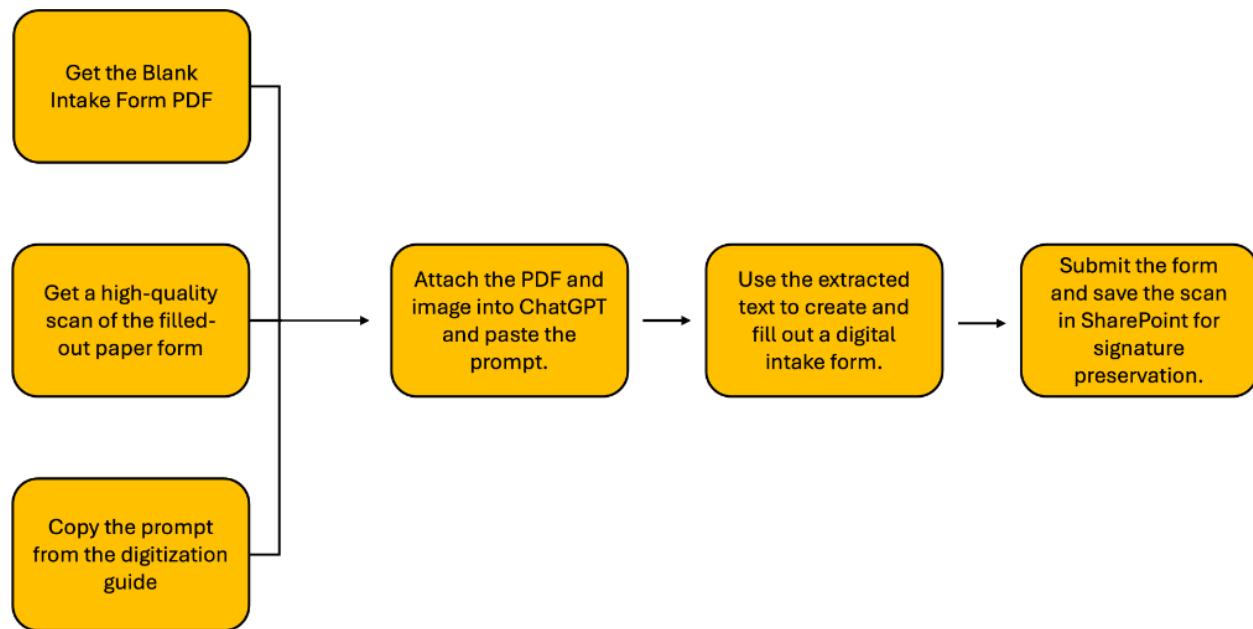


The automation extracts the information from the “Form Selection Tool” and uses it to select the form and email the form to CareLink staff to fill out and sign. The form is then filed out and signed using Adobe Sign, which is integrated as an action directly in Power Automate. The automation then performs a do-while loop while it waits for a “Submitted” status for the intake form. After the form is successfully submitted, the automation extracts the signed PDF agreement and stores it into SharePoint. Each submitted form is stored and organized in the “Form Submissions” which can be accessed by CareLink staff.

## 4.4 Legacy Form Digitization Design

Due to the scope of the project, no custom solution was able to be created, and only Microsoft and ChatGPT tools were to be used in the design of the legacy form digitization tool.

Below is the flow of the Legacy Form Digitization tool that will be used to turn filled out paper forms into fully digital intake forms stored in SharePoint.



A prompt was created by the development team that instructs ChatGPT on what text to extract and how to format that text. The goal of the prompt was to extract the text in an easy-to-read format. A blank PDF was required to further assist ChatGPT in identifying text fields to look for. Due to current ChatGPT limitations and accuracy concerns, a person will be required to manually input the extracted text to Adobe Sign. After submitting in Adobe Sign, the form will automatically be uploaded to SharePoint. Along with the digital form, the high-quality image of the filled-out paper form will also be uploaded in SharePoint for legal concerns surrounding the patient's signature and the importance of preserving it.

## 5. Testing (Plan & Report)

This section provides a comprehensive summary of all testing activities completed for the digital intake automation system. The Software Test Plan (STP) outlined what would be tested, how it would be tested, and the expected behavior of each system component. The Software Test Report (STR) then documented the results of each test, including successful outcomes, failures, fixes,

and overall system readiness. Testing was conducted throughout development and again after the system reached a stable state to ensure all components worked correctly both individually and as part of the complete workflow. This systematic approach allowed us to confirm that the system met all functional and non-functional requirements before preparing it for handoff to CareLink staff.

## 5.1 Test Objectives

The main goal of testing was to ensure that the digital intake system functioned correctly from end to end. Specific objectives included:

### **Verifying core workflow functionality**

- Testing confirmed that all steps from submission, Adobe Sign processing, automated workflow execution, final storage in SharePoint, and staff notifications occurred exactly as expected. This validated that the system replaced the old paper workflow with a consistent digital process.

### **Ensuring system reliability and stability**

- Repeated test runs were performed to confirm that the workflow behaved consistently under normal use, even when executed multiple times in a short period. These tests ensured the system could handle daily clinic usage without failure.

### **Testing security and permissions**

- Because patient information must remain protected, testing focused on verifying that:
  - Only authorized users could view submitted forms
  - SharePoint permissions blocked unauthorized access
  - Adobe Sign links required authentication
  - No sensitive data was exposed during automation

### **Conducting regression testing after flow updates**

- Each time Power Automate was updated, regression tests were run to ensure previously working features were not broken. Common checks included verifying SharePoint storage, Adobe Sign integration, and continued delivery of staff notifications.

### **Validating cross-platform behavior and connectivity**

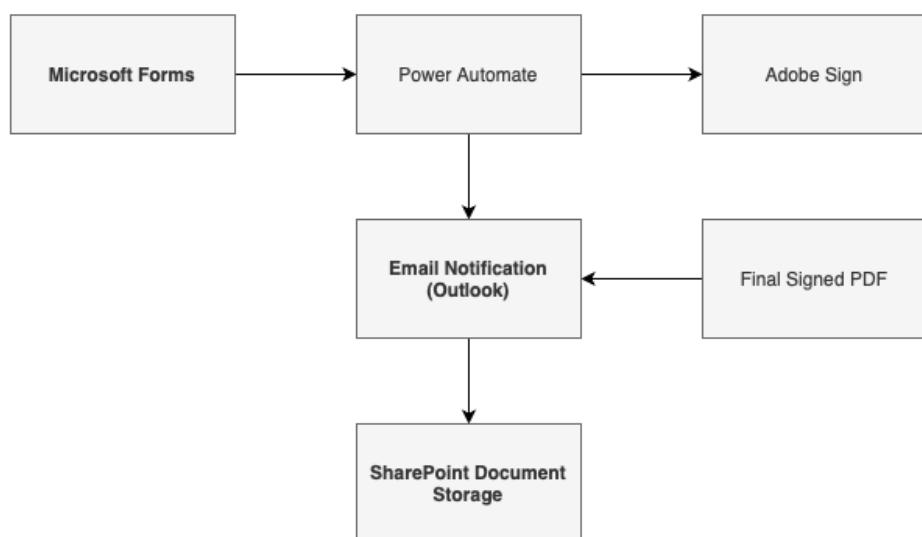
- Testing included running the workflow on multiple devices and networks to ensure stability across environments.

Together, these objectives ensured the system met the practical needs of CareLink staff while maintaining security, reliability, and ease of use.

### **Test Objective Table:**

<b>Objective ID</b>	<b>Test Objective</b>	<b>Description</b>	<b>Success Criteria</b>	<b>Priority</b>
TO-1	Core Workflow Validation	Ensure every step of the digital intake workflow performs correctly (Forms → Adobe Sign → Power Automate → SharePoint → Outlook).	All workflow steps complete with no errors.	Critical
TO-2	System Reliability	Validate repeated workflow execution without failure.	Workflow succeeds under repeated submissions.	High
TO-3	Permission & Security	Verify only authorized staff can access completed forms.	Unauthorized access attempts are denied.	High
TO-4	Regression Testing	Ensure updates to automation do not break previous functionality.	All previously working items remain functional.	High
TO-5	Cross-Platform Behavior	Confirm the workflow works across multiple devices and networks.	Successful execution on laptops, tablets, phones, and various networks.	Medium

### **Workflow Test Diagram:**



## 5.2 Test Results Summary

Testing demonstrated that the digital intake system performs correctly and consistently across all major components described in the STP.

### Progression Testing (End-to-End Tests)

- All progression tests passed, confirming that:
  - Microsoft Forms successfully triggered the workflow
  - Adobe Sign agreements were generated and signed without errors
  - Power Automate correctly monitored the signing status
  - Completed PDFs were stored in the proper SharePoint library
  - Metadata such as patient name, staff name, and date were stored correctly
  - Email notifications were reliably sent to staff members
- These tests confirmed that the workflow performs the complete digital intake process reliably from start to finish.

Test ID	Component Tested	Description	Result	Status
PT-1	Form Submission	User submits form via Microsoft Forms	Successful	PASS
PT-2	Adobe Signing	Patient receives and signs the digital document	Successful	PASS
PT-3	Power Automate Execution	Flow triggers and completes without error	Successful	PASS
PT-4	SharePoint Storage	Signed PDF stored with correct metadata	Successful	PASS
PT-5	Staff Notification	Staff receives email confirmation	Successful	PASS

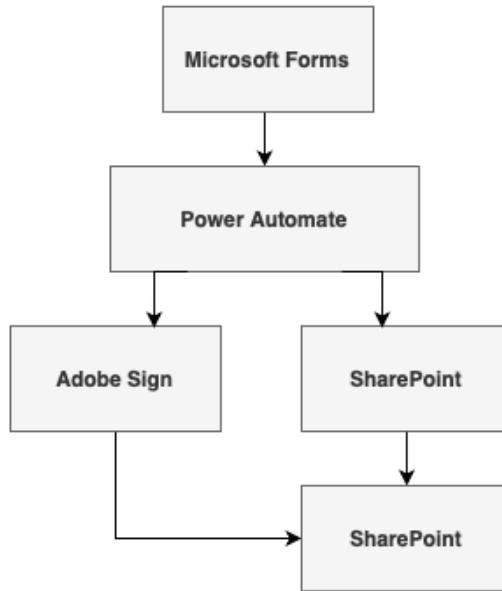
### Regression Testing

- Regression testing was performed after adjustments to the automation. These tests confirmed that:
  - Forms submitted correctly after metadata updates
  - Storage in SharePoint still worked regardless of form type
  - Email notifications continued to function
  - Permissions and security settings remained intact
- Each regression test also passed successfully.

Regression Test ID	Purpose	Focus Area	Result	Status
RT-1	Verify form reuse	Ensuring multiple submissions still succeed	Successful	PASS
RT-2	Verify SharePoint access	Confirming permission integrity	Successful	PASS
RT-3	Check notification system	Ensuring email alerts still send	Successful	PASS
RT-4	Confirm automation stability	Ensuring no failures from recent updates	Successful	PASS

## Integration Testing

- Integration testing confirmed that all five platforms (Microsoft Forms, Power Automate, Adobe Sign, SharePoint, and Outlook) communicated without interruption.
- No integration failures occurred during testing.



## Security Testing

- Security testing verified:
  - Only authenticated users could access SharePoint submissions
  - Unauthorized accounts were properly blocked

- Signed documents could not be altered after submission
- Adobe Sign links required proper verification

## Connectivity & Device Testing

- Tests conducted across different devices (laptops, iPads, phones) and networks (home and campus Wi-Fi) confirmed that:
  - The system worked on all browsers tested (Edge, Chrome, Safari)
  - The signing process resumed properly after reconnecting
  - No network-related failures caused workflow interruptions

## Issues Identified & Resolved

- Only minor issues were discovered:
  - **Occasional Outlook delay:** Emails sometimes arrived a few minutes late but did not affect workflow.
  - **Metadata formatting inconsistencies:** These were corrected by updating variable formatting in Power Automate.
- All issues were resolved before final testing.

## Final Status

The STR concludes that the workflow is stable, functional, and ready for CareLink pilot testing. Final rating: PASS for all core requirements.

## 6. Version Control

Throughout the development of this project, version control was primarily managed through the built-in capabilities of the Microsoft 365 ecosystem. Because our solution is constructed entirely on Microsoft services (SharePoint, Power Automate) and Adobe Sign, each platform provides native mechanisms for change tracking, recovery, and iterative development without requiring external tools like GitHub.

**SharePoint** automatically maintains a version history for pages, lists, and documents. This allowed the team to safely update site layouts, edit list columns, and modify instructional content while retaining the ability to revert to earlier versions at any time. SharePoint also provides a Recycle Bin and second-stage recycle bin, enabling recovery of deleted forms, lists, or files throughout the project lifecycle. This built-in tool proved valuable during UI revisions and restructuring of libraries such as *Blank Forms* and *Completed Forms*.

## Team-P26-T1 Digital Intake Smart Automation

 Empty recycle bin

### Recycle bin

 Name	Date deleted	Deleted by	Created by	Original location
 IntakeReport.pdf	12/3/2025 12:53 AM	Franck Dipanda	Franck Dipanda	sites/Team-P26-T1DigitalIntakeSmartAutomation/TrainingTutorials
 IntakeReport.pdf	12/3/2025 12:50 AM	Franck Dipanda	Franck Dipanda	sites/Team-P26-T1DigitalIntakeSmartAutomation/TrainingTutorials
	11/11/2025 10:33 AM	Franck Dipanda	Franck Dipanda	sites/Team-P26-T1DigitalIntakeSmartAutomation/Lists/Form Submissions
 11	11/11/2025 10:33 AM	Franck Dipanda	Franck Dipanda	sites/Team-P26-T1DigitalIntakeSmartAutomation/Lists/Form Submissions
	11/11/2025 10:33 AM	Franck Dipanda	Franck Dipanda	sites/Team-P26-T1DigitalIntakeSmartAutomation/Lists/Form Submissions

**Power Automate** similarly supports version control by maintaining a complete revision log for each workflow. Every time a change is made to a flow, a new version is automatically created. This goes from adjusting SharePoint connectors, reconfiguring triggers, or updating Adobe Sign actions. It allowed the team to test modifications incrementally and roll back to a stable version whenever needed. The flow's run history further provided detailed tracking of behavior over time, enabling debugging and validation as the system evolved.

The screenshot shows the Microsoft Power Automate interface for a specific flow. At the top, it displays basic metadata: Primary owner (Franck Dipanda), Created (Oct 23, 2025 at 10:53 AM), Modified (Dec 3, 2025 at 01:40 AM), Type (Automated), and Plan (This flow runs on owner's plan). Below this is a '28-day run history' table:

Start	Duration	Status
Dec 5 at 10:32 AM (3 d ago)	00:02:29	Succeeded
Dec 4 at 12:41 PM (4 d ago)	00:03:10	Succeeded
Dec 3 at 01:32 AM (5 d ago)	00:02:08	Succeeded
Dec 3 at 01:21 AM (5 d ago)	00:06:45	Succeeded
Dec 2 at 11:45 AM (6 d ago)	00:42:15	Succeeded
Nov 11 at 11:54 AM (3 wk ago)	00:02:28	Succeeded
Nov 11 at 10:34 AM (3 wk ago)	00:02:06	Succeeded

On the right side of the interface, there are sections for 'Co-owner' (with icons for FD, AG, AK, AS, T), 'Process mining (preview)', 'Average run duration (00:08:46)', and 'Associated apps and flows' (which indicates no associated apps).

*Figure: Screenshot from Power Automate revision log*

Together, these native Microsoft 365 features provide robust change tracking, safe recovery options, and structured workflow control throughout the project's development. This eliminates the need for an external version control platform during the build phase while still preserving historical integrity and accountability.

## 7. Summary & Conclusion

This project successfully transformed CareLink of Georgia's paper-based intake process into a modern, fully automated digital system using Microsoft Forms, Power Automate, Adobe Sign, SharePoint, and Outlook. The new workflow improves efficiency by cutting down on manual tasks, reducing errors, and making sure that all completed forms are stored securely and are easy for staff to access. The system was designed to blend into CareLink's existing workflow so that staff could begin using it without having to change how they normally work day to day.

Milestone 3 focused on turning the system into a long-term solution that CareLink can continue using and maintaining on their own. Deliverables such as the Legacy Form Digitization Toolkit,

the written training guide, and the step-by-step training videos give CareLink the tools they need to manage, update, and expand the system independently. These resources ensure that both current and future staff can understand the workflow and use it correctly with confidence.

Extensive testing, including progression, regression, security, and integration testing, confirmed that the system works reliably across all parts of the workflow. A few minor issues were discovered during testing, but they were fixed during development. The final Software Test Report rated the system as a PASS, showing that it is ready for pilot testing and real-world use.

Overall, this project provides CareLink with a secure, dependable, and user-friendly digital intake system that supports their long-term move toward digital operations. By delivering a complete workflow along with thorough documentation and training materials, the team made sure that CareLink can continue to benefit from this system and grow it in the future.

## 8. Appendix

The Appendix contains all supporting materials referenced throughout this Final Report. These materials provide additional detail for the project's planning, requirements, design, development, testing, and training components. Including these items in the Appendix allows the main body of the report to remain clear and focused while still giving the reader access to all detailed technical and instructional documentation.

All documents included in the Appendix build directly on the previously submitted project deliverables for the Project Plan, Software Requirements Specification (SRS), Software Design Document (SDD), Software Development Document, and Software Test Plan and Report (STP & STR), as required by the course guidelines. These materials also support the long-term use and maintenance of the system by CareLink staff.

The Appendix includes, but is not limited to, the following materials:

- **Project Plan Document**  
Includes the original project scope, objectives, milestone schedule, team roles, and communication plan used throughout the semester.
- **Software Requirements Specification (SRS)**  
Full list of functional and non-functional requirements used to guide the system design and development.
- **Software Design Document (SDD)**  
Detailed system architecture, subsystem descriptions, workflow diagrams, and design constraints.
- **Software Development Documentation**  
Technical descriptions of system setup, Power Automate workflows, Adobe Sign configuration, and SharePoint storage setup.
- **Software Test Plan & Software Test Report (STP & STR)**  
Complete testing procedures, test cases, pass/fail results, regression testing, and final system evaluation.
- **Training Guide & User Manual**  
Full written staff training guide with step-by-step instructions, security reminders, and best practices for system use.
- **Visual Walkthrough & Screenshot Library**  
Screenshots of:
  - Microsoft Form Selection Tool
  - Power Automate workflow steps
  - Adobe Sign signing process
  - SharePoint folder structures and viewsThese visuals support both training and system verification.
- **Legacy Form Digitization Toolkit Materials**  
Example prompts, extracted data samples, and sample outputs used for digitizing paper forms.

- **Version Control Logs**

Records of version history for:

- Power Automate workflows
- SharePoint document libraries
- Project Website (GitHub repository)

All Appendix materials are provided to support transparency, academic review, and future expansion of the system. These documents also serve as reference resources for CareLink staff so they can maintain, modify, and expand the Digital Intake Automation System after project completion.