# The Children's Institute of Pittsburgh

# **Executive Summary**

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## Background

Founded in 1902 by Mary Irwin Laughlin, The Children's Institute of Pittsburgh is a nonprofit organization dedicated to children with special needs and their families in Pittsburgh and Western Pennsylvania. The main campus is located in Squirrel Hill neighborhood of Pittsburgh. It provides an array of services, including autism services, educational services, behavioral health services, physical health services, family support services, care coordination services, and early intervention services. The mission of the Children's Institute of Pittsburgh is as follows: "To Heal. To Teach. To Empower. To Amaze." The organization has over 400 team members and 50 active volunteers. It served 9,179 customers in 2019, and is also providing virtual services during the pandemic time. With the help from CMU IS consulting teams, The Children's Instituteof Pittsburgh is attempting a major effort to digitize its electronic signature gathering process.

## **Project Description**

#### **Project Opportunity**

While the Children's Institute of Pittsburgh currently has a functional signature signing process where patients and family members fill out and sign on physical papers to provide information and give consents for treatment, it is an incredibly inefficient practice. Especially with the impact of COVID-19, Children's Institute has been looking for a more efficient and digitized solution to gather patient information and signatures. A more streamlined digital process can not only improve the patient experience, but it also reduces possibilities of errors such as mixing up patient documents when gathering signatures.

#### **Project Vision**

We envision a simple, easy-to-use web application streamlining the signature gathering process for the Children's Institute. We want to be able to filter both staff and patient signers, select pre-generated, reusable templates from the Adobe Document Cloud, and easily view the details (e.g. status, audit history, etc.) of signature requests that are already sent out. Most importantly, we want to make the signature gathering process as easy as possible by allowing the administrators at the Children's Institute to select recipients and templates in a streamlined workflow, and finish this process with a one-click send button.

### **Project Outcomes**

The main outcomes of this project is to design, develop, and deliver a web application that utilizes Adobe Sign API and FireStore (configurable based on the client's preference), to streamline the signature request process at the Children's Institute. The website has three main functionalities - search and filter both staff and patient signers, select templates and send out requests, and view detailed history of a specific agreement. The user of this application can easily modify the title, message, and the number of templates to send out in a specific request, and the application is easily configurable for the Children's Institute so that they can use their own records if desired, since currently the application is using a temporary database with mocked data.

### **Project Deliverables**

The project deliverables include access to our codebase in React and Express, a detailed guide on how to configure and setup the application for the administrators and developers at the Children's Institute, as well as additional documentation including our high-fidelity prototype in Figma, a Google Drive folder of all our meeting notes, a current issues log, and a plan for future work that is nice to have but was not included in the scope of this project.

#### Recommendations

We recommend our clients to conduct some user testing sessions with the administrators at the institute to see if there are additional features that can benefit them using Adobe Sign. We also recommend our clients to stay up to date with developer news at Adobe Sign, see if there are additional features being released that could further help improve the institute's business processes, such as a transition into OAuth 2.0 and multiple signers delegation. By continuing to explore Adobe Sign API and the Adobe software suite, the Children's Institute can truly benefit from a more streamlined and digitized signature gathering and form filling process.

# **Student Consulting Team**

**Daniel Li** served as the project manager. He is a senior graduating this May with a major in Information Systems. He looks forward to a career in software engineering and web development.

**Roy Xu** served as the client liaison and front-end engineer. He is a senior graduating this May majoring in Information Systems and Human-Computer Interaction. He will be joining GoDaddy as a systems engineer starting this summer.

**Jason Zhou** served as the quality assurance engineer. He is a senior graduating this May and with majors in Information Systems, Computer Science, and Business Administration. He will be joining Akuna Capital as a full-time C++ developer.