

# **Assignment 1 – System Proposal**

# Systems Development Process AIT 610

# **MICA Health Solutions**

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Instructor: Jeffrey Tirschman

## **Amic General Hospital**

## Health Information Management Department

## Project Request

**Project Name:** Patient Portal Integration **Date:** 09/18/2024

Project Sponsor:Cam Howard, Assistant DirectorTelephone:410 - 612 - 1010Agency/ Organization:Amic General HospitalE-mail:Mica@solutions.mdAgency Approval:Mia Hopkins, DirectorDate Required:09/23/2024

**Project Priority:** High  $\Theta$  Medium o Low o

**Justification:** Having access to healthcare services is important and necessary. But more than that, it should be affordable and convenient, encouraging individuals to better take care of themselves.

Also, see Business Needs and Expected Value (both tangible and intangible).

#### **Business Needs:**

The main purpose of a hospital is to perform diagnostics and provide health care services for its patients to prevent health problems or maintain health. However, systematic review shows that healthcare providers spend most of their workday reviewing patient records rather than actively helping others. There are approximately 15,000 hospital visits at Amic Hospital annually, which continues to grow yearly. An integrated patient portal will allow patients to communicate securely and conveniently with their providers, saving time and money. The implementation of this solution will help centralize patient records, appointments, and billing into one system, thereby reducing duplication and errors. It will enhance resource management, offering improved staffing options and better inventory control of medical supplies and equipment. These improvements can lead to a reduction in the hospital's overall expenses.

#### **Functionality:**

The user-friendly application will be available for access by patients and providers from the Amic Hospital homepage. It will include several integrated features such as patient management, where patients can securely update their personal and family health records. Patients will also be able to schedule and manage their appointments with medical personnel. Clinical management, which medical staff can use to streamline their workflows to be more efficient with their time. Tools for real-time tracking of medical supplies and equipment which will include usage analytics for proper planning and decision making. The system will also be able to keep track of patients' invoices, receipts, and integration to verify patients' insurance coverage without any delays. Multiple authentication layers to ensure that patients and clinical information are only authorized personnel. Performance dashboards will be made for top-level officers to monitor the hospital's general progress.

#### **Expected Value:**

#### **Tangible**

The new system will drastically reduce the amount of time hospital workers will spend reviewing patient records during their visitation since the prerequisite questionnaires and forms will already be updated on their online portals. In some cases, it will eliminate the inperson visitation for non-threatening situations and patients can contact their providers and receive guidance at their leisure.

An average physical examination takes about 30 minutes and with the new system, it will cut it down to 20 minutes for a total of 33% increase in productivity. Amic Hospital has an average of 15,000 admissions annually for a total potential time-related saving of 10 minutes x 15,000 which equals 2,500 hours per year. With an average labor of \$73.56 per hour, the hospital will save \$183,900 annually.

#### Intangible:

The new system will free up more time for medical staff's work hours, which will permit them to provide their services and quality care to more patients, which overall results in higher customer satisfaction. By streamlining their workflows, medical staff can reduce menial work, allowing them to focus on more engaging tasks and increase employee productivity and satisfaction.

## **Special Issues or Constraints:**

Since the system will have personal identifiable information from patients, it will be mandatory to have a complete security platform to protect that information from any unauthorized access which will increase the complexity and scope of the project.

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Date Received:		Project ID:	
Assigned To:		HIM Unit:	
Est. Completion Date	2:	Start Date:	
Additional Cost:		Completion Date	e:
Est. Level of Effort:	o High $=>200$ hrs	o Medium =100 TO 200hrs o	Low = <100 hrs
Actual Effort:	o High $=>200$ hrs	o Medium =100 TO 200hrs o	Low = <100 hrs
Comments:	_		