



*KU Bookstore*

*KU BOOKSTORE*

## QUALITY MANAGEMENT PLAN

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VERSION 1.0

APRIL 18, 2022

## QUALITY MANAGEMENT PLAN

### DOCUMENT CONTROL

#### DOCUMENT HISTORY

Version	Issue Date	Changes
1.0	4/18/2022	Initial Creation

#### DOCUMENT APPROVALS

Role	Name	Signature	Date
Project Sponsor	Dr. Saiedian		
Project Manager	Niklas Meissner		

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## QUALITY MANAGEMENT PLAN

### QUALITY OBJECTIVES

Quality in terms of KU Bookstore means that there are no critical or major bugs in the application. The application must meet the requirements of the stakeholders. Among all other requirements, students must be able to buy tickets for university sporting events, perform an in-text search in the online library, and purchase KU merchandise.

- Each component of the application should have unit test coverage of at least 60%.
- QA will create automated integration tests with test coverage of at least 75%.
- QA will run regression testing towards the end of the project to ensure previous functionality was not affected.
- QA will log bugs with the following prioritization:
  - Critical: Requirements are not met. The feature is not functional
  - Major: Requirements are met, but the feature does not meet stakeholder expectations.
  - Minor: Requirements and stakeholder expectations are met, but there are minor errors, such as spelling errors.
- The application can withstand the bug tolerance level:
  - 0 critical bugs
  - 0 major bugs
  - 25 minor bugs
- The application must meet performance metrics set in the non-functional requirements.
- The application must be easy to navigate.
- The application must provide responsive screen sizing.

### QUALITY ROLES AND RESPONSIBILITIES

Roles	Responsibilities
Quality Manager	Oversight of quality control on the project. This role will be fulfilled by the PMO Manager.
Project Manager	Scheduling and management of quality control activities.
Developers	Comply with quality standards and participate in quality control activities.
QA Engineers	Ensure requirements are met and code is within bug thresholds.

### DELIVERABLES AND PROCESSES SUBJECT TO QUALITY REVIEW

## QUALITY MANAGEMENT PLAN

Deliverable or process that will reviewed	Details of quality review
Risk Management	Part of the PMO project audit process
Testing including UAT	Part of the PMO project audit process
Software access and permissions	HTTS to transmit and receive data.  TLS 1.2 encrypt.  API require OAuth 2.0
Website accessibility	Meet WCAG 2.0.

## QUALITY CONTROL APPROACH

- The team will hold bi-weekly demonstration meetings with the stakeholders to ensure requirements are met.
- The stakeholders will review project deliverables in an UAT testing environment. They will have final sign-off for the feature being released to production.
- Definition of Ready:
  - The user story can be worked independent of other stories
  - The user story is negotiable
  - The user story is estimable
  - The user story is valuable and a vertical slice
  - The user story has acceptance criteria
  - The user story is small enough to fit into a single iteration
  - The user story is testable
- Definition of Done:
  - Code is tested by the developer before it is merged into the main branch.
  - Code is reviewed.
  - Code has proper unit testing.
  - QA created automated integration tests.
  - QA manually tested the story.
  - PM has UAT tested the story.