

Project Plan for King of Tokyo

RDK Co.

Development Team

Daniel Mendez

Ranjit John

Kevin Cruz

Contents

1. Overview	3
2. Goals and Scope	3
2.1 Project Goals	3
2.2 Project Scope	4
2.2.1 Included	4
2.2.2 Excluded	4
3. Organization	4
3.1 Organizational Boundaries and Interfaces	4
3.1.1 Resource Owner - Daniel Mendez	4
3.1.2 Receivers	4
3.1.3 Suppliers	5
3.2 Project Organization	5
3.2.1 Project Managers	5
3.2.2 Project-Internal Functions	5
3.2.3 Project Team	5
3.2.4 Steering Committee	5
4. Schedule and Budget	6
4.1 Work Breakdown Structure	6
4.3 Budget	7
4.4 Development Process	7
4.5 Development Environment	7
4.6 Measurements Program	8
5. Risk Management	8
5.1 Risk Mitigation, Monitoring, and Management (RMMM):	9
6. Communication and Reporting	9
7. Delivery Plan	10
8. Quality Assurance	10
9. Configuration and Change Management	10
10. Security Aspects	11
12. References	11
13. Revision	11

1. Overview

The following is RDK Co.'s plan for digitizing the popular board game, *King of Tokyo*, playable on PC's running Java. *King of Tokyo* is aimed towards PC gamers and traditional board game players and hopes to capture the interests of users playing an age old favorite right on their desktop. Unlike PC game companies today, who are constantly at war with one another to bring the best quality, graphics, and gameplay, RDK Co. seeks to take our users back to experience the traditional aspects of games their parents and grandparents loved. By the end of the development of this game, we hope to reinvigorate classic PC board games or card games which can boost the overall popularity of these genres of games. Since this game already exists, the cost of creating our product is fairly low. Additionally, development should not take longer than 3 months and we hope to launch by December 12, 2019.

2. Goals and Scope

The primary goal of our ambitions is to reconstruct the *King of Tokyo* board game into a portable video game application based in Java. Project-based goals and constraints will be set alongside our main goal in order to provide clear guidelines and expectations for project development.

2.1 Project Goals

Project Goal	Priority (1:low -- 3:high)	Comment/Description/Reference
Functional Goals		
Complete planning by the end of the first month of development	3	
Business Goals		
Complete and launch project by projected date	3	
Technological Goals		
Organize and configure development software	1	
Quality Goals		

Ensure quality of development per goal is controlled and consistent	2	
Constraints		
Monitor hardware, software requirements for development environment	1	
Ensure coding standards are applied accordingly	3	

2.2 Project Scope

The following section will include the specifications of deliverables to be made available by the projected launch date.

2.2.1 Included

Explicit deliverables that are expected to be provided:

- Download link for our digitized version of *King of Tokyo*
- The *King of Tokyo* video game executable
 - Base game/source files
 - A functional GUI that communicates between software and user(s)
 - Single-player/offline capability
- *King of Tokyo* player's manual
- Readme file, briefly describing its creators and contents

2.2.2 Excluded

Implicit deliverables excluded from consumer expectations:

- Additional downloadable content (DLC's)

3. Organization

3.1 Organizational Boundaries and Interfaces

3.1.1 Resource Owner - Daniel Mendez

3.1.2 Receivers

Receivers of our deliverables are individuals interested in playing our digitized version of

King of Tokyo. More specifically, this includes people with a recommendation of being ages 8 and over.

3.1.3 Suppliers

Company: Contact	Deliverable	Comment
Oracle	Java	
Eclipse Foundation	Eclipse	

3.2 Project Organization

3.2.1 Project Managers

Organization: Name
Daniel Mendez, Ranjit John, Kevin Cruz

3.2.2 Project-Internal Functions

Function	Organization: Name	Comment
Quality Assurance	TBA	
System Test Lead	TBA	
Validation Lead	TBA	
etc.		

3.2.3 Project Team

Organization: Name	Availability	Comment
Daniel Mendez	T/Th	
Ranjit John	T/Th	
Kevin Cruz	T/Th	

3.2.4 Steering Committee

Organization	Name	Comment
RDK Co.	Kevin Cruz	Assesses guidelines and general direction of ongoing processes within development

4. Schedule and Budget

4.1 Work Breakdown Structure

In order to meet the deadline of December 12, 2019, RDK Co. will begin immediately after this project plan is approved. Once approved, the first step is to get acquainted with the basics of JPanel, since the majority of the project relies on this Java feature. Since the members of RDK Co. are all experienced in Java, implementing the backend should take no more than 1 1/2 months. The remaining time will be spent on JPanel and getting all the game systems to work fluidly to provide a functional and intuitive user experience.

4.2 Schedule and Milestones

Milestones	Description	Milestone Criteria	Planned Date
M0	Start Project	Project Assigned	2019-09-12
	Project goals and scope are defined	Vision Document assigned	
M1	Start Planning		2019-09-20
	Vision Document completed; Project Plan assigned	Goals and scope are described	
M2	Begin Execution		2019-10-01
	Project Plan completed; begin design and backend	Requirements agreed, Project plan reviewed	
M3	Confirm Execution		2019-11-15
	Design and backend completed; begin UI	Design is stable, backend is correct and efficient	
M4	Start Introduction		2019-11-22
	UI completed; final adjustments	System has been undergoing testing, documentation draft	
M5	Release Product		2019-12-10
	System has been fully tested, finalize documentation	Product system has been tested, documentation reviewed	

M6	Close Project		2019-12-12
----	---------------	--	------------

4.3 Budget

Category	Budget for Period in Time hrs.					
	M0 - M1	M1 - M2	M2 - M3	M3 - M4	M4 - M5	M5 - M6
Human Resources (internal)	2	2	2	2	2	2
Equipment	0	0	0	0	0	0
Tools	0	5	0	0	0	0
Travel Costs	0	0	0	0	0	0
Review Activities	2	4	40	10	5	5
Other	0	0	0	0	0	0
Total	4	11	42	12	7	7
Total Accumulated	4	15	57	69	78	85

4.4 Development Process

For this project, RDK Co. will be utilizing the Extreme Programming (XP) agile process. Since we are a small group, pair programming is a given since we all have different programming strengths and weaknesses. Unit testing will be relevant throughout the project when medium to large portions of the backend or complete. These tests will ensure that the system works up to that point and limits any potential backtracking that could have occurred if these tests had not been performed. Each milestone will be considered as a “user story” and will therefore be grouped in deliverable increments. After every milestone, a commitment will be made for the next milestone. Overall, we believe this agile process to be the best for RDK Co. to approach this project.

4.5 Development Environment

Item	Applied for	Availability by
Methods		
N/A		

Tools		
JPanel	UI	M0
DIA or Draw.io	Design	M0
Languages		
Java	Backend	M0

4.6 Measurements Program

Type of data	Purpose	Responsibility
# of major changes	To ensure that they are recorded and are relevant to the overall system	CCM and QA
# of major errors	To ensure these errors are not repeated later during development	CCM and QA
Performance Data	Assess project requirements after major portion completed	QA Lead

5. Risk Management

Project Risks:

- Equipment failure
- Late delivery of software
- Technology will not meet expectations
- Changes in requirements
- Deviation from software engineering standards
- Poor commenting of source code

Risk Table: (1:Minor - 5:Severe)

Risks	Probability	Impact
Equipment failure	30%	5
Late delivery of software	20%	5

Technology will not meet expectations	10%	4
Changes in requirements	20%	2
Deviation from software engineering standards	25%	5
Poor commenting of source code	15%	3

5.1 Risk Mitigation, Monitoring, and Management (RMMM):

Risks are bound to happen in any project, so we have some ways to pad ourselves when the inevitable happens. First we will identify the risk and recognize/describe them. Second, we will analyze the risk and determine the consequence of each risk. Third, we will evaluate and rank the risk according to its impact on the project. Fourth, we will try to treat the risk and find possible solutions for it. Finally, after we solve the problem, we will monitor our systems so we can prevent it from happening again. Each week the project manager will revisit this section and update any probable risks we identify.

6. Communication and Reporting

Type of communication	Method / Tool	Frequency / Schedule	Information	Participants / Responsibilities
Internal communication				
Project meetings	In-person laboratory meet-ups	Weekly, T/Th	Project requirements, status, problems, risks	Project Mgr., Project Team
Sharing project data	Shared online repository (Github)	Whenever available	All project documentation, source game files	Project Mgr., Project Team
External communication				
Project reports	Social application	Weekly, T/Th	Project status, forecasts,	Project Mgr., Project Team

	software (Discord)		weekly results	
--	-----------------------	--	----------------	--

7. Delivery Plan

Ident.	Deliverable	Planned Date	Receiver
D1.	Vision Doc	09/20/19	A.Giacalone
D2.	Project Plan	09/27/19	A.Giacalone
D3.	Flow Chart	10/18/19	A.Giacalone
D4.	Software QA	10/25/19	A.Giacalone
D5.	Test Plan	11/22/19	A.Giacalone
D6.	Program Prototype	11/29/19	A.Giacalone
D7.	Delivery of Final Code	12/12/19	A.Giacalone

All deliverables will be submitted through our GitHub and be accessed by the receiver, Mr. Giacalone.

8. Quality Assurance

To ensure the quality of our product, progress will be recorded and reviewed per completed development goal.

Development Goals	Progress	Comment
Complete Project Plan	Completed	Complete base outline, to be revised during continuing development
TBA	Not started	

9. Configuration and Change Management

The main focus of the Configuration and Change Management (CCM) is to identify, record, and control any major software change. If such a major change occurs, CCM will ensure that the change is necessary and if so, properly implemented. By performing these tasks, unnecessary changes will be eliminated, all necessary changes will be monitored and controlled, and it will be

ensured that these changes have their impact limited on the entire system. This allows software development to continue to flow even with major changes without having to backtrack.

Despite being a team of 3 people, we will still appoint a CCM lead to report to though we will all have oversight of this aspect of the project. The CCM team will be working closely with QA to make sure that every change makes sense and is applicable.

10. Security Aspects

Due to the scale and simplicity of this project, there will be no need to worry about contractor agreements. All information regarding this project will be between RDK Co. and the project manager. If any of this information is leaked or used without permission of RDK Co., the project manager will be immediately notified and appropriate actions will be taken.

11. Abbreviations and Definitions

Abbreviation	Definition
CCM	Configuration and Control Management
QA	Quality Assurance
RMMM	Risk Mitigation, Monitoring, and Management

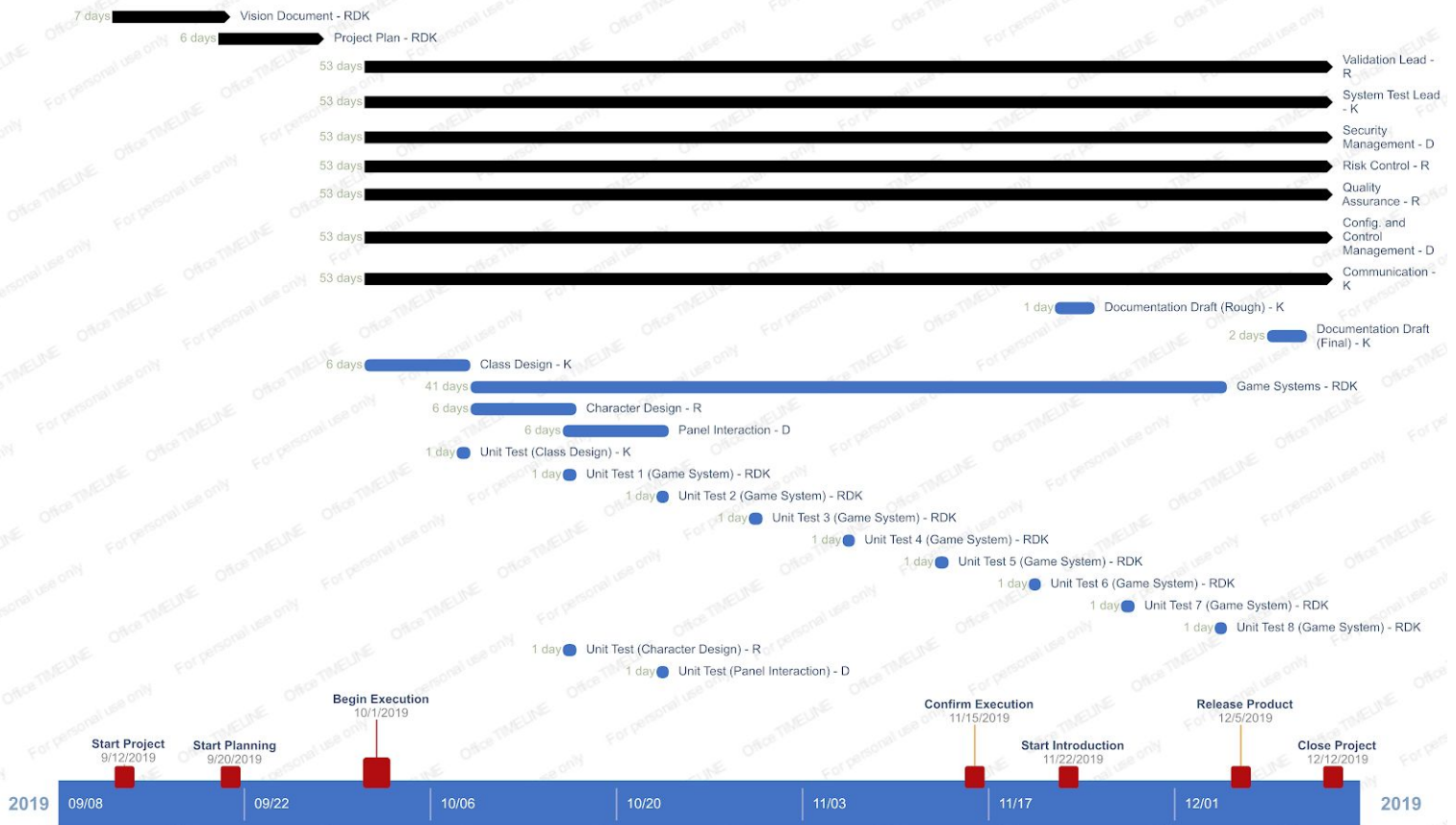
12. References

1. Vision Document for *King of Tokyo* - <https://github.com/danielmendez7899/CECS-343-Semester-Project/blob/master/Documents/Our%20Vision%20Statement.pdf>
2. Project Plan Template - <https://images.template.net/wp-content/uploads/2015/10/17193808/project-list-template-word.pdf>
3. Project Plan Sample - <http://www.mhhe.com/engcs/compsci/pressman/graphics/Pressman5sepa/common/cs2/projplan.pdf>

13. Revision

Revision	Page (P) Chapt. (C)	Description	Date Dept. / Init.
-----	-----	Original version	

King of Tokyo Dev. Timeline



R = Ranjit D = Daniel K = Kevin