

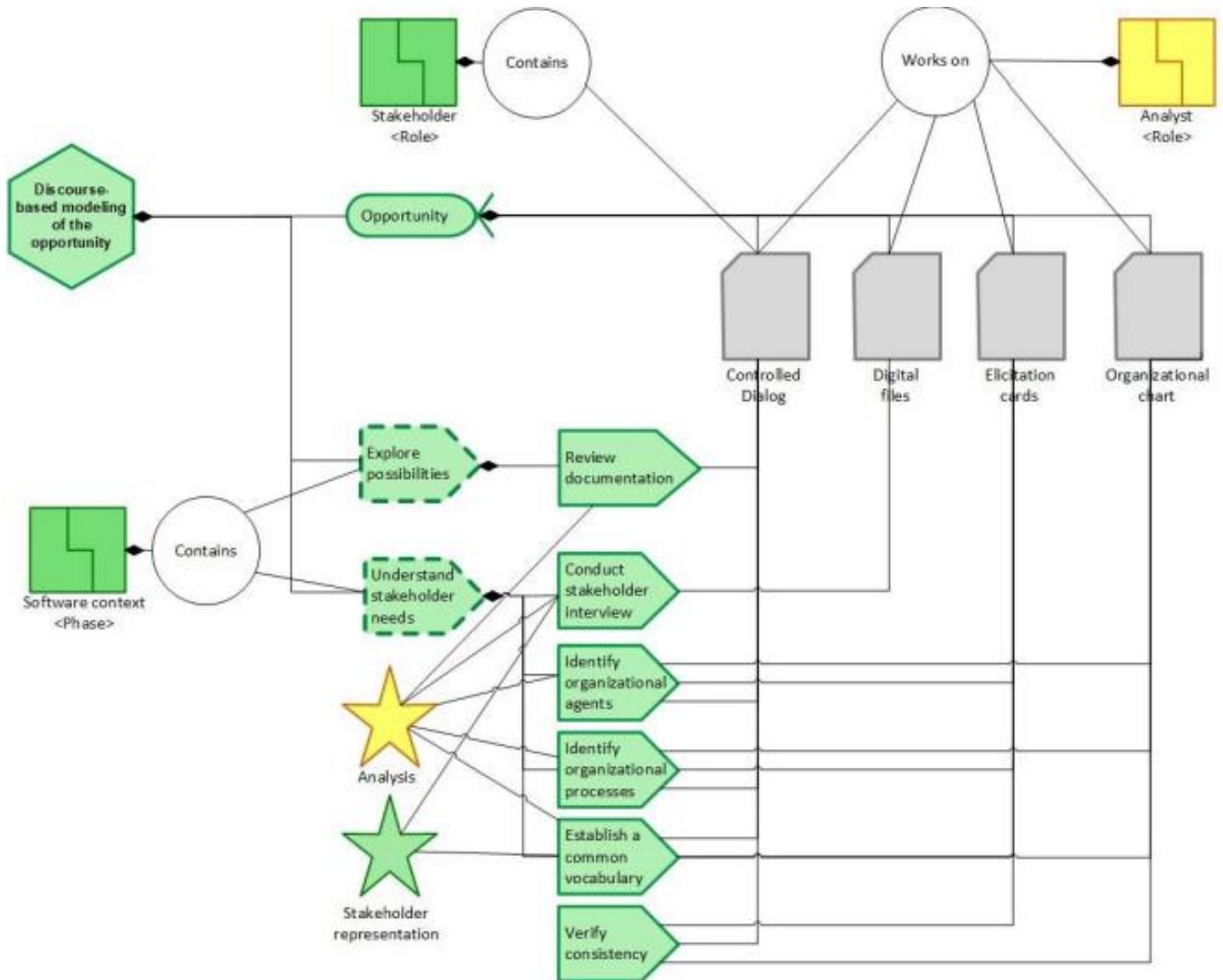
DELIVERABLE 2

THE PROJECT MANAGEMENT GAME

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Requirements >

Controlled dialog:

Analyst: Good morning. With this interview, we aim to clarify the information concerning the problem domain in which we will work. Please answer the questions in the clearest way possible.

Stakeholder: O.k. Let's start.

Analyst: What is the name of this organization?

Stakeholder: This is a Research_Group_on_Computational_Languages. Computing and Decision Sciences Department. Faculty of Mines. Universidad Nacional de Colombia sede Medellín.

Analyst: What is this Project about?

Stakeholder: It is about evaluating and improving a game named the_project_management_game.

Analyst: Please, can you tell me internal/external actors?

Stakeholder: The internal actors are Research_Group_on_Computational_Languages, pre-grade_students and post-grade_students. And the external actors are the game_designer and player.

Analyst: Which are the characteristics of the Research_Group_on_Computational_Languages?

Stakeholder: At this project, Research_Group_on_Computational_Languages has pre-grade_student and post-grade_student involved,

Analyst: What does the Research_Group_on_Computational_Languages do?

Stakeholder: Research_Group_on_Computational_Languages evaluates software_engineering_game; use emotional_transition_pattern_graph; evaluates emotional:transition_frequency.

Analyst: What is the mission of the pre-grade_student?

Stakeholder: Pre-grade_student is player. Pre-grade_student evaluates quality_factor; shares quality_factor.

Analyst: Which are the characteristics of software_engineering_game?

Stakeholder: Software_engineering_game has quality_factor; development_process.

Analyst: Which of the mentioned features have features themselves?

Stakeholder: Quality_factor is usability, motivation, player_experience and learning.

Analyst: and those have more features?

Stakeholder: Usability has dimension and dimension has a name and valoration, player_experience has dimension and dimension has name and valoration.

Analyst: Which are the differences between the name and the valoration of usability and player_experience?

Stakeholder: Perceived Learning, satisfaction, relevance, confidence, social Interaction, challenge, fun, focused Attention, narrative event are values of player_experience dimension name. Accessibility, operability, learnability, aesthetics are values of usability dimension name. -2, -1, 0, 1, 2 are values of both dimension valoration.

Analyst: Which are the characteristics of the emotional_transition_pattern_graph?

Stakeholder: Emotional_transioint_pattern_graph is an emotional_evaluating_method. Emotional_transition_pattern_graph has emotion, distance emotion transition, emotional transition frequency and story_event.

Analyst: Which of the mentioned features have features themselves?

Stakeholder: Emotion has name, emoji, valence and number. Story_event is Game_event and mechanic.

Analyst: and those have more features?

Stakeholder: Yes, game_event has actant, verb, game_object and rule. Mechanic has actant, verb, game_object and rule.

Analyst: Which values can take the emotion features?

Stakeholder: Joy, happiness, satisfaction, relief, sadness, fear, disgust, anger are values of name. -4, -3, -2, -1, 1, 2, 3, 4 are values of number. And positive and negative are values of valence.

Analyst: Which are the differences between game_event and Mechanic features values?

Stakeholder: Manager is a value of mechanic actant. Manager and staff are values of game_event actant. Completes, applies, pauses, resumes, resets, assigns, evaluates and changes are values of mechanic verb. Spawns, fulfills, spends and modifies are values of game_event verb. Project, event, the_project_manament_game and staff are values of mechanic game_object. Staff, task and budget are values of game_event game_object. Manager completes project, manager applies event, manager pauses the_project_management_game, manager resumes the_project_management_game, manager resets the_project_management_game, manager assigns staff, manager evaluates staff and manager changes staff are mechanic rules. manager spawns staff, manager spawns task, manager spawns budget, staff fulfills task, staff spends budget, manager modifies staff and manager modifies task are game_event rules.

Analyst: Which characteristics describe the game_designer?

Stakeholder: The game_designer has a nickname.

Analyst: What does the game_designer do?

Stakeholder: The game_designer teaches the player; develops the_project_management_game; incorporates the emotional_transition_pattern_graph; reports the development_process; considers quality_factor; generates emotion; provides practical_experience; uses a method; teaches project_management_skill.

Analyst: What does method have?

Stakeholder: Method has emotional design.

Analyst: What kind of project_management_skill teaches game_designer?

Stakeholder: Technical and non-technica project_management_skill.

Analyst: What are the characteristics of the_project_mangement_game?

Stakeholder: The_project_management_game is a software_engineering_game.

The_project_management_game has project, score_storage, learning_concept, rating.

Analyst: Who interacts with the_project_management?

Stakeholder: Player plays the_project_management_game when he starts the_project_management_game.

Analyst: What happens when player starts the_project_management_game?

Stakeholder: Manager spawns staff then staff emerges; Manager spawns task then task emerges; Manager spawns budget then budget emerges. Player learns project_management_skill.

Analyst: Would you please mention some features of the Player?

Stakeholder: Player has username, project_management_skill, practical_experience, emotional_transition_frequency, quality_factor and emotion. He is a manager when the player starts the_project_management_game.

Analyst: Please list the main functions of the manager.

Stakeholder: He completes project; applies event; assigns; evaluates and changes staff; completes project; pauses; resumes and resets the_project_management_game; spawns task; spawns staff; spawns budget; modifies task; modifies staff.

Analyst: Are these functions gathered in some sort of responsibility?

Stakeholder: Yes, assigns, evaluates and changes are gathered as "manages staff"; pauses, resumes and resets are gathered as "controls the_project_management_game".

Analyst: do any of these functions have a restriction?

Stakeholder: Of course, staff emerges then Manager can manage staff; player starts the_project_management_game then manager spawns task, staff and budget.

Analyst: What are the elements of the project characteristics?

Stakeholder: The project has a Gantt_chart_template, warning_message, week, timeline, duration, budget, event, staff, total_spending and task.

Analyst: Which of the mentioned features have features themselves?

Stakeholder: Yes, the task has name, spending, estimated_duration, prerequisite, advance_percentage, start_date, schedule_start_date and duration. Each total spending has color, rate and worth.

Analyst: Do any of those have characteristics, too?

Stakeholder: Yes, spending has color, rate and worth.

Analyst: Which colors can spending and total spending take?

Stakeholder: They both can be black, green or red.

Analyst: And which rates can spending and total spending take, too?

Stakeholder: They both can be low, moderate or high.

Analyst: Are there restrictions in the project characteristics?

Stakeholder: Yes, They are timeline <= week; duration <= week.

Analyst: What kind of messages are there?

Stakeholder: Warning messages could be Assign_Staff!, Over_budget! , Staff_burnout!, OK!.

Analyst: Can you tell me some characteristics of the staff?

Stakeholder: Staff has a name, icon_color, pace and cost.

Analyst: What do this staff do?

Stakeholder: Well, Staff spends the budget and fulfills tasks.

Analyst: Do any of these functions have restrictions?

Stakeholder: yes, budget emerges then staff can spend the budget; task emerges then staff can fulfill task.

Analyst: Which values can staff pace take?

Stakeholder: Pace can be slow, average or fast.

Analyst: How does the staff earn?

Stakeholder: Cost can be low, average or expensive.

Analyst: What does the manager need in order to apply for the project event?

Stakeholder: He just needs to have a project timeline = "3 weeks".

Analyst: What happens when the manager applies for an event?

Stakeholder: Task or staff changes, manager modifies task or staff.

Analyst: Could you establish a sequence of functions or responsibilities?

Stakeholder: Begin, Player plays The_project_management_game, then manager controls The_project_management_game and manages staff. Then staff spends budget; then fulfills task. Then manager completes project, then player learns project_management_skill. Another sequence, game_designer launches the_project_management_game, then player plays the_project_management_game, then game_designer generates emotion and provides practical_experience. Other sequence, game_designer uses method, then game_designer reports development_process and game_designer develops the_project_management_game, then Research_group_on_computational_languages evaluates software_engineering_game, then pre-grade_student evaluates quality_factor, then pre-grade_student shares quality_factor, then Research_group_on_computational_languages uses the emotional_transition_pattern_graph, then Research_group_on_computational_languages evaluates the emotional_transition_frequency, then game_designer considers quality_factor, then game_designer incorporates emotion_transition_pattern_graph

Analyst: What are the goals associated with the project?

Stakeholder: The goals are “preserving the budget” and “reducing the duration”.

Analyst: What are the goals associated with the project management game?

Stakeholder: The goals are “improving the_project_management_game” and “increasing the rating”.

Analyst: What are the goals associated with the manager?

Stakeholder: The goal is “allowing the managing of the staff”.

Analyst: What are the goals associated with the player?

Stakeholder: The goals are “encouraging the player”, “expanding the learning_concept”, “gaining practical_experience”, “improving the project_management_skill” and “guaranteeing the learning of project_management_skill” ..

Analyst: What are the goals associated with the research group on computational languages?

Stakeholder: The goal is “improving method”.

Analyst: What are the goals associated with the research group on computational languages?

Stakeholder: The goals are “achieving the incorporation of emotion_transition_pattern_graph”, “Improving quality_factor”, “improving the emotional_design”, “increasing emotional_transition_frequency” and “promoting the emotional_design”.

Analyst: What are the problems associated with the_project_management_game?

Stakeholder: The problems are “the_project_management_game has unusable score_storage” and “the rating of the_project_management_game is unknown”

Analyst: What are the problems associated with player?

Stakeholder: The problem are “players are not encouraging”, “practical_experience of the player is low” and “player has few emotional_transition_frequency”

Analyst: What are the problems associated with game_designer?

Stakeholder: The problems are “game_designer does not consider the quality_factor”, “game_designer does not incorporate transition_emotion_pattern_graph”, “game_designer reports scarcely development_process” and “game_designer uses a method without emotional_design” it means “method does not have emotional_design”

Analyst: What are the problems associated with quality_factor

Stakeholder: the problems are “usability of the quality_factor are low valorations” and “player_experience of the quality_factor are low valorations”

Analyst: What are the problems associated with the task?

Stakeholder: The problem is “the name of the tasks is unclear”.

Analyst: Thank you for your valuable information. We will be in contact in order to clarify any doubts that may arise in this process.

Stakeholder: Thank you. I'll be in touch.

Elicitation cards

FUNCTION	
Develops	
ACTOR	Game_designer
OBJECT	The_project _Manage- ment_game
CONSTRAINT	
Game_designer develops (t_p_m_g) then to game_designer uses method.	

GOAL	PROBLEM
Expanding learning_concept, Gaining practical_experience, Improving project_management_skill	Player plays t_p_m_g of unusable score_storage and unknown rating.

FUNCTION	
Teaches	
ACTOR	Game_designer
OBJECT	Player
CONSTRAINT	
Game_designer teaches to player then to player	plays t_p_m_g.

GOAL	PROBLEM
Encouraging the players. Guaranteeing the teaching of project management skill	Player is not encouraging.

FUNCTION	
Plays	
ACTOR	Player
OBJECT	T_p_m_g
CONSTRAINT	
Player starts t_p_m_g. Game_designer develops t_p_m_g	

GOAL	PROBLEM
Expanding learning_concept. Improving project_management_skill.	Player plays t_p_m_g of unusable score_storage and unknown rating.

FUNCTION	
Applies	
ACTOR	Manager
OBJECT	Project event
CONSTRAINT	
Project timeline = "3 weeks". Then staff or task changes.	

GOAL	PROBLEM
Expanding learning_concept. Improving project_management_skill.	

FUNCTION	
Completes	
ACTOR	Manager
OBJECT	Project
CONSTRAINT	
Manager completes project then to Staff fulfills task. Duration and timeline are less or equal than week.	

GOAL	PROBLEM
Reducing the duration	

FUNCTION	
spends	
ACTOR	Staff
OBJECT	Budget
CONSTRAINT	
Budget emerges. Staff spends budget then to manager manages staff.	

GOAL	PROBLEM
Preserving budget	

FUNCTION	
fulfills	
ACTOR	Staff
OBJECT	Task
CONSTRAINT	
Tasks emerge. Staff fulfills task then to Staff spends budget.	

GOAL	PROBLEM
Expanding learning_concept. Improving project_management_skill. Reducing_duration, preserving_budget	Staff fulfills task of unclear name. The metaphor is not clear.

FUNCTION	
Pauses	
ACTOR	Manager
OBJECT	T_p_m_g
CONSTRAINT	
Manager Pauses t_p_m_g then to player plays t_p_m_g.	

GOAL	PROBLEM
Reducing the duration. Preserving budget.	

FUNCTION	
Resumes	
ACTOR	Manager
OBJECT	T_p_m_g
CONSTRAINT	
Manager resumes T_p_m_g then to player plays t_p_m_g.	

GOAL	PROBLEM
Reducing the duration. Preserving budget.	

FUNCTION	
Resets	
ACTOR	Manager
OBJECT	T_p_m_g
CONSTRAINT	
Manager resets T_p_m_g then to player plays t_p_m_g.	

GOAL	PROBLEM
Reducing the duration.	

FUNCTION	
Assigns	
ACTOR	Manager
OBJECT	Staff
CONSTRAINT	
Staff emerges. Manager assigns staff then to player plays t_p_m_g.	

GOAL	PROBLEM
Allowing staff management to the manager.	

FUNCTION	
Evaluates	
ACTOR	Manager
OBJECT	Staff
CONSTRAINT	
Staff emerges. Manager evaluates staff then to player plays t_p_m_g.	

GOAL	PROBLEM
Allowing staff management to the manager.	

FUNCTION	
Changes	
ACTOR	Manager
OBJECT	Staff
CONSTRAINT	
Staff emerges. Manager changes staff then to player plays t_p_m_g	

GOAL	PROBLEM
Allowing staff management to the manager.	

FUNCTION	
Considers	
ACTOR	Game_designer
OBJECT	Quality_factor
CONSTRAINT	
Game_designer considers quality_factor then to r_g_c_ evaluates emotional_transition_frequency	

GOAL	PROBLEM
Improving t_p_m_g.	Usually Game_designer does not consider the quality factor. Usability and player_experience of the quality factor are "low valuations"

FUNCTION	
Uses	
ACTOR	Game_designer
OBJECT	Method
CONSTRAINT	

GOAL	PROBLEM
Promoting emotional_design. Improving the method	Method does not have emotional design.

FUNCTION	
Teaches	
ACTOR	Game_designer
OBJECT	Project_management_skill
CONSTRAINT	
Game_designer teaches project_management_skill then to player plays t_p_m_g.	

GOAL	PROBLEM
Improving project_management_skill.	guaranteeing the teaching of project management skill

FUNCTION	
Provides	
ACTOR	Game_designer
OBJECT	Practical_experience
CONSTRAINT	
Game_designer provides practical_experience then to player plays t_p_m_g.	

GOAL	PROBLEM
Gaining practical_experience.	Practical_experience can be low.

FUNCTION	
Generates	
ACTOR	Game_designer
OBJECT	Emotion
CONSTRAINT	
Player launches t_p_m_g. Game_designer generates emotion then to player plays t_p_m_g.	

GOAL	PROBLEM
Improving the method, Promoting the emotional design, encouraging player	

FUNCTION	
Evaluates	
ACTOR	Research_group_on_computacional_lenguages(r_g_c_l)
OBJECT	Software_engineering_game
CONSTRAINT	
R_g_c_l evaluates software_engineering_game then to game_designer develops t_p_m_g.	

GOAL	PROBLEM
Increasing rating. Improving the_project_managerment_game (t_p_m_g), Improving quality factor	

FUNCTION	
Uses	
ACTOR	R_g_c_l
OBJECT	Emotion_transition_pattern_graph (e_t_p_g)
CONSTRAINT	
R_g_c_l uses e_t_p_g then to pre-grade student shares quality_factor.	

GOAL	PROBLEM
Promoting emotional_design. Improving quality factor	

FUNCTION	
Evaluates	
ACTOR	Research_group_on_computacional_lenguages(r_g_c_l)
OBJECT	emotional_transition_frequency
CONSTRAINT	
Game_designer evaluates emotional_transition_frequency then to r_g_c_l uses e_t_p_g .	

GOAL	PROBLEM
Increasing emotional_transition_frequency.	Player has 'few' emotional_transition_frequency.

FUNCTION	
Evaluates	
ACTOR	Pre-grade_student
OBJECT	Quality_factor
CONSTRAINT	
Pre-grade_student evaluates quality_factor then to r_g_c_l evaluates software_engineering_game.	

GOAL	PROBLEM
Improving quality_factor	

FUNCTION	
Shares	
ACTOR	Pre-grade_student
OBJECT	Quality_factor
CONSTRAINT	
Pre-grade_student shares quality_factor then to Pre-grade_student evaluates quality_factor	

GOAL	PROBLEM
Improving quality_factor	

FUNCTION	
Reports	
ACTOR	Game_designer
OBJECT	Development_process
CONSTRAINT	
Game_designer reports development_process then to game_designer uses method.	

GOAL	PROBLEM
Expanding the learning concept	Scarcely report.

FUNCTION	
Spawns	
ACTOR	Manager
OBJECT	Task
CONSTRAINT	
Player starts the_project_management _game (t_p_m_g).	

GOAL	PROBLEM
Improving project_management_skill	

FUNCTION	
Spawns	
ACTOR	Manager
OBJECT	Staff
CONSTRAINT	
Player starts the_project_management _game (t_p_m_g).	

GOAL	PROBLEM
Improving project_ma-nage-ment_skill	

FUNCTION	
Spawns	
ACTOR	Manager
OBJECT	budget
CONSTRAINT	
Player starts the_project_management _game (t_p_m_g).	

GOAL	PROBLEM
Improving project_ma-nage-ment_skill	

FUNCTION	
Modifies	
ACTOR	Manager
OBJECT	Task
CONSTRAINT	
Game_designer modifies task then to game_designer applies event.	

GOAL	PROBLEM
Preserving budget. Reducing the duration	

FUNCTION	
Modifies	
ACTOR	Manager
OBJECT	Staff
CONSTRAINT	
Game_designer modifies staff then to game_designer applies event.	

GOAL	PROBLEM
Preserving budget. Reducing the duration	

FUNCTION	
Incorporates	
ACTOR	Game_designer
OBJECT	E_t_p_g
CONSTRAINT	
Game_designer incorporates e_t_p_g then to game_designer considers quality_factor.	

GOAL	PROBLEM
Achieving the incorporation of e_t_p_g.	Game_designer does not incorporate e_t_p_g.

FUNCTION	
Learns	
ACTOR	Player
OBJECT	Project_management_skill
CONSTRAINT	
Player learns project_management_skill then to manager completes project	

GOAL	PROBLEM
Improving project_ma-nage-ment_skill. Guaranteeing the teaching of project management skill	.

ACTOR	
Player	
FEATURES	Username, project_management_skill, practical_experience, emotional_transition_frequency, quality_factor and emotion.

ANNOTATIONS	
Player is manager, player is related to game_designer, pre-grade_student, project_management_skill and t_p_m_g, technical and non. technical are values of project_management_skill. High and low are values of practical experience.	

ACTOR	
Manager	
FEATURES	

ANNOTATIONS	
Players can be manager. Manager is related to projects and their events, staffs and the_project_management_game	

ACTOR	
Game_designer	
FEATURES	Nickname

ANNOTATIONS	
Game_designer is related to the_project_management_game, emotion, project_management_skill, quality_factor, manager, method, practical_experience, staff, task, budget, development_process and player.	

ACTOR	
Research_group_on_computational_languages	
FEATURES	Pre-grade student, post-grade student

ANNOTATIONS	
Research_group_on_computational_languages is related to emotional_transition_frequency , Software_engineering_game and emotion_transition_pattern_graph	

ACTOR	
Pre-grade student	
FEATURES	

ANNOTATIONS	
Pre-grade student is player, Pre-grade student is related to quality_factor, player_experience and research_group_on_computational_languages	

ACTOR	
Post-grade student	
FEATURES	

ANNOTATIONS	
Pre-grade student is related to research_group_on_computational_languages.	

OBJECT	
FEATURES	ANNOTATIONS
The_project_management_game	Score_storage, project, learning_concept, rating

ANNOTATIONS	
The_project_management_game is related to player, manager and game_designer. We tell it t_p_m_g	

OBJECT	
FEATURES	ANNOTATIONS
Staff	Name, icon_color, pace, cost

ANNOTATIONS	
Staff is related to project, task, budget and manager. Fast, average and slow are values of pace. Expensive, average and low-cost are values of cost.	

OBJECT	
FEATURES	ANNOTATIONS
Total_spending	Worth, rate, color

ANNOTATIONS	
Total_spending is related to projects. High, moderate and low are values of rate. Red, black and green are values of color.	

OBJECT	
FEATURES	ANNOTATIONS
Project	Timeline, budget, staff, task, week, total_spending, warning_message, duration, event, gantt_chart_template

ANNOTATIONS	
Project is related to managers and t_p_m_g. Assign Staff!, Over budget!, Staff burnout! and OK!, are values of warning_message. Timeline <= Week, Duration <= Week.	

OBJECT	
FEATURES	ANNOTATIONS
Spending	Worth, rate, color

ANNOTATIONS	
Spending is related to tasks. High, moderate and low are values of rate. Red, black and green are values of color.	

OBJECT	
FEATURES	ANNOTATIONS
Task	Name, spending, estimated_duration, prerequisite, advance_percentage, scheduled_start_date, duration, start_date

ANNOTATIONS	
Task is related to staff, manager and projects	

OBJECT	
FEATURES	ANNOTATIONS
Method	Emotional_design

ANNOTATIONS	
Method is development_process. Method is related to game_designer.	

OBJECT	
FEATURES	ANNOTATIONS
Software_engineering_game	Quality_factor and development_process

ANNOTATIONS	
T_p_m_g is a software_engineering_game. Software_engineering_game is related to research_group_on_computational_languages	

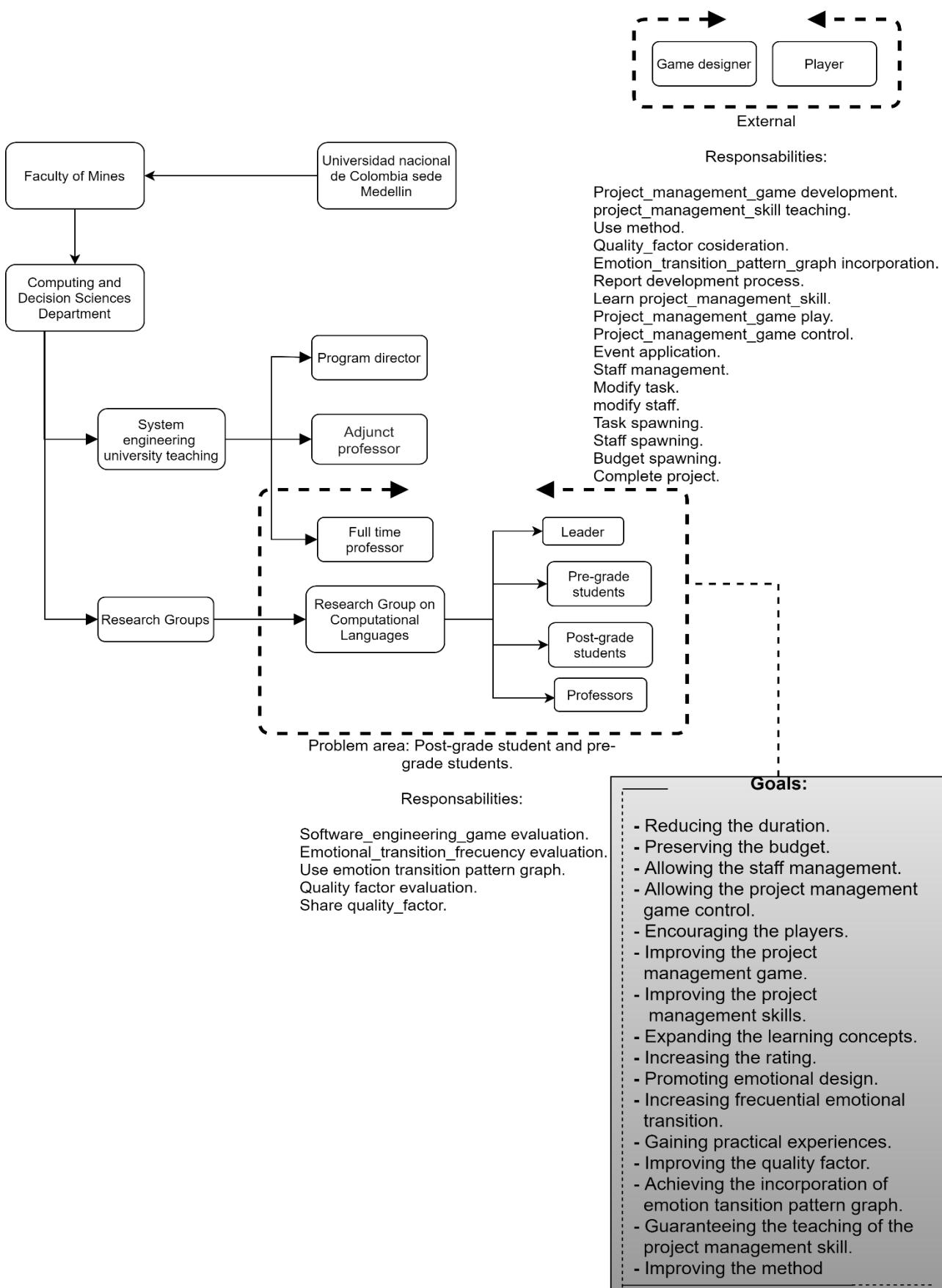
OBJECT		ANNOTATIONS	
Game_event.		Game_event is related to story_event. Manager and staff are values of actant. Spawns, fulfills, spends and modifies are values of verb. Staff, task and budget are values of game_object. Manager spawns staff, manager spawns task, manager spawns budget, staff fulfills task, staff spends budget, manager modifies staff and manager modifies task are rules.	
FEATURES	OBJECT	ANNOTATIONS	
Metaphor-based_game_design.		Metaphor-based_game_design is a development_process.	
FEATURES	OBJECT	ANNOTATIONS	
Emotion_transition_pattern_graph.		Emotion_transition_pattern_graph is an emotional_evaluating_method. Emotion_transition_pattern_graph is related to r_g_c_l.	
FEATURES	OBJECT	ANNOTATIONS	
Quality_factor.		Quality_factor is motivation, player_experience and learning. Quality_factor is related to game_designer, pre-grade_student and software_engineering_game.	
FEATURES	OBJECT	ANNOTATIONS	
Player_experience.		Player_experience is related to pre-grade_student, player and quality_factor.	
FEATURES	OBJECT	ANNOTATIONS	

OBJECT		ANNOTATIONS	
Usability.			
Dimension.		Player_experience is related to pre-grade_student, player and quality_factor.	
FEATURES		OBJECT	ANNOTATIONS
			Joy, happiness, satisfaction, relief, sadness, fear, disgust and anger are values of name. [-4, 4] are values of number. Positive and negative are values of valence. Emotion is related to player, game_designer and emotion_transition_pattern_graph.

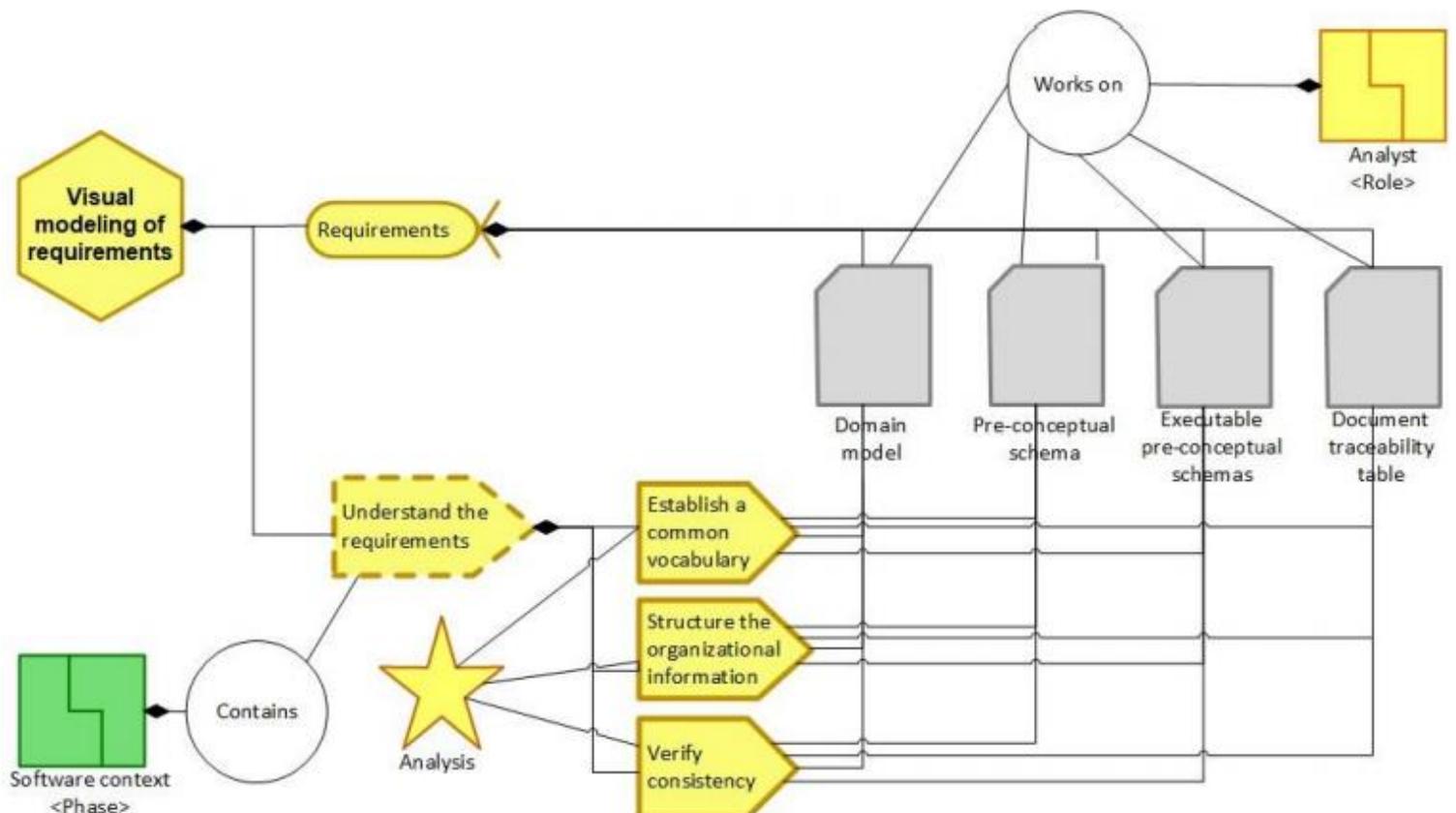
OBJECT		ANNOTATIONS	
Story_event.			
Dimension.		Story_event is game_event and mechanic. Story_event is related to emotion_transition_pattern_graph.	
FEATURES		OBJECT	ANNOTATIONS
			-2, -1, 0, 1 and 2 are values of valoration. (Perceived Learning, satisfaction, relevance, social, interaction, challenge, fun, focused attention, etc.) or (accessibility, operability, learnability, aesthetics) are values of name. Dimension is related to player_experience and usability

OBJECT		ANNOTATIONS	
Mechanic.			
Actant, Verb, game_object and rule		Mechanic is related to story_event. Manager is a value of actant. Completes, applies, pauses, resumes, resets, assigns, evaluates and changes are values of verb. Project, event, t_p_m_g and staff are values of game_object. Manager completes project, manager applies event, Manager pauses t_p_m_g, Manager resumes t_p_m_g, Manager resets t_p_m_g, Manager assigns staff, Manager evaluates staff and Manager changes staff are rules.	
FEATURES		OBJECT	ANNOTATIONS

Organizational chart



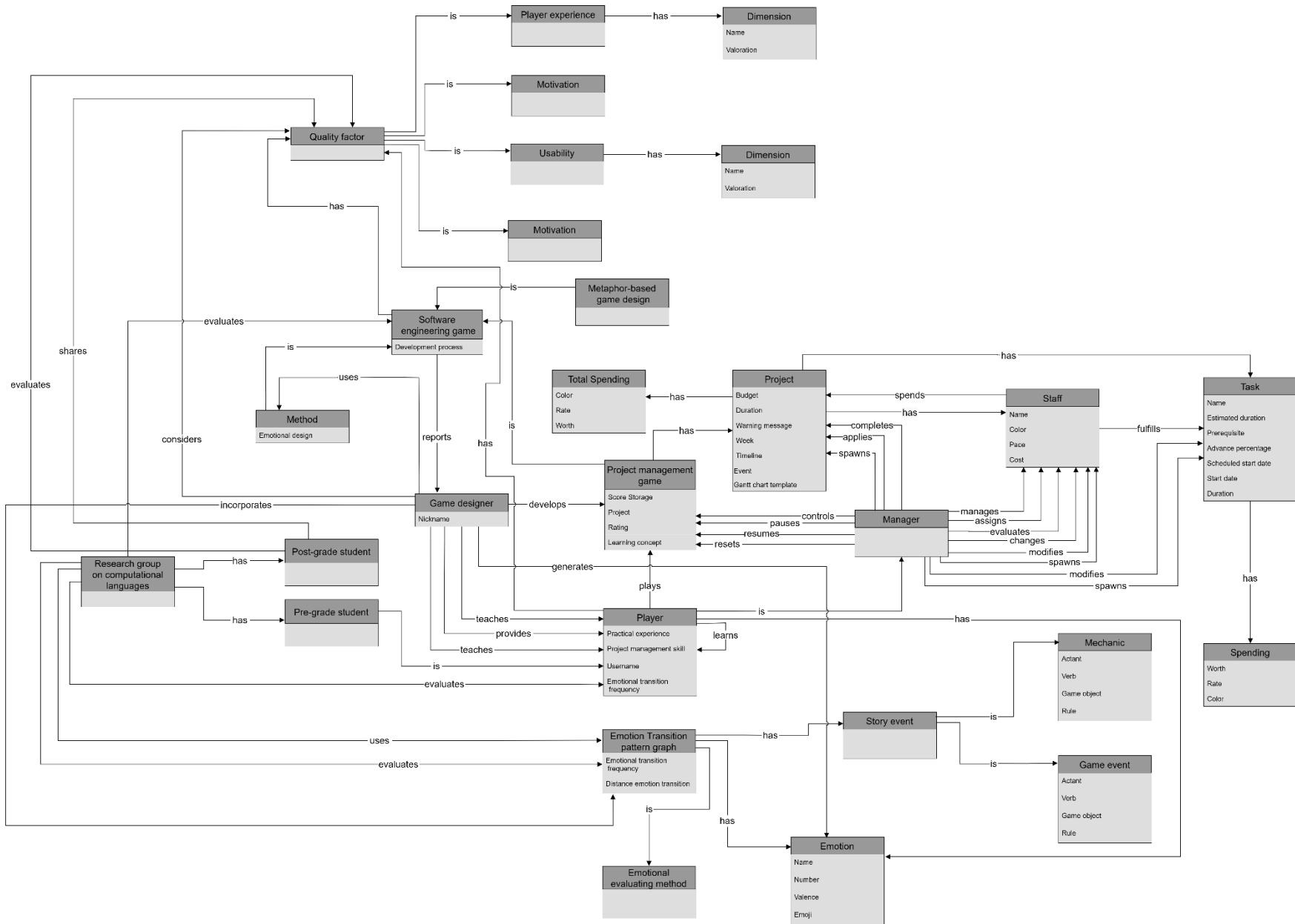
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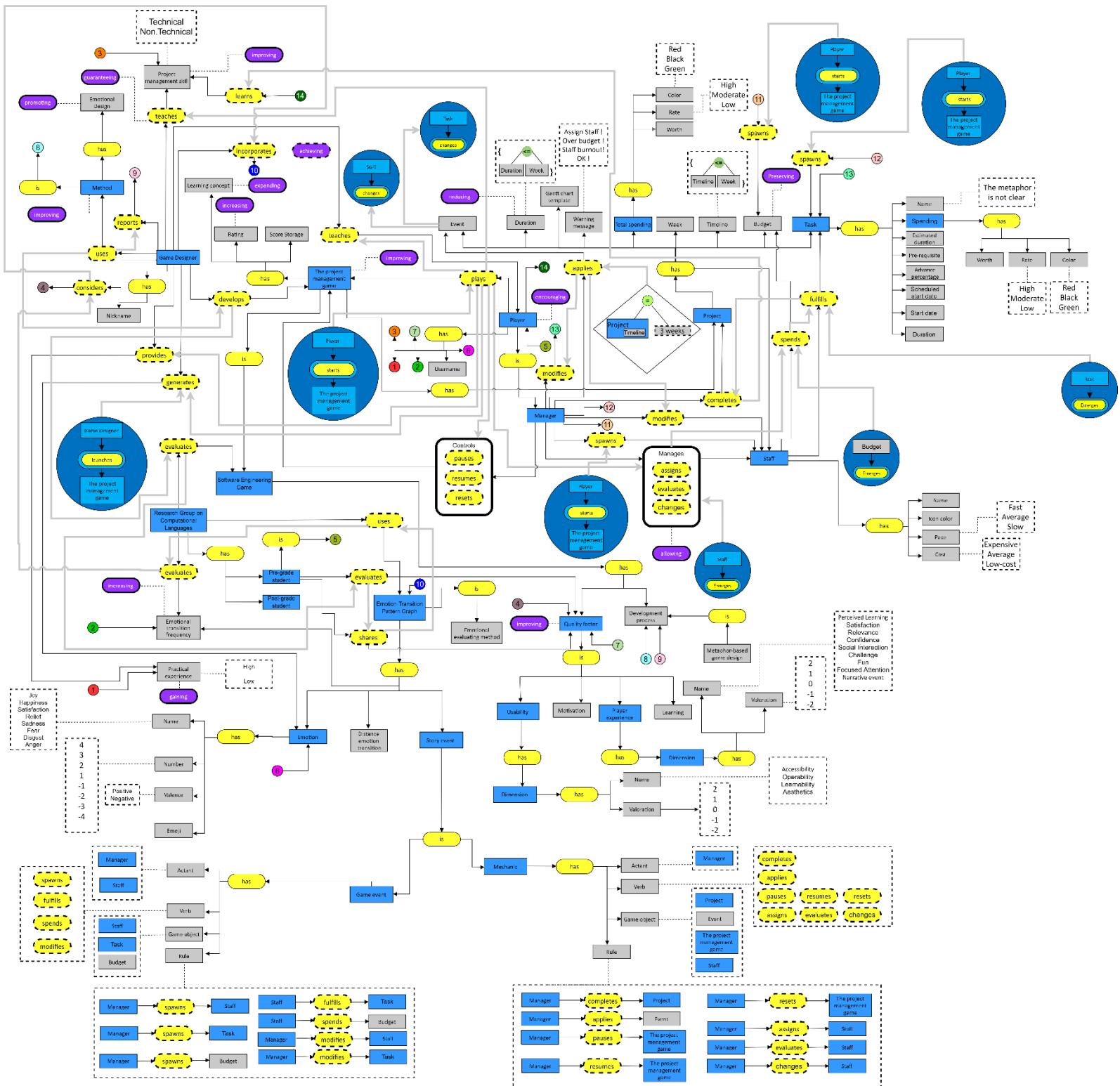
Work >

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Domain model

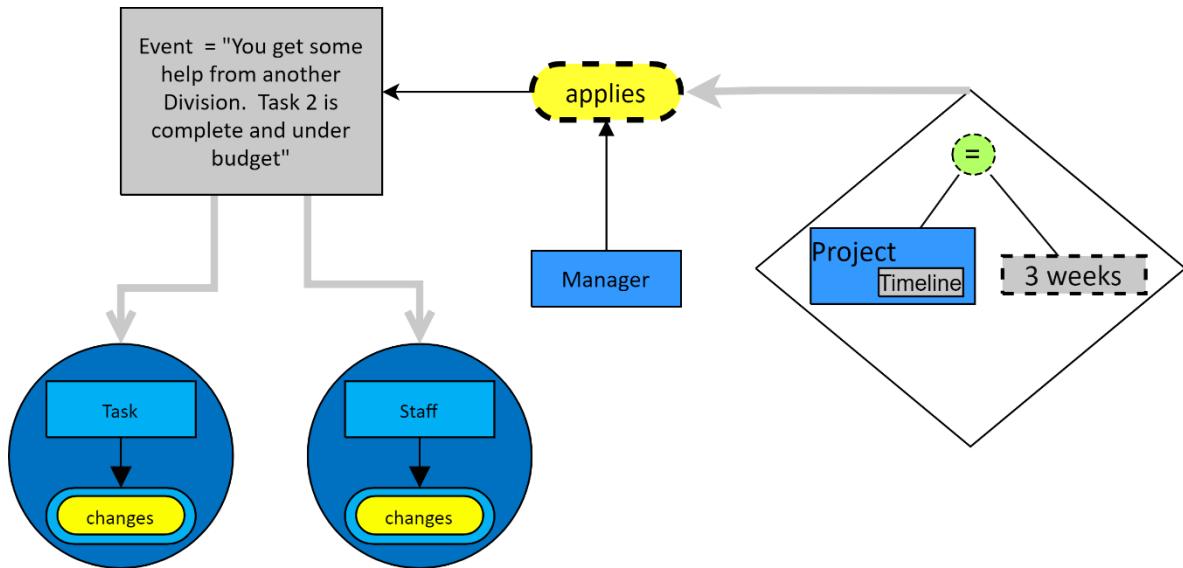


Pre-conceptual schema



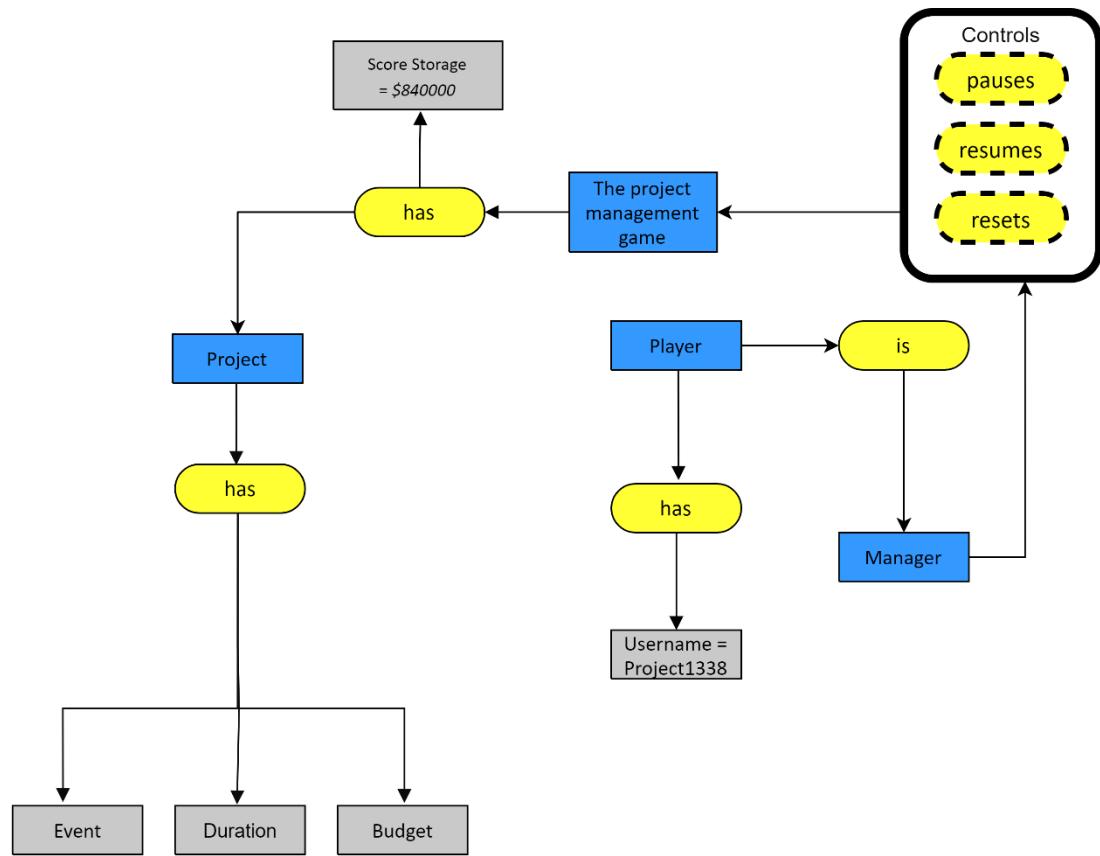
Executable pre-conceptual schemas

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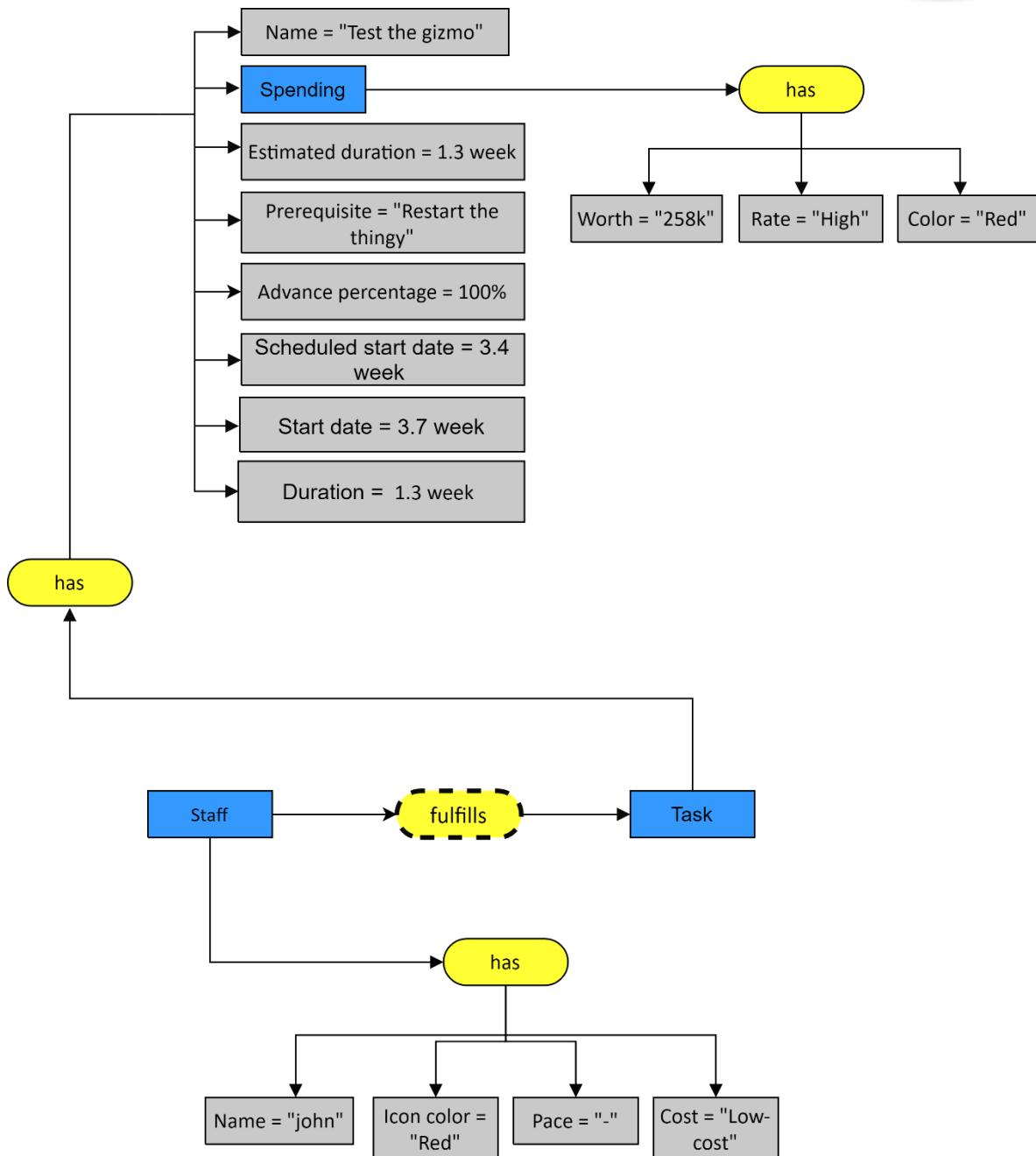


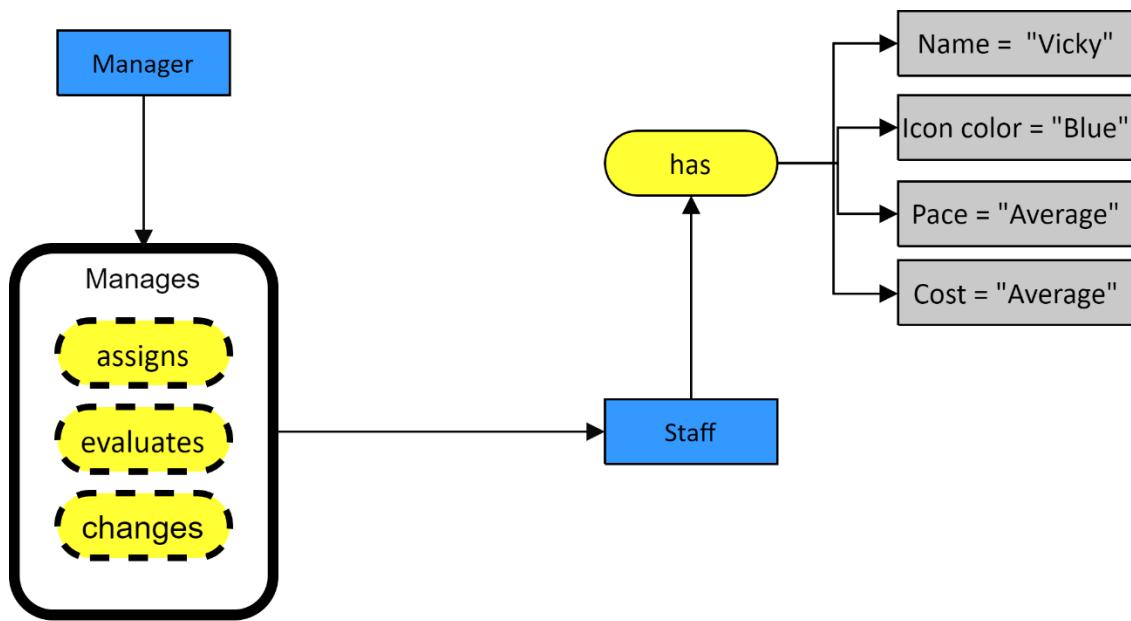
Event
You get some help from another Division. (Task - Week) is complete and under budget
Cost Savings!, (Task - Week) is cheaper
(Staff - Name) took a training class and now works faster!
Boss had a psychedelic vision. No wait, what did he say? Oh yeah... a vision statement. (Task - Duration) slows down.
Breakthrough!, (Task - Week) has advanced
(Staff - Name) is not feeling well and now works slower.

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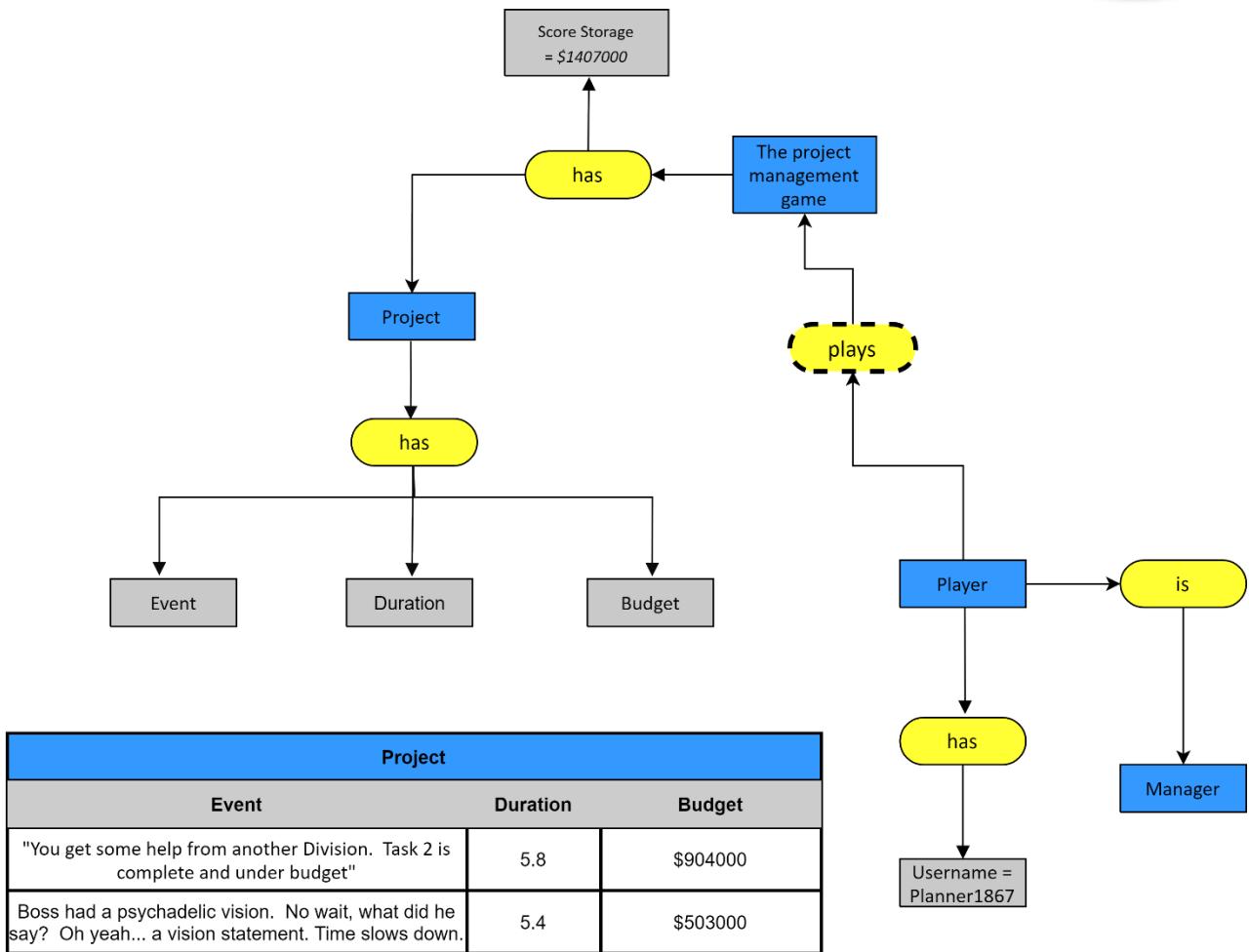


Project		
Event	Duration	Budget
Breakthrough! Task 2 has advanced	6	\$840000



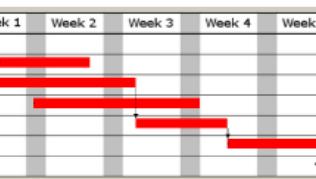


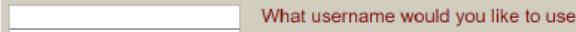
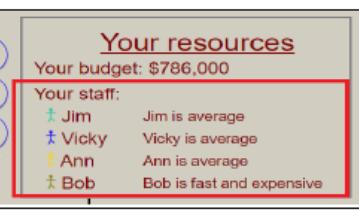
Staff			
Name	Icon color	Pace	Cost
Vicky	Blue	Average	Average
Bob	Gold	Fast	Expensive
Jane	Fuchsia	Slow	Low-cost
Marti	Yellow	Slow	-
Jim	Green	Average	Average
Kathy	Brown	Fast	-
John	Red	-	Low-cost
Rudy	Light green	Slow	Expensive
Mark	Black	-	Expensive
Ann	Light yellow	Average	Average



Document traceability table

Traceability table Pre-conceptual schema

Original sound/image/text	Source	Location	Element	Kind of element	Observations
	Image	www.gamesbyrobc.com	Game designer has nickname	Structural triad	In the left part of the screen, is showed the games developed by Robc
	Image	www.gamesbyrobc.com	Game designer develops the project management game	Dynamic triad	
This game is centered around a common project management scheduling tool known as a Gantt chart.	Text	www.thatpmgame.com	Game designer teaches player	Dynamic triad	The goal for the developer is try to learn about managing a company that's why the game is based in the Gantt chart
You are playing as temporary username: Resources5058. Register a name to save your score.	Text	www.thatpmgame.com	The project management game has score storage	Structural triad	Resources5058 is an default username when you are not registered
	Image	www.thatpmgame.com	The project management game has project	Structural triad	The main frame has elements related to a project
	Image	www.thatpmgame.com	Player starts the project management game	Event	When is pressed the Satart! button, the project starts

Name Registration  What username would you like to use?	Image	www.thatpmgame.com	Player has username	Structural triad	When a player wants to register, username is a required field
"Test your skill as a project manager!"	Image	www.thatpmgame.com	Player is manager	Structural triad	The player plays as a manager
You are playing as temporary username: . Resources5058 Register a name to save your score.	Image	www.thatpmgame.com	Player plays the project management game	Dynamic triad	In the page the player only plays the project management game
	Image	www.thatpmgame.com	Manager controls the project management game	Responsibility	With the main button (highlighted in red) the manager controls the game's flow
	Image	www.thatpmgame.com	Manager pauses the project management game Manager resumes the project management game Manager resets the project management game	Dynamic triad	While the game is running, the main button is changing to pause, when manager pauses, it changes to resume, and when the game ends it changes to Again! and the manager can reset the project management game
	Image	www.thatpmgame.com	Manager manages staff	Responsibility	Highlighted in red there are the staff people that the manager has to manage

<p>Spent</p> <table border="1"> <tr><td>Again?</td><td>Spent</td></tr> <tr><td>Jim</td><td>\$102K</td></tr> <tr><td>Vicky</td><td>\$177K</td></tr> <tr><td>Vicky</td><td>\$108K</td></tr> <tr><td>assign?</td><td>\$0K</td></tr> <tr><td>assign?</td><td>\$0K</td></tr> </table>	Again?	Spent	Jim	\$102K	Vicky	\$177K	Vicky	\$108K	assign?	\$0K	assign?	\$0K	Image	www.thatpmgame.com	Manager assigns staff Manager evaluates staff Manager changes staff	Dynamic triad	In the left frame, the manager, assigns the staff, can change the staff while the game is running, and at the final, he does an evaluation of its spent																																																
Again?	Spent																																																																
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assign?	\$0K																																																																
assign?	\$0K																																																																
<p>Hmmm... you must assign staff to every task to complete the project.</p>	Text	www.thatpmgame.com	Manager completes project	Dynamic triad	The "you" is referred to the manager																																																												
<p>thatpmgame.com dice</p> <p>Vicky took a training class and now works faster!</p> <p>JOIN Key: in Unvirtual Side Me...</p> <p>Aceptar</p> <p>Your resources</p> <p>Our budget: \$966,000</p> <p>Our staff:</p> <ul style="list-style-type: none"> Vicky: Vicky is average Bob: Bob is fast and expensive Jane: Jane is slow and low-cost Jim: Jim is average <p>Roblox Free</p> <p>Care to try Lady Luck? Click here</p> <p>Week 1 Week 2 Week 3 Week 4 Week 5 Chancel</p>	Image	www.thatpmgame.com	Manager applies event	Dynamic triad	When manager applies event pressing the Chancel button, it means that task or staff changes some of its elements																																																												
<table border="1"> <thead> <tr> <th>Task</th> <th>Week 1</th> <th>Week 2</th> <th>Week 3</th> <th>Week 4</th> <th>Week 5</th> </tr> </thead> <tbody> <tr> <td>Project start</td> <td></td> <td></td> <td></td> <td></td> <td></td> </tr> <tr> <td>-Mobilize whatchamacallit</td> <td>██████████</td> <td>██████████</td> <td>██████████</td> <td>██████████</td> <td>██████████</td> </tr> <tr> <td>-Test the gizmo</td> <td></td> <td>██████████</td> <td>██████████</td> <td>██████████</td> <td>██████████</td> </tr> <tr> <td>-Build the thingamabob</td> <td></td> <td></td> <td>██████████</td> <td>██████████</td> <td>██████████</td> </tr> <tr> <td>-Retool the thingumajig</td> <td></td> <td></td> <td></td> <td>██████████</td> <td>██████████</td> </tr> <tr> <td>-Restart the thingy</td> <td></td> <td></td> <td></td> <td></td> <td>██████████</td> </tr> <tr> <td>Project complete</td> <td></td> <td></td> <td></td> <td></td> <td></td> </tr> </tbody> </table> <p>Again? Spent</p> <table border="1"> <tr><td>Jane</td><td>\$75K</td></tr> <tr><td>John</td><td>\$100K</td></tr> <tr><td>Jane</td><td>\$75K</td></tr> <tr><td>Rudy</td><td>\$25K</td></tr> <tr><td>Ann</td><td>\$100K</td></tr> <tr><td>OK!</td><td>\$550K</td></tr> </table>	Task	Week 1	Week 2	Week 3	Week 4	Week 5	Project start						-Mobilize whatchamacallit	██████████	██████████	██████████	██████████	██████████	-Test the gizmo		██████████	██████████	██████████	██████████	-Build the thingamabob			██████████	██████████	██████████	-Retool the thingumajig				██████████	██████████	-Restart the thingy					██████████	Project complete						Jane	\$75K	John	\$100K	Jane	\$75K	Rudy	\$25K	Ann	\$100K	OK!	\$550K	Image	www.thatpmgame.com	Project has staff	Structural triad	In the right there is the staff used in the project
Task	Week 1	Week 2	Week 3	Week 4	Week 5																																																												
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<p>Welcome to thatPMGame!</p> <p>Your team and budget are on the right. Assign team members to tasks and hit START. Good luck!</p> <p>You are playing as: <u>stng1105</u></p>	Image	www.thatpmgame.com	The project management game has unusable score storage.	Problem	It's assumed that when you login, you can see your scores, but that just never happens, the score storage is not used																																																												

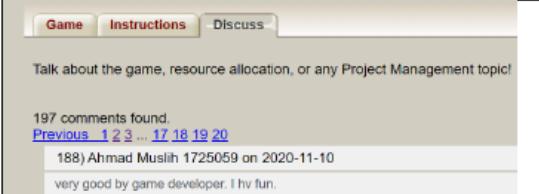
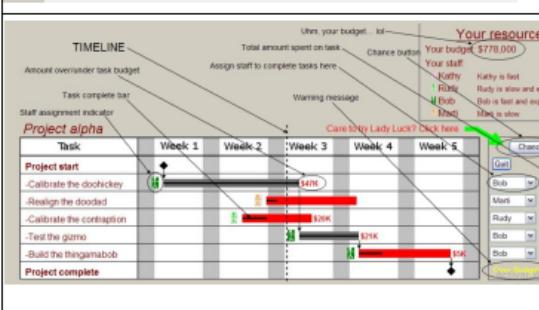
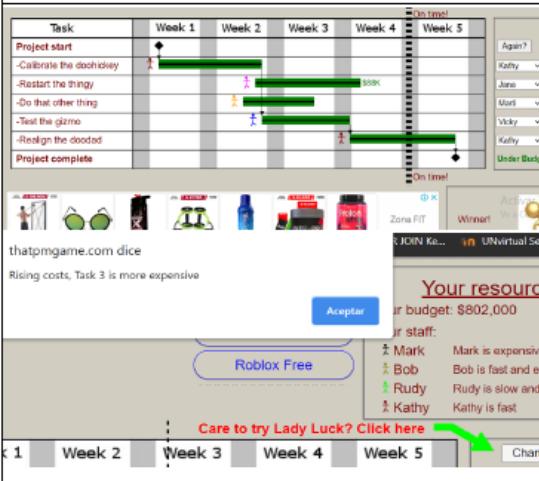
 <p>Talk about the game, resource allocation, or any Project Management topic!</p> <p>197 comments found.</p> <p>Previous 1 2 3 ... 17 18 19 20</p> <p>188) Ahmad Muslih 1725059 on 2020-11-10 very good by game developer. I hv fun.</p>		Image	www.thatpmgame.com	The rating of the project management game is unknown	Problem	There is no official calification about the game to pre-view basing on other feedbacks if the game is good or no
 <p>Project alpha</p> <p>Task: Week 1 Week 2 Week 3 Week 4 Week 5</p> <ul style="list-style-type: none"> -Calibrate the doohickey -Restart the doodle -Calibrate the contraption -Test the gizmo -Build the thingamabob <p>Project start: Week 1</p> <p>Project complete: Week 5</p> <p>Timeline: Total amount spent on task: \$778,000</p> <p>Your resources: Your staff: Kathy (fast), Rudy (slow and expensive), Bob (moderate), Mark (moderate), Vicki (slow)</p> <p>Amount over/under task budget: Task complete bar: Warning message: Care to try Lady Luck? Click here</p>		Image	www.thatpmgame.com	Project has timeline Project has duration Project has warning message Project has total spending Project has week Project has event Project has budget Project has task Project has Gantt chart template	Structural triad	There are the elements of the project,
 <p>Spent</p> <ul style="list-style-type: none"> \$75K \$100K \$74K \$25K \$108K \$582K 		Image	www.thatpmgame.com	Total spending has color Total spending has rate Total spending has worth	Structural triad	Total spending is the sum of all that is spent, when it's rate is high it turns the color to red, when is moderate turns tu black, and when is low turns to green. Worth is the numerical value
 <p>Task: Week 1 Week 2 Week 3 Week 4 Week 5</p> <p>Project start: Week 1</p> <p>Project complete: Week 5</p> <p>On time!</p> <p>Again? Spent: Kathy \$178K, June \$58K, Mark \$120K, Vicki \$147K, Kelly \$180K Under Budget! \$211K</p> <p>thatpmgame.com dice: Rising costs, Task 3 is more expensive</p> <p>Accept: Roblox Free</p> <p>Care to try Lady Luck? Click here</p>		Image	www.thatpmgame.com	Reducing the Duration	Goal	One of the goals is be at least on-time, and try to reduce the duration in weeks (horizontal line) of the task
		Image	www.thatpmgame.com	Task changes	Event	When manager applies event pressing the Chance! button, it mens that a task changes in terms of spending

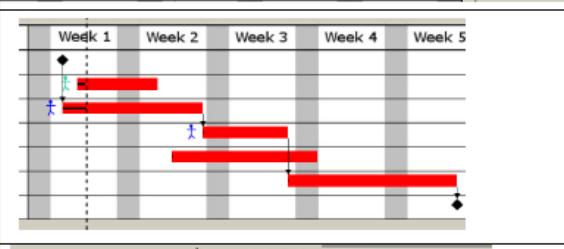
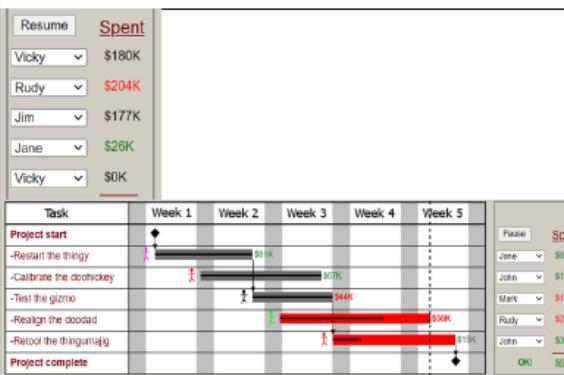
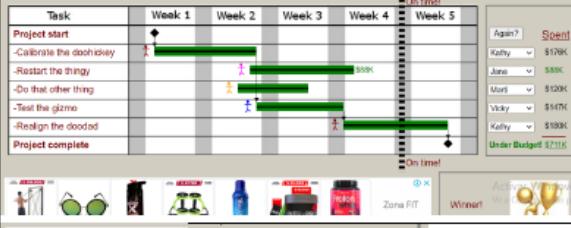
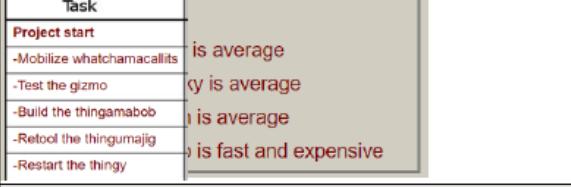
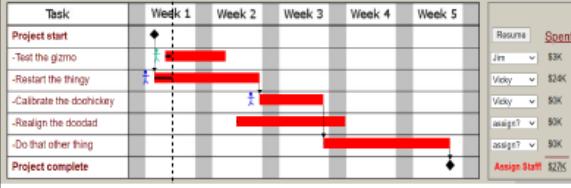
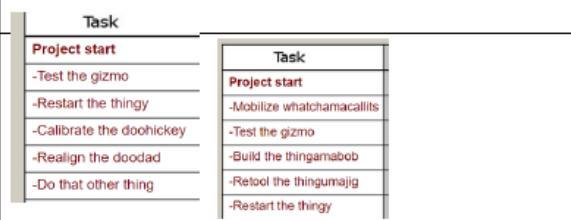
	Image	www.thatpmgame.com	Staff changes	Event	When manager applies event pressing the Chance! button, it means that a staff changes sometimes improving its pace
	Image	www.thatpmgame.com	Duration <= Week	Constrain	As is mentioned in the goal "Reducing Duration", is required that the duration has to be less than or equal to week to be on-time
	Image	www.thatpmgame.com	Project timeline = 3 weeks	Conditional	When project timeline is at the 3rd week, pressing the Chance! button the manager can applies an event related to a task and the staff
	Image	www.thatpmgame.com	Staff spends budget	Dynamic triad	What every staff person spends
	Image	www.thatpmgame.com	Staff fulfills task	Dynamic triad	Every staff actor has to fulfill an assigned task

	Image	www.thatpmgame.com	Preserving the budget	Goal	Be under budget is other of the game's goal, so is important to optimize budget in the project management game. But is used the goal relation "Preserving budget", just for use a verb "preserve" that is in the goal verbs provided by the professor
	Image	www.thatpmgame.com	Timeline <= week	Constrain	As is mentioned in the goal "Reducing Duration", is required that the project timeline has to be less than or equal to week to be on-time
	Image	www.thatpmgame.com	Staff has name Staff has icon color Staff has pace Staff has cost Staff has project	Structural triad	Cost is referred to the possible values expensive, average, low-cost and pace is referred to fast, average, slow
	Image	www.thatpmgame.com	Task has name Task has spending Task has estimated duration Task has prerequisite Task has advance percentage Task has scheduled start date Task has start date Task has duration	Structural triad	There are the elements of the task. Start date is for denote in what point of the week really the task start. Estimated duration is the red horizontal line that it is assumed the will be the duration. Prerequisite is the vertical arrow pointing down to a new task start. Advance percentage is an estimation what quantity of the task completed. Scheduled start is for denote in what part of the week the task starts.
	Image	www.thatpmgame.com	The name of the tasks is unclear	Problem	The name of the task is strange, the structure is: first a verb, followed by a connector and finally there are several nouns with no sense, that don't say something about a real task

Spent ✓ \$75K ✓ \$100K ✓ \$74K ✓ \$225K ✓ \$108K	Image	www.thatpmgame.com	Spending has worth Spending has rate Spending has color	Structural triad	Spending is the worth spent in every task, when its rate is high it turns the color to red, when is moderate turns to black, and when is low turns to green.
"Test your skill as a project manager!"	Image	http://thatpmgame.com/	The metaphor is not clear	Problem	It says that you play as project manager, but if a kid just want to play the game, that person may not know about the real game's metaphor
Game designers can use such a method	Text	Incorporating Emotion Transition Pattern Graph in Metaphor-based Game Design related to Software Engineering, page 2	Game designer uses method	Dynamic triad	In some parts of the text, is used method, or model and so on to refer to the designing plan, process, way to develop, etc all the previous concepts are resumed just to method
Also, the method includes emotional design	Text	Incorporating Emotion Transition Pattern Graph in Metaphor-based Game Design related to Software Engineering, page 7	Method has emotional design	Structural triad	
Emotion, emotion types, and emotion changes in video games are defined for evaluating user experience.	Text	Incorporating Emotion Transition Pattern Graph in Metaphor-based Game Design related to Software Engineering, page 2	Game designer generates emotion	Dynamic triad	Is used to refer to the video game produces several emotion, but for the schema, the concept that makes the game and produces the dynamic trial is Game Designer
Software engineering games (SEG) provide an alternative instrument for gaining practical experience in a safe and controlled environment.	Text	Incorporating Emotion Transition Pattern Graph in Metaphor-based Game Design related to Software Engineering, page 5	Game designer provides practical experience	Dynamic triad	One more time, the designer is who develops the game, he provides the practical experience through the game
It is composed of an evaluation model defining quality factors to be evaluated through a standardized measurement instrument	Text	A METHOD FOR THE EVALUATION OF THE QUALITY OF GAMES FOR COMPUTING EDUCATION, ABSTRACT page	Game designer considers quality factor	Dynamic triad	For the evaluation of the game the experts measure the quality factors, for that is inferred that the game designer has to take care about them
We propose a method for incorporating emotion transition pattern graph in metaphor-based game design related to software engineering.	Text	Incorporating Emotion Transition Pattern Graph in Metaphor-based Game Design related to Software Engineering, page 2	Game designer incorporates Emotion Transition Pattern Graph	Dynamic triad	Again, the developer of the method is the designer, who incorporates the ETPG
In this Ph.D. Thesis proposal, we define a method for incorporating ETPG in metaphor-based game design related to software engineering.		Incorporating Emotion Transition Pattern Graph in Metaphor-based Game Design related to Software Engineering, page 4	Game designer does not incorporate transition emotion pattern graph	Problem	One of the goals of the thesis is incorporate the ETPG to the method, so for that is deducted that sometime it is not included in the method
SEGs are used in educational context for teaching about certain subjects...	Text	Incorporating Emotion Transition Pattern Graph in Metaphor-based Game Design related to Software Engineering, page 5	Game designer teaches project management skill	Dynamic triad	The SEGs are the teaching medium

the SE game design by improving the knowledge of game designer related to player emotional states.	Text	Incorporating Emotion Transition Pattern Graph in Metaphor-based Game Design related to Software Engineering, page 12	Improving the project management skill	Goal	
We propose a method for incorporating emotion transition pattern graph	Text	Incorporating Emotion Transition Pattern Graph in Metaphor-based Game Design related to Software Engineering, page 2	Guaranteeing the learning of project management skill	Requirement	Is important that the designer takes care about the skills related to project management
...also an internal consistency of the items related to each of the quality factors (motivation, user experience, and learning).	Text	A METHOD FOR THE EVALUATION OF THE QUALITY OF GAMES FOR COMPUTING EDUCATION, page 110	Quality factor is motivation Quality factor is usability Quality factor is learning Qaulity factor is player experience	Structural triad	Are used the quality factors in the brackets, generalizing usability related about if the game is well developed or no
Such a method contributes for improving SE games by using game elements according to emotions generated on players.	Text	Incorporating Emotion Transition Pattern Graph in Metaphor-based Game Design related to Software Engineering, page 4	Improving quality factor	Requirement	I used quality factor taken in the XX text, for all the elements that evaluates a game
Which quality and/or sub-quality factors are evaluated?		A METHOD FOR THE EVALUATION OF THE QUALITY OF GAMES FOR COMPUTING EDUCATION, page 74	Game desginer does not consider quality factor	Problem	As quality factors are evaluated, if whatever game shows low results, it means that the designer did not aplly that factors
MEEGA measures three quality factors of educational games: motivation, user experience, and learning.	Text	A METHOD FOR THE EVALUATION OF THE QUALITY OF GAMES FOR COMPUTING EDUCATION, page 77	Software Engineering Game has quality factor	Structural triad	The quality factors are related to games
However, such games lack an emotional design	Text	Incorporating Emotion Transition Pattern Graph in Metaphor-based Game Design related to Software Engineering, page 2	Promoting the emotional Design	Requirement	Change the absence of emotional design is a goal understood
<p>Figure 1. Example of the ETPG [Joy, ST: Satisfaction, RL: Relief, DP: Disappointment, FE: Fear, SD: Sadness; Kim & Ohn, 2016]</p>	Image	Incorporating Emotion Transition Pattern Graph in Metaphor-based Game Design related to Software Engineering, page 6 figure 1 https://www.futurelearn.com/info/courses/teaching-literacy-through-film/0/steps/11357	Emotion Transition Pattern Graph has Distance emotion transition Emotion Transition Pattern Graph has emotion Emotion Transition Pattern Graph has Emotional transition frequency Emotion Transition Pattern Graph has story event	Structural triad	

SE includes fields like test, project management, software design, software development process	Text	Incorporating Emotion Transition Pattern Graph in Metaphor-based Game Design related to Software Engineering, page 5	Game designer launches Software Engineering Game	Event	Is deducted that after the development, the designer or the team have to launch the game
Computer science games are scarcely reported with information related to developing process.	Text	Incorporating Emotion Transition Pattern Graph in Metaphor-based Game Design related to Software Engineering, page 9	Software Engineering Game has development process	Structural triad	
"Test your skill as a project manager!"	Image	www.thatpmgame.com	The project management game is Software Engineering Game	Structural triad	Being assigned for the analysis in this assignment it means that the game is about Software engineering
Software engineering games are usually designed for teaching practical experiences to the students	Text	Incorporating Emotion Transition Pattern Graph in Metaphor-based Game Design related to Software Engineering, page 2	Player has practical experience	Structural triad	Student that is player playing videogames earns practical experience
Software engineering games (SEG) provide an alternative instrument for gaining practical experience	Text	Incorporating Emotion Transition Pattern Graph in Metaphor-based Game Design related to Software Engineering, page 5	High-Low Practical experience	Problem	Is something that some games have to gain, is supposed that some of them has low practical experience
Software engineering games (SEG) provide an alternative instrument for gaining practical experience in a safe and controlled environment.	Text	Incorporating Emotion Transition Pattern Graph in Metaphor-based Game Design related to Software Engineering, page 6	Gaining practical experience	Goal	One of the most important goals of the Grissa's Phd proposal
expand and revising concepts, and learning skills; which improve non-technical issues...	Text	Incorporating Emotion Transition Pattern Graph in Metaphor-based Game Design related to Software Engineering, page 5	Expanding the learning concept	Goal	Generalized to expand learning concept
teaching practical experiences to the students (e.g., video games, board games, and card games).	Text	Incorporating Emotion Transition Pattern Graph in Metaphor-based Game Design related to Software Engineering, page 2	Pre-grade student is player	Structural triad	Is reasonable that whatever who plays is player, but for this work all the students of the assignment are in pre-grade
Emotion transition pattern Graph (ETPG) is a visualization of emotional changes of players.	Text	Incorporating Emotion Transition Pattern Graph in Metaphor-based Game Design related to Software Engineering, page 5	Student has emotional change	Structural triad	The principal player in the thesis is the student, that is more involved in SE games, for that sense is deducted just to student
Software engineering games are usually designed in software engineering (SE) as a strategy for motivating and challenging the students ...	Text	Incorporating Emotion Transition Pattern Graph in Metaphor-based Game Design related to Software Engineering, page 4	Encouraging the player	Goal	Motivating and challenging student = Encouraging student (for to be a goal) also student = player (we generalize to player)
Software engineering players express discomfort in evaluations about games related to user experiences (Petri et al., 2017).	Text	Incorporating Emotion Transition Pattern Graph in Metaphor-based Game Design related to Software Engineering, page 11	Pre-grade student evaluates quality factor	Dynamic triad	Also what we did in the 2nd forum was evaluate various quality factors

Computer science games are scarcely reported with information related to developing process.	Text	Incorporating Emotion Transition Pattern Graph in Metaphor-based Game Design related to Software Engineering, page 9	Game designer reports "scarcely" development process	Problem	
However, such games lack an emotional design.	Text	Incorporating Emotion Transition Pattern Graph in Metaphor-based Game Design related to Software Engineering, page 2	Method does not have emotional design	Problem	Lack = Do not have
Emotional design is imprecise in the method for including emotions in game design models	Text	Incorporating Emotion Transition Pattern Graph in Metaphor-based Game Design related to Software Engineering, page 2	Emotional design is imprecise	Problem	
ETPG is used in successful and unsuccessful games for comparing distances on emotions types.	Text	Incorporating Emotion Transition Pattern Graph in Metaphor-based Game Design related to Software Engineering, page 4	Software engineering game does not have potential success	Problem	Potential success is the similar concept to be successful or not, related to performance or sales
but they lack a description for modeling such attributes in a game design (Padilla-Zea et al., 2015; Ibrahim & Jaafar, 2009; Staalduin and Freitas, 2011; Kiili, 2005).	Text	Incorporating Emotion Transition Pattern Graph in Metaphor-based Game Design related to Software Engineering, page 11	Method does not have description	Problem	
Computer science games are scarcely reported with information related to developing process	Text	Incorporating Emotion Transition Pattern Graph in Metaphor-based Game Design related to Software Engineering, page 10	Game designer reports development process	Dynamic triad	It means that some designer reports the development process
	Image	www.thatpmgame.com	The project management game has learning concept The project management game has score storage The project management game has rating	Structural triad	Being a project management game it means that it has learning concepts about management, also we can see it has score storage and in the discuss there is the game's rating from the player
	Image	www.thatpmgame.com	Improving The project management game	Goal	In the discuss box, whatever player can leave comment about the game and one of the goals for the game designer is improve the game
Incorporating Emotion Transition Pattern Graph in Metaphor	Text	Incorporating Emotion Transition Pattern Graph in Metaphor-based Game Design related to Software Engineering, page 1	Achieving the incorporation of the Emotion Transition Pattern Graph	Goal	Is the main goal from Grissa's PhD Research Proposal

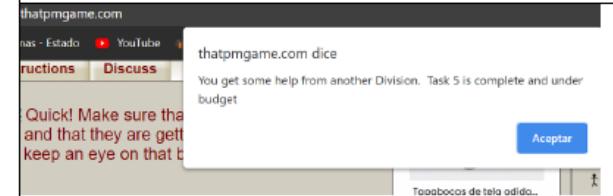
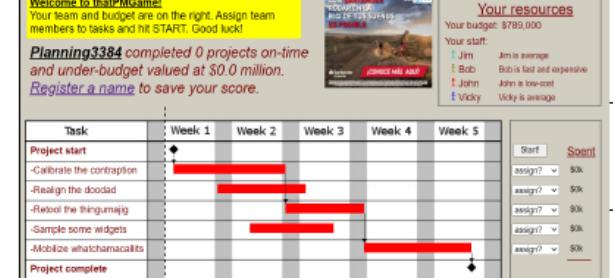
Incorporating ETPG in metaphor-based game design related to software engineering is possible by defining a method.	Text	Incorporating Emotion Transition Pattern Graph in Metaphor-based Game Design related to Software Engineering, page 11	Method is development process	Structural triad	Is generalized that a method of development is part of or could be all the development process
Incorporating Emotion Transition Pattern Graph in Metaphor-based Game Design related to Software Engineering, page 3	Text	Incorporating Emotion Transition Pattern Graph in Metaphor-based Game Design related to Software Engineering, page 3	Achieving the incorporation of the Emotion Transition Pattern Graph	Goal	Is the main goal from Grissa's PhD Research Proposal
This game is centered around a common project management scheduling tool known as a <u>Gantt chart</u> . Basically your goal is to assign your staff to various tasks on the Gantt chart in such a way that the project is completed on-time and under budget. First assign staff to each task, then click the 'start!' button.	Image	www.thatpmgame.com	Player learns project management skill	Dynamic triad	While the player is playing the game also is learning about project management
	Image	www.thatpmgame.com	Manager modifies staff	Dynamic triad	When a "Chance!" is applied the manager could modify the staff
	Image	www.thatpmgame.com	Manager modifies task	Dynamic triad	When a "Chance!" is applied the manager could modify a task
	Image	www.thatpmgame.com	Manager spawns staff	Dynamic triad	When the http://thatpmgame.com/ page charges to start the game, the staff spawns automatically
	Image	www.thatpmgame.com	Manager spawns budget	Dynamic triad	When the http://thatpmgame.com/ page charges to start the game, the budget spawns automatically
	Image	www.thatpmgame.com	Manager spawns task	Dynamic triad	When the http://thatpmgame.com/ page charges to start the game, the tasks spawn automatically
			Task emerges	Event	When the player charges the http://thatpmgame.com/ the task emerges automatically

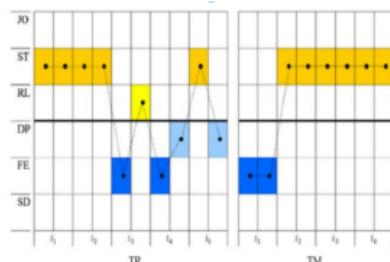
	Image	www.thatpmgame.com	Staff emerges	Event	When the player charges the http://www.thatpmgame.com/ the task emerges automatically
All the documents for the course's chores	Image	www.thatpmgame.com	Budget emerges	Event	When the player charges the http://www.thatpmgame.com/ the task emerges automatically
All the documents for the course's chores	Text	https://minaslap.net/course/view.php?id=530	Research Group on Computational Languages has pre-grade student Research Group on Computational Languages has post-grade student	Structural triad	Being enrolled in the assignment, it makes us participants of the group
All the documents for the course's chores	Text	https://minaslap.net/course/view.php?id=530	Research Group on Computational Languages evaluates Software engineering game	Dynamic triad	What we do in the 2nd forum was an evaluation of each game, and we are part of the Research Group on Computational Languages
All the documents for the course's chores	Text	https://minaslap.net/course/view.php?id=530	Research Group on Computational Languages evaluates Emotional transition frequency	Dynamic triad	What we do in the 2nd forum was an evaluation of each game related to emotion frequency
All the documents for the course's chores	Text	https://minaslap.net/course/view.php?id=530	Research Group on Computational Languages uses Emotion Transition Pattern Graph	Dynamic triad	What we do in the 2nd forum was an evaluation of each game related to emotion frequency aided by the ETPG
"Consentimiento informado"	Text	https://minaslap.net/course/view.php?id=531	Pre-grade student shares quality factor	Dynamic triad	Doing the feedback of the game's survey the player (student) shares the impressions of the game and its quality factors
	Image	Incorporating Emotion Transition Pattern Graph in Metaphor-based Game Design related to Software Engineering, page 6 figure 1	Emotion Transition Pattern Graph is emotional evaluating method	Structural triad	What the pattern evaluates are the emotions presented during the game
ETPG is only used in video games for evaluating emotions and showing the frequency of emotional changes.	Text	Incorporating Emotion Transition Pattern Graph in Metaphor-based Game Design related to Software Engineering, page 2	Increasing Emotional transition frequency	Requirement	Is very important that the game increases the emotional frequency because it could become monotonous

Figure 1. Example of the ETPG (J: Joy, ST: Satisfaction, RL: Relief, DP: Disappointment, FE: Fear, SD: Sadness; Kim & Doh, 2016)

<p>Emotions proposed</p> <p>Joy Happiness Satisfaction Relief Sadness Fear Disgust Anger</p>	<table border="1"> <thead> <tr> <th></th><th>Number notation</th><th>Emotion</th><th>Emoji</th></tr> </thead> <tbody> <tr> <td>P</td><td>4</td><td>Joy</td><td>😂</td></tr> <tr> <td>O</td><td>3</td><td>Happiness</td><td>😊</td></tr> <tr> <td>S</td><td>2</td><td>Satisfaction</td><td>😍</td></tr> <tr> <td>I</td><td>1</td><td>Relief</td><td>😌</td></tr> <tr> <td>N</td><td>-1</td><td>Sadness</td><td>😢</td></tr> <tr> <td>E</td><td>-2</td><td>Fear</td><td>😱</td></tr> <tr> <td>G</td><td>-3</td><td>Disgust</td><td>🤮</td></tr> <tr> <td>A</td><td>-4</td><td>Anger</td><td>😡</td></tr> </tbody> </table> <p>(Jaeger, Roigard, Jin, Vidal, & Ares, 2019)</p>		Number notation	Emotion	Emoji	P	4	Joy	😂	O	3	Happiness	😊	S	2	Satisfaction	😍	I	1	Relief	😌	N	-1	Sadness	😢	E	-2	Fear	😱	G	-3	Disgust	🤮	A	-4	Anger	😡		<p>Image</p> <p>PhD Thesis Incorporating emotion transition pattern graph in metaphor-based game design related to software engineering, Presentación Problems page/slide 14</p>	<p>Emotion has name Emotion has number Emotion has valence Emotion has emoji</p>	<p>Structural triad</p>	
	Number notation	Emotion	Emoji																																							
P	4	Joy	😂																																							
O	3	Happiness	😊																																							
S	2	Satisfaction	😍																																							
I	1	Relief	😌																																							
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E	-2	Fear	😱																																							
G	-3	Disgust	🤮																																							
A	-4	Anger	😡																																							
<p>Interactive Stories/Narrative</p> <p>The player's actions form part of the story itself, which makes an interactive story very different from a story presented to a passive audience. In fact, an interactive story includes three kinds of events:</p> <p>(Adams, 2013)</p> <p>Events/Mechanics from the emotion perspective</p> <p>1) Everything that would plausibly cause a notable psychophysiological reaction</p> <p>2) Everything that either promotes or hinders success/progress in the game.</p> <p>(Cowley et al., 2013)</p>	<p>Context Related Work Problem Statement Proposed S</p> <p>Player events: are actions performed directly by the player.</p> <p>In game events: are events initiated by the core mechanics of the game</p> <p>Narrative events: are events whose content the player cannot change, although he may be able to change whether they occur or not. A narrative event narrates some action to the player; he does not interact with it.</p> <p>Events/Mechanics from the emotion perspective</p> <p>1) Everything that would plausibly cause a notable psychophysiological reaction</p> <p>2) Everything that either promotes or hinders success/progress in the game.</p> <p>(Cowley et al., 2013)</p>	<p>Image</p>	<p>Image</p> <p>PhD Thesis Incorporating emotion transition pattern graph in metaphor-based game design related to software engineering, Presentación Problems pages/slides 19-20</p>	<p>Story event is mechanic Story event is game event</p>	<p>Structural triad</p>																																					

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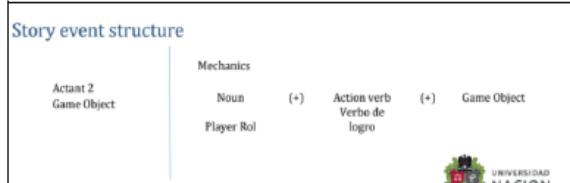
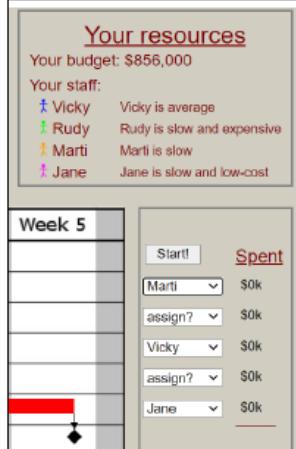
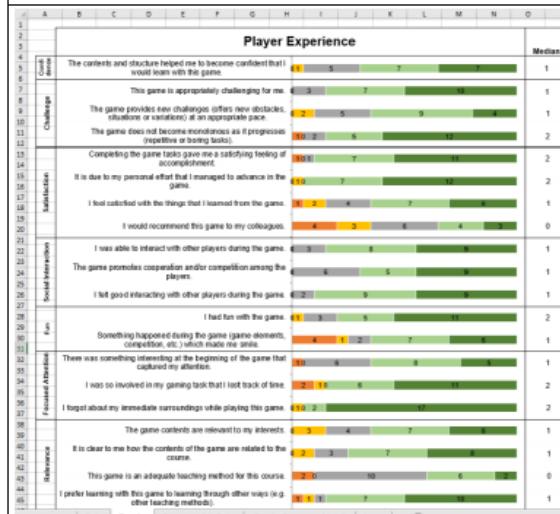
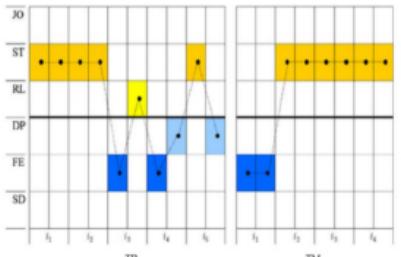
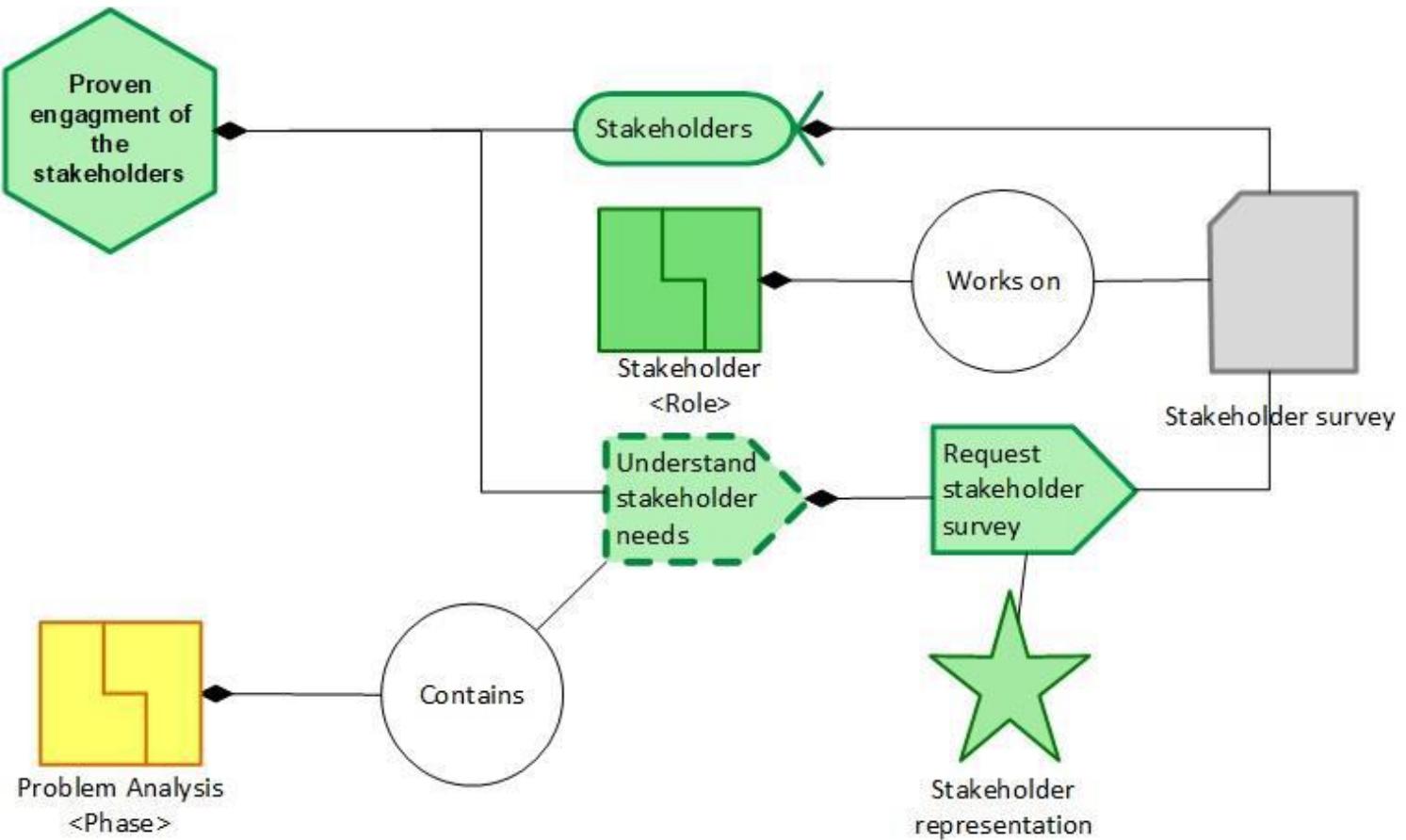
Story event structure	Image	PhD Thesis Incorporating emotion transition pattern graph in metaphor-based game design related to software engineering, Presentación Problems page/slide 24	Mechanic has actant Mechanic has verb Mechanic has game Mechanic has object rule	Structural triad	Description of Mechanic																		
 <p>(Source: The authors)</p>  <p>UNIVERSIDAD NACIONAL</p> <p>Game Instructions Discuss</p> <p>Talk about the game, resource allocation, or any Project Management topic!</p> <p>197 comments found.</p> <p>Previous 1 2 3 ... 6 7 8 9 10 11 12 ... 18 19 20 Next</p> <p>81) Pablo on 2016-05-25</p> <p>Hello - thanks for the game. It's very interesting to introduce the training attendants in resource management. Thanks</p>	Image	http://thatpmgame.com/feedback/?&s=80&np=20#pos2	Increasing the rating	Goal	Get a better calification, the game could be more famous and more people that want learn about project management could learn from it																		
 <table border="1"> <thead> <tr> <th>Week 5</th> <th>Start!</th> <th>Spent</th> </tr> </thead> <tbody> <tr> <td></td> <td>Marti</td> <td>\$0k</td> </tr> <tr> <td></td> <td>assign?</td> <td>\$0k</td> </tr> <tr> <td></td> <td>Vicky</td> <td>\$0k</td> </tr> <tr> <td></td> <td>assign?</td> <td>\$0k</td> </tr> <tr> <td></td> <td>Jane</td> <td>\$0k</td> </tr> </tbody> </table>	Week 5	Start!	Spent		Marti	\$0k		assign?	\$0k		Vicky	\$0k		assign?	\$0k		Jane	\$0k	Image	http://thatpmgame.com/	Allowing the managing of the staff	Requirement	Requirement for the developers that allows the free managing of the staff to see what happens in different scenarios
Week 5	Start!	Spent																					
	Marti	\$0k																					
	assign?	\$0k																					
	Vicky	\$0k																					
	assign?	\$0k																					
	Jane	\$0k																					

	Image	A METHOD FOR THE EVALUATION OF THE QUALITY OF GAMES FOR COMPUTING EDUCATION, page 127-128, table 30	Usability of the quality factor are "low values".	Problem	Low valoration of usability, could be values between -1 and -2
	Image	A METHOD FOR THE EVALUATION OF THE QUALITY OF GAMES FOR COMPUTING EDUCATION, page 133, figure 26	Player experience of the quality factor are "low values"	Problem	Low valoration of the dimension of player experience, could be values between -1 and -3



 <p>Figure 1. Example of the ETPG (JO: Joy, ST: Satisfaction, RL: Relief, DP: Disappointment, FE: Fear, SD: Sadness; Kim & Doh, 2016)</p>	Image	Incorporating Emotion Transition Pattern Graph in Metaphor-based Game Design related to Software Engineering, page 6 figure 1	Player has "few" emotional transition frequency	Problem	If in the ETPG the transitions are monotonous it means that the player didn't show emotional changes
Software engineering players express discomfort in evaluations about games related to user experiences	Text	Incorporating Emotion Transition Pattern Graph in Metaphor-based Game Design related to Software Engineering, page 4	Practical experience of the player is "low"	Problem	User experiences could be resumed to practical experiences, what is a problem about some games that didn't experiment widely before

< Requirements

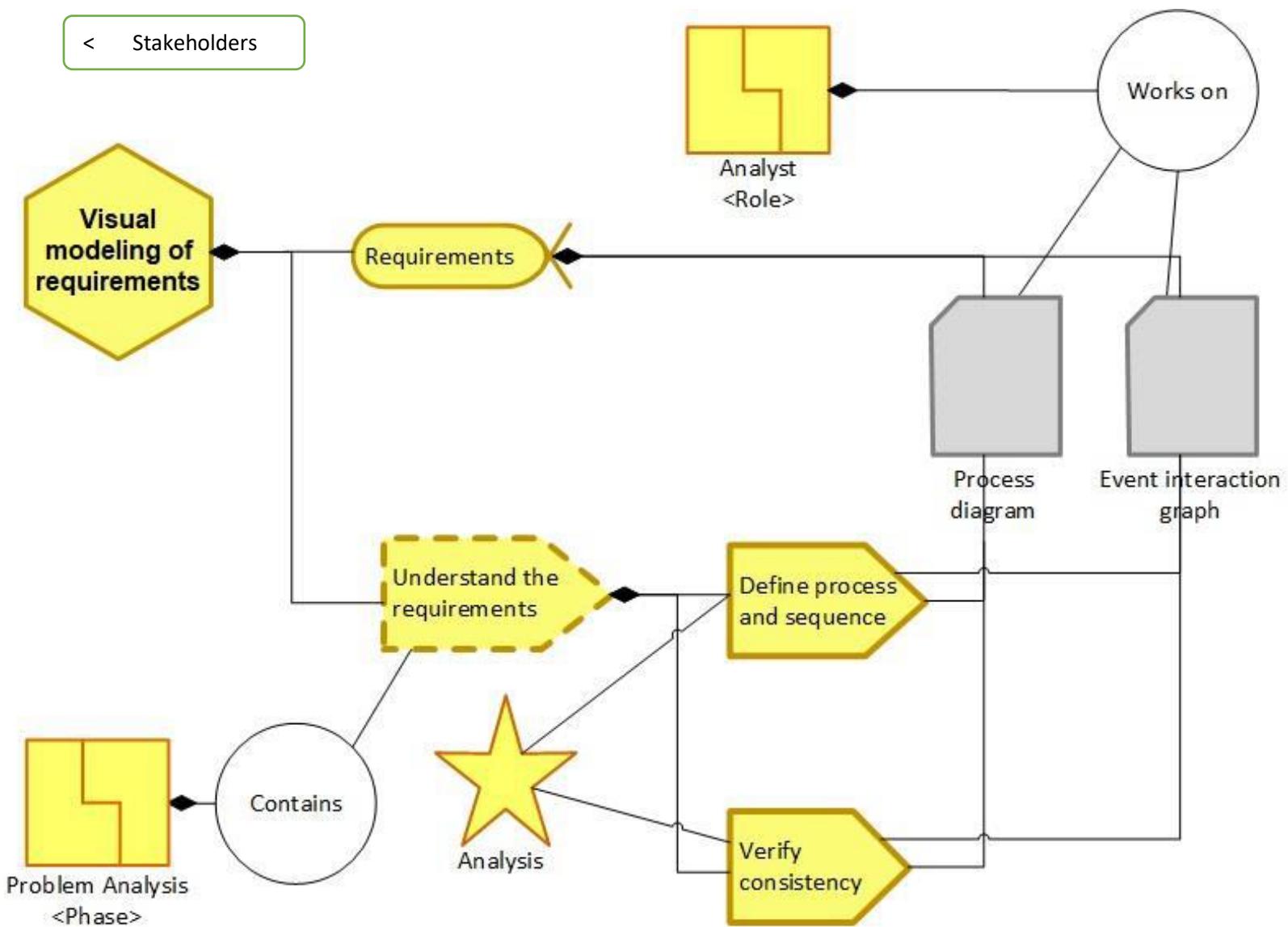


Requirements >

STAKEHOLDER SURVEY

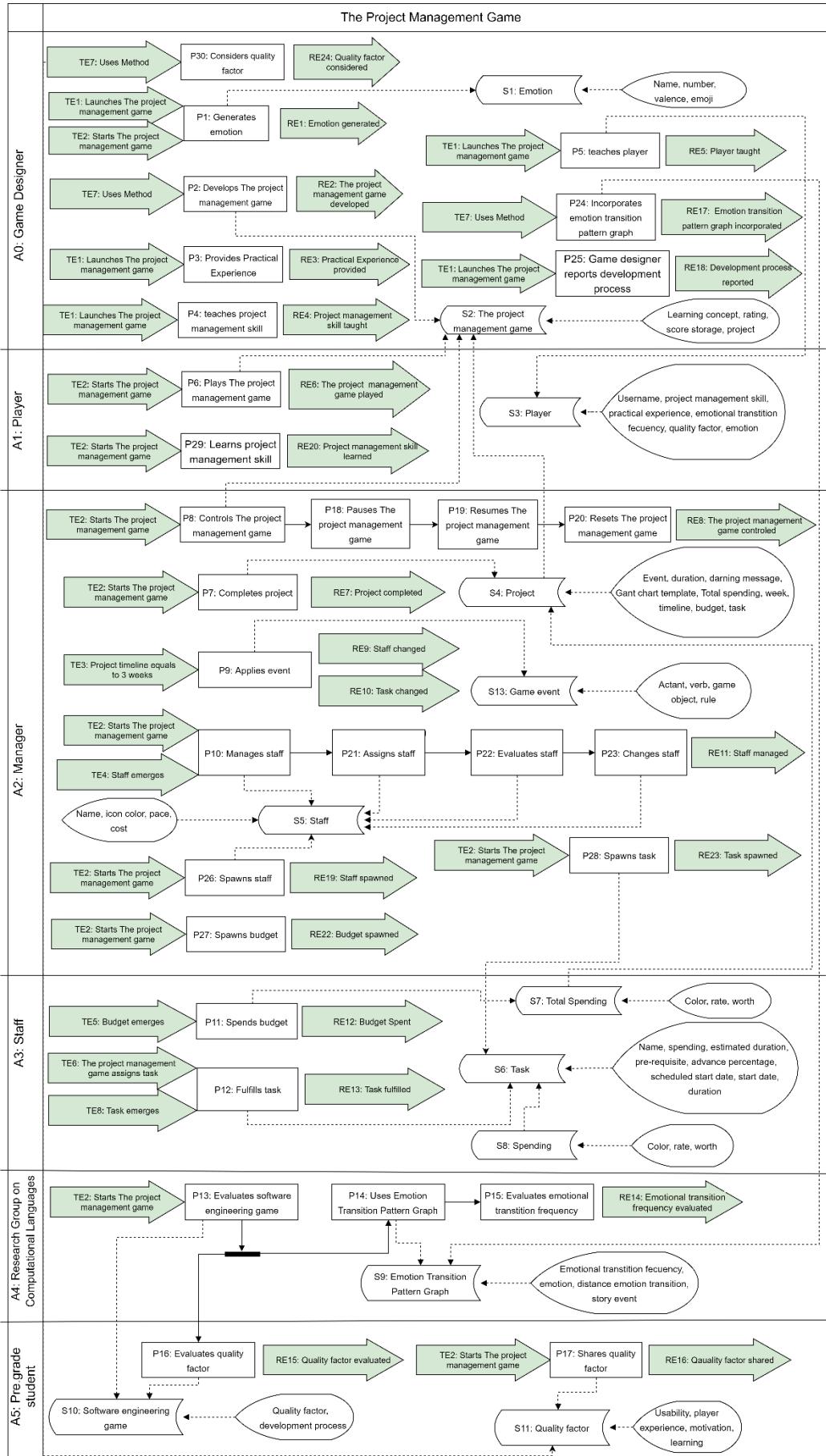
PROJECT NAME	The project management game				
STAKEHOLDER NAME	Grissa Vianney Maturana Gonzalez				
DATE	19/04/2021				
CRITERIA	STRONGLY AGREE	AGREE	NEITHER	DISAGREE	STRONGLY DISAGREE
THE INFORMATION IS COMPLETE ACCORDING TO OUR MEETINGS	x				
THE WORK PRODUCTS I COULD REVIEW ARE CLEAR	x				
THE PROBLEM IS CLEARLY IDENTIFIED	x				
GOALS ARE RELATED TO THE ORGANIZATION	x				
THE SEQUENCE OF THE PROCESS IS ARTICULATED	x				
THE OVERAL QUILITY OF THE DELIVERABLES IS ADEQUATE	x				
SUGGESTIONS	La representación del dominio es adecuada pero le falta plenitud. Se realizaron las recomendaciones requeridas para mejorar el modelo.				
SIGNATURE	<i>Grissa V. Maturana G.</i>				

< Stakeholders

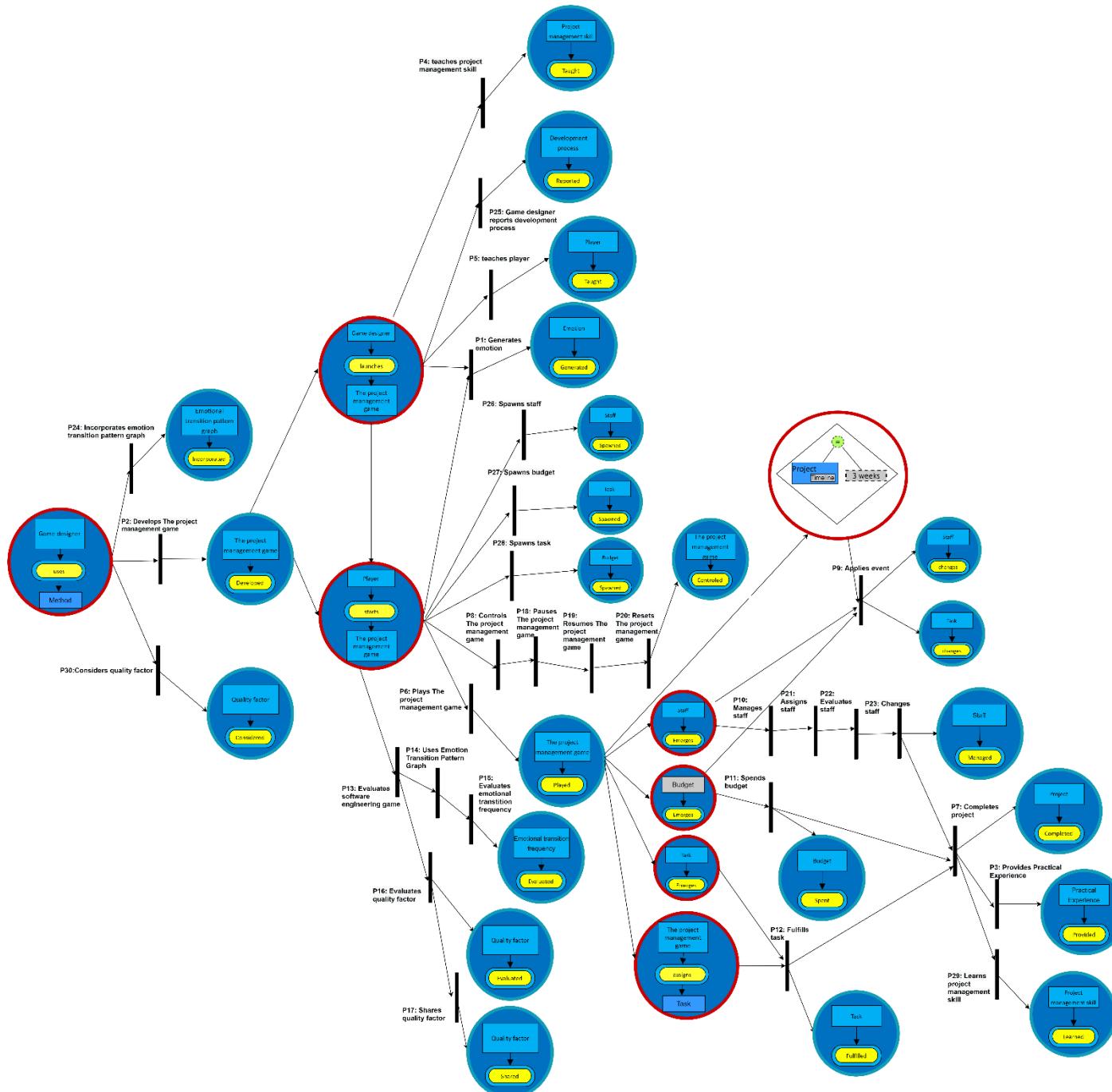


Requirements >

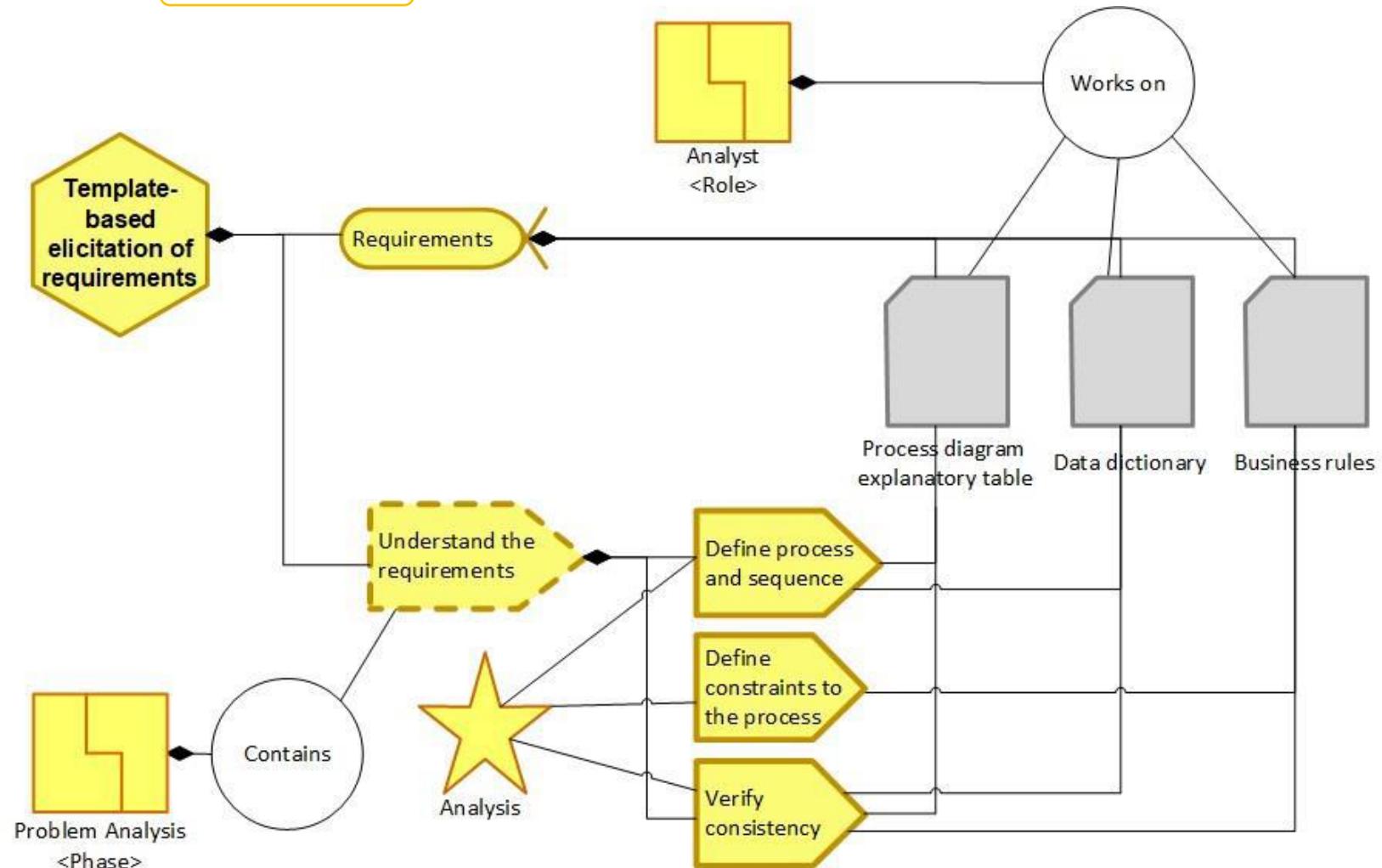
Process diagram



Event interaction graph



< Requirements



Requirements >

Process diagram explanatory table

Name	Goal	Duration / Frequency	How ? / Where ?	Problems	Business Rules	Events
P1: Generates emotion	G1: Improving method G13: Promoting the emotional design G5: Encouraging player	Every time the game starts and is played	When the game is launched and the player plays the game it produces emotions	SP3: Player has few emotional transition frequency	BR009: Take a chance	TE1: Launches The project management game RE1: Emotion generated TE2: Starts The project management game
P2: Develops The project management game	G2: Improving The project management game G8: Expanding the learning concept G3: Gaining practical experience	Once for create it Once in a while for actualizations	The game designer develops the game and sometimes he actualizes it	C1: The project management game has unusable score storage. C5: The rating of the project management game is unknown. C9: Game designer reports "scarcely" development process. C8: Game designer does not incorporate transition emotion pattern graph. C7: Method does not have emotional design		TE7: Uses Method RE2: The project management game developed
P3: Provides Practical Experience	G3: Gaining practical experience	Every time the game starts and is played	Playing the game maked that the player experiment with new challenges during the game	SP1: Low practical experience	BR001: Burn out staff BR002: Pre-requisite task	TE1: Launches The project management game RE3: Practical Experience provided
P4: Teaches project management skill	G4: Improving project management skill R1: Guaranteeing the teaching of project management skill	Every time the game starts and is played	The main topic of the game is project management and play the game makes the player learn about it, thus the developer teaches that skill	Player is not encouraged	BR001: Burn out staff BR002: Pre-requisite task BR007: Assign staff	TE1: Launches The project management game RE4: Project management skill taught
P5: Teaches player	G5: Encouraging player R1: Guaranteeing the teaching of project management skill	Every time the game starts and is played	In a similar way with the previous process, the actor who learns about project management is the player	Player is not encouraged	BR007: Assign staff	TE1: Launches The project management game RE5: Taught Player
P6: Plays The project management game	G4: Improving project management skill G8: Expanding the learning concept	Every time the game starts and is played	Whatever can plays the game in the web page http://thatpmgame.com/	Player is not encouraged	BR008: Empty task	TE2: Starts The project management game RE6: The project management game played
P7: Completes project	G3: Gaining practical experience G4: Improving project management skill G6: Reducing duration	5 weeks	When the manager finishes the game successfully the main project is completed		BR009: Take a chance	TE2: Starts The project management game RE7: Project completed
P8: Controls The project management game	R2: Allowing the managing of the staff	5 weeks (duration of the game)	With the main button in the right frame, near to "Spent!" the manager can controls the game		BR003: Pause BR004: Resume BR010: Reset	TE2: Starts The project management game RE8: The project management game controled

P9: Applies event	G8: Expanding the learning concept G4: Improving the project management skill	Once in the 3rd week	Clicking the "Chance!" button in the 3rd week		BR009: Take a chance BR003: Pause BR004: Resume	TE3: Project timeline equals to 3 weeks RE9: Staff changed RE10: Task changed
P10: Manages staff	R2: Allowing the managing of the staff	5 weeks	Assigning, evaluating and changing the staff with the buttons "Assign!" in the right frame		BR005: Replacing staff BR007: Assign staff BR001: Burn out staff	TE2: Starts The project management game TE4: Staff emerges RE11: Staff managed
P11: Spends budget	G6: Preserving budget	5 weeks (during the game)	While the project is running, every staff is spending resources from the total budget		BR006: Warning message	TE5: Budget emerges RE12: Budget Spent
P12: Fulfils task	G7: Reducing the duration G6: Preserving the budget G8: Expanding the learning concept G4: Improving project management skill	Every week	When a task bar turns to grey color, it means that the task is fulfilled	C2: The name of the tasks is unclear.	BR007: Assign staff	TE6: The project management game assigns task RE13: Task fulfilled TE8: Task emerges
P13: Evaluates software engineering game	G9: Increasing the rating G2: Improving The project management game G12: Improving quality factor	Once when the game is played	After playing the game, the player may evaluate the game	C6: Player experience of the quality factor are "low valoration". C4: Usability of the quality factor are "low valoration".		TE2: Starts The project management game
P14: Uses Emotion Transition Pattern Graph	G11: Improving quality factor G13: Promoting the emotional design	Every evaluation	For the evaluation of the player reaction, is used this special graph	SP3: Player has few emotional transition frequency C6: Player experience of the quality factor are "low valoration". C4: Usability of the quality factor are "low valoration". C7: Method does not have emotional design		
P15: Evaluates Frequential emotional transition	G12: Increasing Emotional transition frequency	Every evaluation	In the graph is showed the frequential emotional transition and it shows to the evaluator something about the feeling of the player during the game	SP3: Player has few emotional transition frequency C6: Player experience of the quality factor are "low valoration". C4: Usability of the quality factor are "low valoration".		RE14: Frequential emotional transition evaluated
P16: Evaluates quality factor	G11: Improving quality factor	Every evaluation	The evaluation considers different items about quality	SP2: Game designer does not consider the quality factor. C6: Player experience of the quality factor are "low valoration". C4: Usability of the quality factor are "low valoration".		RE15: Quality factor evaluated

P17: Shares quality factor	G11: Improving quality factor	Every time the game is played	After play the game or during the evaluation of the game feelings, the player shares impressions and could do a feedback related to the game	C9: Game designer reports "scarcely" development process.		TE2: Starts The project management game RE16: Quality factor shared
P18: Pauses The project management game	G7: Reducing the duration G6: Preserving the budget	5 weeks (duration of the game)	With the main button in the right frame, near to "Spent!" the manager can pauses the game while it is running		BR003: Pause	RE8: The project management game controled
P19: Resumes The project management game	G7: Reducing the duration G6: Preserving the budget	6 weeks (duration of the game)	With the main button in the right frame, near to "Spent!" the manager can resumes the game if it is paused		BR004: Resume	TE2: Starts The project management game RE8: The project management game controled
P20: Resets The project management game	G7: Reducing the duration	7 weeks (duration of the game)	With the main button in the right frame, near to "Spent!" the manager can resetss the game when it finishes		BR010: Reset	TE2: Starts The project management game RE8: The project management game controled
P21: Assigns staff	R2: Allowing the managing of the staff	5 weeks	The manager do this process with the buttons "Assign!" in the right frame for assign staff in each task		BR007: Assign staff	TE2: Starts The project management game TE4: Staff emerges
P22: Evaluates staff	R2: Allowing the managing of the staff	5 weeks	While the game is running the manager can evaluates the staff and see what is happening with the staff in each task		BR007: Assign staff BR005: Replacing staff	TE2: Starts The project management game TE4: TE4: Staff emerges
P23: Changes staff	R2: Allowing the managing of the staff	5 weeks	The manager can change the actor of the task with the buttons "Assign!" that appears in the right frame when the game is not started, and it changes to the name of the staff actor that is in charge of the selected task		BR005: Replacing staff	TE2: Starts The project management game TE4: TE4: Staff emerges
P24: Incorporates emotion transition pattern graph	G10: Achieving the incorporation of emotion transition ptertern graph	All the project	This process occurs when the game designer incorporates the emotion transition pattern graphn to its development method	C8: Game designer does not incorporate transition emotion pattern graph C7: Method does not have emotional design		TE7: Uses Method RE17: Emotion transition pattern graph incorporated
P25: Reports development process	G8: Expanding the learning concept	All the project	This process occurs when the game designer reports correctly and do the documentation of the project	C9: Game designer reports "scarcely" development process		TE1: Launches The project management game RE18: Development process reported
P26: Spawns staff	G4: Improving the project management skill	Just in the beginning of the game	When the http://thatpmgame.com/ page charges to start the game, the staff spawns automatically		BR007: Assign staff BR004: Resume	TE2: Starts The project management game RE19: Staff spawned
P27: Spawns budget	G4: Improving the project management skill	Just in the beginning of the game	When the http://thatpmgame.com/ page charges to start the game, the budget spawns automatically		BR004: Resume	TE2: Starts The project management game RE22: Budget spawned

P28: Spawns task	G4: Improving the project management skill	Just in the beginning of the game	When the http://thatpmgame.com/ page charges to start the game, the tasks spawn automatically	C2: The name of the tasks is unclear	BR004: Resume	TE2: Starts The project management game RE23: Task spawned
P29: Learns project management skill	R1: Guaranteeing the teaching of project management skill G4: Improving the project management skill	During the game	Playing the project management game the player is learning about project management	C6: Player experience of the quality factor are "low valorations" Player is not encouraged		TE2: Starts The project management game RE 20: Project management skill learned
P30: Considers quality factor	G2: Improving The project management game	During the game	Playing the project management game the player is learning about project management	SP2: Game designer does not consider the quality factor. C7: Method does not have emotional design		TE7: Uses Method RE24: Quality factor considered

Data dictionary

Name	Alias	Type	Processes involved	Features
A0: Game designer	Game maker	External agent	P1: Generates emotion, P2: Develops the project management game, P3: Provides practical experience, P4: Teaches project management skill, P5: Teaches player, P24: Incorporates emotion transition pattern graph, P25: Game designer reports development process	Nickname
A1: Player	Manager	External agent and I/O storage	P5: teaches player, P6: Plays the project management game, P29: Learns project management skill	Username, project management skill, practical experience, emotional transition frequency, player experience, emotion
A2: Manager		External agent	P7: Completes Project, P8: Controls the project management game, P9: Applies event, P10: Manages staff, P18: Pauses The project management game, P19: Resumes The project management game, P20: Resets The project management game, P21: Assigns staff, P22: Evaluates staff, P23: Changes staff, P26: Spawns staff, P27: Spawns budget, P28: Spawns task	
A3: Staff		External agent and I/O storage	P10: Manages staff, P11: Spends budget, P12: Fulfils task, P21: Assigns staff, P22: Evaluates staff, P23: Changes staff	Name, icon color, pace, cost
A4: Research group on computational languages		External agent	P13: Evaluates software engineering game, P14: Uses Emotion Transition Pattern Graph, P15: Evaluates emotional transition frequency	Pre-grade student, post-grade student
A5: Pre-grade student		External agent	P16: Evaluates quality factor, P17: Shares quality factor	
S1: Emotion		I/O storage	P1: Generates emotion, P2: Develops the project management game	Name
S2: The project management game	Software engineering game	I/O storage	P2: Develops the project management game, P6: Plays The project management game, P7: Completes project, P8: Controls the project management game, P18: Pauses The project management game, P19: Resumes The project	Score storage, project, learning concept, rating

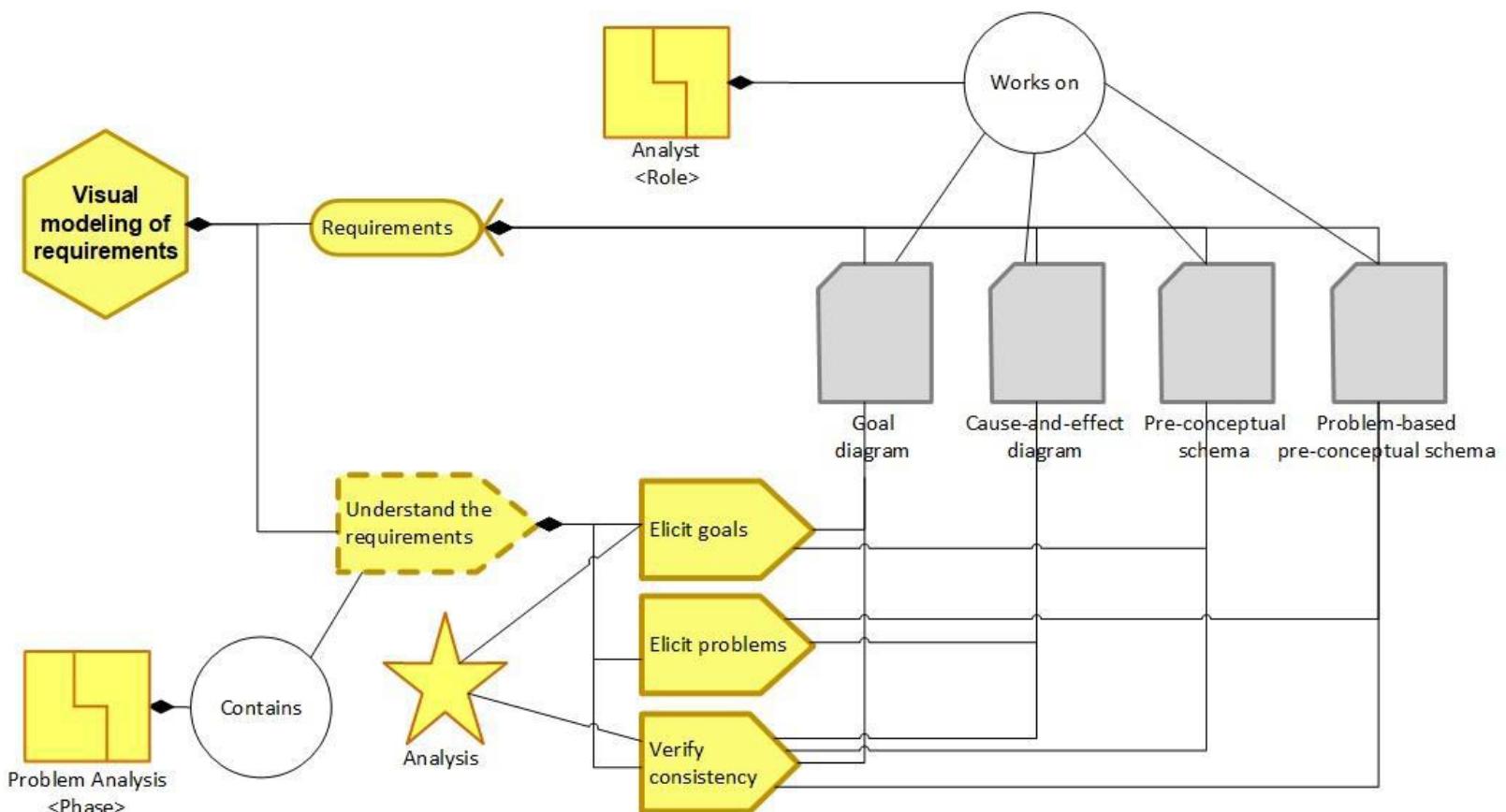
			management game, P20: Resets The project management game	
S4: Project		I/O storage	P7: Completes Project, P11: Spends budget	Event, duration, darning message, Gant chart template, Total spending, week, timeline, budget, task
S6: Task		I/O storage	P12: Fulfils task	Name, spending, estimated duration, pre-requisite, advance percentage, scheduled start date, start date, duration
S7: Total spending		I/O storage	P11: Spends budget	Color, rate, worth
S8: Spending		I/O storage		Color, rate, worth
S9: Emotion Transition Pattern Graph		I/O storage	P14: Uses Emotion Transition Pattern Graph	Emotional transition frequency, emotion, distance emotion transition, story event
S10: Software engineering game		I/O storage	P13: Evaluates software engineering game, P16: Evaluates quality factor	Quality factor, development process
S11: Quality factor		I/O storage	P17: Shares quality factor, P30: Considers quality factor	Motivation, usability, player experience, learning
S13: Game event		I/O storage	P9: Applies event	Actant, verb, game object, rule

Business rules

Code	Name	Description	Formulae	Source	Related business rules
BR001	Burn out staff	The manager can assign a staff member to more than one task, but then will have a burn out member that have a slow down at they pace		http://thatpmgame.com/	BR007
BR002	Prerequisite task	3 of the assigned tasks are connected and need to be complete in order (critical route), you will start with one just after completed the one before, we call it a prerequisite		http://thatpmgame.com/	
BR003	Pause	During the game, the manager can pause the time		http://thatpmgame.com/	
BR004	Resume	If the game is pause, the manager can resume and put the time run again	The_project_management_game.project = "Pause"	http://thatpmgame.com/	BR003
BR005	Replacing staff	the staff can be replacing in any moment, even in state of pause		http://thatpmgame.com/	BR003 BR004 BR007
BR006	Warning messages	During the game the value of warning message will chance indicating the status of the progress, they are: Assign Staff! when there is a task without a staff assign, Over budget! When the		http://thatpmgame.com/	BR001 BR007 BR008 BR002

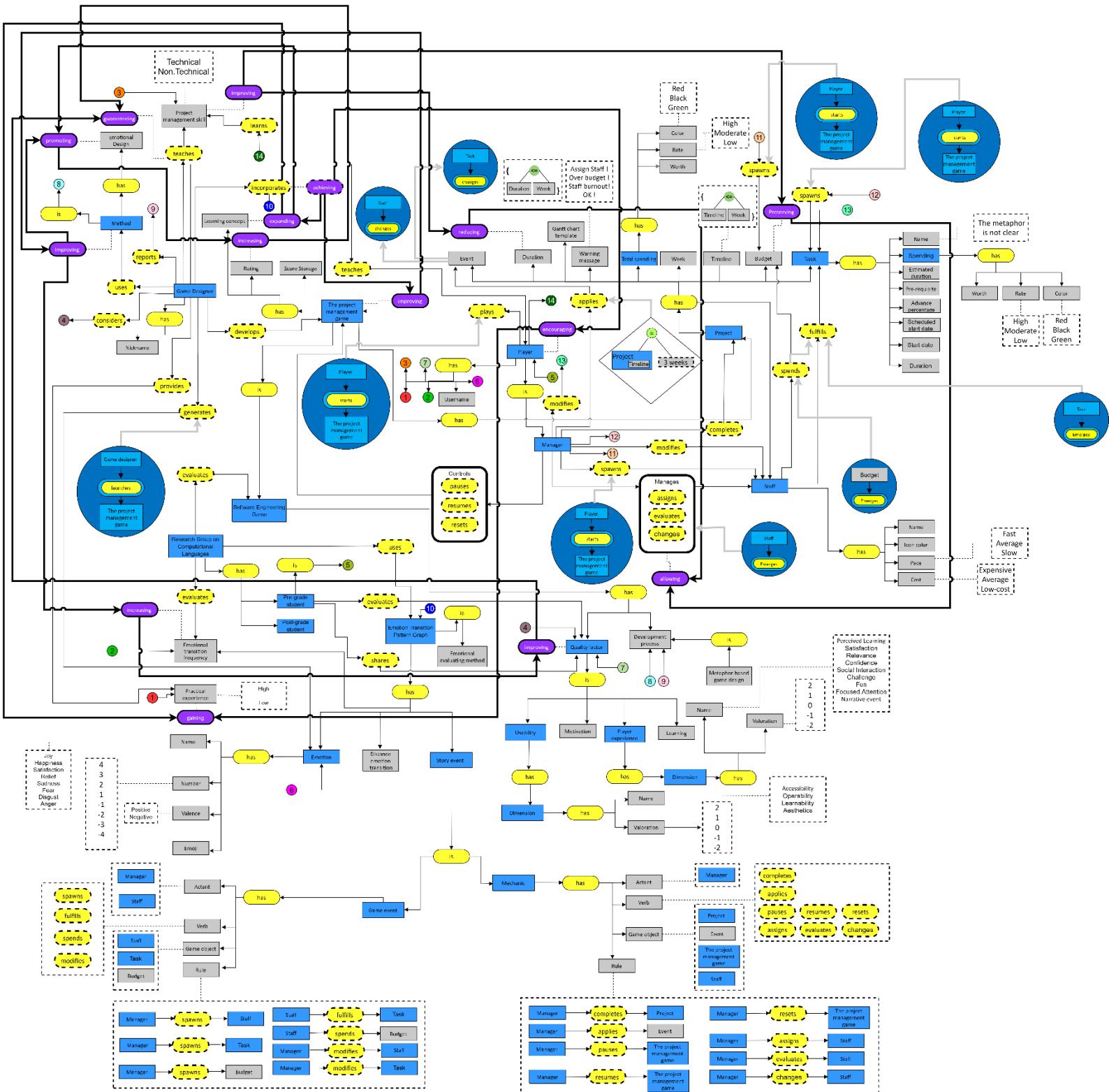
		spent is higher than it is expected or the game ends over budget, Staff burnout! When any member or members of the staff are tired by work on simultaneous task and OK! When the game is going well.			
BR007	Assign staff	The manager can assign a staff member to the task		http://thatpmgame.com/	
BR008	Empty task	If a task does not have a staff assigned it will not move the progress	Staff.Assign(Task.name) != null	http://thatpmgame.com/	
BR009	Take a chance	When the timeline reaches the third week of the project manager will have a very short opportunity to get some help from lady luck. Appears the 'chance' button and be able to be press during that week, if it is pressing the game will pause briefly and the manager applies a random event announce by a text explain the event (change the staff cost or pace, slow down the time, or change the progress of a task	Project.Timeline = "3 weeks"	http://thatpmgame.com/	
BR010	Reset	The manager can reset the game any time which generate randomly the resources and the task again		http://thatpmgame.com/	

< Requirements

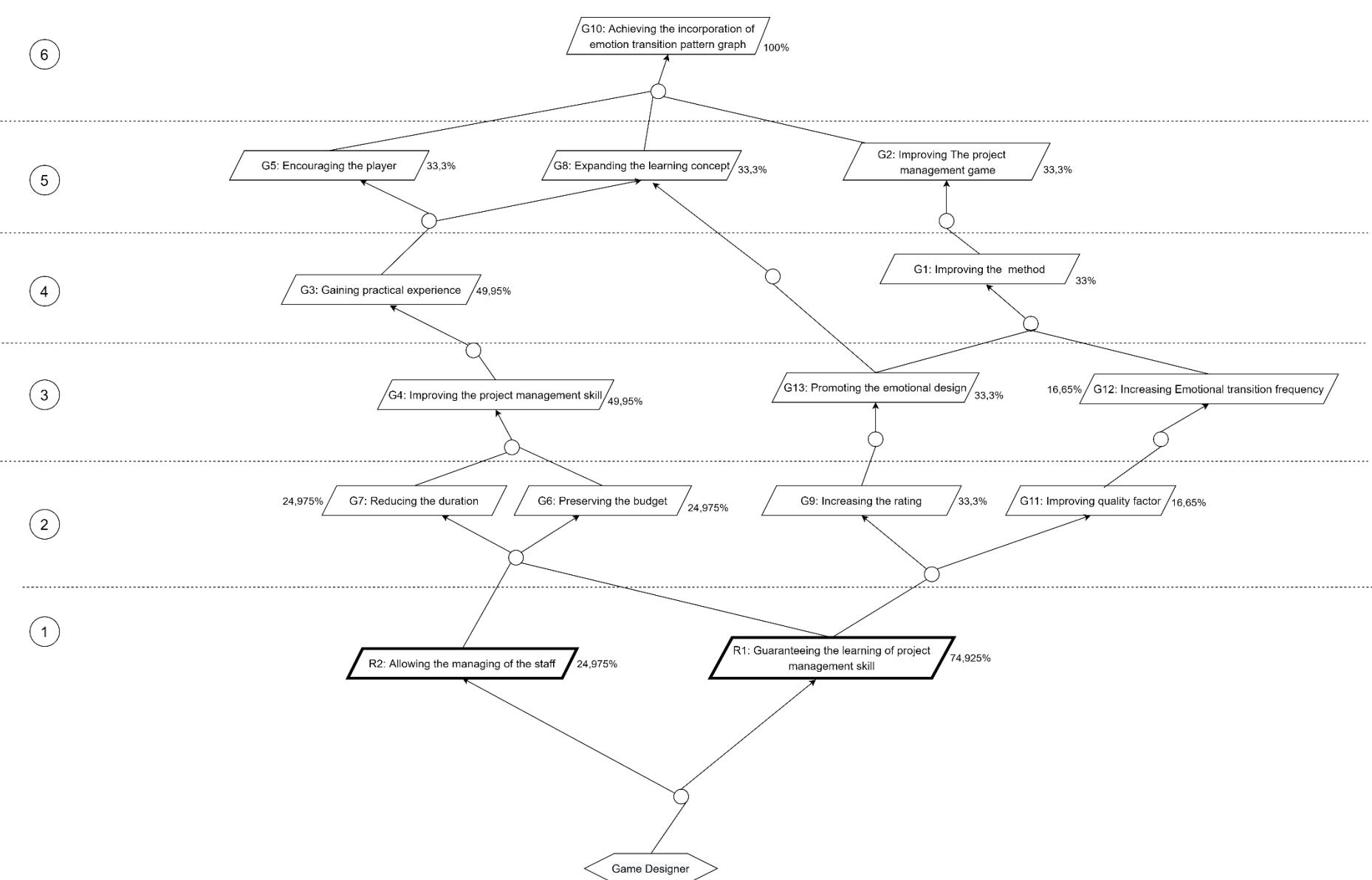


Requirements >

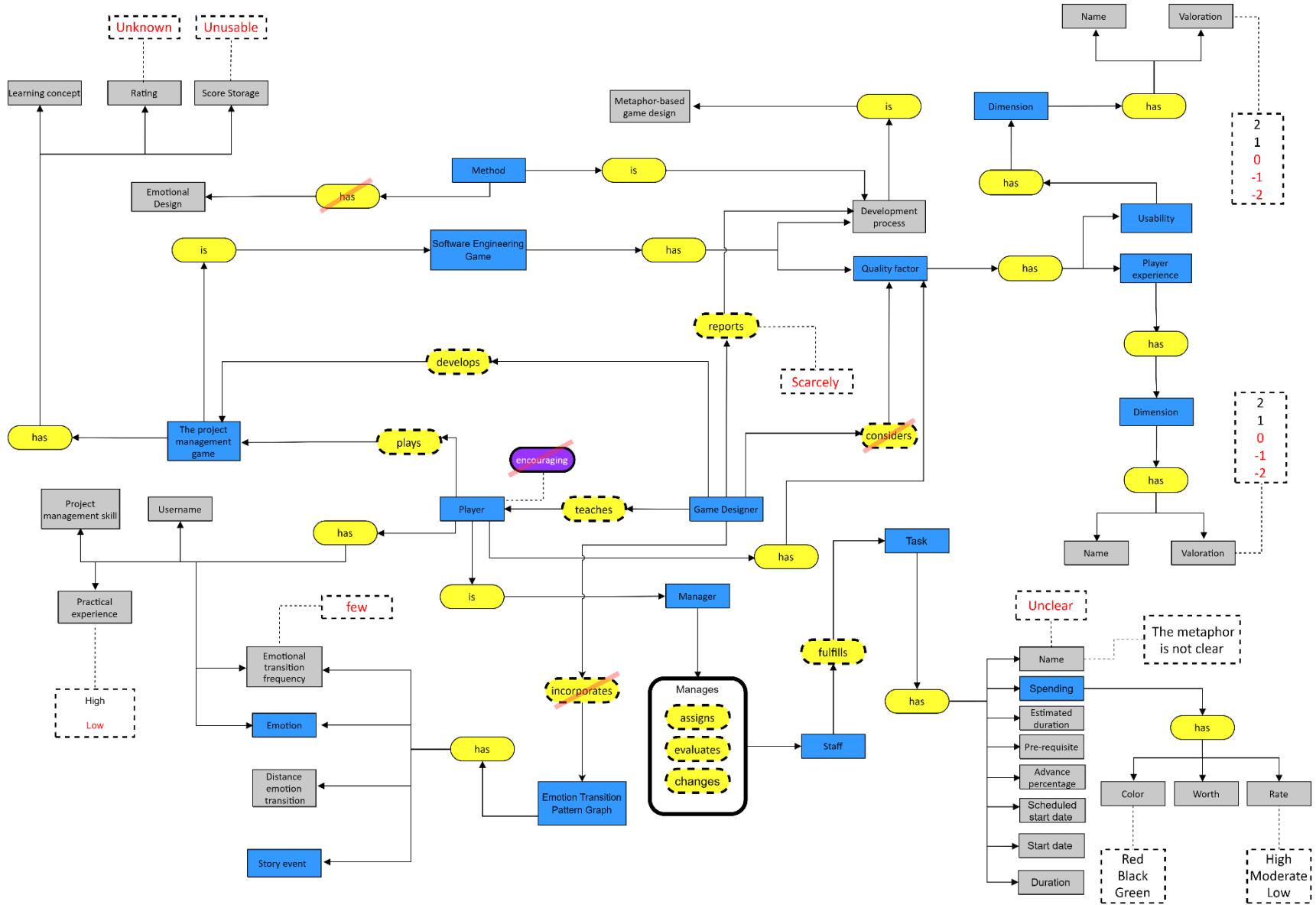
Pre-conceptual schema with achievement sets

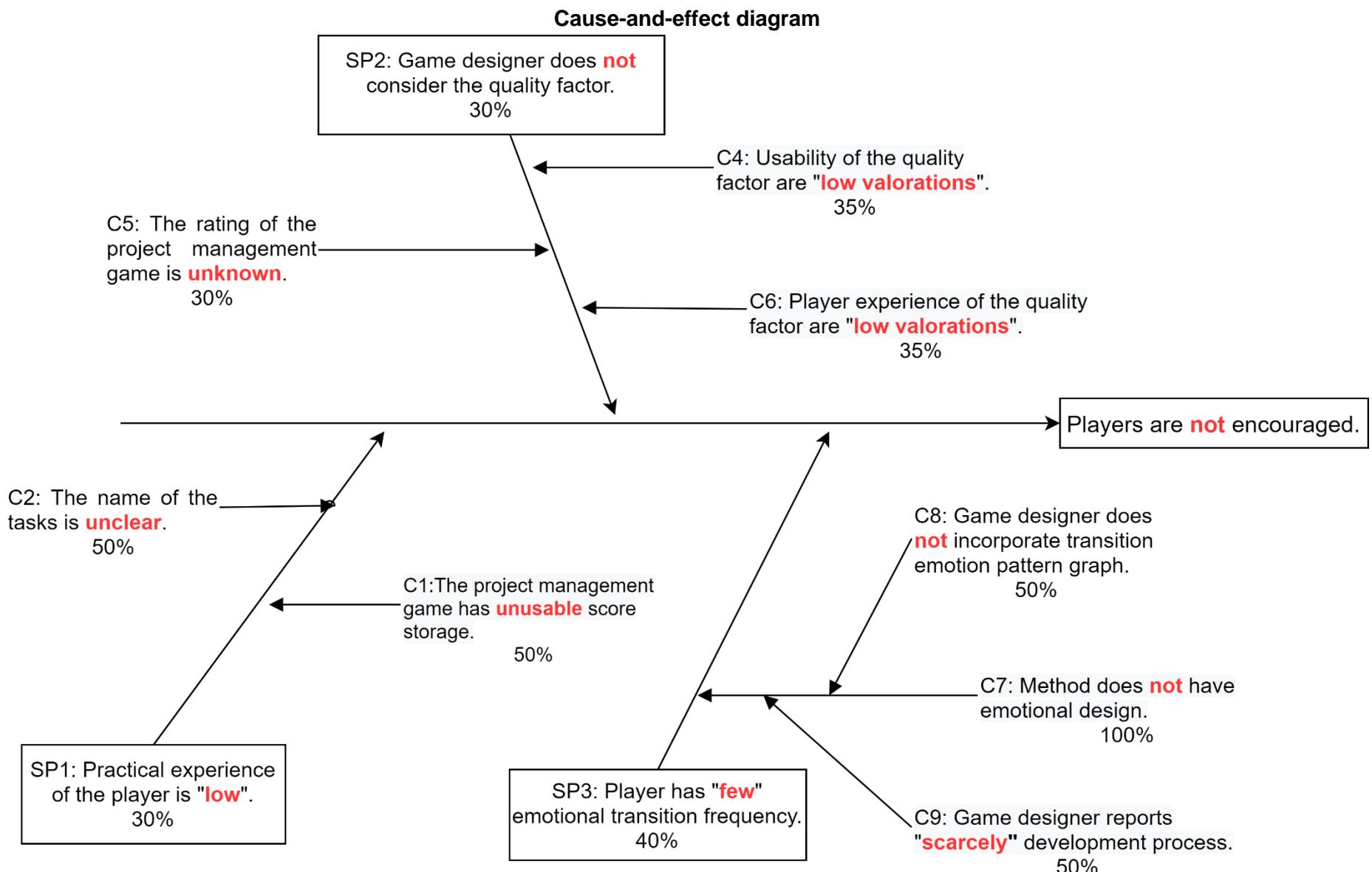


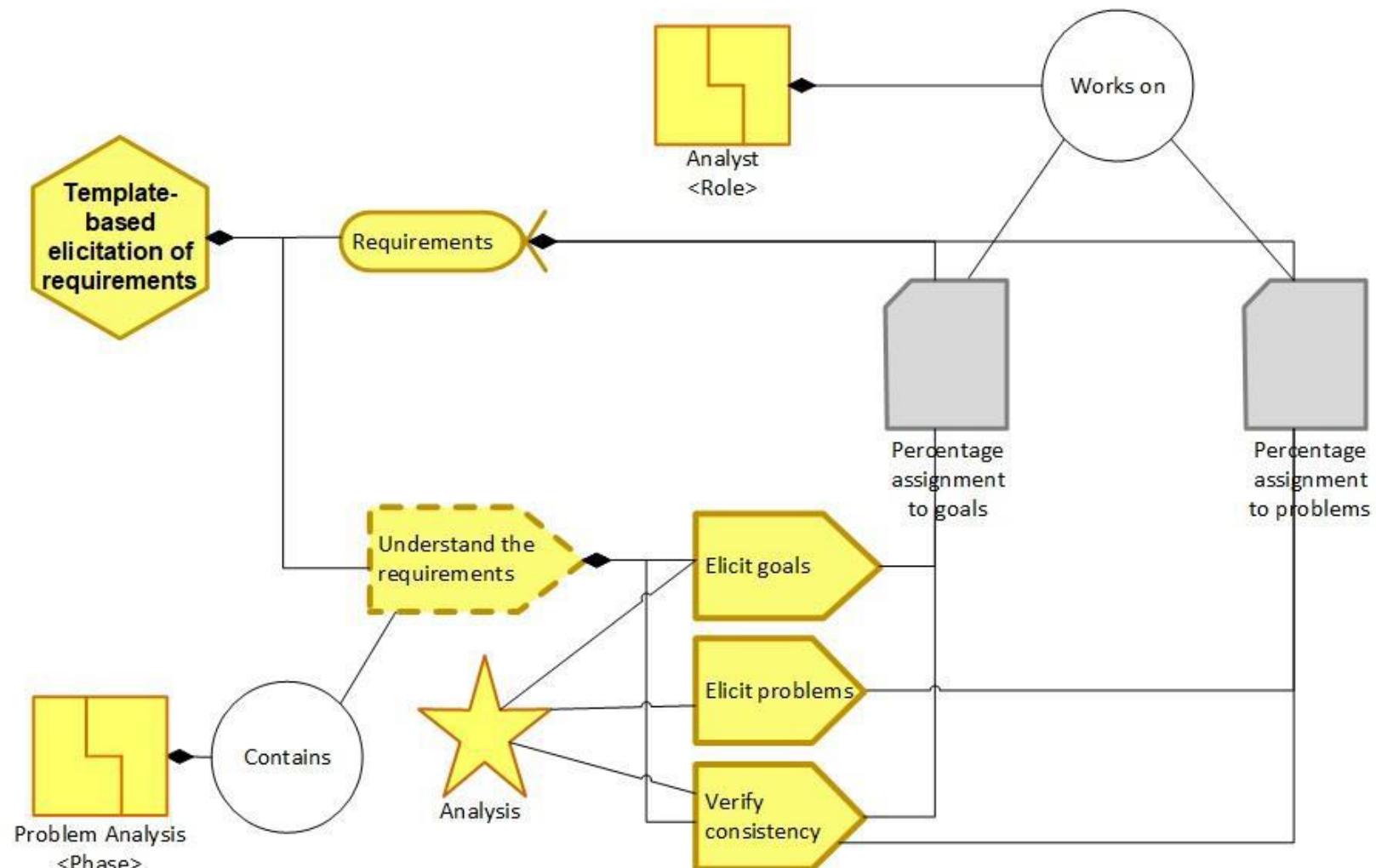
Goal diagram



Problem-based pre-conceptual schema







Percentage assignment to goals

Father	KAOS Element	Level	%	Achievement verb	Verb Type	Verb Weigth	Verb %	Element type	Element Weight	Element %	Weighted %	Leaf %
ROOT	G10: Achieving the incorporation of emotion transition pattern graph											
		6	100,0	ACHIEVE	ACHIEVEMENT	1	100,0	GOAL		100,0	100,0	0,0
			100,0			1	100,0		1	100,0	100,0	
G10	G5: Encouraging the player	5	33,3	ENCOURAGE	IMPROVEMENT	2	33,3	GOAL		33,3	33,3	0,0
G10	G8: Expanding the learning concept	5	33,3	EXPAND	IMPROVEMENT	2	33,3	GOAL		33,3	33,3	0,0
G10	G2: Improving The project management game	5	33,3	IMPROVE	IMPROVEMENT	2	33,3	GOAL		33,3	33,3	0,0
			100,0			6	100,0		6	100,0	100,0	
G5-G8	G3: Gaining practical experience	4	49,95	GAIN	IMPROVEMENT	2	49,95	GOAL		49,95	49,95	0,0
			49,95			2	49,95		2	49,95	49,95	
G2	G1: Improving the method	4	33,3	IMPROVE	IMPROVEMENT	2	33,3	GOAL		33,3	33,3	0,0
			33,3			2	33,3		2	33,3	33,3	
G3	G4: Improving the project management skill	3	49,65	IMPROVE	IMPROVEMENT	2	49,65	GOAL		49,65	49,65	0,0
			49,65			2	49,65		2	49,65	49,65	
G8-G1	G13: Promoting the emotional design	3	33,3	PROMOTE	ACHIEVEMENT	1	22,1	GOAL		22,1	22,1	0,0
G1	G12: Increasing Emotional transition frequency	3	16,65	INCREASE	IMPROVEMENT	2	44,2	GOAL		44,2	44,2	0,0
			49,95			3	66,3		3	66,3	66,3	
G4	G7: Reducing the duration	2	24,975	REDUCE	IMPROVEMENT	2	24,975	GOAL		24,975	24,975	0,0
G4	G6: Preserving the budget	2	24,975	PRESERVE	MAINTENANCE	2	24,975	GOAL		24,975	24,975	0,0
			49,95			4	49,95		4	49,95	49,95	
G13	G9: Increasing the rating	2	33,3	INCREASE	IMPROVEMENT	2	33,3	GOAL		33,3	33,3	0,0
			33,3			2	33,3		2	33,3	33,3	
G12	G11: Improving quality factor	2	16,65	IMPROVE	IMPROVEMENT	2	16,65	GOAL		16,65	16,65	0,0
			16,65			2	16,65		2	16,65	16,65	
G7-G6	R2: Allowing the managing of the staff	1	24,98	ALLOW	ACHIEVEMENT	1	24,98	REQUIREMENT		24,98	24,98	24,98
			24,98			1	24,98		1	24,98	24,98	
G6-G9-G11	R1: Guaranteeing the learning of project management skill	1	74,925	GUARANTEE	MAINTENANCE	2	74,925	REQUIREMENT		74,925	74,925	74,925
			74,925			2	74,925		2	74,925	74,925	100,0

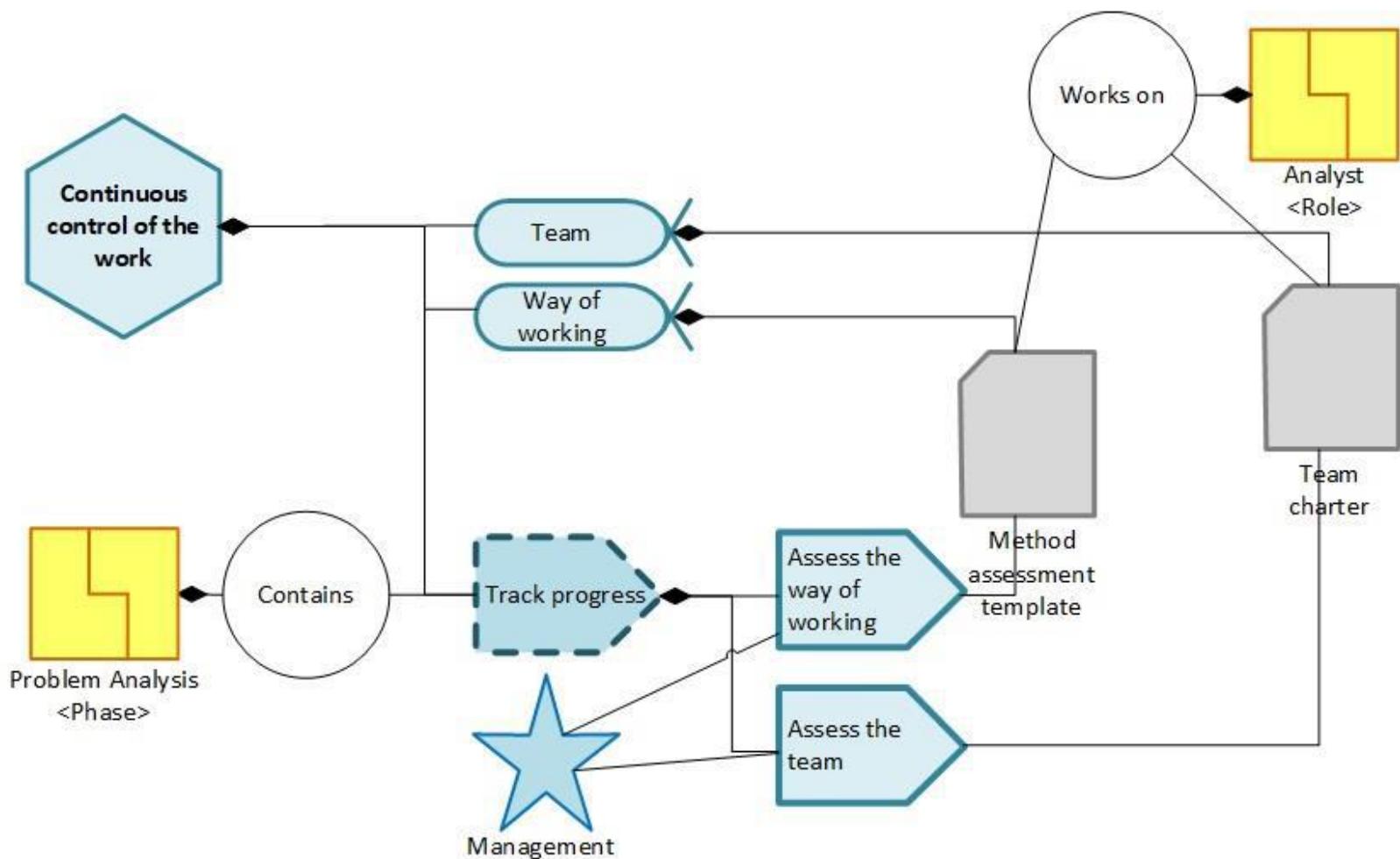
Percentage assignment to problems

	C1	C2	C3	C4	C5	C6	C7	C8	C9
P1									
P2	G2				G2		G2	G2	G2
P3									
P4									
P5									
P6									
P7									
P8									
P9									
P10									
P11									
P12		G6, G7, G8, G4							
P13				G2, G9, G12		G2, G9, G12			
P14				G11, G13		G11, G13	G11, G13		
P15				G12		G12			
P16				G11		G11			
P17									G11
P18									
P19									
P20									
P21									
P22									
P23									
P24							G10	G10	
P25									G8
P26									
P27									
P28		G4							
P29						G4, R1			
P30							G2		

Percentage assignment to problems

	C1	C2	C3	C4	C5	C6	C7	C8	C9
P1									
P2	33.3				33.3		33.3	33.3	33.3
P3									
P4									
P5									
P6									
P7									
P8									
P9									
P10									
P11									
P12		132.9							
P13			83.25		83.25				
P14			49.95		49.95	49.95			
P15			16.65		16.65				
P16			16.65		16.65				
P18									16.65
P19									
P20									
P21									
P22									
P23									
P24						100	100		
P25									33.3
P26									
P27									
P28		49.65							
P29					124.575				
P30							33.3		

< Requirements



Work >

Team charter

Team name	The project management game	Date	19 de abril del 2021
Team leader	Jose Orlando Tovar Cano	Sponsor	Grissa Vianney Maturana Gonzalez
Team purpose	We analyse and model a software engineering game to test a method for incorporating emotion transition pattern graph in metaphor-based game design related to software engineering, presented at the stakeholder organization method		
Mission	Help to improve the software engineering game design method and the final results of the game by using the Emotion Transition Pattern Graph to have a better classification on the game's quality factors		
Objectives	<ul style="list-style-type: none"> -Understand the concepts and methodology of the UNC-method, using to model the game -Have a better comprehension of the PhD Thesis Incorporating emotiontransitionpatterngraphin metaphor-based gamedesignrelatedtosoftware engineering -Correctly incorporate the Emotion Transition Pattern Graph in the game design process -Have a better comprehension of the metaphor based game elements and how to analyse them -Identify the main emotions in the game play to incorporate them to the Emotional Transition Pattern Graph analysis -Learn practical experience of software engineering 		
Scope	<ul style="list-style-type: none"> -Improve The project management game incorporate the Emotion Transition Pattern Graph -Complete the stakeholder requirements -Help with the stakeholder thesis process -Acquires software engineering skills -complete an orderly and well-managed project -Get good grades at the college assignment "Requirements Engineering" 		
Team members			
Name	Role	Responsibilities	
Santiago Campos Giraldo	Analyst, manager, developer, tester	Assist the meetings, analyse the project management game, create schemas, develop the executable game, test the game, suggest changes, ask for help from the stakeholder and the tutor, analyse the problems and goals of the project, set priorities	
Julian Camilo Ossa Zapata	Analyst, manager, developer, tester	Assist the meetings, analyse the project management game, create schemas, develop the executable game, test the game, suggest changes, ask for help from the stakeholder and the tutor, create the kanban and	

		organice, shcedule meetings with the stakeholder,collect evidence of meetings
Jose Orlando Tovar Cano	Analist, manager,leader, developer, tester	Assist the meetings, analise the project managemet game, create schemas, develop the executable game,test the game, suggest changes,ask for help to the stakeholder and the tutor, schedule team meetings, contact with the tutor, teacher and stakeholder, distribute team tasks,keep the team aline

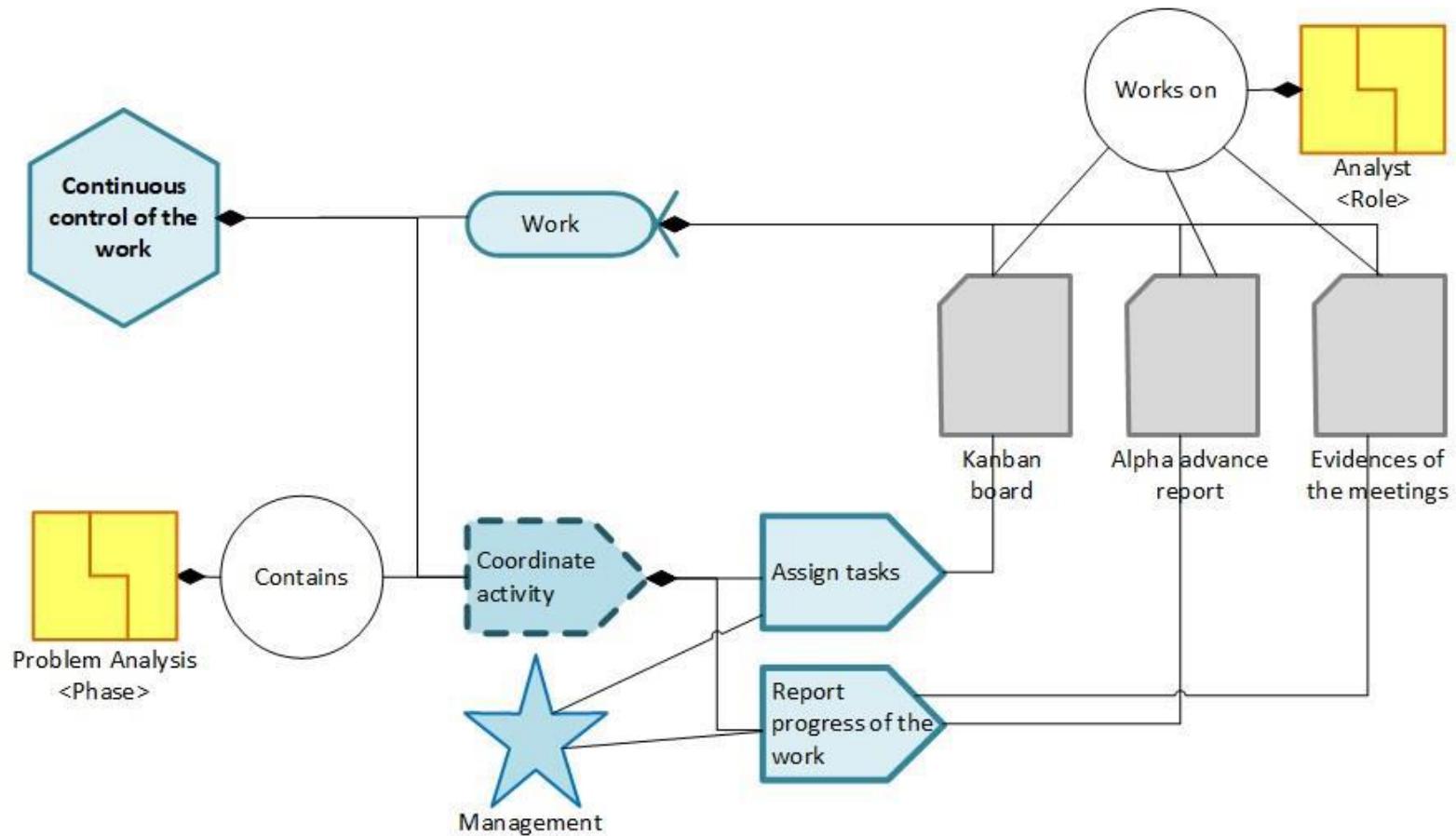
Method assessment template

Team	The project management game		Date	19/04/2021
UNC-METHOD		Suggestions for improvement		
Phase	Practice	Consistency	Completeness	Correction
Problem Analysis	Proven engagement of the stakeholders	This point of the advance, the stakeholder is already very involved and has made their requests known on repeated occasions, it does not generate a real substantial analysis material.	-Lack of activities performed compared to other practice at this phase. -The stakeholder survey contains repetitive questions, although they are important to answer, it gives the feeling of needing other questions that open more analysis	
Software context	Discourse-based modeling of the opportunity	The organizational chart seems to need more linked to the Preconceptual schema	- Apart of the goals that help to understand the needs, the information model at the organizational	

			chart seems to be lack of importance to the project out of a real organization -Lack of conventions or templates to have a better collect of documents and analysis of digital files	
Problem analysis	Visual modeling of requirements	The symbology and the order of the process diagram is hard to understand and read	Is difficult to make the transition to the event interaction graph base on the process because of the chaotic order, also it does not help a lot to the main purpose on this phase understand the requirements, we have more compressible diagrams before	
Problem analysis	Template-based elicitation of requirements		-It is hard to understand the process for the	It is more easy and helpful to understand the

			percentage assignment to goals and problems -many activities for one practice compared to others	goals and problems hierarchy with the used before diagrams without percentage
Problem analysis	Continuous control of the work		Lack of conventions or templates to deliver and record the evidence of the meetings	Repetitive alphas that must be understand and realize in other one before, planted here not as a revision but as a new activity

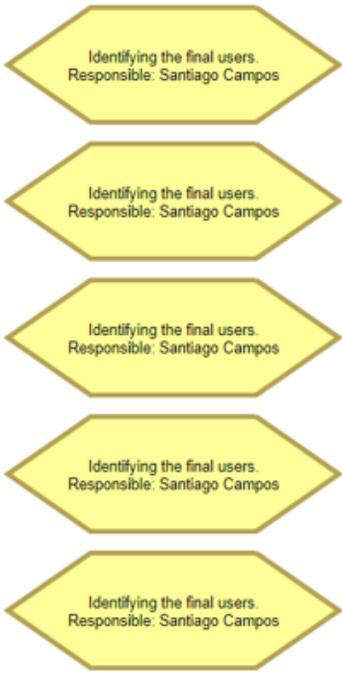
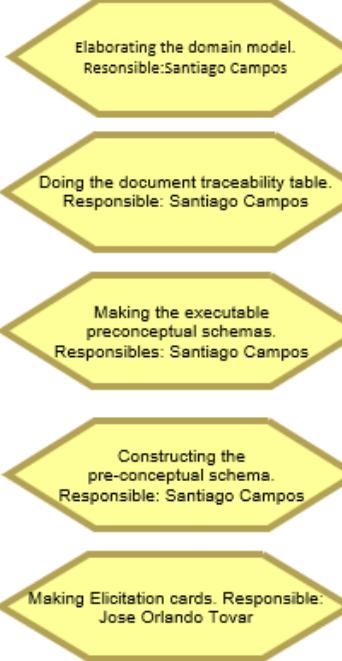
< Work



Kanban board

KANBAN BOARD			
GOAL	TO DO	DOING	DONE
		<p>Receive and study documentation. Responsible: Jose Orlando tovar</p> <p>Searching for more information on web documents. Responsible: Julian Camilo Ossa</p> <p>Doing video meetings with the stakeholder. Responsible: Jose Orlando Tovar</p> <p>Making Elicitation cards. Responsible: Jose Orlando Tovar</p> <p>Verifying consistency. Responsible: Jose Orlando Tovar</p> <p>Making the Controlled dialog. Responsible: Julian Camilo Ossa</p> <p>Elaborating the domain model. Responsible: Santiago Campos</p>	<p>Opportunity</p> <p>Identified</p> <ul style="list-style-type: none"> <input type="checkbox"/> Idea behind opportunity identified <input type="checkbox"/> At least one investing stakeholder interested <input type="checkbox"/> Other stakeholders identified <p>1 / 6 1.1.2</p> <p>IVAR JACOBSEN Refinement Developed by CPM Practice Worldwide™</p>

		<p>Identifying the actors of the project, internal and external. Roles and specifications. Responsible: Jose Orlando Tovar</p> <p>Making the Organization chart. Responsible: Jose Orlando Tovar</p> <p>Doing video meetings with the stakeholder. Responsible: Jose Orlando Tovar</p> <p>Verifying consistency. Responsible: Jose Orlando Tovar</p>	<p>Stakeholders</p> <p>Recognized</p> <ul style="list-style-type: none"> <input type="checkbox"/> Stakeholder groups identified <input type="checkbox"/> Key stakeholder groups represented <input type="checkbox"/> Responsibilities defined <p>1 / 6</p> <p>IVAR JACOBSEN Software Development Methodology</p> <p>1.1.2</p>
		<p>Verifying the information. Responsible: Santiago Campos</p> <p>Establishing a common vocabulary. Responsible: Jose Orlando Tovar</p> <p>Making the Controlled dialog. Responsible: Julian Camilo Ossa</p> <p>Making Elicitation cards. Responsible: Jose Orlando Tovar</p> <p>Verifying consistency. Responsible: Jose Orlando Tovar</p>	<p>Stakeholders</p> <p>Represented</p> <ul style="list-style-type: none"> <input type="checkbox"/> Responsibilities agreed <input type="checkbox"/> Representatives authorized <input type="checkbox"/> Collaboration approach agreed <input type="checkbox"/> Way of working supported & respected <p>2 / 6</p> <p>IVAR JACOBSEN Software Development Methodology</p> <p>1.1.2</p>

			<p>Requirements</p> <p>Conceived</p> <ul style="list-style-type: none"> <input type="checkbox"/> Stakeholders agree system is to be produced <input type="checkbox"/> Users identified <input type="checkbox"/> Funding stakeholders identified <input type="checkbox"/> Opportunity clear <p>1 / 6 1.1.2</p> <p>IVAR JACOBSEN Practical Methods Generated by UML Practice Metamodel</p>
			<p>Software System</p> <p>Architecture Selected</p> <ul style="list-style-type: none"> <input type="checkbox"/> Architecture selection criteria agreed <input type="checkbox"/> HW platforms identified <input type="checkbox"/> Technologies selected <input type="checkbox"/> System boundary known <input type="checkbox"/> Decisions on system organization made <input type="checkbox"/> Buy, build, reuse decisions made <input type="checkbox"/> Key technical risks agreed to <p>1 / 6 1.1.2</p> <p>IVAR JACOBSEN Practical Methods Generated by UML Practice Metamodel</p>

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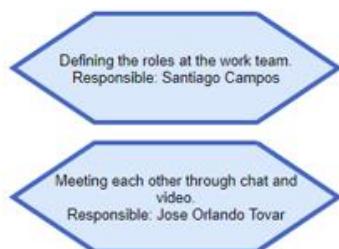


Team

Seeded

- Mission defined
- Constraints known and defined
- Growth mechanisms in place
- Composition defined
- Responsibilities outlined
- Required commitment level clear
- Required competencies identified
- Size determined
- Governance rules defined
- Leadership model selected

1 / 5
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International Standard
1.1.2



Team

Formed

- Enough members recruited
- Roles understood
- How to work understood
- Members introduced
- Individual responsibilities accepted and aligned to competencies
- Members accepting work
- External collaborators identified
- Communication mechanisms defined
- Members commit to team

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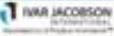


Work

Initiated

- Required result clear
- Constraints clear
- Funding stakeholders known
- Initiator identified
- Accepting stakeholders known
- Source of funding clear
- Priority clear

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International Standard
1.1.2

		<p>Meeting each other through chat and video. Responsible: Jose Orlando Tovar</p> <p>Going to counseling. Responsible: Julian Camilo Ossa</p> <p>Doing video meetings with the stakeholder. Responsible: Jose Orlando Tovar</p> <p>Organizing the work with KANBAN board. Responsible: Julian Camilo Ossa</p> <p>Report the advance with the alpha advance report. Responsible: Julian Camilo Ossa</p>	<p>Work</p> <p>Prepared</p> <ul style="list-style-type: none"> <input type="checkbox"/> Commitment made <input type="checkbox"/> Cost and effort estimated <input type="checkbox"/> Resource availability understood <input type="checkbox"/> Risk exposure understood <input type="checkbox"/> Acceptance criteria established <input type="checkbox"/> Sufficiently broken down to start <input type="checkbox"/> Tasks identified and prioritized <input type="checkbox"/> Credible plan in place <input type="checkbox"/> Funding in place <input type="checkbox"/> At least one team member ready <input type="checkbox"/> Integration points defined <p>2 / 6</p> <p> 1.1.2</p>
		<p>Do a initial video meeting with the stakeholder Responsible: Jose Orlando Tovar</p> <p>Assist to the course and take information from it. Responsible: Jose Orlando Tovar</p> <p>Going to counseling. Responsible: Julian Camilo Ossa</p>	<p>Way of Working</p> <p>Principles Established</p> <ul style="list-style-type: none"> <input type="checkbox"/> Team actively support principles <input type="checkbox"/> Stakeholders agree with principles <input type="checkbox"/> Tool needs agreed <input type="checkbox"/> Approach recommended <input type="checkbox"/> Operational context understood <input type="checkbox"/> Practice & tool constraints known <p>1 / 6</p> <p> 1.1.2</p>

Doing video meetings with the stakeholder.
Responsible: Jose Orlando Tovar

Using the stakeholder survey Responsible:
Julian Camilo Ossa

Stakeholders

Involved

- Representatives assist the team
- Timely feedback and decisions provided
- Changes promptly communicated

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International
Innovative Software Methods™

1.1.2

Alpha advance report

ALPHA ADVANCE REPORT				
STATE	SUMMARY OF THE	TASK	DATE/DURATION	CONTENTS/OBSERVATIONS
Opportunity  Identified <input type="checkbox"/> Idea behind opportunity identified <input type="checkbox"/> At least one investing stakeholder interested <input type="checkbox"/> Other stakeholders identified  	<p>We keep the communication with the stakeholder so we can use the information that she bring us by talking and from documents of her work and tesis, lastly we use the adquire knowledge by playing the game and the information that containst the web site where it is place.</p>	Receive and study documentation. Responsible: Jose Orlando Tovar	Start date: 23/02/2021 6 hours	We receive documents from the stake holder about a general idea of the tesis, and analyze it, and more specific information comes later.
		Searching for more information on web documents. Responsible: Julian Camilo Ossa	Start date: 25/02/2021 5 hours	After receive the documents for the project we search through web and find some information and documends to use as reference and knowlege to develop th eproject.
		Doing video meetings with the stakeholder. Responsible: Jose Orlando Tovar	Start date: 01/03/2021 7 hours 45 min	We receive the information,help and feedback from the stakeholder.
		Making the Controlled dialog. Responsible: Julian Camilo Ossa	Start date: 11/03/2021 7 hours	questions about actors,functions,goals, problems,objects,responsabilities,implications and restrictions.
		Making Elicitation cards. Responsible: Jose Orlando Tovar	fecha de inicio: 13/03/2021 10 hours	carts about : 31 function, 6 actor, 18 objects.
		Elaborating the domain model. Resonsible:Santiago Campos	fecha de inicio: 12/03/2021 7 hours	with 28 concepts.
		Verifying consistency. Responsible: Jose Orlando Tovar	Start date:10/03/2021 10 hours	check all the diagramas and scheemas finised so we can compare the congruency among with the information we hacve from the stakeholder and the documents.
Stakeholders  Recognized <input type="checkbox"/> Stakeholder groups identified <input type="checkbox"/> Key stakeholder groups represented <input type="checkbox"/> Responsibilities defined  	<p>We use the video meetings with the stakeholder to define the wok and responsibilities of the actors of the project.</p>	Identifying the actors of the proyecto, internal and external. Roles and especifications. Responsible: Jose Orlando Tovar	Start date: 11/03/2021 2 hours	2 external and 5 internal actors.
		Making the Organizational chart. Responsible: Jose Orlando Tovar	Start date:11/03/2021 5 hours	We make the Organizational chart to indicates the roles into the organization.
		Doing video meetings with the stakeholder. Responsible: Jose Orlando Tovar	Start date:01/03/2021 7 hours 45 min	We receive the information,help and feedback from the stakeholder.
		Verifying consistency Responsible: Jose Orlando Tovar	Start date:10/03/2021 10 hours	check all the diagramas and scheemas finised so we can compare the congruency among with the information we hacve from the stakeholder and the documents.

<p>Stakeholders</p> <p>Represented</p> <ul style="list-style-type: none"> <input type="checkbox"/> Responsibilities agreed <input type="checkbox"/> Representatives authorized <input type="checkbox"/> Collaboration approach agreed <input type="checkbox"/> Way of working supported & respected <p>2 / 6 1.1.2</p>	<p>We use the video meetings with the stakeholder to confirm the work and responsibilities, also to let the stakeholder to be agree with our way of work, lastly we communicate to have a common vocabulary</p>	<p>Verifying the information. Responsible: Santiago Campos</p> <p>Establishing a common vocabulary. Responsible: Jose Orlando</p> <p>Making the Controlled dialog. Responsible: Julian Camilo Ossa</p> <p>Making Elicitation cards. Responsible: Jose Orlando</p> <p>Verifying consistency. Responsible: Jose Orlando Tovar</p>	<p>Start date: 12/02/2021 1 hours</p> <p>Start date: 10/03/2021 2 hours</p> <p>Start date: 11/03/2021 7 hours</p> <p>fecha de inicio: 13/03/2021</p> <p>Start date: 10/03/2021 7 hours</p>	<p>Talk with the stakeholder to be shure she is agree with everything-</p> <p>make shure that the stakeholder and we talk in the same words, to reduce the error-</p> <p>questions about actors,functions,goals, problems,objects,responsibilities,implications and restrictions.</p> <p>carts about: 31function, 6 actor, 18 objects.</p> <p>check all the diagramas and scheemas finised so we can compare the congruency among with the information we haove from the stakeholder and the documents.</p>
<p>Requirements</p> <p>Conceived</p> <ul style="list-style-type: none"> <input type="checkbox"/> Stakeholders agree system is to be produced <input type="checkbox"/> Users identified <input type="checkbox"/> Funding stakeholders identified <input type="checkbox"/> Opportunity clear <p>1 / 6 1.1.2</p>	<p>To clarify the requirements we make video meetings and take the information of what we need , also read documents and make informational schemas to clarify with the stakeholder the concepts.</p>	<p>Identifying the final users. Responsible: Santiago Campos</p> <p>Doing video meetings with the stakeholder. Responsible: Jose Orlando</p> <p>Constructing the pre-conceptual schema. Responsible: Santiago Campos</p> <p>Doing the document traceability table. Responsible: Santiago Campos</p> <p>Making the executable preconceptual schemas. Responsibles: Santiago Campos</p> <p>Verifying consistency. Responsible: Jose Orlando Tovar</p>	<p>Start date: 23/02/2021 6 hours</p> <p>Start date: 01/03/2021 7 hours 45 min</p> <p>Start date: 10/03/2021 10 hours</p> <p>Start date: 14/03/2021 8 hours</p> <p>Start date: 15/03/2021 5 hours</p> <p>Start date: 10/03/2021 10 hours</p>	<p>We make shure who the final users by analyze the thesis of the stakeholder, and understand her point of view.</p> <p>We receive the information,help and feedback from the stakeholder.</p> <p>Elements from the preliminary pre-conceptual schema: 79 concepts; 75 structural relationships; 31 dynamic relationships; 10 events,1conditional,15 achievement relationships,37 implications, 12 problems and</p> <p>The sources where we get the information that we modeled at the pre-conceptual schema.</p> <p>Pre-conceptual schemas that shows the behaviour of the sinamic relationships at the pre-conceptual shcoema.</p> <p>check all the diagramas and scheemas finised so we can compare the congruency among with the information we haove from the stakeholder and the documents.</p>

<p>Software System</p> <p>Architecture Selected</p> <ul style="list-style-type: none"> <input type="checkbox"/> Architecture selection criteria agreed <input type="checkbox"/> HV platforms identified <input type="checkbox"/> Technologies selected <input type="checkbox"/> System boundary known <input type="checkbox"/> Decisions on system organization made <input type="checkbox"/> Buy, build, reuse decisions made <input type="checkbox"/> Key technical risks agreed to <p>1 / 6 IVAR JACOBSEN UNIVERSITY OF PRACTICAL INSTITUTE 1.1.2</p>	<p>Use the information we have to define the process, understand the technology to use, and to analyze and model the project</p>	<p>Making Elicitation cards. Responsible: Jose Orlando Tovar</p> <p>Constructing the pre-conceptual schema. Responsible: Santiago Campos</p> <p>Making the executable preconceptual schemas. Responsibles: Santiago Campos</p> <p>Doing the document traceability table. Responsible: Santiago Campos</p> <p>Elaborating the domain model. Resonsible:Santiago Campos</p>	<p>fecha de inicio: 13/03/2021 9 hours</p> <p>Start date: 10/03/2021 10 hours</p> <p>Start date: 15/03/2021 5 hours</p> <p>Start date: 14/03/2021 8 hours</p> <p>fecha de inicio: 12/03/2021 7 hours</p>	<p>carts about : 31 function, 6 actor, 18 objects.</p> <p>Elements from the preliminary pre-conceptual schema: 79 concepts; 75 structural relationships; 31 dynamic reletionships, 10 events,1 conditional,15 achievement relationships,37 implications, 12 problems and 2 constraints</p> <p>Pre-conceptual schemas that shows the behaviour of the sinamic relationships at the pre-conceptual shcema.</p> <p>The sources where we get the information that we modeled at the pre-conceptual schema.</p> <p>with 28 concepts.</p>
<p>Team</p> <p>Seeded</p> <ul style="list-style-type: none"> <input type="checkbox"/> Mission defined <input type="checkbox"/> Constraints known and defined <input type="checkbox"/> Growth mechanisms in place <input type="checkbox"/> Composition defined <input type="checkbox"/> Responsibilities outlined <input type="checkbox"/> Required commitment level clear <input type="checkbox"/> Required competencies identified <input type="checkbox"/> Size determined <input type="checkbox"/> Governance rules defined <input type="checkbox"/> Leadership model selected <p>1 / 5 IVAR JACOBSEN UNIVERSITY OF PRACTICAL INSTITUTE 1.1.2</p>	<p>We create a team based in the needs of the moment, and keep in touch to confirm the team</p>	<p>Form a work team. Responsible: Julian Camilo Ossa</p> <p>Doing video meetings with the stakeholder. Responsible: Jose Orlando Tovar</p>	<p>Start date: 16/02/2021 1 hours</p> <p>Start date: 01/03/2021 7 hours 45 min</p>	<p>During the class we talk by text messaging and form the team.</p> <p>We receive the information, help and feedback from the stakeholder.</p>
<p>Team</p> <p>Formed</p> <ul style="list-style-type: none"> <input type="checkbox"/> Enough members recruited <input type="checkbox"/> Roles understood <input type="checkbox"/> How to work understood <input type="checkbox"/> Members introduced <input type="checkbox"/> Individual responsibilities accepted and aligned to competencies <input type="checkbox"/> Members accepting work <input type="checkbox"/> External collaborators identified <input type="checkbox"/> Communication mechanisms defined <input type="checkbox"/> Members commit to team <p>2 / 5 IVAR JACOBSEN UNIVERSITY OF PRACTICAL INSTITUTE 1.1.2</p>	<p>Doing reunions and talk about the organization of the project</p>	<p>Defining the roles at the work team. Responsible: Santiago Campos</p> <p>Meeting each other through chat and video. Responsible: Jose Orlando Tovar</p>	<p>Start date: 25/02/2021 2 hours</p> <p>Start date: 25/02/2021 16 hours</p>	<p>We separates the work to do, in order to accomplish the requirements on time.</p> <p>Use chat meetings to all the team planeation reunions and to work.</p>

<p>Work</p> <p>Initiated</p> <ul style="list-style-type: none"> <input type="checkbox"/> Required result clear <input type="checkbox"/> Constraints clear <input type="checkbox"/> Funding stakeholders known <input type="checkbox"/> Initiator identified <input type="checkbox"/> Accepting stakeholders known <input type="checkbox"/> Source of funding clear <input type="checkbox"/> Priority clear <p>1 / 6 NARI JACOBSON Gestión de Proyectos Intensivos</p>	<p>Making video meetings to coordinate the team and assign task to each member, then going to class and counseling to understand the project bases.</p>	Defining the roles at the work team. Responsible: Santiago Campos	Start date: 25/02/2021 2 hours	We separates the work to do, in order to accomplish the requirements on time.
		Meeting each other through chat and video. Responsible: Jose Orlando Tovar	Start date: 25/02/2021 16 hours	Use chat meetings to all the team planeation reunions and to work.
		Going to counseling. Responsible: Julian Camilo Ossa	Start date: 08/03/2021 9 hours	Take benefit from the counseling dictate by a tutor to develop the project correctly.
		Doing video meetings with the stakeholder. Responsible: Jose Orlando Tovar	Start date: 01/03/2021 7 hours 45 min	We receive the information,help and feedback from the stakeholder.
		Organizing the work with KANBAN board. Responsible: Julian Camilo Ossa	Start date: 15/03/2021 4 hours	Have more organization about the flow of the project to make it easier and faster.
		Report the advance with the alpha advance report. Responsible: Julian Camilo Ossa	Start date: 14/03/2021 7 hours	Have knowlege of the principal task in any software project, so we can keep the order and the efficiency.
<p>Work</p> <p>Prepared</p> <ul style="list-style-type: none"> <input type="checkbox"/> Commitment made <input type="checkbox"/> Cost and effort estimated <input type="checkbox"/> Resource availability understood <input type="checkbox"/> Risk exposure understood <input type="checkbox"/> Acceptance criteria established <input type="checkbox"/> Sufficiently broken down to start <input type="checkbox"/> Tasks identified and prioritized <input type="checkbox"/> Credible plan in place <input type="checkbox"/> Funding in place <input type="checkbox"/> At least one team member ready <input type="checkbox"/> Integration points defined <p>2 / 6 NARI JACOBSON Gestión de Proyectos Intensivos</p>	<p>Making video meetings to coordinate the team and report the advance of the project and tasks, then going to counseling to understand and to get help to develop correctly the project.</p>	Meeting each other through chat and video. Responsible: Jose Orlando Tovar	Start date: 25/02/2021 16 hours	Use chat meetings to all the team planeation reunions and to work.
		Going to counseling. Responsible: Julian Camilo Ossa	Start date: 08/03/2021 9 hours	Take benefit from the counseling dictate by a tutor to develop the project correctly.
		Doing video meetings with the stakeholder. Responsible: Jose Orlando Tovar	Start date: 01/03/2021 7 hours 45 min	We receive the information,help and feedback from the stakeholder.
		Organizing the work with KANBAN board. Responsible: Julian Camilo Ossa	Start date: 15/03/2021 4 hours	Have more organization about the flow of the project to make it easier and faster.
		Report the advance with the alpha advance report. Responsible: Julian Camilo Ossa	Start date: 14/03/2021 7 hours	Have knowlege of the principal task in any software project, so we can keep the order and the efficiency.

<p>Way of Working</p> <p>Principles Established</p> <ul style="list-style-type: none"> <input type="checkbox"/> Team actively support principles <input type="checkbox"/> Stakeholders agree with principles <input type="checkbox"/> Tool needs agreed <input type="checkbox"/> Approach recommended <input type="checkbox"/> Operational context understood <input type="checkbox"/> Practice & tool constraints known <p>1 / 6 IVAR JACOBSEN Scalable Project Management™ 1.1.2</p>	<p>We present the team to the stakeholder by video meeting, and clarify roles, then the stakeholder clarify the context. Then we use the knowledge from the course to define tools to the project</p>	<p>Do a initial video meeting with the stakeholder Responsible: Jose Orlando Tovar</p> <p>Going to counseling. Responsible: Julian Camilo Ossa</p> <p>Assist to the course and take information from it. Responsible: Jose Orlando Tovar</p>	<p>Start date: 01/03/2021 1 hour 45min</p> <p>Start date: 08/03/2021 9 hours</p> <p>Start date: 25/02/2021 10 hours</p>	<p>Present ourselves with the stakeholder and initiate the project</p> <p>Take benefit from the counseling dictate by a tutor to develop the project correctly.</p> <p>Take the classes information and use it in order to create the project elements and use tools</p>
<p>Way of Working</p> <p>Foundation Established</p> <ul style="list-style-type: none"> <input type="checkbox"/> Key practices & tools selected <input type="checkbox"/> Practices needed to start work agreed <input type="checkbox"/> Non-negotiable practices & tools identified <input type="checkbox"/> Gaps between available and needed way of working understood <input type="checkbox"/> Gaps in capability understood <input type="checkbox"/> Integrated way of working available <p>2 / 6 IVAR JACOBSEN Scalable Project Management™ 1.1.2</p>	<p>Start using the tools, and have the evidence of the meetings where we use them, in case we don't understand ask for help going to counseling and then unites all assigned work</p>	<p>Meeting each other through chat and video. Responsible: Jose Orlando Tovar</p> <p>Going to counseling. Responsible: Julian Camilo Ossa</p> <p>Unify all assigned work Responsible: Santiago Campos</p> <p>Keep evidence of the meetings and communication of the team members Responsible: Julian Camilo Ossa</p>	<p>Start date: 25/02/2021 16 hours</p> <p>Start date: 08/03/2021 9 hours</p> <p>Start date: 10/03/2021 4 hours</p> <p>Start date: 25/02/2021 2 hour</p>	<p>Use chat meetings to all the team planeation reunions and to work.</p> <p>Take benefit from the counseling dictate by a tutor to develop the project correctly.</p> <p>Use the deliver work parts to create whole unify project</p> <p>Take a short time on every meeting to take evidence, and keep screenshots of the chats</p>
<p>Stakeholders</p> <p>Involved</p> <ul style="list-style-type: none"> <input type="checkbox"/> Representatives assist the team <input type="checkbox"/> Timely feedback and decisions provided <input type="checkbox"/> Changes promptly communicated <p>3 / 6 IVAR JACOBSEN Scalable Project Management™ 1.1.2</p>	<p>Meeting with the stakeholder to have assistance and keep communication then sent the Stakeholder survey to evaluate the experience in the stakeholder point of view</p>	<p>Doing video meetings with the stakeholder. Responsible: Jose Orlando Tovar</p> <p>Using the stakeholder survey Responsible: Julian Camilo Ossa</p>	<p>Start date: 01/03/2021 7 hours 45 min</p> <p>Start date: 19/04/2021 1 hour</p>	<p>We receive the information, help and feedback from the stakeholder.</p> <p>Sent the format of the request called Stakeholder survey, to receive a feedback and involve her even more in the process of the project</p>

<p>Requirements</p> <p>Bounded</p> <ul style="list-style-type: none"> <input type="checkbox"/> Development stakeholders identified <input type="checkbox"/> System purpose agreed <input type="checkbox"/> System success clear <input type="checkbox"/> Shared solution understanding exists <input type="checkbox"/> Requirements format agreed <input type="checkbox"/> Requirements management in place <input type="checkbox"/> Prioritization scheme clear <input type="checkbox"/> Constraints identified & considered <input type="checkbox"/> Assumptions clear <p>2 / 6 IVAR JACOBSEN Developed by Software Engineering</p> <p>1.1.2</p>	<p>Using active communication to analyze lookin for problems that can be solved by a software, we modeled the requirements to link them with the problems and the goals raised by the stakeholder and concluded by us</p>	Meeting each other through chat and video. Responsible: Jose Orlando Tovar	Start date: 25/02/2021 16 hours	Use chat meetings to all the team planeation reunions and to work.
		Making the process diagram. Responsible: Santiago Campos	Start date: 17/04/2021 9 hours	Use a diagram that follows and shows the flow of the process, elements and events
		Modeling an Event interaction graph Responsible: Julian Camilo Ossa	Start date: 19/04/2021 4 hours	To make more clear the process diagram, a web oriented graph that help to Understand the flow of elements and aplication: with 8 trigger events , 23 result events and 30 process
		Creating a Process diagram explanatory table Responsible: Santiago Campos	Start date: 19/04/2021 5 hours	Understand a process, the freqency and the different elements that interacts on it: 30 process, and 11 storages
		Making a Data dictionary Responsible: Jose Orlando Tovar	Start date: 16/04/2021 5 hours	Use of storages and actors as a source of information, an approximate visualization to a database: 16 entries
		Elaboraing the Business rules of the project Responsible: Julian Camilo Ossa	Start date: 18/04/2021 3 hours	Defined the restrictions and requisites of the business, in this case the game rules and its elements: 10 Business rules
		Creating a goal diagram Responsible: Santiago Campos	Start date: 19/04/2021 3 hours	Stratification levels, and percentage to Understand the importance of the goals in order to achieve a final goal: 15 goals, 2 requirements and 13 objectives
		Making an Cause effect diagram Responsible: Jose Orlando Tovar	Start date: 20/04/2021 4 hours	Define the management and redaction of the problems
		Constructing the pre-conceptual schema. Responsible: Santiago Campos	Start date: 10/03/2021 14 hours	Elements from the preliminary pre-conceptual schema: 79 concepts; 75 structural relationships; 31 dynamic relationships, 10 events, 1 conditional, 15 achievement relationships, 37 implications, 12 problems and 2 constraints
		Modeling an Problem-based pre-conceptual schema Responsible: Jose Orlando Tovar	Start date: 19/03/2021 4 hours	A most simplify view from the preconceptual schema to understand and analyze the problems of the project: 12 problems
<p>Work</p> <p>Started</p> <ul style="list-style-type: none"> <input type="checkbox"/> Development started <input type="checkbox"/> Progress monitored <input type="checkbox"/> Definition of done in place <input type="checkbox"/> Tasks being progressed <p>3 / 6 IVAR JACOBSEN Developed by Software Engineering</p> <p>1.1.2</p>	<p>Consolidate the work by organize and keep it achieving at every delivery ,and keep the work monitored by the stakeholder</p>	analyze and calculate a percentage assignment to goals Responsible: Santiago Campos	Start date: 20/04/2021 4 hours	Use the heritage, type and verb to calculate the percentage for each goal
		analyze and calculate a percentage assignment to problems Responsible: Jose Orlando Tovar	Start date: 19/04/2021 4 hours	understand the weight of the root causes to make the total distribution of the problems based on the objective diagram and the process diagram
		Verifying consistency. Responsible: Jose Orlando Tovar	Start date: 10/03/2021 10 hours	check all the diagramas and scheemas finised so we can compare the congruency among with the information we have from the stakeholder and the documents.
		Organizing the work with KANBAN board. Responsible: Julian Camilo Ossa	Start date: 15/03/2021 4 hours	Have more organization about the flow of the project to make it easier and faster.
		Report the advance with the alpha advance report. Responsible: Julian Camilo Ossa	Start date: 14/03/2021 7 hours	Have knowlege of the principal task in any software project, so we can keep the order and the efficiency.
		Keep evidence of the meetings and communication of the team members Responsible: Julian Camilo Ossa	Start date: 25/02/2021 2 hour	Take a short time on every meeting to take evidence, and keep screenshots of the chats
		Doing video meetings with the stakeholder. Responsible: Jose Orlando Tovar	Start date: 01/03/2021 7 hours 45 min	We receive the information,help and feedback from the stakeholder.

<p>☒ Team</p> <p>Collaborating</p> <ul style="list-style-type: none"> <input type="checkbox"/> Works as one unit <input type="checkbox"/> Communication open and honest <input type="checkbox"/> Focused on mission <input type="checkbox"/> Members know each other <p>3 / 5 INAR JACOBSEN Gestión de Proyectos Intensivos™ 1.1.2</p>	<p>We work on improving the communication to have a better collaboration in the project, clarify our missions and be prepared for what is coming</p>	<p>Full fills the Team charter Responsible: Julian Camilo Ossa</p> <p>Unify all assigned work Responsible: Santiago Campos</p> <p>Meeting each other through chat and video. Responsible: Jose Orlando Tovar</p>	<p>Start date: 15/04/2021</p>	<p>Use it to autoevaluate the process of the team and understand where we want to go to stay aline with objectives and mission</p> <p>Start date: 10/03/2021 4 hours Use the deliver work parts to create whole unify project</p> <p>Start date: 25/02/2021 16 hours Use chat meetings to all the team planeation reunions and to work.</p>
<p>☒ Way of Working</p> <p>In Use</p> <ul style="list-style-type: none"> <input type="checkbox"/> Practices & tools in use <input type="checkbox"/> Regularly inspected <input type="checkbox"/> Adapted to context <input type="checkbox"/> Supported by team <input type="checkbox"/> Feedback mechanisms in place <input type="checkbox"/> Practices & tools support collaboration <p>3 / 6 INAR JACOBSEN Gestión de Proyectos Intensivos™ 1.1.2</p>	<p>Keep in shape the work in use, analyze and evolved the development methodology</p>	<p>Meeting each other through chat and video. Responsible: Jose Orlando Tovar</p> <p>Fullfills method assessment template Responsible: Julian Camilo Ossa</p>	<p>Start date: 25/02/2021 16 hours</p>	<p>Use chat meetings to all the team planeation reunions and to work.</p> <p>Start date: 21/04/2021 2 hours Be more involved with the UNC-method, and analise what we thing and undestand about it: 5 suggestions</p>

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Evidences

The screenshot shows a Google Meet interface. On the left, a slide titled "context" displays a bulleted list of items related to organizational charts and pre-conceptual schemas. On the right, a "Detalles de la reunión" (Meeting details) panel shows two participants: Jose Orlando Tovar Cano and Julian Camilo Ossa Zapata. The participant list includes a "Personas (5)" section, a "Chat" tab, and a toggle for "Permitir a todo el mundo enviar mensajes" (Allow everyone to send messages). Below the participant list, a message from "Tú" at 11:00 says "http://thatpmgame.com/". At the bottom of the screen, a Windows taskbar is visible.

Esquema Pre-conceptual

This screenshot shows the "Esquema Pre-conceptual" diagram's details page. It includes tabs for "Detalles" (Details) and "Actividad" (Activity). The "Actividad" tab lists the following information:

Ubicación	Entregable 1
Propietario	Santiago Campos Giraldo
Modificado	17:29 por Santiago Campos Giraldo
Abierto	7:21 por mí
Creado el	10 mar 2021 con diagrams.net

Below the activity log, there is a note: "Los usuarios con acceso de lectura pueden descargar este elemento" (Users with read access can download this element).

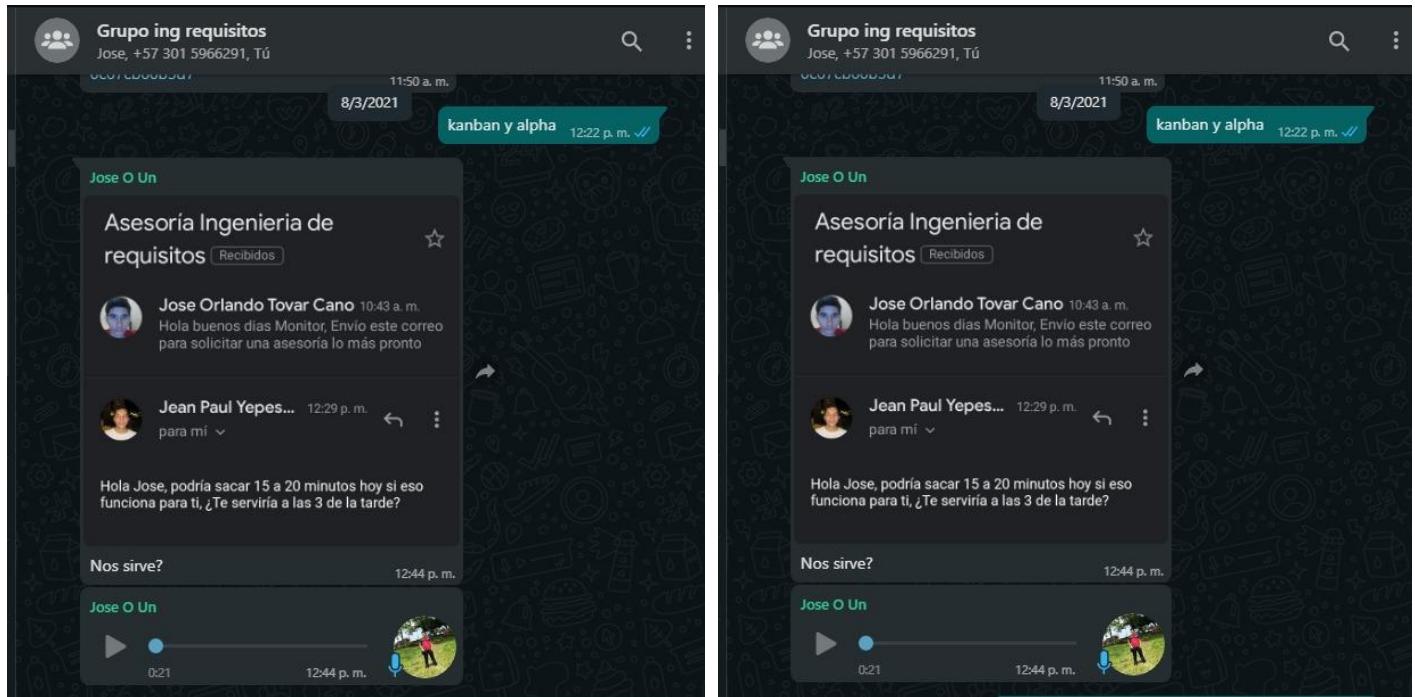
The screenshot shows a Google Meet session titled "Dialogo controlado". A complex state transition diagram is displayed on the left side of the screen. The diagram consists of various states represented by circles and rectangles, connected by arrows indicating transitions. On the right side, a participant list shows "Jose Orlando Tovar Cano" and "Julian Camilo Ossa Zapata". The participant list includes a "Mostrar a todos" (Show all) button and a "Style" panel. At the bottom of the screen, a Windows taskbar is visible.

Dialogo controlado

This screenshot shows the "Dialogo controlado" diagram's details page. It includes tabs for "Detalles" (Details) and "Actividad" (Activity). The "Actividad" tab lists the following information:

Ubicación	Entregable 1
Propietario	Jose Orlando Tovar Cano
Modificado	11:32 por Jose Orlando Tovar Cano
Abierto	11:48 por mí
Creado el	11 mar 2021 con Documentos de Google

Below the activity log, there is a note: "Los usuarios con acceso de lectura pueden descargar este elemento" (Users with read access can download this element).



Asesoria con Grissa- 1 de marzo.mp4



Jose Orlando Tovar ... 1 mar 2021 Jose Orl... 271 MB

Julian Camilo Ossa Zapata is presenting

Controlled dialog:

```

evaluates software_engineering_game, then pre_grade_student eval
pre-grade student shares quality_factor, then Research_group_on_c_red
uses the emotional_transition_pattern_graph, then
Research_group_on_computational_languages evaluates the emotional_transition_frequency,
then game_designer shares quality_factor, then game_designer incorporates
emotional_transition_pattern_graph
Analyst: What are the goals associated with the project?
Stakeholder: The goals are "preserving budget" and "reducing Duration".
Analyst: What are the problems associated with the project management game?
Stakeholder: The problems are "Players are not encouraging", "The project management game has unusable user storage", "Game designer does not consider the quality factor", [Game designer reports "scarcely" development process
The rating of the project management game is unknown
Methodology used in the project management game
Practical experience of the player is "low"
Player has "few" emotional transition frequency
The name of the tasks is unclear
Usability of the quality factor are "low values"
Player experience of the quality factor are "low values"
Game designer does not incorporate transition emotion pattern graph
Analyst: What are the problems associated with the task?
Stakeholder: The problem is "the task name is unclear".
Analyst: Thank you for your valuable information. We will be in contact in order to clarify any doubts that may arise in this process.
Stakeholder: Thank you. I'll be in touch.

```

Meeting details ^

Julian Camilo Ossa Zapata is presenting

Activar Windows

Preconceptual frankenstein

Jose Orlando Tovar Cano está presentando

Jose Orlando Tovar Cano

Santiago Campos Girado

Detalles de la reunión ^

Levantarse la mano

Jose Orlando Tovar Cano está presentando



The screenshot shows a video conference interface. On the left, a presentation slide titled "METRICAS CLÁSICAS DEL SOFTWARE" is displayed, featuring a diagram with a yellow square labeled "Problem Analysis <Phase>" connected by an arrow to a circle labeled "Contains", which is connected to a green star labeled "Stakeholder representation". Below the diagram, the date "17-mar-21", the topic "Requirements engineering", and the slide number "4" are visible. To the right of the slide, there are two video feeds: one for "Jose Orlando Tovar Cano" (a young man with dark hair) and another for "Santiago Campos Giraldo" (a man with short hair). The bottom half of the screen shows a Google Drive interface with a folder structure for "Entregable 2" and a detailed view of a "Process Diagram" file, including its details and activity log.

< back

quisitos > Entregable 2

The screenshot shows a Google Drive folder named 'Entregable 2' containing several files:

- Traceability table
- Elicitation cards, data ...
- Elicitation cards, data ...
- Ignorar Copia de Trace...
- STAKEHOLDER SURVEY
- Lista the cambios
- Asesoria grissa 19 ab...
- Asesoria grissa 15 Ab...

Activar Windows

The screenshot shows a Google Drive folder named 'Entregable 2' containing several files:

- Priority
- My Drive
- Shared drives
- Shared with me
- Recent
- Starred
- Trash
- Storage: 9.2 GB used
- Folders:
 - Evidencias(No olvidar)
- Files:
 - Preconceptual franken...
 - PROCESS DIAGRAM E...
 - Process Diagram
 - PERCENTAGE ASSIGN...
 - Domain Model
 - Tecoco_Clase 06_0....pdf

Details for the 'PROCESS DIAGRAM E...' file:

- Size: 0 bytes
- Storage used: 0 bytes
- Owned by Universidad Nacional de Colombia
- Location: Entregable 2
- Owner: Santiago Campos Giraldo
- Modified: 2:09 AM by Santiago Campos Giraldo
- Opened: 10:30 PM by me
- Created: Apr 18, 2021 with Google Sheets
- Add a description
- Viewers can download

Activar Windows
Ve a Configuración para activar Windows.
Show all

< back

Screenshot of Google Drive showing a folder structure and file details.

Shared with me > ing requisitos > Entregable 2

Folders:

- Evidencias(No olvidar)

Files:

- Preconceptual frankenstein (Unknown File, 219 KB, 224,588 bytes, Owner: me, Modified: 2:12 AM by Julian Camilo Ossa Zapata, Opened: 2:10 AM by me, Created: Apr 11, 2021 with diagrams.net)
- PROCESS DIAGRAM E... (Diagram, 219 KB, 224,588 bytes, Owner: me, Modified: 2:12 AM by Julian Camilo Ossa Zapata, Opened: 2:10 AM by me, Created: Apr 11, 2021 with diagrams.net)
- Process Diagram (Diagram, 219 KB, 224,588 bytes, Owner: me, Modified: 2:12 AM by Julian Camilo Ossa Zapata, Opened: 2:10 AM by me, Created: Apr 11, 2021 with diagrams.net)
- PERCENTAGE ASSIGN... (Diagram, 219 KB, 224,588 bytes, Owner: me, Modified: 2:12 AM by Julian Camilo Ossa Zapata, Opened: 2:10 AM by me, Created: Apr 11, 2021 with diagrams.net)
- Domain Model (Diagram, 219 KB, 224,588 bytes, Owner: me, Modified: 2:12 AM by Julian Camilo Ossa Zapata, Opened: 2:10 AM by me, Created: Apr 11, 2021 with diagrams.net)
- Tecoco_Clase 06_0...pdf (PDF, 219 KB, 224,588 bytes, Owner: me, Modified: 2:12 AM by Julian Camilo Ossa Zapata, Opened: 2:10 AM by me, Created: Apr 11, 2021 with diagrams.net)

Details for Preconceptual frankenstein:

Type	Unknown File
Size	219 KB (224,588 bytes)
Storage used	219 KB (224,588 bytes)
Location	Entregable 2
Owner	me
Modified	2:12 AM by Julian Camilo Ossa Zapata
Opened	2:10 AM by me
Created	Apr 11, 2021 with diagrams.net

Add a description
Viewers can download
Activar Windows
Ve a Configuración para activar Windows.
Show all

Asesoria grissa 19 abril.mp4	Jose Orlando Tovar Cano	19 abr 2021	Jose Orlando Tov...	143 MB
Asesoria grissa 19 abril.mp4	Jose Orlando Tovar Cano	19 abr 2021	Jose Orlando Tov...	143 MB