

# Master Meds



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# Introduction

Master Meds is a business simulation game where you as player run your own hospital. Expand your facility, learn new remedies and hire your own, handpicked staff. Make up and pick your own strategy for how to run your hospital as efficiently and successfully as possible by ranging out or specializing. All is up to you.

Master Meds was born out of my own love for the game Two Point hospital. TPH is a business simulation game where players learn to treat silly diseases such as “Inflated Ego” or “Jumbo DNA”. The game was made to be fun and stripped of the unpleasantness many may associate with hospitals. Although there’s a charm in that, I—as a player—wanted to become an actual life saver, taking big decisions for my serious hospital. As a result, I began making my own game.

In Master Meds I wanted the core elements or pillars to be Authenticity, Strategies and Replay Value. Authenticity I’ve touched on already, but it includes things like treating actual diseases and removing gameplay which do not correlate with the severity of running a hospital. When it comes to Strategies, I wanted there to be several ways to play the game successfully, letting the player pick between range and specializing. And the result of that achieves my final core element, Replay Value!

Read my design document below and I’ll hope you like the idea of Master Meds just as much as I do.

Anna

Note: This document does so far only reach from player level 0-3, which is only a small part of the entire game. I’d like to have a richer gameplay and more game elements further down the line.

I’m currently working on a prototype in UE5 Blueprints with the intent of testing variables and functions. Once the current design has been implemented, I will branch out the game design document.

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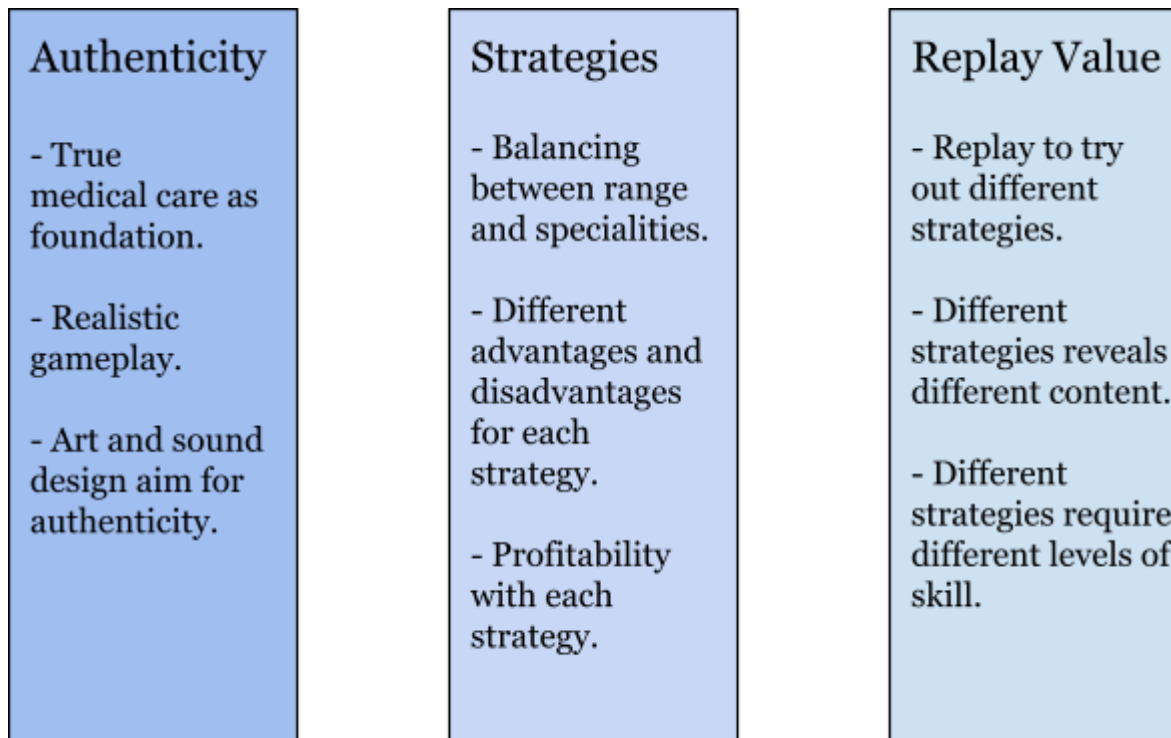
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# 1 Game Core

The Game Core chapter covers the core experience in Master Meds without dealing with too much detail. It offers a summary of the game essence while describing Core Pillars and Core Loop.

## 1.1 Core Pillars

As touched on in the introduction chapter, the core pillars of Master Meds are Authenticity, Strategies and Replay Value.



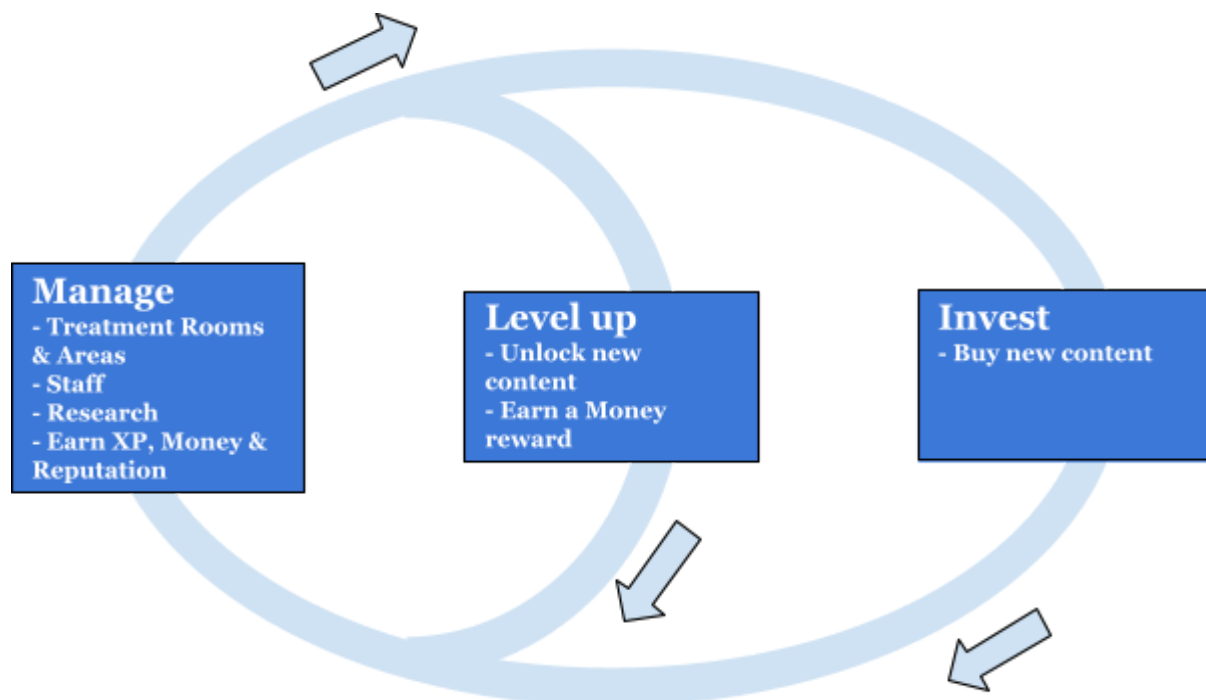
Regarding the pillar of Authenticity, Master Meds should feel serious and meaningful to the player. Just as if they were the head of an actual hospital, staff, patients, revenue and—most importantly—lives, lies in their hands. This message should be made by making all in-game content and their dynamic with each other true to life—or at least, made to be perceived as such. Gameplay and available player actions should derive from actual medical care, while art and sound design accompanies by aiming for setting an authentic hospital scene.

Strategies have the role of giving the player a sense of accountability and control. The player should be able to choose how they want to run their facility without being held back by the game favoring one strategy or another. Different strategies should come with their own advantages and disadvantages, but they all should be profitable when executed properly. The different strategies derive from different types of treatment rooms, where different treatments are executed (Details in 2.1 Treatment Rooms). A

player's strategy will be based on which treatment room types they choose to host and how they choose between having a big range of treatments or speciality in a few.

Replay Value we create by not revealing all game content in every playthrough. In Master Meds, this will mainly be connected to the different strategies. If a player chooses to only host and specialize in two different treatment room types, a lot of treatment types will not have been discovered once the game session is finished. A reason for the player to begin a new session, will therefore be to discover the treatments they didn't the time before. To keep it interesting, strategies and the choice of different treatment rooms should have the element of variation in difficulty. Testing one's skill by trying out new more difficult strategies, will be another factor pulling the player in for a new session.

## 1.2 Core Loop



The image above represents the core gameplay with a dual loop. The player begins with running their hospital with all that it entails; Expanding the hospital and number of treatment rooms, hiring or laying off staff, and researching, all while earning and spending XP, Money and Reputation points. Eventually, the player has gained enough XP to level up and will then have new game content made available along with being rewarded with a larger sum of Money. At that point, the player may choose to either keep managing—now with more more resources—or investing in the new content.

The player challenge lies in the management part. Putting money into treatment rooms, staff and research improves the hospital experience (XP) as well as its capacity of treating patients, but it also increases the costs. The action comes down to where to put one's money and when to save and when to spend. The player will be rewarded when spending their money right by gaining a larger profitability—however—the most noticeable reward will be when leveling up. Since the player gains new content and a larger sum of Money, leveling up will in an instant give the player resources to spend and content to explore.

## 2 Gameplay

Master Meds is a hospital management game where player action mainly happens in business overviews while supervising and adjusting staff, treatments and profit. The game begins with a small, empty facility and the first step will be to buy a first treatment room and hire staff, but from there, priorities will be up to the player. Accomplishments are measured by player level, staff level and facility standard as well as amount of money and reputation points. However, all accomplishments may not have a place in every strategy, making the game different for each player and playthrough.

### 2.1 Objectives

Master Meds contains several objectives the player themselves may prioritize how they wish.

#### 2.1.1 Levels

The initial objective will be leveling up since that's how to attain new game content. Each player starts their game at level 0 and will only have access to a very limited amount of actions and mechanics, giving them a slow pace to get started in but also an inefficient business to run. However, players gather XP by treating patients or putting money into their facility and will therefore by the nature of the game level up soon just by playing, working their way up to new, added game content.

Treatment rooms	Staff types	Facility areas	Other Elements
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Player Level	Required XP	Available Content
0	0	30 000 coins
		2 staff spots
		Examination Room
		Family Physician
		Entrance
1	1000	10 000 coins
		3 staff spots (+1)
		Pharmacy
		Pharmacist

2	5000	10 000 coins
		Research Tree
3	10 000	15 000 coins
		5 staff spots (+2)
		Ambulance
		Paramedic

### 2.1.2 Expansions

Players have two ways to expand their facility.

1. Buy Treatment Rooms. Once a Treatment Room type is within a player's available content, they may buy as many units of it as they like (as long as they have resources in terms of money and facility space). Every unit holds only one patient at a time, so obtaining several units of the same type of Treatment Room means that the player are able to care for several patients of equal type concurrently. Obtaining different types of Treatment Rooms means that the player are able to care for different types of patients.
2. Buy new Facility Areas. Once an area is within a player's available content, they may buy and gain access to that one area. By doing so, they obtain more room to build on and are therefore able to hold more units of Treatment Rooms.

### 2.1.3 Staff

The quality of staff will determine how well of a treatment success rate and treatment time the hospital holds, which directly impacts revenue. All staff have two variables, type and level. Type (ex. Family Physician) determines which Treatment Room type they can operate in, and level (1-5) determines their treatment success rate, speed and hourly rate.

Staff of higher levels bring in more revenue to the hospital but are also more expensive on duty. Staff level is determined by numbers of hours on duty and will automatically level up as playtime goes, raising their wage. Players may hire staff that start out on any level—however—staff that are hired at higher levels will have a higher rate than staff who were hired at low levels but trained to equally high levels. Different types of staff also have different rates. See details in chapter 3.3 Staff.



Once a player achieves 5 employees in one staff type, they may choose one of those employees to become head of that staff type (ex. Head of Family Physicians). This means three things:

1. Having a head within a staff type, makes leveling up require less hours for that staff type. Restricted only to staff individuals who have a lesser level than the head of staff.
2. Having a head within a staff type, improves overall treatment time and success rate for that staff type.
3. Heads of staff have an increased wage.

### 2.1.4 Money and Reputation

The more money players earn, the more resources they have to improve their hospital. Money is earned simply by playing, but the amount earned differs greatly by player choices. Player earnings are affected by treatment success rates and waiting times as well as costs of staff, expansions and upgrades.

Reputation has an effect on treatment fees. Gain a good reputation by high treatment success rates and short waiting times and gain a poor reputation by the opposite. The greater reputation a player's hospital possesses, the greater pay for each treatment.

See details in chapter 3.6 Variables - Money, Reputation and XP.

### 2.1.5 Research Tree

The research tree will carry upgrades and advancements for the player to buy. It's restricted to players current available content and will therefore expand its own content as player level increases. Buying and unlocking research tree parts will improve business efficiency or profitably.

The research tree will not have to do with availability of Treatment Room types, staff types or facility areas, only the advancement of them.

See details in chapter 2.4 Research Tree and 3.2.4 Research Tree.

## 2.2 Strategies

As mentioned, Master Meds will leave room for several strategies to choose from. Besides from prioritizing the objectives above, there's one important thing to consider when picking a strategy. Who shall the hospital treat?

All, is one answer. Having a wide range of treatments and professionals will allow any patient to be treated at your hospital. The overall content of clients will be stable, since everyone who visits the hospital will get taken care of. Then, there's

specializing. Pick one type of staff and treatment to excel in that field, assuring the waiting time and treatment success rate for your speciality is the very best.

Make your choice between the two alternatives or find a middle way when choosing your next investment, hire and path up the research tree.

## 2.3 No Finish Line

Master Meds has no absolute end and is ideally progressing for as long as players will have it. This is partly done by allowing for different play styles to exist and thrive, making Master Meds replayable and interesting for many times over. One future, developer goal is also to implement the possibility to invest in several hospitals. The player's business can then expand to different facilities, allowing for cooperation between hospitals with joint funds and ability to transfer patients.

## 3 Game Elements

The Game Elements chapter describes the elements and their specific types that are available content in level 0-3.

### 3.1 Treatment Rooms

Treatment Rooms are required to perform treatments and hold only one staff member and patient at a time. Treatment Room type determines which treatments a room is able to perform and what revenue it makes.

Level 0-3 will contain three Treatment Room types; Examination Room, Pharmacy and Ambulance.

1. Examination Room will be the default Treatment Room type and performs the treatment type Check-up. Some patient types are only in need of a Check-Up, but many times they follow up with another treatment type, making the examination room important for several treatments.
2. Pharmacy performs the treatment type Drug shop.
3. Ambulance performs the treatment type Patient transport, which is required when patients are of a type that the player hospital can't treat due to not having qualified staff or matching Treatment Rooms. Once at a level when the hospital can treat emergency cases, the Ambulance may also be used to bring in patients.

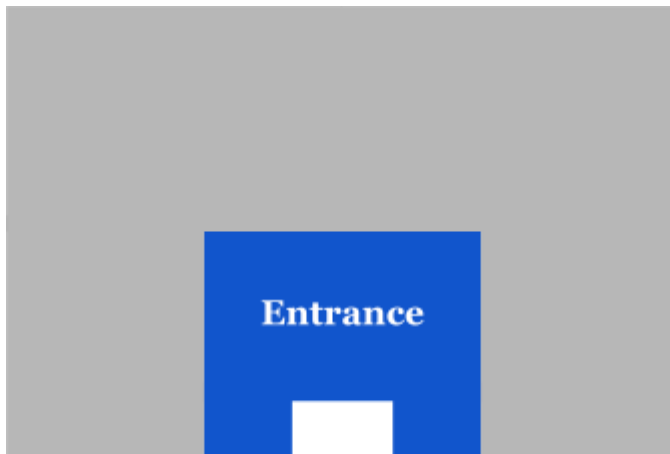
Below is a table over the individual Treatment Rooms costs, treatments and revenues.

Treatment Room	Unit Cost	Treatment Type	Standard Treatment Fee	Successful Treatment Fee (adds to Standard Treatment Fee)
Examination Room	1 000	Check-up	100	25
Pharmacy	1 500	Drug shop	25	10
Ambulance	5 000	Patient transport	500	100

Revenue is also affected by reputation level as demonstrated in the table below.

Reputation Level	Standard Treatment Fee Impact
1	-10%
2	-5%
3	0%
4	+5%
5	+10%

## 3.2 Facility Areas



Above is a top down view of the player facility. Initially, the player will only have access to one area but by leveling up, they will gain access to buy more areas and further along also floors.

### 3.2.1 Entrance

Entrance will make up the player's default, available area, costing 15 000 coins.

## 3.3 Staff

Different staff types work in different Treatment Room types. Efficiency, profitability and rate differs between the different staff types. Staff level is determined by total time on duty, making leveling up and its resulting rate increase automatic. Staff can also directly be hired at increased levels, but their entry rate will be higher than a rate dictated by the automatic rate increase.

A staff individual elected to head of their field receives a 10% rate increase.

### 3.3.1 Family Physician

Family physicians host Examination Rooms.

Staff Level	Treatment Time (sec)	Treatment Success Rate	Rate Increase	Entry Rate
1	25	60%		40/h
2	22	70%	15%	50/h
3	20	80%	15%	65/h
4	19	85%	10%	80/h
5	18	90%	10%	90/h

### 3.3.2 Pharmacist

Pharmacists host Pharmacies.

Staff Level	Treatment Time (sec)	Treatment Success Rate	Rate Increase	Entry Rate
1	15	30%		40/h
2	12	40%	15%	50/h
3	10	50%	15%	65/h
4	9	65%	10%	80/h
5	8	70%	10%	90/h

### 3.3.3 Paramedic

Paramedics host Ambulances.

Staff Level	Treatment Time (sec)	Treatment Success Rate	Rate Increase	Entry Rate
1	40	30%		55/h
2	38	40%	12%	65/h
3	35	50%	15%	80/h
4	32	65%	15%	95/h
5	30	70%	10%	105/h

### 3.4 Research Tree

The Research Tree will be made available content at player level 2, allowing players to invest in upgrades in efficiency and profitability. Some upgrades are fully activated directly as they're unlocked, while others need to be applied to certain units.

Player Level	Available Upgrades	Cost Unlock/Unit	Description	Field
2	Examination Room Upgrade 1	2000/300	Every upgraded examination room unit's treatment time is impacted -1 second	Family Medicine
2	Family Physician Training 1	5000/-	Every family physician staff treatment success rate is impacted +5%	Family Medicine
2	Pharmacy Upgrade 1	2500/350	Every upgraded pharmacy unit's treatment time is impacted -1 second	Pharmaceutical
2	Pharmacist Training 1	5000/-	Every pharmacist staff treatment success rate is impacted +5%	Pharmaceutical
3	Ambulance Upgrade 1	12000/2000	Every upgraded ambulance unit's treatment time is impacted -1 second	Paramedic Services
3	Paramedic Training 1	7000/-	Every paramedic staff treatment success rate is impacted +5%	Paramedic Services

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### 3.5 Patients

Patient types are described by their needed treatments in order.

Patient Type	1st Treatment Room	2nd Treatment Room
Check-up	Examination Room	
Check-up + Drug shop	Examination Room	Pharmacy
Check-up + Patient transport	Examination Room	Ambulance
Drug shop	Pharmacy	

### 3.6 Variables - Money, Reputation and XP.

Variable	+	-
Money	Treatment fees	Buy Treatment Rooms
	Successfully treat patients	Invest in the Research Tree
	Level up	Buy Facility Areas
		Pay the daily staff wage
	+	-
Reputation	Successfully treat patients	Unsuccessfully treat patients
	Short waiting time	Long waiting time
	+	-
XP	Buy Treatment Rooms	
	Upgrade Treatment Rooms	

	Buy Facility Areas	
	Amount of hired staff	
	Amount of heads of staff	

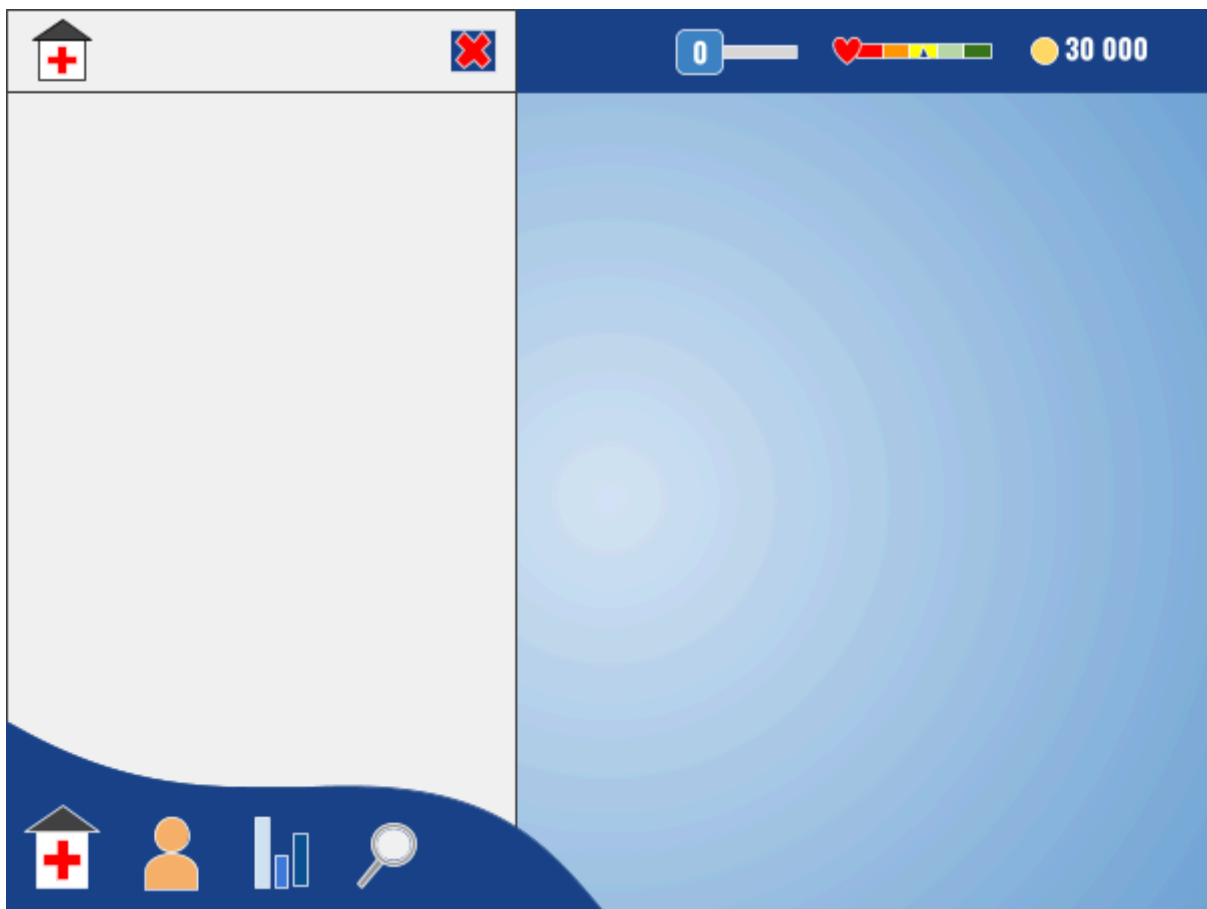


## 4. UI and Controls

Master Meds' gameplay relies on buttons and menus for its controls. The extent of those, as well as their UI design, will be described in this chapter.

### 4.1 Game View


The game view is the default game scene. It will show the hospital in motion, framed by an instrument panel displaying player level, reputation level and amount of money at the top, and buttons to menus at the bottom. Opened menus will be displayed to the left with a symbol of the picked menu and a close button, leaving the instrument panel and the right side of the hospital visible and interactable.

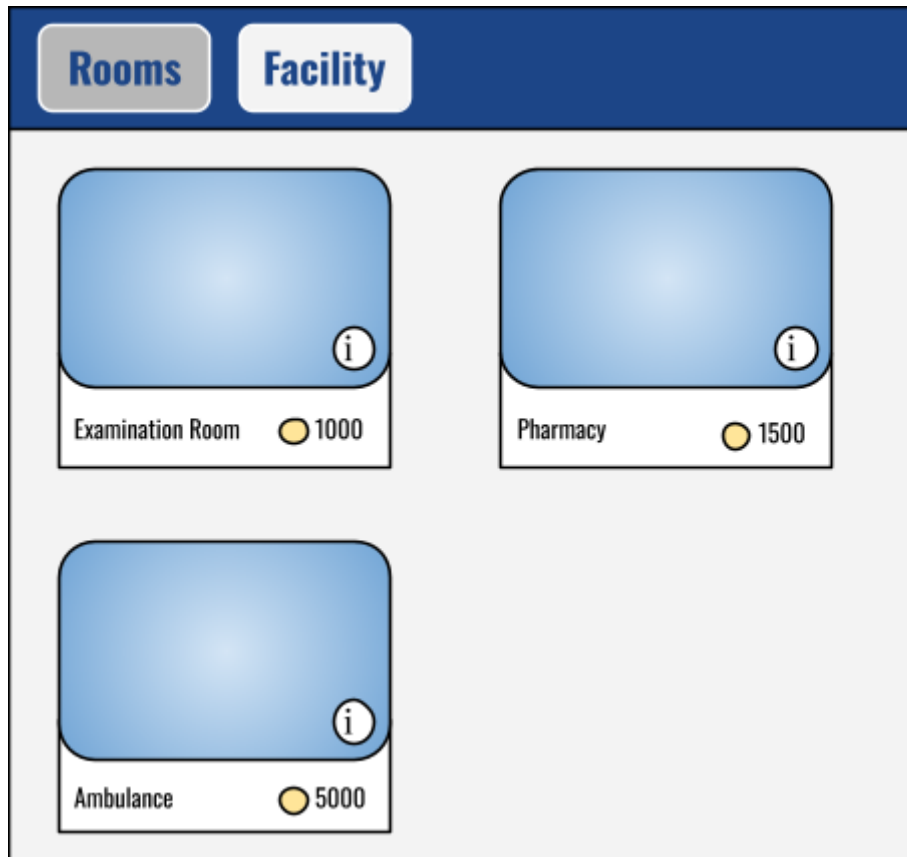


### 4.2 Menus

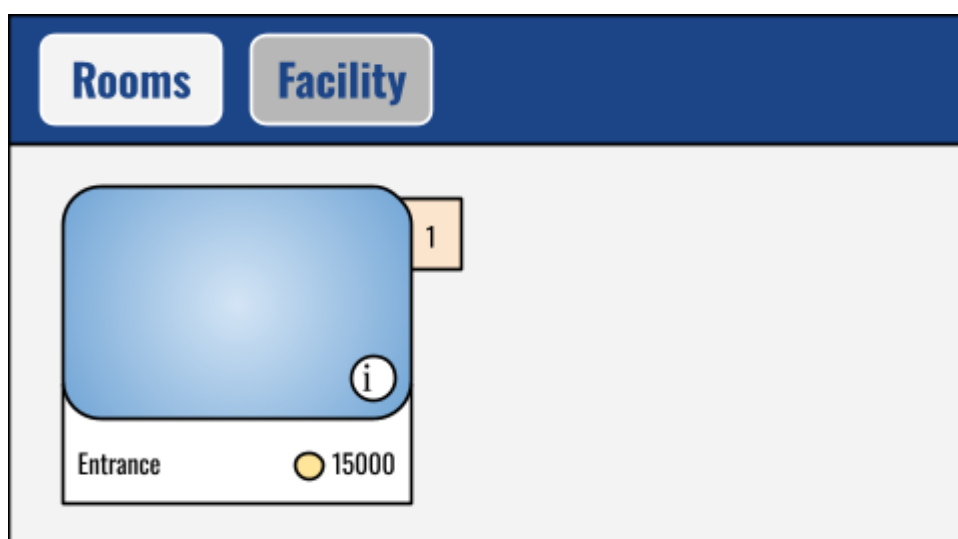
Menus are displays that provide information and buttons when requested. Following menu designs are meant to be inserted into the gray left of the game view above.

### 4.2.1 Facility

The facility menu opens when following button, , is pressed. Tab one, 'Rooms', displays purchasable Treatment Rooms, their cost and specific information button.



Tab two, 'Facility', displays purchasable areas, their cost, floor level and specific information button.





### 4.2.2 Staff



The staff menu opens when following button, , is pressed. Tab one, 'Staff', displays the current amount of staff ordered into type.



Pressing any staff type will open its own tab, displaying staff amount, every individual staff member, their level and wage sorted from lowest to highest level. Every member has one button for electing to head of field and one for firing.


Family Physicians 2		↑	
Andy Andersson	★ 	Level 1	40/h
Sandy Sandersson ★	★ 	Level 3	58/h

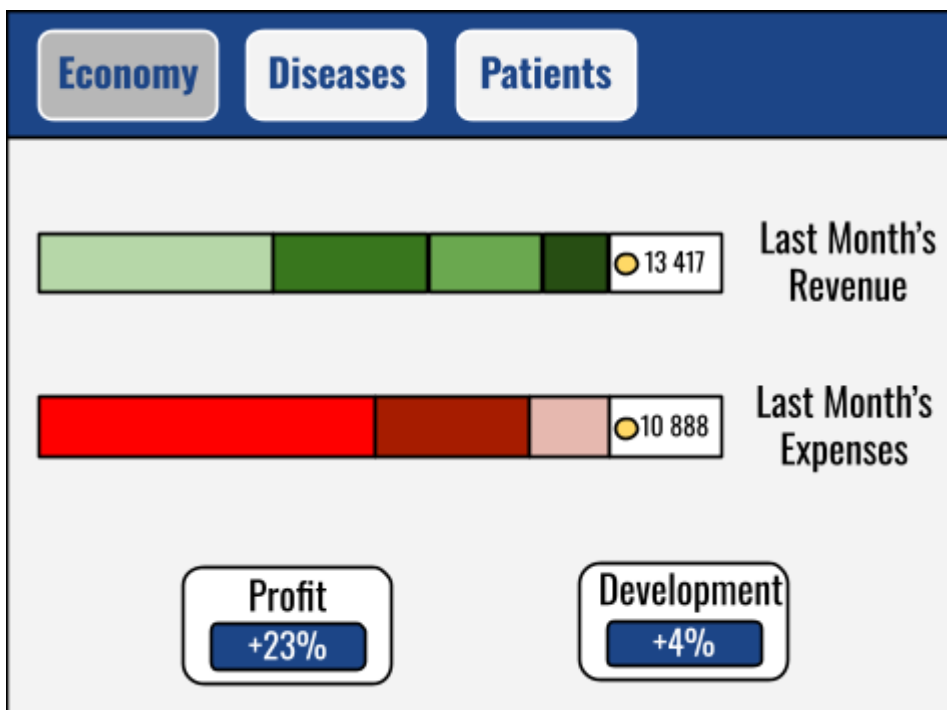
Tab two, 'For Hire', displays individuals open for hire, their level, type and rate sorted from lowest to highest level. The individuals are switched out regularly.



#### 4.2.3 Statistics

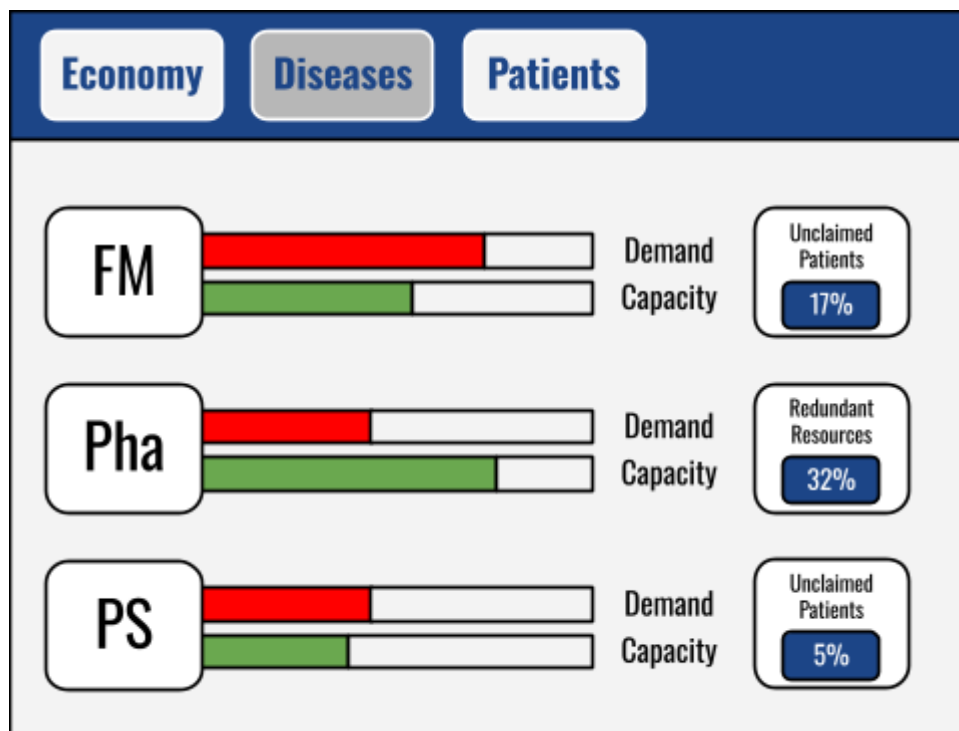


The statistics menu opens when following symbol, , is pressed. Tab one, 'Economy', displays last month's revenue and expenses divided into categories, current profit and development—a percentage of how much results are increasing or decreasing.



Tab two, 'Diseases', displays all fields (ex. Family Medicine), their demand for service, hospital resources for that service, and a percentage of how well demand and


resources balance each other. In the design below, each field is represented with its abbreviation, but that should be switched out to a field symbol.



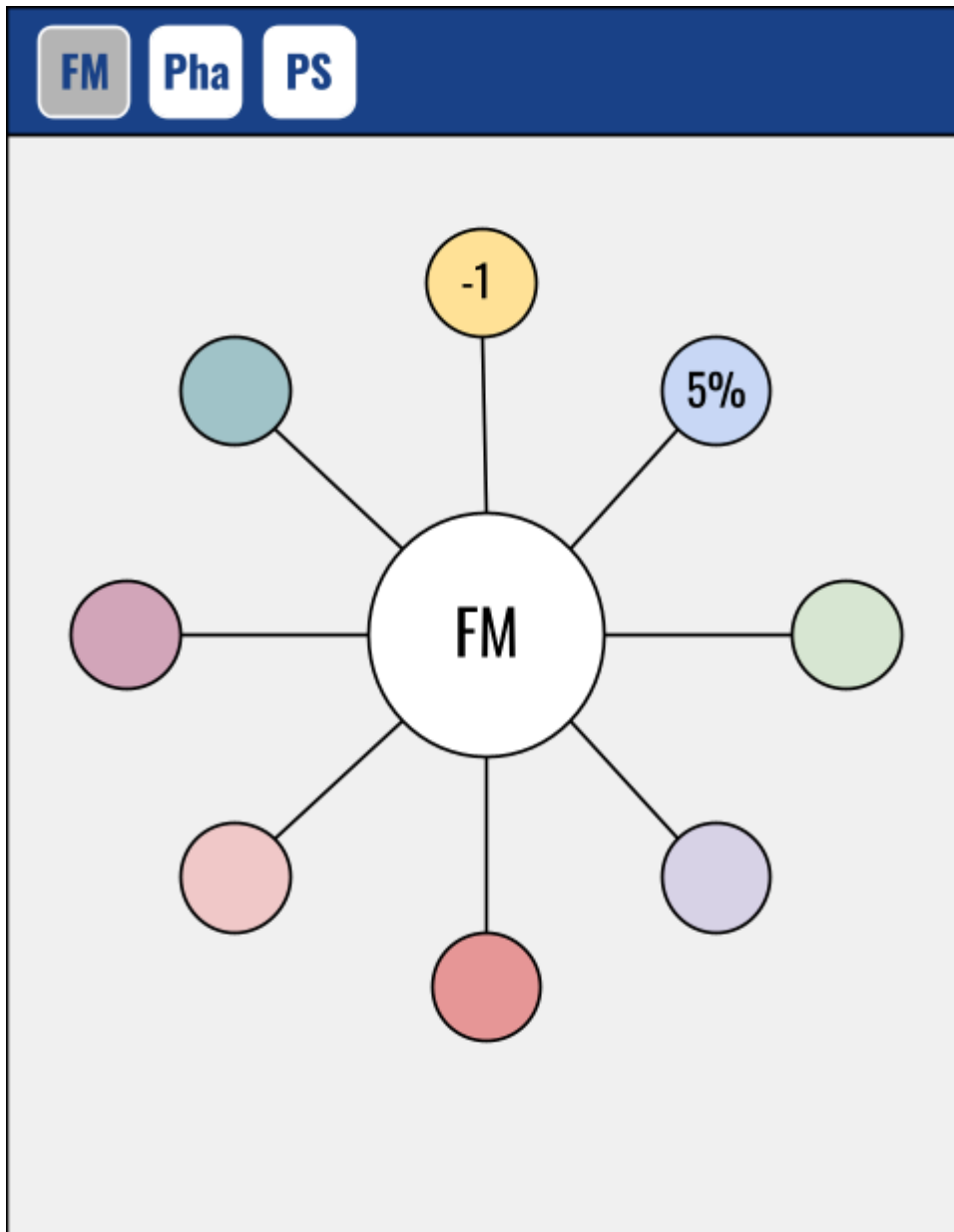
Tab three, 'Patients', displays all current patients, their individual reputation assessment, field of treatment and status. In the design below, each field is represented with its abbreviation, but that should be switched out to a field symbol.

Economy	Diseases	Patients
Erik Eriksson		FM Received
Ted Tedson		FM Waiting
Belle Bellson		Pha Received
Otto Ottoson		PS Received

#### 4.2.4 Research Tree

The Research Tree menu opens when following symbol, , is pressed. Every tab represents the tree of each field (ex. Family Medicine) and by pressing one, that field's tree shows. The tree is displayed by the chosen field's in its core and possible upgrades surrounding it. In the design below, each field is represented with its abbreviation, but that should be switched out to a field symbol. Same goes for the

upgrades which should be represented by symbols and reveal its actual content only when being hovered on.



#### 4.2.5 Treatment Room Units

The Treatment Room Units menu will open when such a unit is pressed in the actual hospital. It displays Treatment Room type, level, an upgrade button, unit revenue and expenses.

