The Waste of Parts - A Game by Evan Duda

Toxic, chemical sludge is strewn across much of the wasteland, meaning that only a mech can get through it. Wasteland is filled with old scrap and parts of mechs who tried and failed to get across.

Tone/Theme: Dreary, horror/thriller-inspired. Scary, yet a twinge of hope should be present within the characters.

Goal: Players must successfully make their way across the Waste of Parts to sanctuary. 40 Units.

Hull: The Mech begins with a set amount of Hull Points. If it is reduced to 0, the Mech is destroyed, along with its occupants, ending the game. Another addition to the Waste of Parts. Hordes are capable of attacking the Mech's Hull directly, while regular enemies attack it from within. If a room is attacked by an enemy once, it becomes inoperable and all upgrades attached to it are discarded. If it is attacked again, it will catch fire and begin costing the Mech 1 Hull Point per round until it is repaired.

Noise: Traversing the Waste of Parts is sure to attract some attention. Your Noise level is dependent upon your crew and equipment on board. Noise level starts out at half the number of crew members rounded up. You can accrue more Noise as you gain more upgrades to your Mech. At the end of each round, the captain will draw a number of Monster cards equal to the noise level.

The Mech moves forward as long as:

- There is at least one Crew Member in the Cockpit
- The Engine rooms are in working condition
- There are no enemies in the Engine Rooms

Mech Rooms:

- **Engine Rooms** Both Engine Rooms are required to be operational for the Mech to continue moving.
- Artillery Rooms (Front and Rear) Allow access to the Mech's main exterior cannons.
 A Crew member stationed in these rooms can fire at enemies outside the Mech. Can be wielded from the Cockpit at 50% efficiency.
- **Salvaging Crane** Allows the Mech to dredge up useful parts from the wastes. A Crew member stationed in this room can attempt to salvage at the end of the round. Can be activated from the Cockpit at 50% efficiency.
- Cockpit Requires a living Crew member present in the room to keep the Mech moving.

- **Multi-Function** Start out as blank space. A majority of Upgrade Cards can be placed on Multi-Function Rooms.
- Decks (Front and Rear) No cards can be placed on Decks. They serve as vantage points. Crew members on the Deck can take place in ranged combat against enemies outside of the Mech.

At the beginning of the game:

- Reveal enemy cards equal to the starting Noise level

During your Turn:

- You may choose up to 3 of the following actions:
 - Move
 - Repair
 - Attack
 - Work (This action ends your turn)

At the end of each Round:

- 1. Room effects take place (if any)
- 2. All enemies attack/move (if present)
- 3. Attempt a Salvage Roll (if able)
 - a. Upon a successful Salvage Roll, draw and reveal Salvage Cards one at a time and resolve them. If it is an Upgrade Card, each player votes on whether or not to add it to the Mech (and where to add it). Ties are broken by the First Player. If it is an Item card, the players may choose which player receives the item card. If no decision can be reached, it defaults to the First Player's choice.
- 4. Draw Monster cards equal to the Noise Level
 - a. For each Noise level, draw an Enemy card, reveal it, and place the appropriate enemy figure in that room.
- 5. The Mech moves forward equal to its current Speed.
- 6. If the Mech has reached a milestone, shuffle in the appropriate cards to the Monster deck

Enemy Behavior:

- Priority:
 - Attack Crew Members
 - Damage Room until on fire
 - Move to Adjacent Room (Always moves towards closest crewmember. If tied, it moves in the direction of the closest engine room.)
- Attacking Rooms:
 - Each room of the mech has 3 states: Functional, Inoperable, and On Fire. If an enemy is left alone in a room and no player is present, it will attack the room it is in. The first time a room is attacked, its effects become non-functional until it is

repaired. The second time it is attacked, the room will catch fire, costing the Mech 1 Hull point every round until it is put out. If a room with an upgrade is on fire, discard all upgrade cards attached to it. After a room is on fire, enemies will then move towards the closest crew member.

- Attacking Players:
 - Enemies attack Crew Members by rolling dice equal to its attack stat. Enemies attack each Crew Member in the room they're in.

Mech Schematics:

Rear Deck(1)	MultiFunction Room(2)	MultiFunction Room(3)	Front Deck(4)
Salvaging Crane(5)	MultiFunction Room(6)	MultiFunction Room(7)	Cockpit(8)
Rear Gun(9)	Engine Room(10)	Engine Room(11)	Front Gun(12)

^{||} Denotes Ladders, allowing to move up/down

Base Statistics:

Salvaging Crane:

- Manned Salvage Roll of 2

Engine Rooms:

Contributes +1 Movement per round

Gunner Rooms:

Manned Combat Roll of 3

ENEMIES/COMBAT:

Binary Combat Dice

Enemy Combat: After revealing an enemy within a room, a Crew Member may engage in combat with it. Each Crewmember has a basic starting attack stat of 1. Weapons and other augmentations may increase the attack stat. Roll Binary Dice equal to the attack stat to determine the amount of damage dealt.

Armor: Armor must be broken through before the defender begins taking HP damage. Armor is regenerated at the end of each round.

Wastelanders - Irradiated, Mutated, Zombie-like figures, many of which were crews of their own mechs who fell victim to the toxic sludge; a grim reminder of what failure means. Slow, mindless, and weak on their own. Often travel in packs. Most common enemies.

Starting Deck:

Name	# in Deck	Spawn #'s	HP	Attack	Armor	Ability
Blank	45	N/A	N/A	N/A	N/A	N/A
Wastelander	24	1-12	1	1	0	N/A
Heavy Wastelander	8	5-12	1	1	1	N/A
Wasteland Mongrel	8	1-8	1	2	0	N/A
Wastelander Pack	2	13	6	3	0	Attacks Hull Directly. Halts movement.

At 10 Shuffle in:

Name	# Shuffled in	Spawn #'s	HP	Attack	Armor	Ability
Wastelander	12	1-12	1	1	0	N/A
Wasteland Mongrel	4	1-4	1	2	0	N/A
Carrion Herald	4	1, 4	1	1	0	Cannot move; Noise +1
Wastelander Pack	2	13	6	3	0	Attacks Hull Directly. Halts movement.

At 20 Shuffle in:

Name	# Shuffled in	Spawn #'s	HP	Attack	Armor	Ability
Irascible Wastelander	4	5-8	3	1	0	+2 ATK when

						injured
Heavy Wastelander	8	5-12	1	1	1	N/A
Carrion Herald	4	1, 4	1	1	0	Cannot move; Noise +1
Wasteland Mongrel	4	5-8	1	2	0	N/A
Wastelander Pack	2	13	6	3	0	Attacks Hull Directly. Halts movement.

At 30 Shuffle in:

Name	# Shuffled in	Spawn #'s	HP	Attack	Armor	Ability
Irascible Wastelander	4	5-8	3	1	0	+2 ATK when injured
Greater Ooze	4	9-12	2	2	0	Splits into lesser oozes
Carrion Herald	4	1, 4	1	1	0	Cannot move; Noise +1
Heavy Wastelander	8	5-12	1	1	1	N/A
Wastelander Pack	4	13	6	3	0	Attacks Hull Directly. Halts movement.

- Wastelander (1-12)

HP: 1Attack: 1Armor: 0

- Special Ability: N/A

- Irascible Wastelander (5-8)
 - HP: 3
 - Attack: 1
 - Armor: 0
 - Special Ability: If this enemy is wounded, it gains +2 Attack.
- Heavy Wastelander (5-12)
 - HP: 1
 - Attack: 1
 - Armor: 1
 - Special Ability: N/A
- Wasteland Mongrel (1-8)
 - HP: 1
 - Attack: 2
 - Armor: 0
 - Special Ability: N/A
- Greater Ooze (9-12)
 - HP: 2
 - Attack: 2
 - Armor: 0
 - Special Ability: When killed, splits into 2 Lesser Oozes
 - Lesser Ooze
 - HP: 1
 - Attack: 1
 - Armor: 0
 - Special Ability: N/A
- Carrion Herald (1, 4)
 - HP: 1
 - Attack: 1
 - Armor: 0

- Special Ability: This enemy does not move. As long as this enemy is on the ship, increase the Noise Level by 1.
- Wastelander Pack (13)

HP: 6Attack: 3Armor: 0

- Special Ability: Attacks Hull Directly, can only be fired at with Artillery

Upgrades/items:

Multi-Functional Upgrades:

- Automatic Hull Repair Systems (4x)
 - Noise Level: 0
 - Ability: At the end of turn, before Enemies Attack, heal the Mech's Hull Points by 1.
- Containment Cell (4x)
 - Noise Level: 0
 - Ability: Enemies cannot leave Containment Cell. Containment Cell requires **3** damage instead of **1** before it can be set On Fire.
- Medical Bay (4x)
 - Noise Level: 0
 - Ability: Crew Members in this room gain the **Heal** ability and may spend 1 Action to remove a wound from themselves.
- Reinforced Hull Plating (4x)
 - Noise Level: 0
 - Ability: When placed, increase and heal the Mech's maximum Hull Points by 5. If discarded, reduce the Mech's maximum hull points by 5.
- Automatic Disintegration Ray (3x)
 - Noise Level: 0
 - Ability: The next time an enemy enters this room, immediately discard this card to destroy all enemies within it.
- Automatic Fire Suppression Systems (3x)
 - Noise Level: 0
 - Ability: If this room or an adjacent room catches on fire, you may immediately discard this upgrade card to make the room inoperable instead.
- Proximity Repair Drone (1x)
 - Noise Level: 1
 - Ability: Place the Drone token on this room when played. Repair Drone is controlled by the First Player and has 2 actions per turn. The Drone can only move to directly adjacent rooms to the Proximity Repair Drone room. If the Drone is destroyed through combat, discard this upgrade card. If this room becomes inoperable, the Repair Drone cannot take any actions. If this upgrade card is discarded, remove the Repair Drone from play.

- Repair Drone Actions (2 per turn)
 - Move
 - Repair
- Repair Drone Stats:
 - HP: 6Attack: 0Armor: 0
 - Ability: Immune to Fire
- Proximity Defense Drone (1x)
 - Noise Level: 1
 - Ability: Place the Drone token on this room when played. Defense Drone is controlled by the First Player and has 2 actions per turn. The Drone can only move to directly adjacent rooms to the Proximity Defense Drone room. If the Defense Drone is destroyed through combat, discard this upgrade card. If this room becomes inoperable, the Defense Drone cannot take any actions. If this upgrade card is discarded, remove the Defense Drone from play.
 - Defense Drone Actions (2 per turn)
 - Move
 - Attack
 - Defense Drone Stats:
 - HP: 6Attack: 2Armor: 0
 - Ability: Immune to Fire

Salvaging Crane Upgrades:

- Deep Dredger Crane (5x)
 - Noise Level: 0
 - Manned Salvage Roll of 3
 - Ability: N/A
- Waste Stirrer Crane (3x)
 - Noise Level: 1
 - Manned Salvage Roll of 4
 - Ability: N/A
- Radar-Enhanced Crane (1x)
 - Noise Level: 1
 - Manned Salvage Roll of 3
 - Ability: If you would draw a Salvage Card, instead draw 2 and then choose and discard 1.

Cockpit Upgrades:

- Autopilot (2x)
 - Noise Level: 0
 - Ability: If there is no pilot in the cockpit, the Mech will continue moving at half speed rounded up if able.
- Ocular HUD Screen (3x)
 - Noise Level: 0
 - Ability: Once per turn as an action, any Crew Member in the Cockpit may look at the top card of the Salvage deck and either put it back on top or on the bottom of the deck.

Gunner Upgrades:

- Upgraded Artillery (4x)
 - Noise Level: 0
 - Manned Combat Roll of 4
 - Ability: N/A
- Deadeye Cannon (2x)
 - Noise Level: 0
 - Manned Combat Roll of 4
 - Ability: When rolling for damage, treat Boss Results as critical hits, dealing double damage.
- Glass Howitzer (2x)
 - Noise Level: 0
 - Manned Combat Roll of 8
 - Ability: Discard this upgrade card after firing once.
- The Hekkelator (1x)
 - Noise Level: 1
 - Manned Combat Roll of 10
 - Ability: After firing, roll a die. Upon a hit result, the Upgraded room immediately catches fire. Discard this card. Upon a blank result, nothing happens.

Engine Upgrades:

- More Efficient Engines (4x)
 - Noise Level: 1
 - Contributes +2 Movement per round
 - Ability: N/A
- Unstable Engines (2x)
 - Noise Level: 1
 - Contributes +3 Movement per round
 - Ability: If this room becomes inoperable, treat it as if it were set On Fire.
- Gas Guzzlin' Engines (2x)
 - Noise Level: 2
 - Contributes +3 Movement per round

- Ability: N/A

Item Cards:

- Hull Sealant (5x)
 - Ability: As an action, discard this card to heal the Mech's Hull by 5 HP
- Fire Extinguisher (3x)
 - Ability: Discard this card to put out a fire in a room your crew member is currently in or is adjacent to.
- Medkit (8x)
 - Discard this card to heal up to 2 wounds on your crew member.
- Adrenaline Shot (5x)
 - Discard this card to gain an extra action this turn.
- Pistol Weapon (5x)
 - Attacking Crew Member gets +1 Attack
- 12-Gauge Weapon (3x)
 - Attacking Crew Member gets +2 Attack. Attacking with this weapon requires two spent actions.
- Survivalist's Knife Weapon (1x)
 - Attacking Crew Member gets +0 Attack. If an enemy is killed with this weapon, reveal the top card of the Salvage Deck. If it is an Item card, you may place it onto your character, otherwise put it on the bottom of the Salvage Deck.
- Light Armor (3x)
 - Ability: Equipped Crew Member has +1 Armor
- Heavy Armor (1x)
 - Ability: Equipped Crew Member has +2 Armor but can only move once per round.

Event Cards:

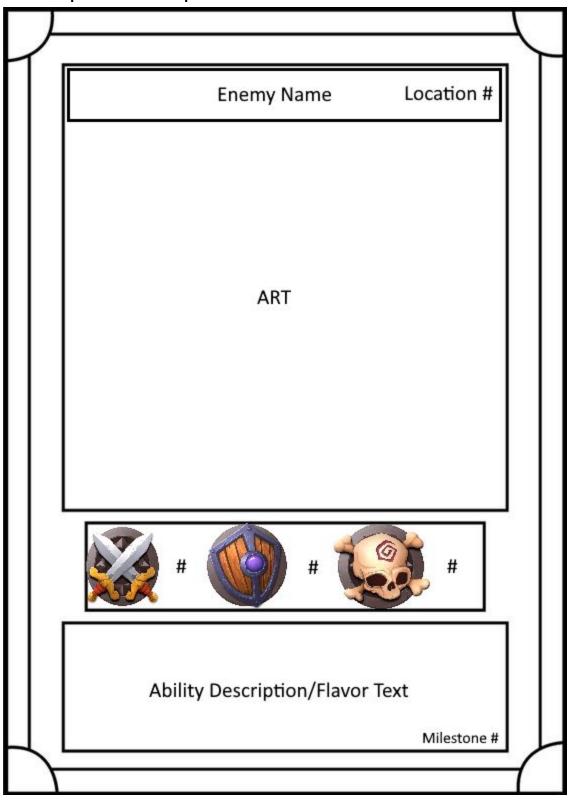
- Muck-Dredged Monster (5x)
 - Immediately place an enemy in the Salvage Crane Room, then draw another Salvage Card.
- Worth the Risk? (3x)
 - Crew must vote Yes or No. If No, nothing happens. If Yes, reveal cards from the top of the Salvage Deck until you reveal two Upgrade cards and place them onto the Mech. If you do, put 2 Enemies in each of those rooms. Put all other revealed cards on the bottom of the Salvage Deck.
- Raiding the Infested Cache (5x)
 - Crew must vote Yes or No. If No, nothing happens. If Yes, reveal cards from the top of the Salvage Deck until you reveal two Item cards and distribute them amongst Crew Members. If you do, roll 2 additional dice during the Encounter Roll this turn.
- Stuck in the Muck (2x)
 - The Mech's leg has gotten trapped on something beneath the sludge. Crew must vote Yes or No. If Yes, the Mech Fires its guns to blast free whatever has it stuck;

roll 2 additional dice during the next Encounter Roll. If No, the Mech does not move forward this round and unsticks itself. Draw another Salvage Card.

Characters:

- Base Stats:
 - HP: 3Attack: 1Armor: 0
- Characters can only hold up to 2 Items.
- Mechanic
 - Ability: May use the Repair ability in a fully functional room to heal 1 Mech Hull Point
- Deadeye
 - Ability: When rolling for any attack, you may reroll up to 1 die.
- Brute
 - Ability: Begins the game with 2 additional HP
- Doctor
 - Ability: Once per turn, as an action, you may heal yourself or a crew member in the same room by 1 HP.
- Firefighter
 - Ability: Once per turn, as a free action, you may extinguish a room this character is in.
- Prepper
 - Ability: May hold up to 3 Item cards instead of 2.
- Berserker
 - Ability: As long as you are wounded, you gain +2 Attack.
- Scout
 - Ability: Once per round, you may move as a free action.

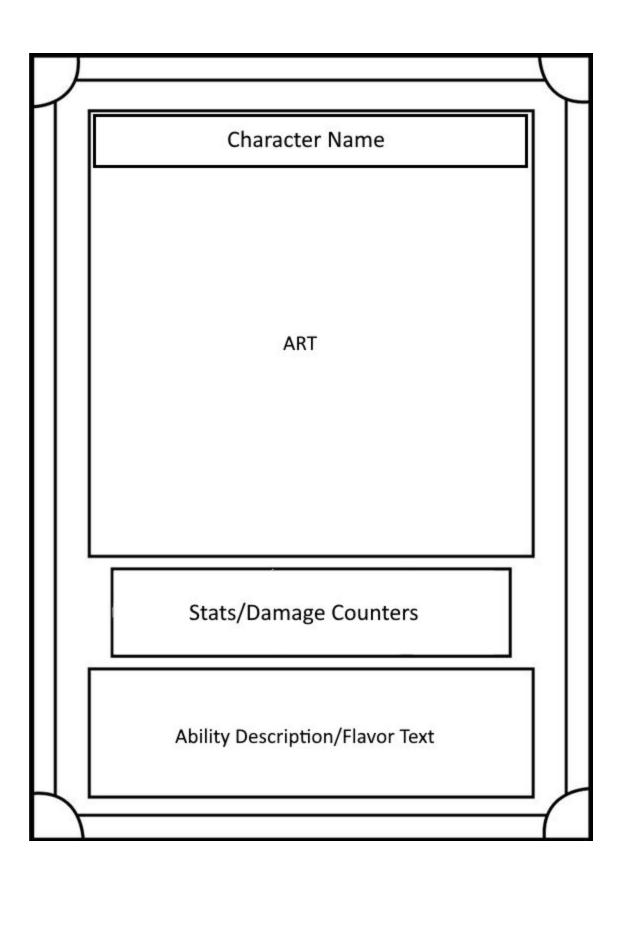
Card Blueprints and Examples:

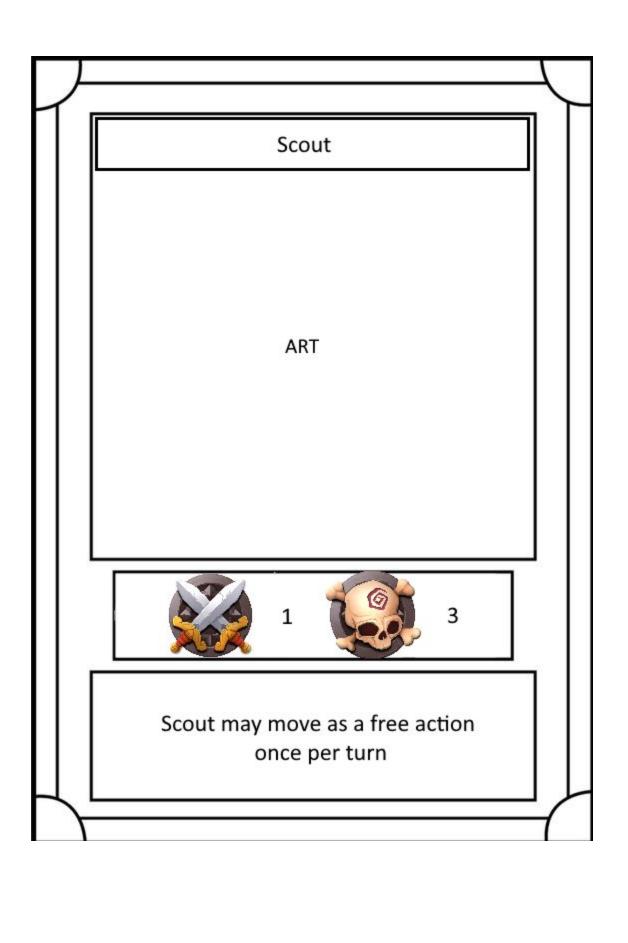


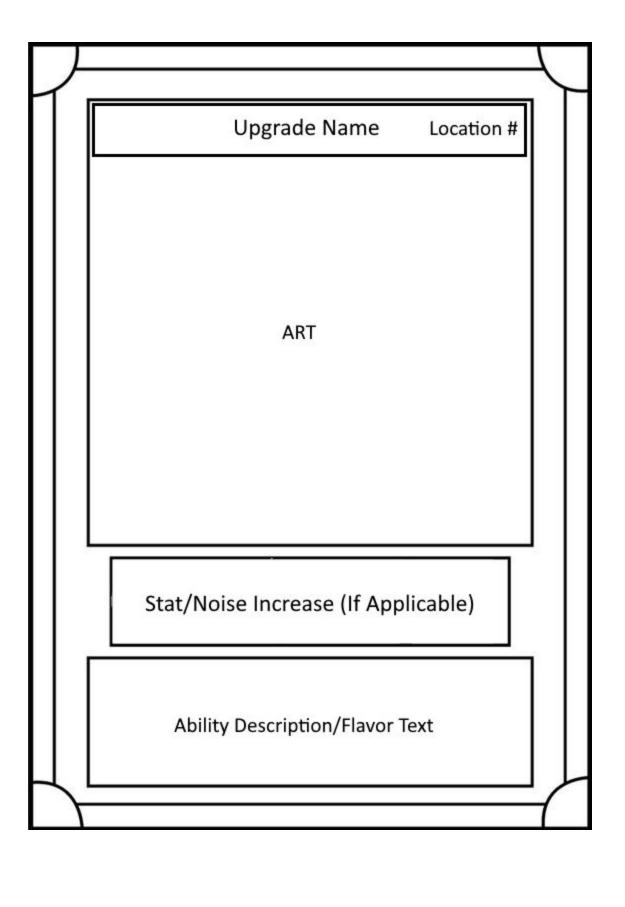


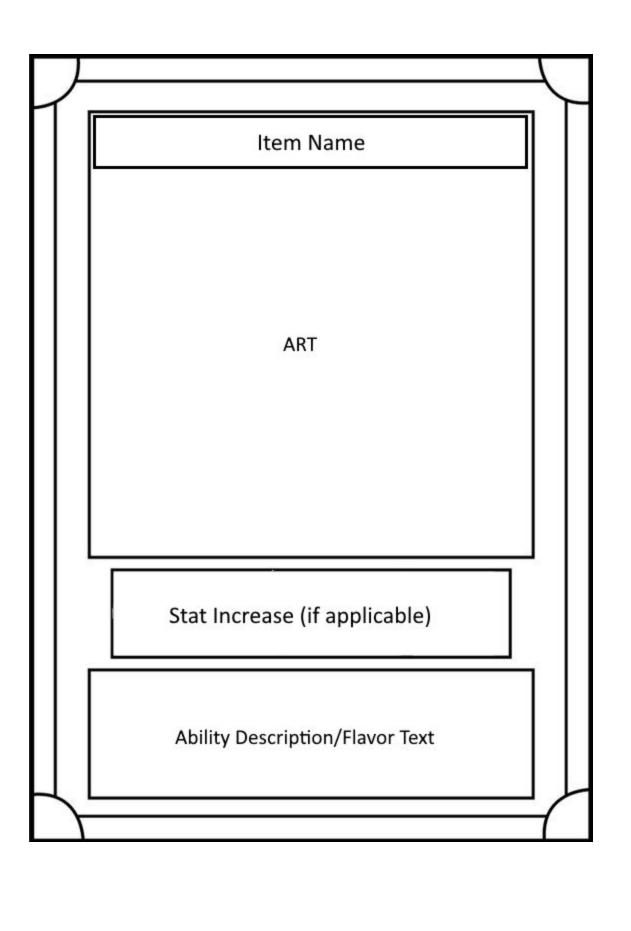


Monstrous Cur that have been transformed by the horror of the Wastes. Beware the pack that follows the lone wolf.









Post-Mortem:

Working on this project has been a massive pleasure for me; one of the few bright spots that has come out of online learning and the stay-at-home orders. Being able to put into practice many of the things I've learned through my Digital Humanities major and Business minor, including game design, marketing, and research has helped further cement my excitement when it comes to future career possibilities. Of course, as with any large-scale project, my Capstone wasn't nearly as simple as I'd hoped it would be. My biggest hurdle was getting a sense of scale, and learning how to "kill your darlings". Initially, my plans for the game were much bigger: More enemies, more mechanics, and systems to reward the player for being victorious in combat were all in the rough draft. Many of these even made it into the first prototype for testing. Unfortunately, partly due to time constraints, partly due to the limitations of being at home, and partly due to a feeling of directionlessness and too much going on in that first playtest, many of the things I'd initially wanted to include had to be scrapped for the sake of the game's health, or had to be shoved back past the more prototypical stage. This was tough, but I think by chipping away at these ideas until the core gameplay loop became apparent, it ultimately ended with a much more enjoyable final product. If there was anything I would want to add back in from that stage, it would be some kind of "final boss" mechanic. The Waste of Parts is heavily inspired by Rogue-Like video games; in many of those kinds of games, you begin at your weakest point and slowly scale up in hopes of defeating a final boss as a sort of cathartic end. I do have plans on continuing to expand this game and hopefully publish it in the future, after refinement. Overall, I'd say I had a very positive experience with this project and the Capstone Elective as a whole. Actually being able to put into practice that which I've learned at IIT has helped encourage that I'm in the right field, and the right school.