


MICROPLASTIC WORLD

A circular image of the Earth, showing the continents in green and the oceans in blue. The entire image has a crumpled, translucent plastic texture overlaid on it, giving it a three-dimensional, tactile appearance. The globe is centered against a dark blue background filled with numerous small, bright blue stars and a few larger, four-pointed starburst patterns.

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COOPERATIVE GAME



30 MINUTES



2 TO 6 PLAYERS



RECOMMENDED FOR AGES 10 AND UP

Summary

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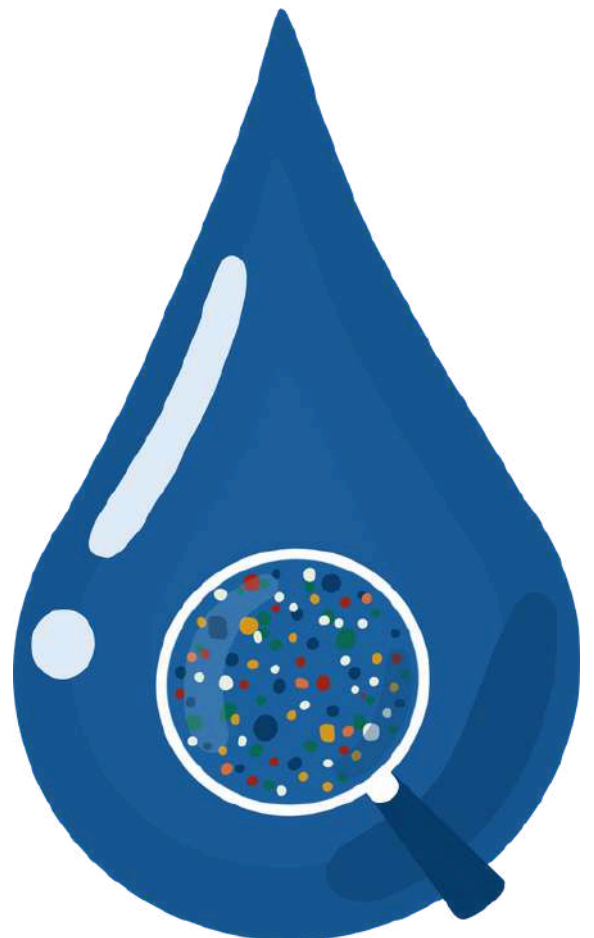
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Overview

The year is 2057 and the world is suffocating from plastic.

150 years ago, chemist Leo Baekeland created plastic produced from petroleum. Due to its characteristics such as high electrical resistance, lightness, malleability and low cost, it contributed to the emergence of new materials that were and continue to be fundamental to the technological development of our society.

The same characteristics that make plastic an industrial phenomenon make it an environmental problem because, due to its high resistance, it takes hundreds of years to degrade and it has been a little over 100 years since we started consuming these synthetic polymers. In other words, in less time than it takes for plastic to degrade, we have already dumped enough to start covering our oceans and generating harmful effects on living beings and the environment.

Therefore, the excessive consumption and disposal of these materials has resulted in an accumulation of plastic on the planet, making it increasingly a world made of plastic.

Furthermore, plastic pollution has worsened due to its fragmentation, generating microplastics. These microplastics are also produced as raw material for larger plastic objects (pellets), to make exfoliating personal cleaning products, synthetic fabric clothing and abrasive cleaning materials, for example.

Overview

Because they are so small, they spread easily, invaded our food, and were absorbed by our bodies, in addition to other harmful effects suffered by living beings and the environment. This means that we are in a time where the effects of plastic are increasingly apparent.

The prediction is that if nothing is done, by the year 2117, many of us, living beings, will be dead. Therefore, humanity needs to work together to prevent the worst from happening: the end of the planet and of many living beings because of plastic and microplastics.

The world has no more room for plastic, so we need to learn to reuse the ones that are already available to us, so that society can continue to enjoy the benefits of plastics, avoid their disposal in nature and the generation of microplastics. In addition, we can no longer generate microplastics. They need to be replaced by another type of material that does not negatively affect the environment.

To this end, you are being called to form a team of professionals from all over the world who have been hired to try to solve this problem and you need to, together, achieve these two goals: to end the production of plastic and to end the production of microplastics.

If these two goals are not achieved within 60 years, there is not much we can do and you lose the game!

Game Components

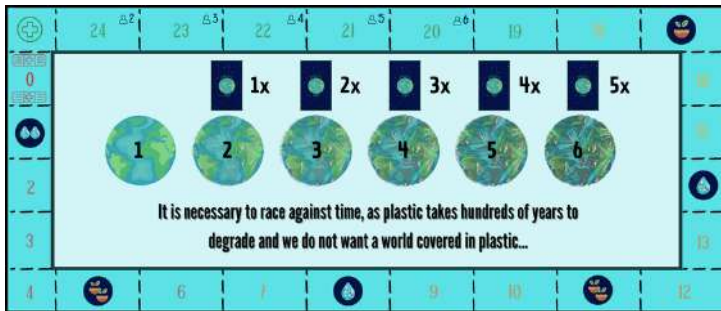
Main Board - map:



18 Solution Cards:



Rounds and health board:



15 Health Effect Cards:



25 Product Cards:



30 microplastics tokens:



20 microplastics biodegradable tokens:



Game Components

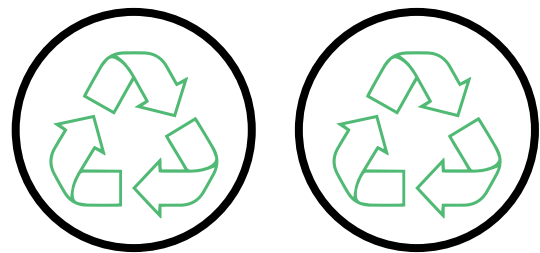
6 Professional Cards:



6 Resume Cards:



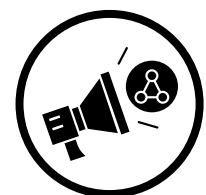
Plastic and microplastic generation tokens:



Round token:



Scientific dissemination profession tokens:



Health token:



Meeples:



Set-up

Players components

Everyone chooses a character, a meeple in the chosen character's color, and a card with a summary of the actions. Then, each player chooses a different continent to start the game and places their meeple in that location.

Product cards:

Shuffle the cards containing products containing plastic (green) and products containing microplastic (blue) separately in the decks next to the boards.

Solution cards:

Shuffle all the solution cards, give one card to each player, and place the remaining cards face down next to the boards.

Set-up

Health Effect Cards:

Shuffle all the cards and place them next to the boards.

Tokens:

The round token should be placed on the first space. The health token should be placed on the space corresponding to the number of players, as indicated on the board. The product token should be placed as follows: on the 1st spaces for 6 players; on the 2nd spaces for 5 players; on the 3rd spaces for 4 players; on the 4th spaces for 3 players; and on the 5th spaces for 2 players.

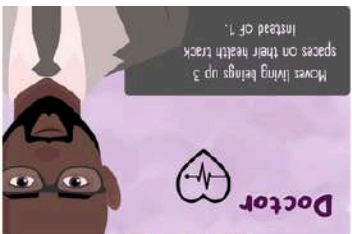
First products on the map:

Open 5 cards of products containing plastic and 2 of products containing microplastic and place the tokens in the spaces indicated on the cards. The cards should be returned to the bottom of their respective decks.

GAME SET-UP - FOR 6 PLAYERS

Doctor

Moves living beings up 3 spaces on their health track instead of 1.




Garbage Collector

You can recycle 3 plastics instead of 1, on the continent you are present on.



Resistant Actions

On your turn, you can do any of the following actions:

- 1. Remove 1 plastic from the board.
- 2. Remove 1 plastic from the board and place it in the trash.
- 3. Remove 1 plastic from the board and place it in the trash.
- 4. Remove 1 plastic from the board and place it in the trash.
- 5. Remove 1 plastic from the board and place it in the trash.
- 6. Remove 1 plastic from the board and place it in the trash.
- 7. Remove 1 plastic from the board and place it in the trash.
- 8. Remove 1 plastic from the board and place it in the trash.
- 9. Remove 1 plastic from the board and place it in the trash.
- 10. Remove 1 plastic from the board and place it in the trash.



It is necessary to race against time, as plastic takes hundreds of years to degrade and we do not want a world covered in plastic...

Round 1x 2x 3x 4x 5x

2 3 4 5 6



Scientific Disseminator

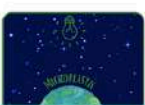
Use one of your two actions to decrease by 1 the number of plastic or microplastic cards that will enter your next turn.



Resistant Actions

On your turn, you can do any of the following actions:

- 1. Remove 1 plastic from the board.
- 2. Remove 1 plastic from the board and place it in the trash.
- 3. Remove 1 plastic from the board and place it in the trash.
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- 10. Remove 1 plastic from the board and place it in the trash.



Scientist

It can remove 3 microplastics instead of 1 from an ocean adjacent to the continent it is present in.



Resistant Actions

On your turn, you can do any of the following actions:

- 1. Remove 1 plastic from the board.
- 2. Remove 1 plastic from the board and place it in the trash.
- 3. Remove 1 plastic from the board and place it in the trash.
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- 10. Remove 1 plastic from the board and place it in the trash.



Public Representative

Disarm two soldiers and from the same profession to decrease the plastic production level by 1 and the microplastic production level by 1.



Resistant Actions

On your turn, you can do any of the following actions:

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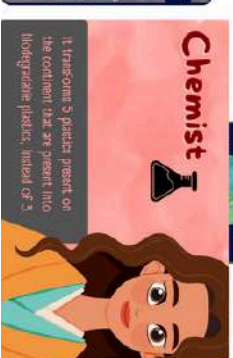
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- 10. Remove 1 plastic from the board and place it in the trash.

Chemist

It transforms 3 plastic present on the continent that are present into biodegradable plastics, instead of 3.




How to play?

The main objective of the game is to reduce the level of microplastic generation to zero and plastic generation to the last space, while at the same time reducing recycling to a maximum.

Plastic generation

Microplastic generation



How to play?

The number above the plastic and microplastic generation spaces represents the consumption of these products and shows how many product cards should be entered at the beginning of each round. The number of cards that enter is the number that is in the same space on the token.

In this example, 5 cards of products containing plastic (green) and one card of a product containing microplastic (blue) are opened.



The (+1) on the last plastic production space means that when the marker is there, all players can recycle an extra plastic from the continent.

The plastic consumption figure does not change. What changes is the origin of the plastic, which as the marker goes down, represents an increasing consumption of recyclable origin.

How to play?



In the game all players follow the following steps:

1

CHOOSE TWO ACTIONS OUT OF FIVE POSSIBLE;

2

TAKE A SOLUTION CARD FROM THE DECK.



The 5 actions that can be performed by players are:

1

TRAVEL FROM ONE CONTINENT TO ANOTHER.

2

DONATE A CARD TO ANOTHER PLAYER WHO IS ON THE SAME CONTINENT AS HIM.

3

INCREASE THE HEALTH LEVEL OF LIVING BEINGS BY 1 ON THE HEALTH BOARD.

4

SOLUTION: DISCARD 2 SOLUTION CARDS FROM THE SAME PROFESSION TO ADVANCE RECYCLING BY 1 OR DECREASE MICROPLASTIC PRODUCTION BY 1.

5

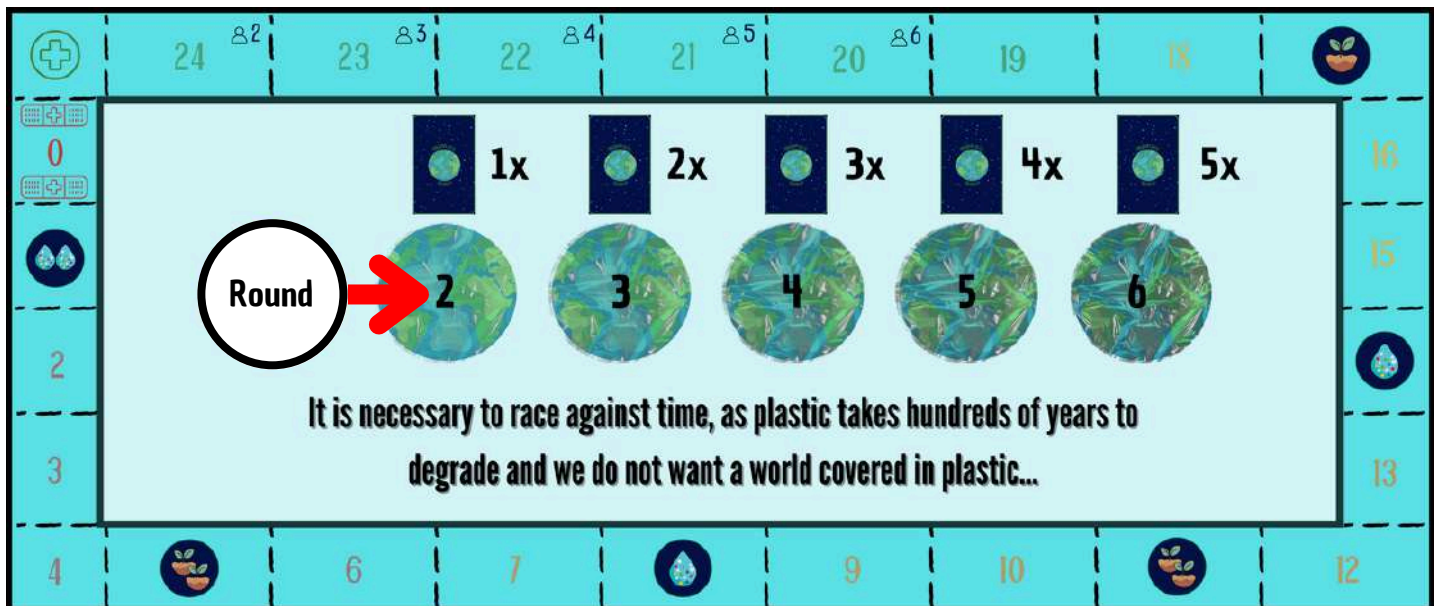
PERFORM ONE OF THE FOLLOWING ACTIONS:

- REMOVE 1 MICROPLASTIC FROM THE OCEAN ADJACENT TO THE CONTINENT THE PLAYER IS ON.
- RECYCLE 1 PLASTIC FROM THE CONTINENT THE PLAYER IS ON.
- TURN 3 PLASTICS INTO BIOPLASTIC FROM THE CONTINENT THE PLAYER IS ON.

Game stages



Move the round token to the round that will start.



Open the number of health effect cards indicated on the top of the round tokens.

For example: in round 2, open one health effect card. In round 4, open 3 health effect cards.

In the first round, no cards are opened.



Using the health token, reduce the health level of living beings equal to the sum of the value that appears on all health effect cards opened in that round.

The health track is located around the round board.

NOTE: Every time the token passes through the earth symbol 🌍 and the drop symbol 💧, it must open the number of product cards equal to the number of symbols in the space and that have the same symbol.

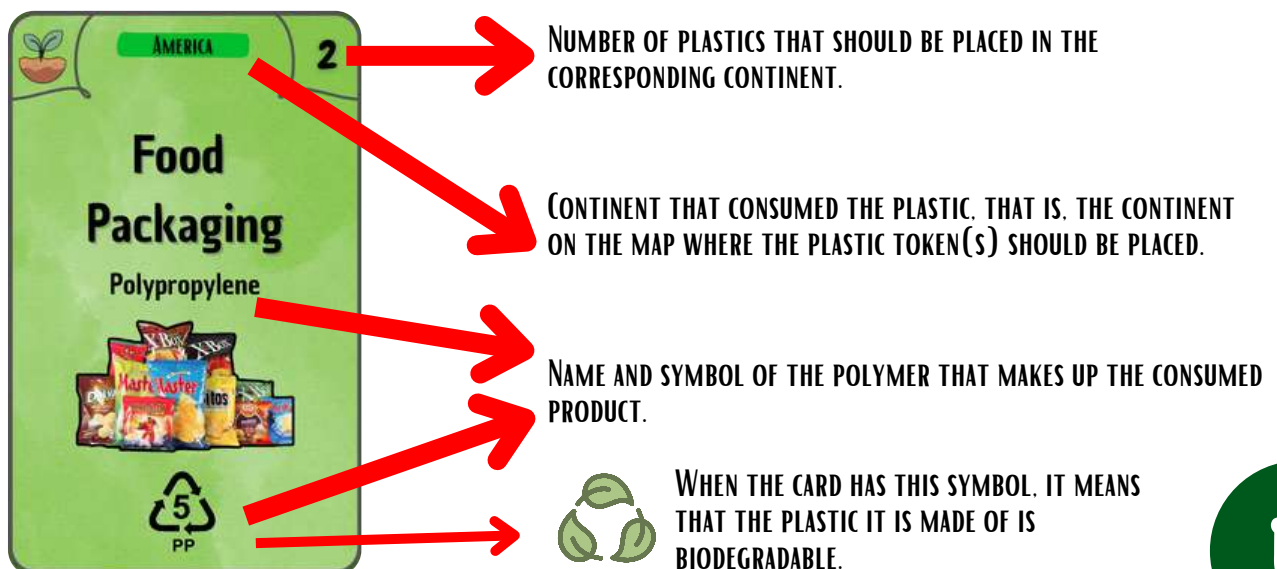
Game stages

Example of health effect cards:



IN THIS EXAMPLE, YOU ARE STARTING ROUND 4 AND HAVE OPENED THESE HEALTH EFFECT CARDS. THEREFORE, THE HEALTH TOKEN SHOULD DECREASE BY 7 SPACES.

- ➡ Open the cards of products containing plastic and microplastic according to the number that appears in the plastic and microplastic generation range.
- ➡ Place plastics on the continents and microplastics in the oceans, as indicated on the product cards opened in the round.



Game stages



NUMBER OF MICROPLASTICS THAT SHOULD BE PLACED IN THE CORRESPONDING OCEAN.

OCEAN THAT RECEIVED THE MICROPLASTIC, THAT IS, THE OCEAN ON THE MAP WHERE THE MICROPLASTIC TOKEN(S) SHOULD BE PLACED.

NAME AND SYMBOL OF THE POLYMER THAT MAKES UP THE MICROPLASTIC IN THE CONSUMED PRODUCT.



After placing the plastic and microplastic tokens on the map, it is time for players to carry out their actions and then take a solution card.



After all players have finished their turn, all plastic remaining on the continents must be placed on the ocean spaces adjacent to the continent that has the plastic. This represents that the plastic consumed on land is being sent to the oceans and to become secondary microplastics, due to its fragmentation.

Special case: Biodegradable plastics are only in the game for two rounds. After the first round, turn the biodegradable microplastic token over to its back, indicating that it will be removed at the end of that round.

Attention: if an ocean is completely occupied, the health of living beings is further harmed and the token decreases by 3 spaces on the health track.

Ending Game

One way for the game to end is to reach the objective, that is, to make the product generation markers reach the last space, reducing the generation of primary microplastics and ensuring that the plastics we consume are of recyclable origin. In this case, the game ends with the players victorious.

However, there are some ways the game can end with players in a losing condition. They are:

- ➡ If the number of rounds exceeds 6 without solving the problem, that is, without placing the tokens in the last spaces for generating plastic and microplastic;
- ➡ If the health gauge reaches zero;
- ➡ If all ocean spaces are filled.



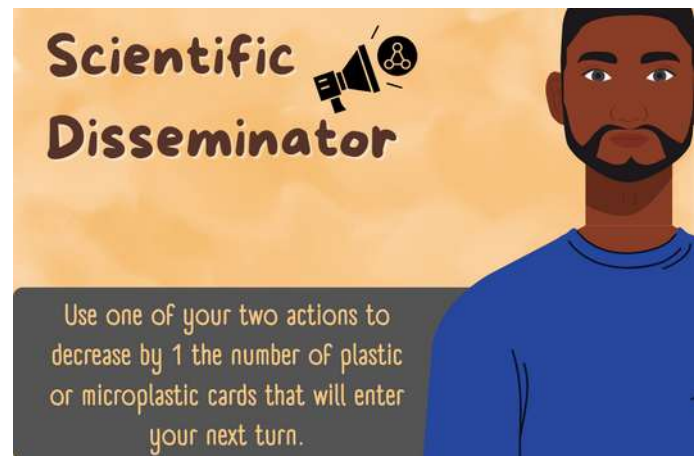
Professional Cards

Before players choose which professional they will play as, they need to understand how the game works and the function of each profession.

All profession cards have two sides with different genders, however the function is the same.




Scientific disseminator:




The scientific dissemination card comes with a marker to be placed either in the plastic generation lane or in the microplastic generation lane, indicating that in the next round one less card will be entered than indicated in the marker space.

Professional cards

➡ Scientist:

Scientist 




It can remove 3 microplastics instead of 1 from an ocean adjacent to the continent it is present in.


Scientist 




It can remove 3 microplastics instead of 1 from an ocean adjacent to the continent it is present in.


➡ Chemist:

Chemist 



It transforms 5 plastics present on the continent that are present into biodegradable plastics, instead of 3.

Chemist 



It transforms 5 plastics present on the continent that are present into biodegradable plastics, instead of 3.

➡ Public Representative:

Public Representative 



Discard two solution cards from the same profession to decrease the plastic production level by 1 and the microplastic production level by 1.

Public Representative 



Discard two solution cards from the same profession to decrease the plastic production level by 1 and the microplastic production level by 1.

Professional Cards



Garbage Collector:

Garbage Collector 

You can recycle 3 plastics instead of 1, on the continent you are present on.



Garbage Collector 

You can recycle 3 plastics instead of 1, on the continent you are present on.



Doctor:

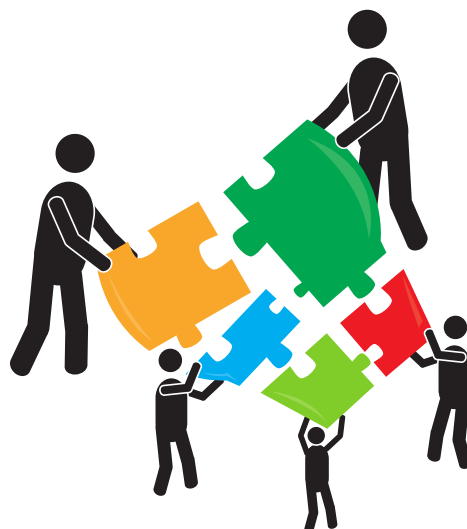
Doctor 

Moves living beings up 3 spaces on their health track instead of 1.



Doctor 

Moves living beings up 3 spaces on their health track instead of 1.



“Print and Play”

To access all the Microplastic World components, ready to print, simply access the link or QR code below. Meeples can be easily found for purchase, can be reused from other games or can be various materials that are no longer used, such as plastic bottle caps, for example.



Cards



Board



Microplastic tokens

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