

ECOLOGICAL TRANSFORMATION : “are we (still) ready ?”

BAROMETER OF THE ECOLOGICAL TRANSFORMATION - 2024 EDITION

SAUDI ARABIA 



ELABE

WHY THE BAROMETER OF THE ECOLOGICAL TRANSFORMATION?

The debate around ecology has entered a new phase which is struggling to be structured on common basis. If there is a consensus on the risks for the planet and for all humankind, the solutions to reduce our impact are still little debated and dividing.

IPCC reports, climate strategies, the Green New Deal, the COP: there are **many proposals** to fight climate change, biodiversity loss and pollution. **But as half the people on the planet are about to vote in 2024, voices are raising around the world calling for a sharp slowdown of the ecological transition and gathering under a new banner: the ecological pause.** The large-scale adoption and deployment of ecological solutions raise a decisive question: **are the needed changes to win the "battle of the century" socially, economically and culturally acceptable to human communities?**

This question is at the heart of the Barometer of the ecological transformation carried out with a sample covering **more than half of the world's population** on the 5 continents.

This barometer aims to **make the public debate concrete** by working on **solutions**, and to understand **the obstacles and levers** of their **acceptability** to accelerate the transition.

3 thematic axes

Decarbonisation

Decontamination

Resources
regeneration

A novel angle : **acceptability of ecological solutions and desirability of the transition**

What are the **psychological, economic and cultural obstacles** to adopt ecological solutions?

How do we arbitrate between **the cost of action and the cost of inaction?**

Why are we prepared to **bear or accept the cost of ecological transformation?** What are the **objectives and benefits that make people want to make the ecological transition?**

Methodology



Target countries

A survey carried out in **26 countries on 5 continents**, involving over **29,500 individuals** (between **1,000 and 2,000 per country**). **1 500 individuals** were surveyed in **Saudi Arabia**. The countries were chosen for their demographic weight, their weight in GHG emissions and to ensure a diversity of ecological political and cultural histories. Overall, these countries represent nearly **60% of the world's population**, **67% of global GHG emissions** and **77% of global GDP**. [See details on the next page.](#)



Collection method and field dates

An **online** survey conducted from **17 October to 6 December 2023**. In Saudi Arabia, the survey took place from **November 6 to 30, 2023**.



Sample representativeness

For **each of the 26 countries**, a **representative** sample of **residents aged 18 and over** was selected. Representativeness was ensured using the **quota method** applied to the following variables: **gender, age, socio-professional category or income** (depending on the country), **urban area** and **region of residence**.



Results "World Opinion"

To constitute the **results of the "world opinion"**, an **equivalence between countries was privileged** (each country counts for 1, no weighting according to the number of inhabitants). This choice was made to ensure that the diversity of countries is represented and thus avoid "world opinion" being only the average of the results of the most populous countries (China and India in particular).

« World opinion » is indicated with the world symbol. 







































Frequency of the barometer

Every 18 months. This is the **2nd edition**. The questions common to the 2 editions and showing significant changes (+ / - 3 % points) are indicated **↑+3 ↓-3**

A global scope



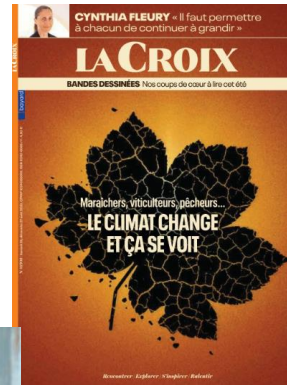
				Number of people interviewed	Pop. of the country on global pop.	Share of the country in global GHG emissions	Share of world GDP
			TOTAL	29 500	59,2%	67,0%	77,0%
AFRICA							
1		CIV	Ivory Coast	1 000	0,4%	0,1%	0,1%
2		MAR	Morocco	1 500	0,5%	0,2%	0,1%
3		NGA	Nigeria	1 000	2,8%	0,8%	0,4%
AMERICA							
4		BRA	Brazil	1 000	2,7%	2,4%	2,0%
5		CHL	Chile	1 000	0,2%	0,3%	0,3%
6		COL	Colombia	1 000	0,6%	0,4%	0,3%
7		USA	United States	2 000	4,2%	11,2%	25,8%
8		MEX	Mexico	1 000	1,6%	1,5%	1,7%
EASTERN ASIA							
9		CHN	China	1 000	17,6%	29,2%	16,9%
10		IND	India	1 000	17,8%	7,3%	3,6%
11		IDN	Indonesia	1 000	3,4%	2,3%	1,4%
12		JPN	Japan	1 000	1,5%	2,2%	4,0%
EUROPE							
13		DEU	Germany 	1 000	1,0%	1,5%	4,2%
14		BEL	Belgium 	1 000	0,1%	0,2%	0,6%
15		ESP	Spain 	1 000	0,6%	0,6%	1,5%
16		FRA	France 	1 000	0,8%	0,8%	2,9%
17		NOR	Norway 	1 000	0,1%	0,1%	0,5%
18		HUN	Hungary 	1 000	0,1%	0,1%	0,2%
19		ITA	Italy 	1 000	0,7%	0,7%	2,1%
20		NDL	Netherlands 	1 000	0,2%	0,3%	1,0%
21		POL	Poland 	1 000	0,5%	0,7%	0,8%
22		CZE	Czech Republic 	1 000	0,1%	0,2%	0,3%
23		GBR	United Kingdom	2 000	0,8%	0,8%	3,2%
MIDDLE EAST							
24		SAU	Saudi Arabia	1 500	0,5%	1,5%	1,0%
25		UAE	United Arab Emirates	1 500	0,1%	0,5%	0,5%
OCEANIA							
26		AUS	Australia	1 000	0,3%	1,1%	1,6%

**Ecology,
do we stop
or do we go further ?**



The planet is burning, humankind is suffering: the collapse has begun

Since November 2023, **dozens of municipalities in the regions of Nord and Pas de Calais (France) have been hit by successive floods**, leading to power cuts, evacuations and restrictions on the use of water. Soil was waterlogged and overflowing rivers flooded crops. The subsiding of floodwater is making it much harder for farmers to get back to normal, and to rotate their crops. **With global warming, the increase in rainfall is set to become stronger**, increasing the risk of a recurring situation.



In August 2023, **Iran became the first country in the world to shut down due to high temperatures**, sometimes exceeding 50 degrees. The authorities instituted two public holidays and closed public infrastructures, banks and some businesses. **The number of consultations at medical centres has tripled** due to the heatwave.



According to the European Copernicus programme, **2023 was the hottest year on record**. The average annual temperature reached 14.98°C, with peaks of 53°C in Death Valley and 38°C recorded in the middle of winter in Argentina.

At this rate, **the climate in a city like Paris could be similar to Seville or Canberra by 2050**, with long heatwaves and temperature peaks over 50°C.

Our planet has just endured a season of simmering — the hottest summer on record. Climate breakdown has begun.

António Guterres, Secretary General of the United Nations



In France, **Rumilly (Haute-Savoie) is one of 17,000 European sites contaminated by eternal pollutants**. The town's water supply had to be cut off, and large quantities of PFOA were found in the blood of some residents. In December 2023, the International Agency for Research on Cancer classified PFOA as "carcinogenic to humans".

Fine particle pollution, emitted by motor vehicles, industry and fires, represents "the greatest external threat to public health" according to the Energy Policy Institute of the University of Chicago (EPIC).

In New Delhi (India), one of the world's most polluted cities, **the average person loses 12 years of life expectancy due to air pollution**.



In August 2023, **Maui (Hawaii) burns down**. The town of Lahaina was nearly razed to the ground. 100 people died and around thirty disappeared. **It was one of the deadliest fires in the United States**, and the rebuilding costs exceeded 5.5 billion dollars, according to the authorities.

According to scientist Raul R. Cordero, **"a change of a few degrees in the tropical Pacific can make the difference between a relatively calm forest fire season and a widespread disaster"**.

Since the beginning of February, **Chile has been experiencing "the greatest climatic tragedy for more than ten years"**, according to President Gabriel Boric. The country is facing violent fires fuelled by extreme temperatures and violent winds during an intense drought. The climate situation has been intensified by the natural phenomenon El Niño (which causes a rise of sea and atmospheric temperatures). More than 43,000 hectares of forest went up in smoke, thousands of homes were destroyed and 122 people died.

Health and quality of life, the first victims on the Saudi front of ecological and climatic insecurity

All over the world, the litany of record-breaking temperatures continues to grow, with loss of life, health damage and material damage caused by extreme weather events. Countries that have historically been the most vulnerable (low GDP, difficult access to essential services such as water, etc.) and developed countries that have long felt 'safe', protected by their economic development and infrastructures, are now united by the same ecological fear.

48% of Saudi Arabia residents feel exposed and vulnerable to a risk linked to climate change or pollution. Residents with the highest incomes feel more exposed and vulnerable to threats, whether health-related or material.

17 points below the world average (65%), Saudi Arabia's ecological and climate insecurity is the second lowest level recorded (48%, the only country with Norway to have less than 1 in 2 inhabitants vulnerable), and much lower than that of its neighbour, the United Arab Emirates (60%).

South America, Asia, Southern and Eastern Europe are the regions of the world with the highest levels of perceived vulnerability (>66% and up to 82% in Brazil).



46% feel **exposed and vulnerable** to **a deterioration in their quality of life**

68%

♂ 51% (+11 vs 40% women)

👤 37% 18-24 yo (-14 vs 51% 25+ yo)

💰 56% Affluent populations (+16 vs 40% low-income populations)



51%

71% ↓ -3

Increasingly harsh living conditions

49%

↑ +3 66%

Property damage caused by natural disasters

47%

70% ↓ -4

Degradation of the ecosystem, the biodiversity

46%

68%



Resource scarcity and depletion

43%

64%



Lack of food and/or poor-quality food

43%

67% ↓ -4

Migratory movements



50% feel **exposed and vulnerable** to **a health risk**

64%

♂ 52% (+6 vs 46% women)

👤 42% 18-24 yo (-12 vs 54% 25+ yo)

💰 58% Affluent populations (+14 vs 44% low-income populations)



52%

66%

Falling ill owing to pollution

51%

64%



Poorer health due to the reduced nutritional quality of food

49%

68%



Increase of infectious diseases

47%

58%



Mental health problems

Question : When you think about the risks related to climate disruption and pollution (water, air, soil), do you... personally feel exposed and vulnerable to them? Feel that your country is exposed and vulnerable to them?

58% of Saudi Arabia residents are convinced that climate change is currently happening and that human activity is the main cause

Faced with the 'climate and ecological wall', **86% of Saudi Arabia residents are certain that climate change is underway**. However, its anthropogenic origin is still the subject of debate among 28% of them: 18% support the theory of a strictly natural phenomenon, while 10% argue that it is impossible to identify the cause. Already among the small number of countries with more than 25% sceptics or deniers in 2022 (1st edition of the Barometer), **climate deniers have not gained a single vote in Saudi Arabia in 18 months. The majority of sceptics are under 25 and on the country's lowest incomes.** On the other hand, they have recruited in large numbers in 14 of the 26 countries covered by the Barometer, particularly among the lowest income groups and among conservative and right-wing populist sympathisers and voters in the UK (+5), Eastern Europe (+10 and +5 in Poland and the Czech Republic), Africa (+8 in Ivory Coast) and Australia (+6). 13 of the 26 countries - the UK, USA, Australia and in Africa, Eastern Europe and the Middle East - now have between 26% and 43% of people who dispute whether man is responsible for global warming, or whether it even exists.

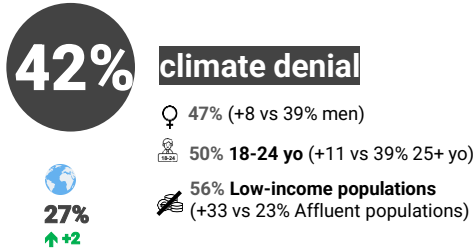
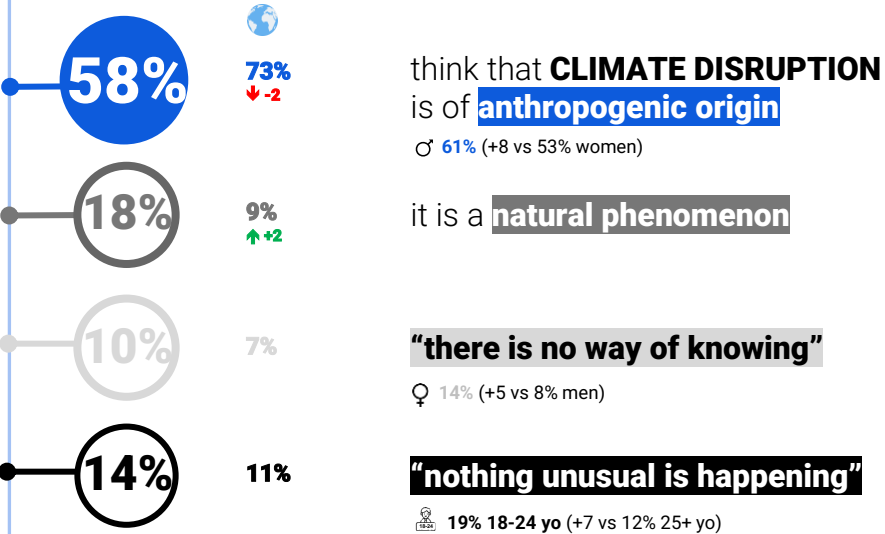


86%

89%

share the certainty that a **CLIMATE DISRUPTION** is **CURRENTLY HAPPENING**

81% 18-24 yo (-7 vs 88% 25+ yo)
 93% Affluent populations (+13 vs 80% low-income populations)



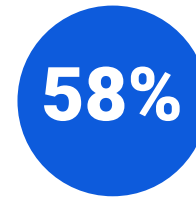
Question : Would you personally say that climate disruption is currently happening on our planet?

The temptation of ecological fatalism



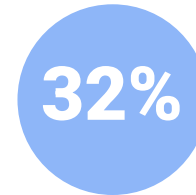
As in 2022, **Saudi Arabia is split in two, between those who believe in ecological fatalism** (a third of the population have doubts and a minority of 9% are resigned) **and those who are convinced that we are still masters of our own destiny**, capable of limiting climate change and pollution (58%, rising to 70% among the wealthy).

Optimism and determination are clearly in the majority in Asia (excluding Japan), Africa and South America, Italy and Poland (> 60%), but the temptation to fatalism is growing on every continent. **Resignation is particularly prevalent among the lowest income groups** in Asia, Africa, South America and Central Europe (+15 to +20 points of doubt in 18 months).



think that
the future is still in our hands,
we can still limit climate disruption and pollution

70% Affluent populations (+17 vs 53% low-income populations)



have a **doubt**



think it is **too late**

1% no answer

Question : And do you think we still have the future in our hands, that we can still limit climate disruption and pollution, or is it too late?

Ecological transition: appropriate action, but a failing ecological imaginary

Saudi fatalism is partly fuelled by the failure of the ecological imaginary: while nearly 8 out of 10 Saudi Arabia residents believe that **action and investment in favour of the ecological transition are commensurate with the risk in their country, a majority still fails to imagine the post-carbon world and its daily life.** Of the 26 countries included in the Barometer, only Colombia (50%) and India (63%) have a majority of inhabitants capable of imagining the tangible benefits of ecological and climate action.



78%

65%

believe that **action and investment to promote ecological transformation** in Saudi Arabia are **commensurate** with the risk that pollution, climate change and the depletion of natural resources pose to their health and quality of life

22%

35%

not commensurate with the risk

28% Low-income populations
(+9 vs 19% Affluent populations)

Question : In your opinion, is action and investment in supporting ecological transformation in your country **commensurate** with the risk that pollution, climate disruption and the depletion of natural resources poses to your health and quality of life?

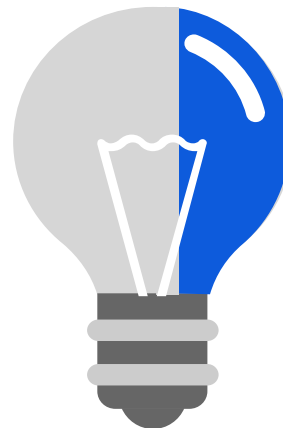


57%

62% ↑ +2

find it **difficult to imagine** what daily life could be like after **ecological transformation**

61% 18-24 yo (+5 vs 56% 25+ yo)



40%

37% ↓ -2

find it **quite easy** to imagine

Question : When you hear that we need to change a number of things in society and in our lifestyles to limit climate disruption and reduce pollution, do you find it easy or difficult to imagine what daily life could be like if we achieved the ecological transformation?

The ecological pause, a dead end?

Environmental regulations are dividing and polarising public opinion. All over the world, voices opposing social policy and ecological action are rising to encourage "pragmatism", to put the consequences of the climate crisis into perspective and to call for an "ecological pause".

But global warming is accelerating. Without a major reduction of emissions, the 1.5 degree threshold could be exceeded in 2030, with all the connected human and economic costs. Yet the sums needed "to adapt to global warming are ten to eighteen times greater than current international public financial flows", i.e. 203 to 365 billion euros each year (UNEP).

Ecology is a new political crest line, as half the world's voting age population is called to the polls (4.1 billion people) in nearly 70 countries: Russia, Belarus, South Africa, South Korea, Taiwan (presidential and legislative elections), Iran, Pakistan, India, the world's most populous country (legislative elections), the American superpower (presidential elections), the largest trading bloc (European elections), Indonesia (legislative elections), Mexico, the largest Spanish-speaking country (presidential elections).

In January 2024, the Norwegian parliament authorised mining prospecting on 280,000 km² of its seabed with the aim of finding reserves of increasingly coveted minerals (cobalt, zinc, copper).



In September 2023, Rishi Sunak, the British Prime Minister, announced that he was "adopting a more pragmatic, proportionate and realistic approach to achieving carbon neutrality, which eases the burden on working people" by backing down on a number of green measures.



In March 2023, the Farmer-Citizen Movement (BBB) became the leading political force in the Dutch Senate, notably by representing the rural and agricultural world's opposition to the "nitrogen plan" (50% reduction in emissions by 2030).



In November 2023, Justin Trudeau's government in Canada announced a carbon tax exemption for Canadians who heat with heating oil, for the next 3 years (carbon pricing had been introduced in 2018).



In November 2023, Javier Milei was elected President of the Republic of Argentina, stating that "global warming is a lie".



In May 2023, French President Emmanuel Macron called for "a European regulatory pause" in terms of environmental constraints, so that the weight of standards does not slow down European economies.



During COP 28, India, which said it was in favour of tripling renewable energies by 2030, refused to join the 116 nations in ratifying an agreement because of restrictions on coal, calling for a "phasing out of coal-fired power generation".



While Anthony Albanese's Australian Labor government was talking about ambitious climate targets, the country continues to give major support to the coal and fossil fuel industries. According to the Australian Conservation Foundation, no fewer than "16 fossil fuel projects have been approved or received some form of support" since the government took office in 2022.

Inaction is still considered more costly than ecological action




Despite a decline in opinion since 2022 (-4), 60% of Saudi Arabia residents are now convinced that inaction will cost them more than taking ecological action (climate change deniers, who are numerous in the UAE, are themselves 45% to establish this cost/benefit ratio of ecological action). This puts the country in the bottom half of the world average (stable) and < 4 points behind the United Arab Emirates.

Asia, Africa, South America, Southern Europe and a large part of Central and Eastern Europe are the most categorical regions of the world (>60%). Arbitration is more cautious in the USA, Australia, the Czech Republic and the Netherlands (between 52% and 57%), but **remains overwhelmingly in favour of action everywhere.**

60%  -4  66%

are **certain** that

the **costs of the consequences**
of **climate disruption**
are going to be **greater than** the
investments needed for ecological transformation

 **54% 18-24 yo** (-8 vs 62% 25+ yo)

 **72% Affluent populations**
(+17 vs 55% low-income populations)

 **71% Believers in climate change** (+26 vs 45% climate sceptics)

Question : Experts say that the costs caused by the damage linked to climate disruption and pollution are going to be greater than the investments needed for the ecological transition of our societies. Do you personally feel that this fact is true or false?

The seriousness of the health threat has become a certainty

And mass poverty is a credible threat




67%  **75%**

are **certain** that

« **climate change is the greatest health threat facing humanity** »

World Health Organization, 2021

 **61% 18-24 yo** (-9 vs 70% 25+ yo)

 **74% Affluent populations**
(+9 vs 65% low-income populations)




57%  **74%**

are **certain** that

« **climate change is an acute threat to the poorest people across the world, with the potential to push more than 130 million people into poverty by 2030** »

World Bank, 2023

♂ **61%** (+11 vs 50% women)

 **66% Affluent populations**
(+14 vs 52% low-income populations)

Question : In a report published in 2021, the World Health Organization (WHO) said that climate change is the single biggest health threat facing humanity. Do you think this information is true or false?

The World Bank says that "climate change is an acute threat to the poorest people across the world, with the power to push more than 130 million people back into poverty by 2030". Do you think this information is true or false?



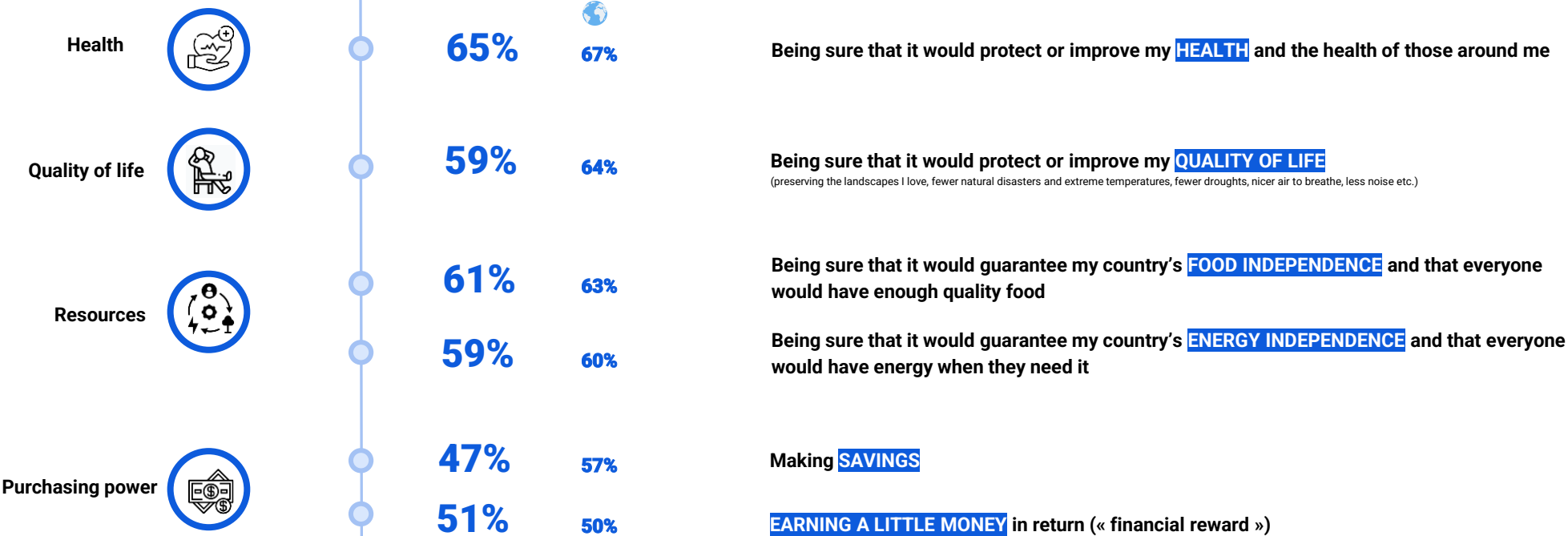
So, what do we do ?



Protecting health, quality of life, food and energy independence to make ecology desirable

In Saudi Arabia, as in all regions of the world, a desirable ecology is an ecology that protects : in the country, whatever the gender, generation or income level, protecting health and quality of life and contributing to food security and energy independence for human communities makes people want to act and consent to the additional costs and changes in behaviour brought about by most ecological actions, whether they aim to protect resources, decarbonise or depollute. The protection of purchasing power is a lever of consent to change, but in all categories of the population the prospect of a financial reward for encouraging change is significantly less motivating than the health benefits and the country's autonomy.

IT REALLY MAKES ME WANT TO DO IT

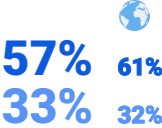


Question : The ecological transformation may lead us to change some of our behaviours, sometimes change the way we live or cost us a little more. What would encourage you to make these changes? What would make them easier for you or would justify the extra costs?



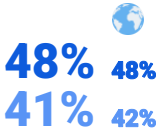
Concrete results, collective action et national pride to encourage change

Seeing results quickly, positive effects

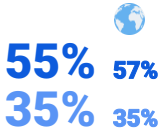
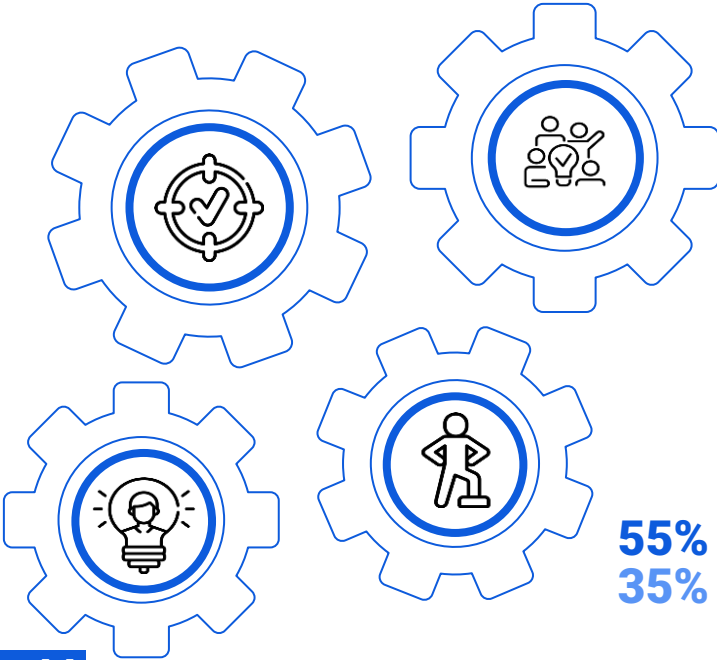


It really makes me want to do it
It may help, but it's not what's going to make me change

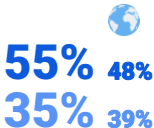
♀ 62% (+7 vs 55% men)



Understanding why I should give up certain things



Feeling like **everyone is doing their bit**, that there is a collective movement



The fact that **my country is at the forefront** of the ecological transition, **being proud of my country** and setting an example to other countries around the world

Question : The ecological transformation may lead us to change some of our behaviours, sometimes change the way we live or cost us a little more. What would encourage you to make these changes? What would make them easier for you or would justify the extra costs?

A joint commitment to find and implement solutions



Achieving tangible results in terms of health and quality of life is seen as dependent on the ability of stakeholders to work together, with each having a duty to act in accordance with their means and responsibilities.

Governments and **international institutions** are the players in the planning process, with a role to play in providing impetus and guidance through standards and regulations, both encouraging and constraining.

Local authorities are the architects of the territory, in the front line when it comes to preventing, adapting to and responding to risks.

Saudi Arabia residents are neither hesitant nor reluctant to give individual responsibility a key role. Despite the temptation of fatalism, climate denial and stowaway strategies, most are aware that the ecological transition will not happen without them.

Finally, **businesses** are the key players in innovation and the implementation of solutions.

Local authorities

92% incl. 52%
55% 18-24 yo
(-8 vs 63% 25+ yo)

International institutions

(UN, G20, WHO, etc.)
91% incl. 61%

Governments

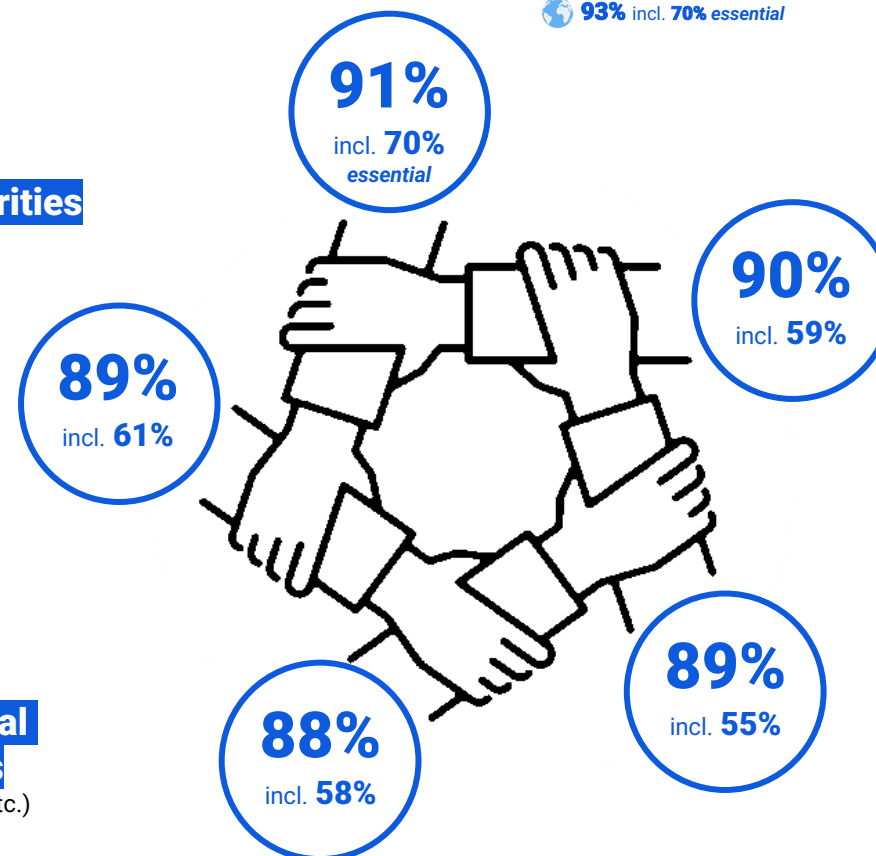
93% incl. 70% essential

Individuals

93% incl. 57%

Businesses

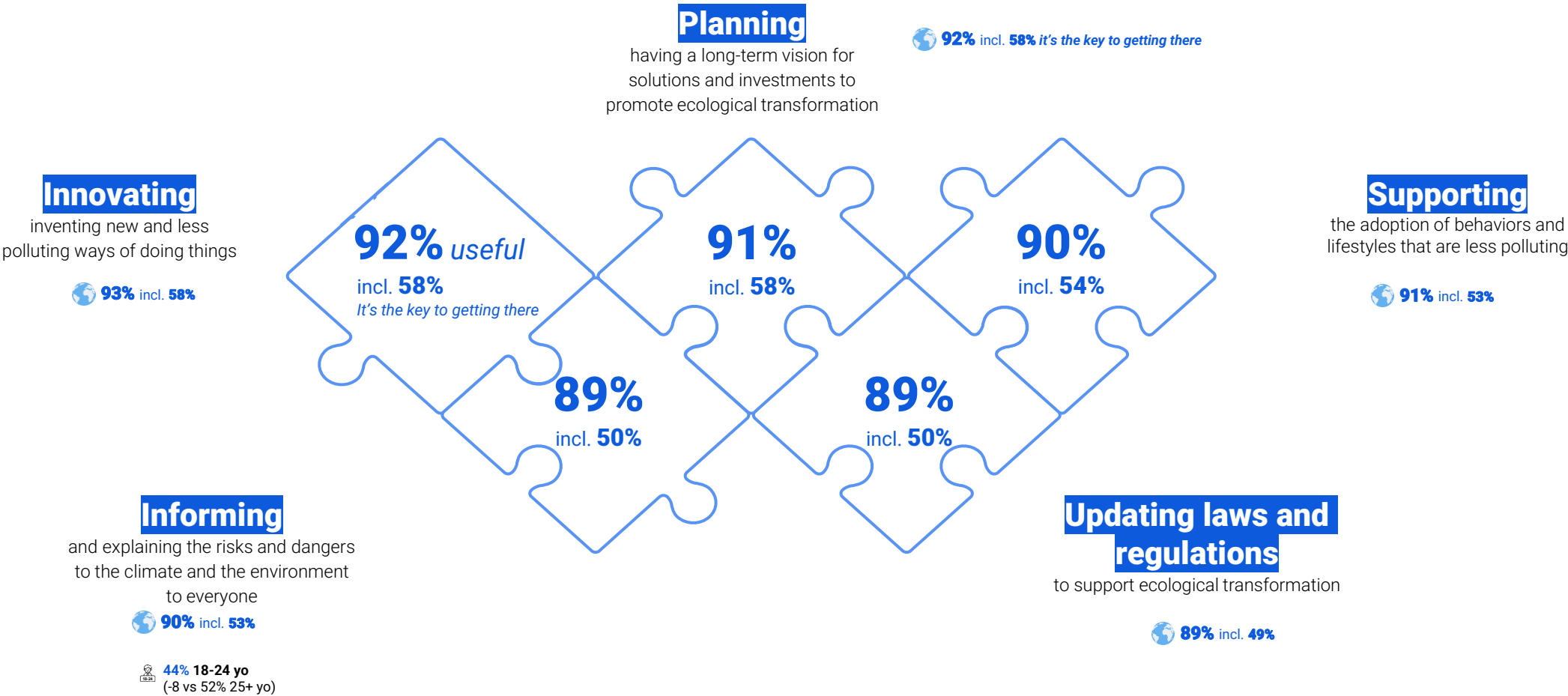
93% incl. 60%
49% 18-24 yo
(-8 vs 57% 25+ yo)




Question : To what extent do we need each of the following stakeholders to find and implement specific and effective solutions for ecological transformation?



Inventing, programming, supporting, informing and updating laws to succeed



Question : In your opinion, what matters for the success of the ecological transformation in your country (reducing greenhouse gas emissions and pollution, and protecting natural resources and biodiversity) ? 

Such as making health and ecological risks the keys to local decision-making for water, waste and energy

The majority of Saudi Arabia residents believe that local decisions on water, waste and energy should **take into account their health and ecological risks** whenever they require a trade-off (investment, choice of technology), **at least as much as the final price for the consumer.**

With the exception of the Czech Republic, health and resource protection are everywhere considered essential by a larger proportion of the population than the final price. On every continent, people on the lowest incomes make the same trade-off, both in terms of hierarchy and percentage.



Protecting your health

97% incl. *77% essential*

 79%



Taking ecological risks into account

95% incl. *65% essential*

 67%



Final price for the consumer

95% incl. *62% essential*

 58%

Question : When making decisions about managing water, waste or energy where you live, should your local leaders/elected officials take into account ?



But the path to follow between sobriety and technology divides Saudi Arabia

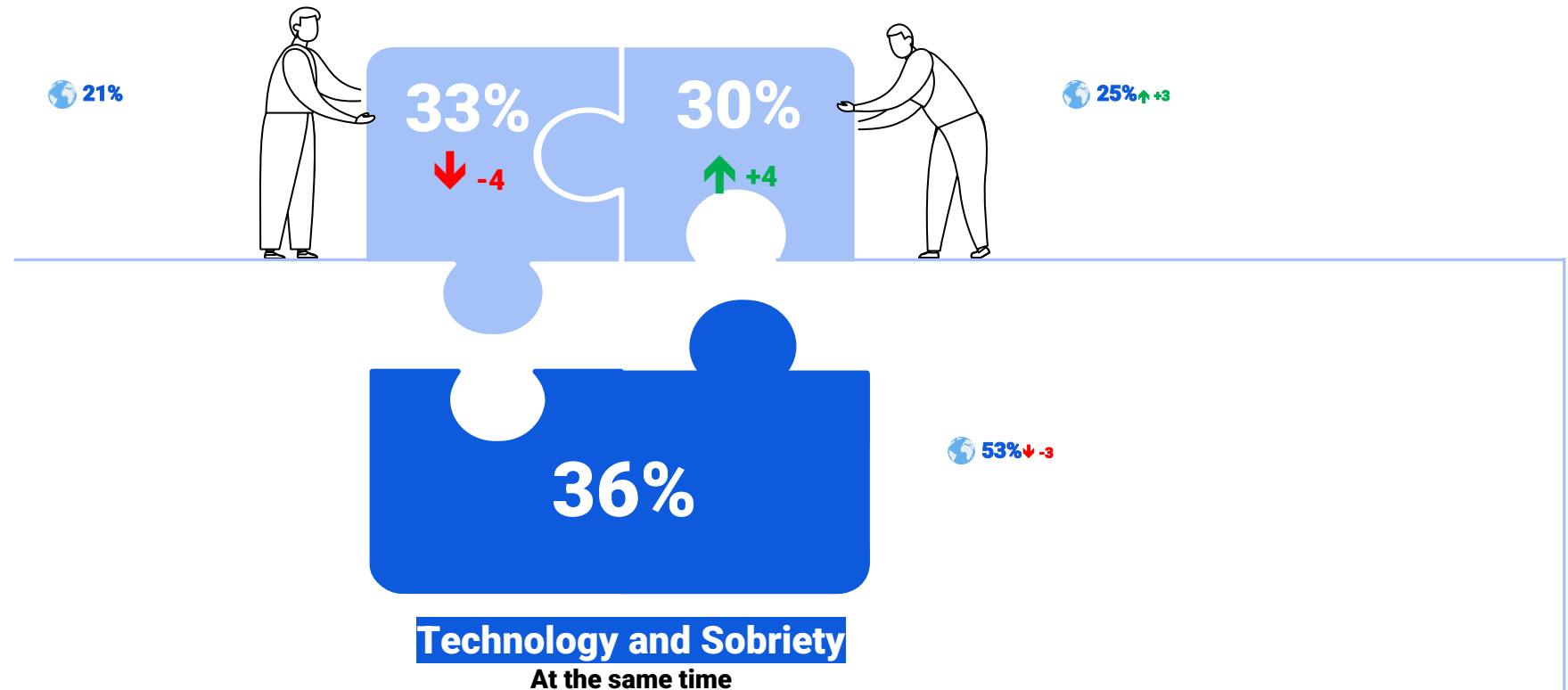
Although there are more people in most countries of the world who favour technology alone than there were 18 months ago (+3 in the global trend, +4 in Saudi Arabia, to the detriment of sobriety), **1 in 2 of the world's inhabitants still share the conviction that we need to combine sobriety and technology** to limit climate change and reduce pollution.

In 23 of the 26 countries included in the Barometer, a majority (at least a relative one) of between 43% and 69% agree on the complementary nature of these means.

Saudi Arabia and UAE residents, and Moroccans are the exceptions. The debate divides Saudi Arabia, the UAE and Morocco into 3 groups of equal size.

First and foremost
considerably REDUCE
our consumption,
live more frugally

First and foremost
PUT IN PLACE
technological solutions



Question : Generally speaking, when you think about the changes to be implemented to limit climate disruption and pollution, do you think that first and foremost we need to...?

**Decarbonising, depolluting
and regenerating our resources**

Micro-pollutants and soil pollution: health risks are unacceptable and justify additional costs, beyond socio-economic divide

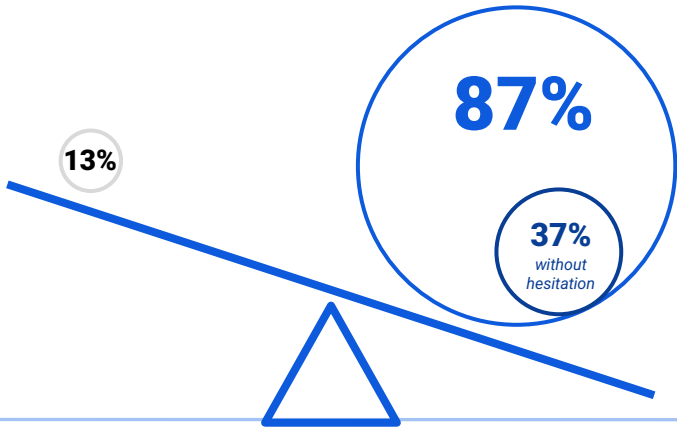
Paying more for water to **eliminate micropollutants** and reduce health risks

NOT READY
Focus on the final price for the consumer

16%

READY
Arbitrating in favour of micropollutants elimination

84%



♀ Not ready : 17% (+5 vs 12% men)

📉 Not ready : 17% **low-income populations** (+11 vs 6% affluent populations)
Despite the difficulty of bearing the additional cost, the majority of people on the lowest incomes are prepared to make the investment if it guarantees a reduction in health risks.

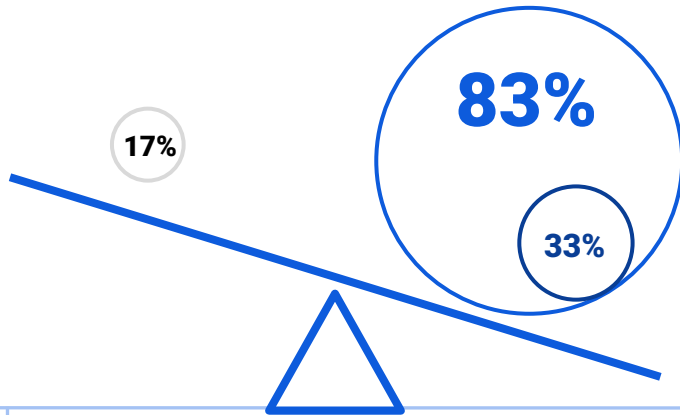
Paying more for fruit, vegetables and meat to **clean up, protect agricultural soil** and reduce health risks

NOT READY
Focus on the final price for the consumer

19%

READY
Arbitrating in favour of the depollution and preservation of agricultural soils

81%



👤 Not ready : 21% **18-24 yo** (+6 vs 15% 25+ yo)

📉 Not ready : 20% **low-income populations** (+9 vs 11% affluent populations)

Reuse and recycled: resource conservation, avoided pollution and economic co-benefits lever the social acceptability of changing behavior

Buy **food packaged in recycled materials** (recycled paper or plastic) to reduce plastic pollution and oil extraction

NOT READY
Prefer packaging without recycled materials
12%

READY
Arbitrating in favour of packaging in recycled materials
88% ↑+8

Eat food from **agriculture that uses recycled water** to reduce the risk of water shortages for consumption, agriculture and the country's economy

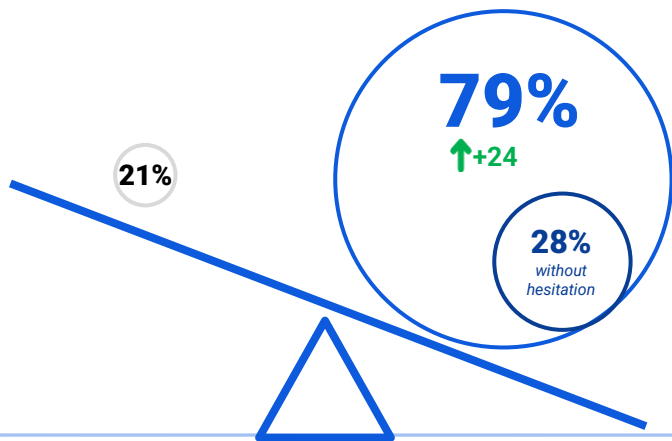
NOT READY
Reluctant to eat food grown with water from REUSE
21%

READY
Arbitrating in favor of agriculture that uses recycled water (REUSE)
79% ↑+10

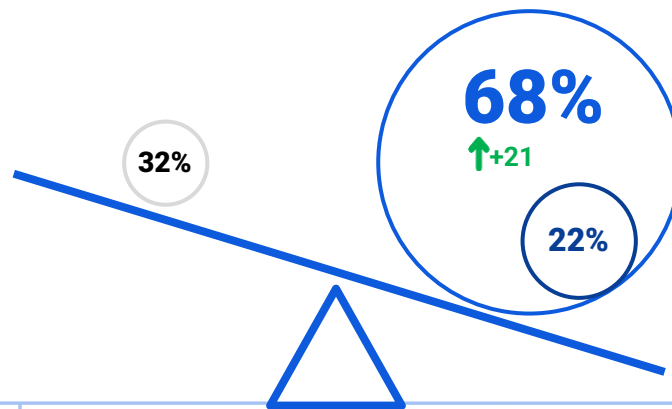
Drinking water from **recycled wastewater** to reduce the risk of water shortages for consumption, agriculture and the country's economy

NOT READY
Reluctant to drink water from REUSE
34%

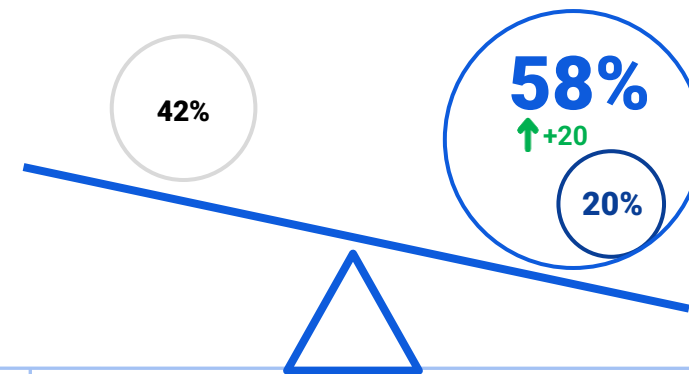
READY
Arbitrating in favor of drinking water from REUSE
66% ↑+13



Not ready : 28% low-income populations (+13 vs 15% affluent populations)



Not ready : 38% (+9 vs 29% men)



Not ready : 46% (+6 vs 40% men)

Reuse, electrical/electronic devices and plastics recycling: economic, geopolitical and ecological gains can justify the cost of action

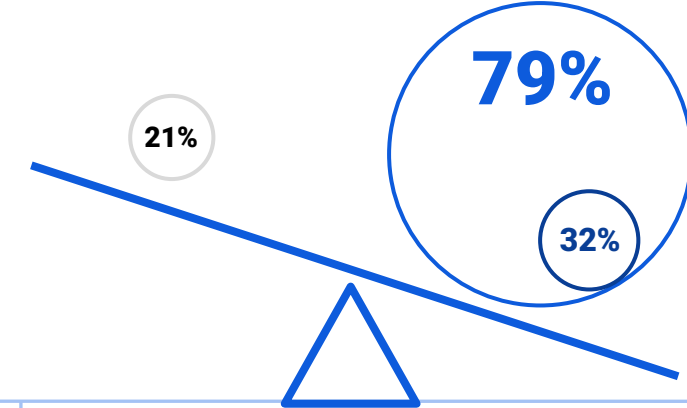
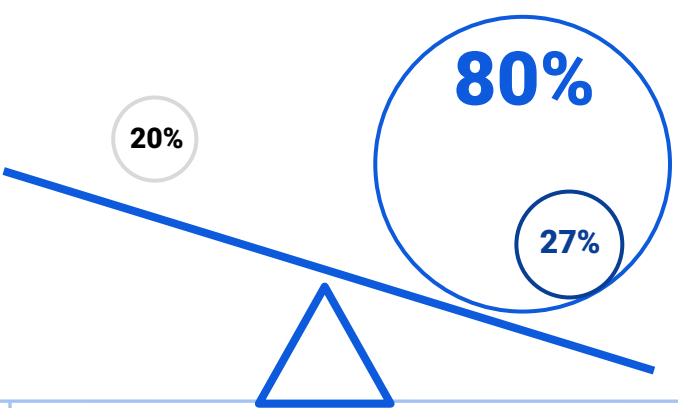
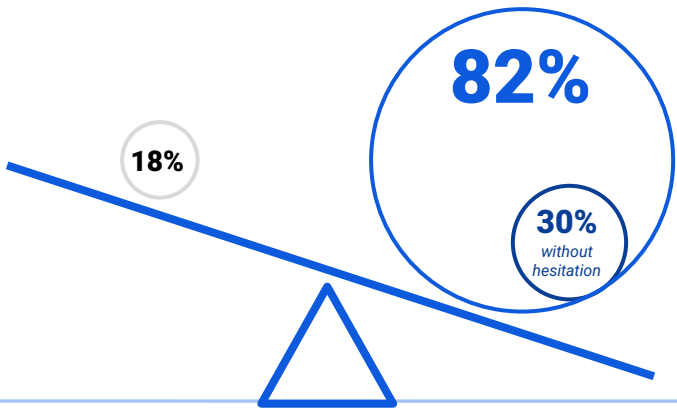
Pay a little more for electrical and electronic devices to ensure that **the battery and the device** itself are **recycled**, and to limit the pollution caused by the extraction of rare metals and reduce our dependence on countries that produce these metals





Pay a little more for **everyday products that contain or are packaged with plastic** to ensure they are **recycled**, reduce plastic pollution and limit oil extraction





Pay a little more for **water** now so that it can be **recycled** and reduce the risks of running out for consumption, agriculture and the country's economy




 **Not ready : 23% low-income populations** (+11 vs 12% affluent populations). Despite the difficulty of bearing the additional cost, most people on the lowest incomes are prepared to accept the additional expense.

 **Not ready : 24% 18-24 yo** (+5 vs 19% 25+ yo)

 **Not ready : 27% low-income populations** (+13 vs 14% affluent populations). Despite the difficulty of bearing the additional cost, most people on the lowest incomes are prepared to accept the additional expense.

 **Not ready : 24% 18-24 yo** (+5 vs 19% 25+ yo)

 **Not ready : 25% low-income populations** (+12 vs 13% affluent populations). Despite the difficulty of bearing the additional cost, most people on the lowest incomes are prepared to accept the additional expense if it guarantees a reduction in pollution, dependence on imports of strategic minerals and the risk of water shortages.

Local and low-carbon energy: security of local supply, decrease of GHG emissions and reduction of national energy dependency make the extra cost acceptable

Pay a little more for energy that is produced locally from non-recyclable waste and biomass...

To secure the region's energy supply

NOT READY



Focus on the final price for the consumer

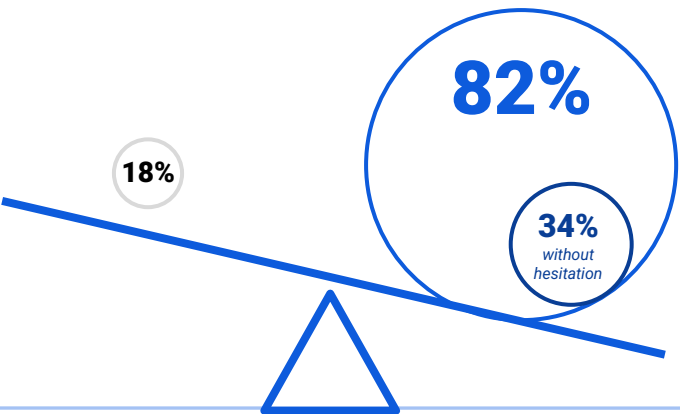
18%

READY



Arbitrating in favour of locally produced energy from non-recyclable waste

82%



To reduce CO2 emissions

NOT READY



Focus on the final price for the consumer

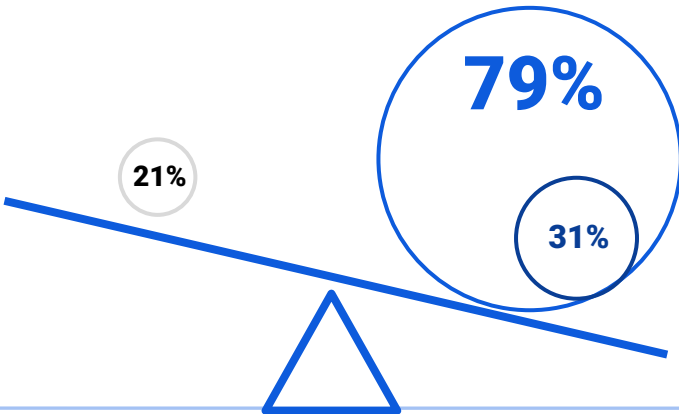
20%

READY



Arbitrating in favour of locally produced energy from non-recyclable waste

80%



To reduce our dependence on fossil fuel-producing countries

NOT READY



Focus on the final price for the consumer

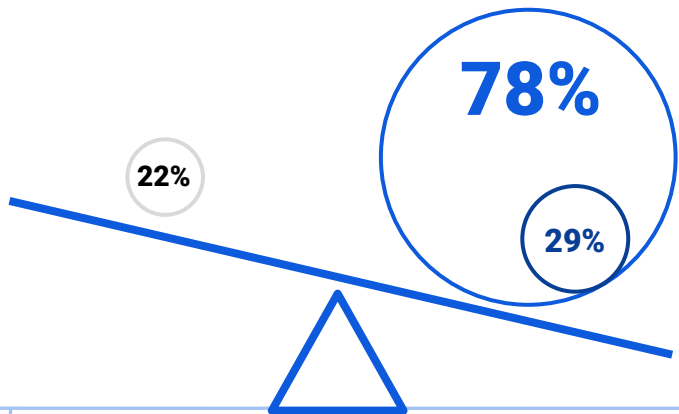
21%

READY



Arbitrating in favour of locally produced energy from non-recyclable waste

79%



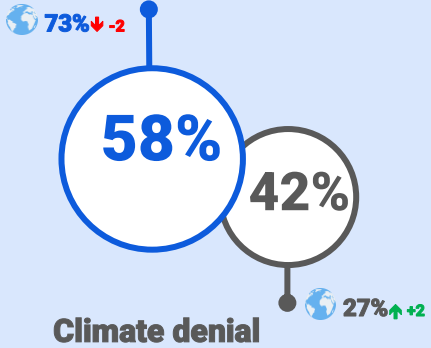
18-24

Not ready : 28% 18-24 yo (+8 vs 20% 25+ yo)



Saudi Arabia – Key figures

Climate disruption of anthropogenic origin



THE FUTURE IN ACTION

60%↓ -4 66%

the **costs of the consequences** of climate disruption are going to be **greater than the investments** needed for **ecological transformation**

TO MAKE ECOLOGY DESIRABLE

Being sure that it would protect or improve my health and the health of those around me	65%	67%
Being sure that it would guarantee my country's food independence and that everyone would have enough quality food	61%	63%
Being sure that it would protect or improve my quality of life	59%	64%
Being sure that it would guarantee my country's energy independence and that everyone would have energy when they need it	59%	60%

ECOLOGICAL AND CLIMATIC VULNERABILITY

48%

feel **exposed and vulnerable to a risk** related to **climate change or pollution**

65%

BUT A TRANSITION WITH NO HORIZON

57%

find it **difficult to imagine** what **daily life** could be like after **ecological transformation**

62%↑ +2

67% 75%

are certain that « **climate change** is the **greatest health threat** facing humanity »

World Health Organization, 2021

57% 74%

are certain that « **climate change** is an **acute threat to the poorest people** across the world, with the potential to **push more than 130 million people into poverty by 2030** »

World Bank, 2023

DECARBONISING, DEPOLLUTING AND REGENERATING OUR RESOURCES

READY

	Paying more for water to eliminate micropollutants and reduce health risks	87%	84%
	Paying more for fruit, vegetables and meat to clean up, protect agricultural soil and reduce health risks	83%	81%
	Pay a little more for energy that is produced locally from non-recyclable waste and biomass to secure the region's energy supply	82%	82%
	Pay a little more for electrical and electronic devices to ensure that the battery and the device itself are recycled, and to limit the pollution caused by the extraction of rare metals and reduce our dependence on countries that produce these metals	82%	80%
	Pay a little more for everyday products that contain or are packaged with plastic to ensure they are recycled, reduce plastic pollution and limit oil extraction	80%	78%
	Pay a little more for water now so that it can be recycled and reduce the risks of running out for consumption, agriculture and the country's economy	79%	82%
	Pay a little more for energy that is produced locally from non-recyclable waste and biomass to reduce CO2 emissions	79%	80%
	Buy food packaged in recycled materials (recycled paper or plastic) to reduce plastic pollution and oil extraction	79%	88% ↑+24 ↑+8
	Pay a little more for energy that is produced locally from non-recyclable waste and biomass to reduce our dependence on fossil fuel-producing countries	78%	79%
	Eat food from agriculture that uses recycled water to reduce the risk of water shortages for consumption, agriculture and the country's economy	68%	79% ↑+21 ↑+10
	Drinking water from recycled wastewater to reduce the risk of water shortages for consumption, agriculture and the country's economy	58%	66% ↑+20 ↑+13

DECISION CRITERIA FOR ECOLOGICAL ACTION



Protecting your health

97% incl. 77% essential
79%



Taking ecological risks into account

95% incl. 65% essential
67%



Final price for the consumer

95% incl. 62% essential
58%

APPENDIX

PART A : Diagnostic

Existence of climate change

Would you personally say that climate disruption is currently happening on our planet?

1. Yes, climate disruption is currently happening
2. No, nothing unusual is happening

Human responsibility for climate change

Do you think that human activity is responsible for climate disruption or not?

1. Yes, the disruption is mainly due to human activity
2. No, the disruption is mainly due to a natural phenomenon
3. There is no way of knowing

Fears about the consequences of climate change

When you think about the risks related to climate disruption and pollution (water, air, soil), do you...

- personally feel exposed and vulnerable to them?
1. The risk of falling ill owing to pollution (water, air, soil)
 2. The risk of property damage caused by natural disasters (impact of floods, droughts and severe weather events on buildings and infrastructure such as roads, gas and electricity networks, water supply, etc.)
 3. The risk of increasingly harsh living conditions (extreme temperatures, limitation of water consumption for certain uses in case of drought, disappearance or decline in the quality of certain foods, etc.)
 4. The risk of being in poorer health due to the reduced nutritional quality of food
 5. The risk of having mental health problems (stress, depression, anxiety)
- feel that your country is exposed and vulnerable to them?
6. The degradation of the ecosystem, the biodiversity in my country (disappearance of animals, flora, etc.).
 7. Migratory movements caused by pollution (water, air, soil) and the consequences of climate disruption (drought, famine, rising sea levels, etc.)
 8. An increased risk of infectious diseases (spread by mosquitoes, insects or animals)
 9. The risk of lacking food and having poor quality food
 10. The risk of resource scarcity and depletion (lack of drinking water, healthy soil for agriculture, etc.)

Awareness of the risk of poverty/impact on global living standards

The World Bank says that “climate change is an acute threat to the poorest people across the world, with the power to push more than 130 million people back into poverty by 2030”. Do you think this information is true or false?

1. I'm certain it is true
2. I think it is true
3. I think it is false
4. I'm certain it is false
5. I don't know if it is true or false

Climate change, the greatest threat to health

In a report published in 2021, the World Health Organization (WHO) said that climate change is the single biggest health threat facing humanity. Do you think this information is true or false?

1. I'm certain it is true
2. I think it is true
3. I think it is false
4. I'm certain it is false
5. I don't know if it is true or false

Our climate and ecological future in our own hands

And do you think we still have the future in our hands, that we can still limit climate disruption and pollution, or is it too late?

1. Yes, I'm sure we still have the future in our hands
2. I'm not sure
3. No, it is too late, we no longer have our future in our hands

The role of technology

Generally speaking, when you think about the changes to be implemented to limit climate disruption and pollution, do you think that first and foremost we need to...?

1. Considerably reduce our consumption, live more frugally (energy, food, transport, etc.)
2. Put in place and invent technologies to offset and reduce the consequences of pollution and climate disruption
3. Both at the same time: fundamentally change our ways of life and live more frugally, and at the same time put in place technologies to offset and reduce the consequences of pollution and climate disruption

Type of action

In your opinion, what matters for the success of the ecological transformation in your country (reducing greenhouse gas emissions and pollution, and protecting natural resources and biodiversity)?

It's key, it's essential for getting there / It won't do everything, but it's useful / It won't do much

1. Planning, having a long-term vision for solutions and investments to promote ecological transformation
2. Updating laws and regulations to support ecological transformation
3. Innovating, inventing new ways of doing things (manufacturing, travelling, housing people, diet, etc.) that produce little pollution, produce few greenhouse gas emissions and use few natural resources
4. Supporting the adoption of behaviours and lifestyles that are less polluting and use few natural resources (incentives or financial support, information, expanding the range of suitable products and services, penalties, etc.)
5. Informing and explaining the risks and dangers to the climate and the environment to everyone

PART A : Diagnostic

Actors

To what extent do we need each of the following stakeholders to find and implement specific and effective solutions for ecological transformation?

These stakeholders are essential, we can't achieve ecological transformation without them / They aren't essential but they still have a role to play / They are not needed for achieving ecological transformation

1. International institutions (the United Nations, G20, World Health Organization, etc.)
2. Governments
3. Local authorities
4. Businesses
5. Individuals

Cost of climate and ecological action/inaction

IPCC scientists say that the costs caused by the damage linked to climate disruption and pollution are going to be greater than the investments needed for the ecological transition of society.

Do you think this information is true or false?

1. I'm certain it is true
2. I think it is true
3. I think it is false
4. I'm certain it is false
5. I don't know if it is true or false

Assessment of the action in relation to health risks/quality of life

In your opinion, is action and investment in supporting ecological transformation in your country commensurate with the risk that pollution, climate disruption and the depletion of natural resources poses to your health and quality of life?

1. Completely commensurate
2. Somewhat commensurate
3. Not very commensurate
4. Not at all commensurate

PART B : Solutions and acceptability

The IPCC (Intergovernmental Panel on Climate Change), a body created by the United Nations and which comprises almost all the countries of the world, recently published a report that states that our current lifestyles will lead to a temperature increase of 3.5 to 5°C by 2100. In order to limit the negative effects of global warming, the temperature increase should be limited to 2°C by 2030.

Ability to imagine the world transformed

When you hear that we need to change a number of things in society and in our lifestyles to limit climate disruption and reduce pollution, do you find it easy or difficult to imagine what daily life could be like if we achieved the ecological transformation?

1. Yes, I find it quite easy to imagine what the world and our daily lives might look like after the ecological transformation
2. I have a vague idea, but it is still very unclear
3. No, I can't really see what the world and our daily lives might look like after the ecological transformation

CLEANING UP

Each year, pollution (air, water and soil) causes 9 million deaths worldwide (according to leading medical journal The Lancet), three times more than AIDS, tuberculosis and malaria deaths combined. We already have solutions for reducing this pollution. They include:

- Eliminating micropollutants found in small quantities in drinking water, toxic products such as pesticides, herbicides, household products, solvents and medicine residues
- Cleaning up soil contaminated by pollutants such as hydrocarbons or heavy metals (lead, mercury, copper, zinc, etc.)

New trade-off between the cost of action in the short term and the cost of inaction in the medium term (individual level)

Elimination of micropollutants from water

Some micropollutants cause cancer, neurological or behavioural disorders, and endocrine hormone disruption (source: Inserm). Treating water to eliminate these micropollutants could cost a little more.

If it reduced the risks to your health, would you be willing to pay a little more for your water today to eliminate these micropollutants?

1. Yes, without hesitation
2. Yes, probably
3. No, probably not
4. No, definitely not

Soil decontamination

Pollution of soil with hydrocarbons or heavy metals can significantly reduce crop yields, or even leave them completely unusable for agriculture. Cleaning up soil could cost a little more.

If it reduced the risks to your health, would you be willing to pay a little more for your fruit, vegetables and meat to clean up and protect agricultural soil?

1. Yes, without hesitation
2. Yes, probably
3. No, probably not
4. No, definitely not

PART B : Solutions and acceptability

REGENERATE

In 2023, by 2 August, humanity had consumed all the resources that the planet is capable of regenerating in one year. This date comes increasingly earlier each year. The depletion of resources is a risk to the health, quality of life and economy of a country. It can also be a source of conflict between countries. We already have solutions for preserving resources. They include:

- Recycling wastewater (domestic, industrial and rainwater) to produce drinking water that meets health standards
- Recycling plastic
- Recycling batteries and electrical and electronic equipment

New trade-off between the cost of action in the short term and the cost of inaction in the medium term (individual level)

Reuse of wastewater

Following the summer of 2022, the UN said that 40% of the world's population was affected by water shortages. Recycling wastewater to directly produce drinking water that meets health standards could limit the draining of water tables, and reduce water shortages for individuals and the country's agriculture and economy (industry and tourism). This could cost a little more.

If it reduced the risk of water shortages for you and your country's agriculture and economy, would you be willing to pay a little more for your water today so that it was recycled?

1. Yes, without hesitation
2. Yes, probably
3. No, probably not
4. No, definitely not

If it reduced the risk of water shortages for you and your country's agriculture and economy, would you be willing to eat food from agriculture that uses water recycled directly from treated wastewater?

1. Yes, without hesitation
2. Yes, probably
3. No, probably not
4. No, definitely not

If it reduced the risk of water shortages for you and your country's agriculture and economy, would you be willing to drink drinking water that had been produced by recycling wastewater?

1. Yes, without hesitation
2. Yes, probably
3. No, probably not
4. No, definitely not

Plastics recycling

Recycling plastic reduces plastic pollution and limits the extraction of oil (which is used to produce plastic). This could cost a little more.

If it reduced plastic pollution and limited oil extraction, would you be willing to pay a little more for your everyday products containing or packaged in plastic to be sure that they were recycled?

1. Yes, without hesitation
2. Yes, probably
3. No, probably not
4. No, definitely not

It is possible to package food in recycled paper or plastic. If it reduced plastic pollution and limited oil extraction, would you be willing to buy food packaged in recycled materials (recycled paper or plastic)?

1. Yes, without hesitation
2. Yes, probably
3. No, probably not
4. No, definitely not

Recycling electrical and electronic equipment and batteries

Recycling batteries and electrical and electronic equipment enables the recovery of the rare metals they contain, which are essential for manufacturing many high-tech products. It also reduces pollution caused by the extraction of rare metals, and reduces dependence on countries that produce these metals. This could cost a little more.

If it limited pollution caused by the extraction of rare metals and reduced dependence on countries that produce these metals, would you be willing to pay a little bit more for your electrical and electronic devices to be sure that the battery and the device itself will be recycled?

1. Yes, without hesitation
2. Yes, probably
3. No, probably not
4. No, definitely not

PART B : Solutions and acceptability

DECARBONISE

The IPCC states that greenhouse gas emissions (including CO₂), which are responsible for global warming, have continued to increase in recent years. To limit global warming to 2°C, these greenhouse gas emissions must be drastically reduced. Climate impacts include an increase in natural disasters (floods, droughts, fires, heat waves, cyclones), melting glaciers and rising sea levels, resulting in increased food and water crises, health crises, the extinction of animal and plant species, etc. We already have solutions for reducing CO₂ emissions. They include:

- Locally producing low-carbon energy from the incineration of non-recyclable waste and biomass (agricultural waste, wood, leaves, waste of animal origin, etc.) from the area

New trade-off between the cost of action in the short term and the cost of inaction in the medium term (individual level)

Local low-carbon energy production

When energy is produced and burnt, carbon dioxide (CO₂) is emitted. Producing energy locally from the incineration of non-recyclable waste and biomass reduces CO₂ emissions, reduces dependence on countries that produce fossil fuels, and provides energy security for your region. Producing low-carbon energy locally could cost a little more.

Would you be willing to pay a little more for energy so that it was produced locally from non-recyclable waste and biomass, if it...?

Yes, without hesitation / Yes, probably / No, probably not / No, definitely not

1. Reduced CO₂ emissions (responsible for global warming)
2. Reduced dependence on countries that produce fossil fuels
3. Provided energy security for your region

Elements of the public decision

When making decisions about managing water, waste or energy where you live, should your local leaders/elected officials take into account:

It's essential / It's important, but not essential / It's not important

1. Protecting your health
2. The environmental risks (pressure on resources, pollution, drought, greenhouse gas emissions, etc.)
3. The end price for you (price of drinking water, energy, waste management, etc.)

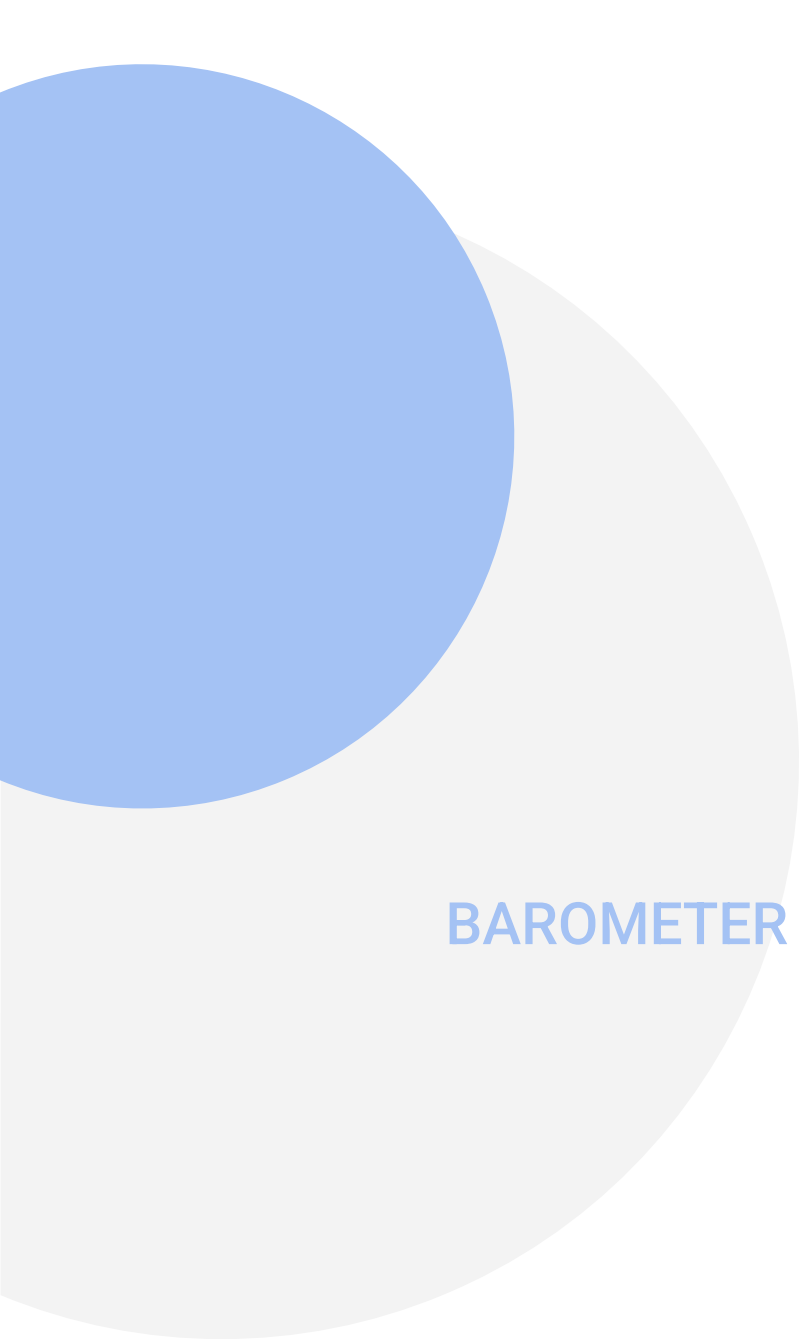
PART C : Desirability of ecology

Desirability levers

The ecological transformation may lead us to change some of our behaviours, sometimes change the way we live or cost us a little more. What would encourage you to make these changes? What would make them easier for you or would justify the extra costs?

It would make a big difference, it might really make me want to do it / It might help, but it isn't what would get me to change / It wouldn't make a difference for me

1. Being sure that it would protect or improve my health and the health of those around me
2. Being sure that it would protect or improve my quality of life (preserving the landscapes I love, fewer natural disasters and extreme temperatures, fewer droughts, nicer air to breathe, less noise etc.)
3. Being sure that it would guarantee my country's energy independence and that everyone would have energy when they need it
4. Being sure that it would guarantee my country's food independence and that everyone would have enough quality food
5. Quickly seeing results, positive effects
6. Feeling like everyone is doing their bit, that there's a collective movement
7. Making savings
8. Earning a little money in return ("financial reward")
9. The fact that my country is at the forefront of the ecological transition, being proud of my country and setting an example to other countries around the world
10. Understanding why I should give up certain things



ECOLOGICAL TRANSFORMATION : “are we (still) ready ?”

BAROMETER OF THE ECOLOGICAL TRANSFORMATION - 2024 EDITION

SAUDI ARABIA 



ELABE