

New Global Scenarios

World Economy, Power Shift and Global Architectures



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ScMI stands for Scenario Management International. ScMI is a consulting company founded in 1998 as a spin-off from Paderborn University in Germany. As a specialist and one of the market leaders in the development of future scenarios, ScMI supports companies, organizations and public stakeholders in tapping future knowledge, developing visionary strategies and business models, and designing strategic planning and early warning processes.

Due to its broad spectrum of methods, ScMI has successfully worked with the majority of DAX-listed companies in Germany as well as numerous small and medium-sized enterprises and individual business and functional units in more than 500 scenario projects. In addition, Szenario ManagementTM has also been beneficially applied by associations and organizations as well as by countries and regions. (www.scmi.de)



Foreword:

The Western World and the European Union in particular are currently challenged by a multitude of crises: The Russian war against Ukraine, climate change, the COVID-19 pandemic, the energy crisis, migration, international terrorism, the decline of traditionally dominant geopolitical powers and the deterioration of the rule of law. More than ever, it is necessary to prepare for the future by assessing possible future scenarios of how the global economy and the future world order might look like.

While the 20th century was dominated by the two World Wars which enabled the rise of a first superpower, the United States, the 21st century is seeing the rise of another superpower, China, and the rivalry between both will dominate the century. In this regard, the study "New Global Scenarios" conducted by ScMI offers valuable orientation. On the basis of the current state of affairs between the US and China, the study presents eight different possible future scenarios for an outcome of this rivalry, ranging from global US domination (Scenario 1) to global Chinese domination on the inverse (Scenario 5). The impact of private companies, digitalisation, the trust in public institutions and the effects of the climate change largely shape the scenarios in between, each describing a situation of, to some extent, shared global power.

These scenarios range from the domination of geopolitical pillars and alliances to a future driven by non-state factors such as innovation and fragmentation.

What is of particular concern in all of these scenarios is the role of the European Union. Will Europe remain in the two-pillar alliance with the USA as the weaker and dependent partner or will it emerge as an independent geopolitical player at eye-level with the US and China?

These are the questions on which the European Union needs to find answers. What is the long-term goal of our Common Foreign and Security Policy? And what must be done in the short term to ensure these targets?

In September 2021, the European Parliament responded to the accelerated economic growth in South-East Asia and China as well as the rising geopolitical tensions between China and the United States with a new EU-China policy report. The report, marking China as a systemic rival, aims at establishing a strategic framework in which the European Union becomes a strong geopolitical player, which is able to defend its core values such as human rights, democracy and the rule of law on a global level. Further cooperation with China should be based on the three principles of "cooperation where possible, competition where needed and confrontation where necessary" - on a level playing field.

A month later, the European Parliament also adopted a report on the future of EU-US relations. This report, calling for stronger transatlantic cooperation, advocates for a joint strategic approach towards China, especially regarding the green and digital transformation of the economy, the emission of greenhouse gases, the exploitation of resources in Africa and the Arctic as well as the fight against human rights violations.

The European Parliament has emphasised at multiple occasions that Europe should have a leadership role in defence and promotion of freedom, democracy and human rights in multilateral forums as well as in the reform of key multilateral institutions and organisations in order to improve their efficiency and their resilience.

The horrible war in Ukraine and the chaotic withdrawal from Afghanistan show how rapidly the global structure is changing. It reminds us that as Europeans, we should further enhance our Common Foreign and Security Policy framework. As the European Parliament, we have made clear proposals how Europe can become a more credible and assertive player on the world stage. The consultation of experts from all over the world, which ScMI has undertaken in this study, shows that the preferred future may not be the expected one. In order to be prepared for all possible scenarios, it is mandatory to understand what alternative scenarios of the future there might be. In this regard, the ScMI New Global study offers a valuable contribution.

David McAllister Chair of the Committee on Foreign Affairs (AFET) of the European Parliament



THE "NEW GLOBAL"

For two years we have been discussing the "New Normal" – the changes in our daily lives after COVID19. Now the Ukraine war has shown us how quickly and drastically political conditions can change. This makes it all the more important to think ahead to the future of world order, world economy and globalization. Which powers will rise or fall? What new global systems and architectures might emerge? In short, what might a "New Global" look like?

In the slipstream of COVID19, changes are emerging – in some cases long-known trends and in others new structural breaks: Will China start the 2020s stronger, and how will its rivalry with the USA and its relationship with the West change? Will the pandemic show Europe the way to new common ground? Will globalization continue, will it be transformed – or will we see deglobalization? What role will climate change, digitalization and global imbalances play? These are just some of the pressing questions, but there are no clear answers. Even more than before, the future of our world is not only complex, but highly uncertain.

Starting from our post-Covid scenarios, we took a deeper look at the global environment. As part of an open scenario process with four online workshops in 2021, the most important global drivers were identified, possible developments were envisaged in the form of eight New Global scenarios, and a first scenario assessment was conducted. In the process, we were supported by an expanded and significantly more global team of more than 200 experts from more than

65 countries and all continents. We would like to thank them for their commitment and input.

Almost exactly when the scenario assessment was completed, the Ukraine war began in February 2022. Therefore, the question is obvious: Are the scenarios still usable? Our aswer is clear: Yes, especially now.

The eight New Global scenarios presented in this study are "thinking tools" to prepare early for possible developments up to 2035 and beyond. They enable us to develop long-term perspectives, recognize turning points at an early stage and thus consciously shape our own path. The scenarios do not claim to know the future exactly. But we are convinced that with the scenarios we are providing a tool for more solid decision-making that could (and should) be used by very many. In addition, we are using them to support a global and open-ended dialogue about the possible and necessary changes we all face.

Dr. Alexander Fink, Hanna Jürgensmeier and Jens-Peter Kuhle

SCENARIO-MANAGEMENT – FOUR STEPS IN AN OPEN ONLINE PROCESS

Scenarios are not the outcome, but a tool for making better decisions in complex and uncertain situations. This is the principle behind the *Scenario Management* approach developed in the 1990s, as it has since been successfully used by ScMI in more than 500 projects. The core elements of *Scenario Management* are the utilization of a broad knowledge of the future from inside and outside to organization(s), the combination of systematic and creative phases, and a consistent application orientation. This is reflected in the targeted connection to strategy and innovation processes (for example, through systematically developed strategic options and business models) as well as the systematic scenario evaluation (also as a basis for early warning- and monitoring processes).

Figure 1: **Methodical procedure**



STEP 1a: INFLUENCE FACTORS

After the fundamental areas of interest had been visualized in a system image, a total of 79 influence factors were identified and described in detail.



STEP 1b:

KEY FACTORS

A network analysis then provided insights into how active or passive the individual factors were in the overall global system. In addition, a visual factor network was created, which on one hand enabled a balanced factor selection and on the other hand was further used in the later phases. On this basis, the scenario team selected a total of 23 key factors. These key factors can be understood as "our questions to the future", which are specifically addressed in the scenarios.



STEP 2:FUTURE PROJECTIONS

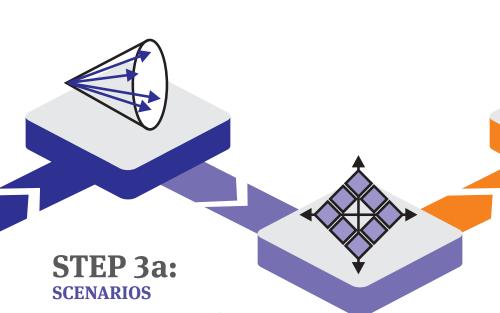
Relevant uncertainties were first identified for each key factor. A portfolio was formed from each of the key uncertainties, in which four to five possible developments – the so-called future projections – could be located.

The New Global scenario process was based on the results and organizational structures of the post-Covid process from 2020. What was new, however, was the consistently global approach and also the significantly broader composition of the scenario team with participants from more than 20 countries and all continents.

The four phases outlined below were worked on in four online workshops, which were intensively pre- and post-processed by the ScMI and the core team. In addition, the scenario team was involved via questionnaires and specific interviews to improve the quality of results in individual phases such as the identification of influencing factors, the formation of future projections or the formation of the scenarios.

The evaluation of the scenarios was a particular challenge. It took place in a specific form in which ten core questions were identified and addressed in an online questionnaire. After a first round of evaluation in summer/fall 2021, the evaluation was extended again until January 2022, so that the non-European expert view in particular was strengthened once more.

Our New Global scenario process is not yet complete with the status presented in this study. A further preparation of the scenarios ("Storytelling") and a preparation of the results for individual project use are planned for 2022 – as is an extended scenario evaluation.



In scenario construction, the first step was to assess how plausible it would be for two of the projections to occur in one and the same scenario. Based on this consistency assessment, eight consistent raw scenarios were created using the "Scenario Manager"-software.

Each of these scenarios represents a plausible and imaginable future that can later be worked out and communicated in different ways.

STEP 3b: MAP OF THE FUTURE

The scenario construction was done in such a way that the individual scenarios differ from each other as much as possible. This range of content made it possible to visualize the entire future space by means of multidimensional scaling and to depict it later in a "Map of the future".

STEP 4:

EXPECTED AND PREFERRED CHANGES

While the first three steps comprised the scenario development, the scenario assessment followed as step 4. This was done on the basis of ten core differences between the scenarios, each of which was evaluated in terms of its proximity to the present and to the expected and preferred future. These detailed statements were attributed to the scenarios so that the proximity of the scenarios to the present and to the expected and desired future is also available. This made it possible to interpret the future map strategically.



MAP OF THE FUTURE

"To make knowledge productive, we will have to learn to see both forest and tree. We will have to learn to connect." According to this insight by Peter Drucker, it is not enough to know and understand individual scenarios. Rather, we must also understand the "window of possibilities" spanned by the scenarios. In Scenario-Management this is done by building a map of the future.

How the "Map of the Future" has been developed

The development of a usable "Map of the Future" already begins with scenario building: here, the scenarios are to be generated not only according to internal plausibility and coherence, but also according to external distinctiveness. The development of our map took place in four steps (see figure 2):

Future Space Mapping (step 1): As part of scenario building, the plausible combinations of key factors were graphically arranged using multidimensional scaling (MDS) so that similar combinations were closer together and particularly different combinations were far apart. Since each combination is assigned to exactly one draft scenario, this created a colored cloud of dots for each scenario. **Simplification** (step 2): Since the number of combinations per scenario does not contain any significant information, the graph was then simplified so that each scenario is represented by only one dot.

Rotation and mirroring (step 3): The mapping was then rotated and mirrored. The relationships between the in-

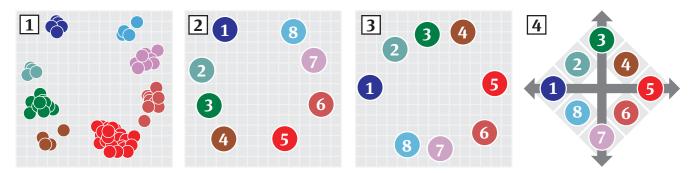
dividual scenarios were retained and the mapping was easier to interpret.

Map of the Future (step 4): In the last step, the actual Map of the Future was derived from the rotated mapping. This map consists of two core axes that have emerged from the analysis of key factors and projections (and were not predefined). These axes are something like the directions of the sky, because they illustrate the fundamental uncertainties and directions of development.

Global power center / Asianization (Core question #1)

On the left side of the map shown in figure 3, the global center of power remains with the USA and the Western states, which continue to dominate politically, militarily and economically and whose value system is globally influential. This goes hand in hand with a high level of individualism and a loss of trust in public institutions. On the right side, there is a significant shift of power in the direction of Asia – the "Asianization" described by Parag Khanna. This development is being reinforced by

Figure 2: How the »Map of the Future« has been developed



digitization. Scenarios 3 and 7 are not clearly located, although Scenario 7 leans more toward the Westernized world and Scenario 3 contains many elements of the Power Shift. [Effects like this are shown below in small, superscript numbers

A - The West continues to lead

- Low trust in public authorities
- Remaining high inequality between the West and emerging countries+7
- Digital division of world (by penetration and/or participation)+7
- China lagging behind⁺⁷

B - Power Shift to Asia

- High trust in public authorities
- Consequences of climate change in all geographical regions – but less destruction of structures⁺³
- Emerging countries catch up with the West⁺³
- Digital development permeates all countries and strata+3
- Leading economic and technological position of China in global competition⁺³
- Closing of global gap⁺³

Global governance (Core question #2)

The upper part of the map shows the scenarios with pronounced multilateral cooperation. This goes hand in hand with an economic and political strengthening of the global South. Moreover, this development is the prerequisite for a successful climate policy and a general increase in subjective well-being. Accordingly, in the lower part of the map are scenarios with a pronounced strategic rivalry between the U.S. and a China that is hardly opening up – combined with global political and technological conflicts as well as strong global migration.

Scenarios 1 and 5 describe, as a third group, two possibilities of a more unipolar world order or at least one dominated by one nation. It can be seen that, despite their differences, both unipolar scenarios go hand in hand with less room for maneuver on the part of the middle powers, Europe and the global South. Moreover, structural changes in climate policy, the financial system or consumption and dietary habits are more likely to be hindered.

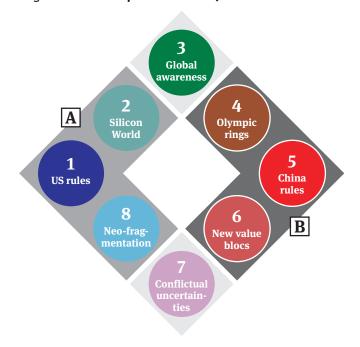
A - Multilateral cooperation

- Multipolar geo-architecture based on co-operation
- Economic and political strengthening of the Global South
- European Integration
- Overall high subjective well-being
- Consequent climate policies on both levels reduction of greenhouse gas (GHG)-pollution AND management of consequences
- Community-orientation
- G20-driven alternative financial system
- High ethical standards of companies
- Circular economies
- Low degree of tech-based conflicts
- High sustainability and environmental compatibilityof the global agriculture and food industry

B – Division and conflicts

- Degree/intensity of geo-strategic rivalry between the U.S. and China
- Chinas hegemonic policy meets with resistance in Asia
- Moderate economic development of the global South

Figure 3: Global power center / Asianization



- Multiple global conflicts lead to strong global migration
- Cold or hot technology wars
- Fossil fuels are only being replaced very slowly many conflicts due to unsecure energy transport

C - Unipolar development

- Unipolar world with dominance of one super power
- Europe is being ground down between the world powers or a powerless and increasingly dependent partner of the USA⁺⁸
- Low degree of political freedom in the global south⁺⁶
- Climate policies are focusing on management of consequences – Only moderate GHG-reduction⁺⁶
- Resolving of financial challenges in current system⁺⁶
- Traditional competitor focuses on short-term profits ethical behavior plays only a subordinate role⁺⁷
- Largely unchanged consumption patterns⁺⁶
- Globally standardized technology landscape is repeatedly attacked by external forces
- Highly cost-efficient food- and agriculture supply system – but with significant negative consequences for the environment and sustainable development

Extra perspective: USA



Starting from the unipolar scenario 1 with the dominant role of the USA as »world's policeman«, it becomes apparent that the strong influence of the USA on the world in scenarios 2 and 8 is mainly through econo-

mic power. Leaving the realm of U.S.-dominated futures, several options emerge: In Scenarios 3 and 4, the U.S. would be involved in a much more open, multilateral world order than, for example, would accept reforms of global institutions. The other scenarios show either at least a weakened position in system competition or even a withdrawal from the global stage.

While these two core dimensions span the map, a number of other dimensions can be identified that can be used to gain a deeper understanding of future forces.

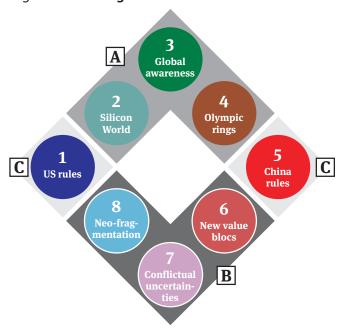
Political power and alliances (Core question #3)

The third core dimension addresses the question of the extent to which non-state actors are gaining political influence. This happens above all in scenarios 2 and 8- in conjunction with regionalization and decentralization. Global platforms and digital ecosystems play a special role in these scenarios.

A - Non-state institutions gain political power in a decentralized world

- High substitution of public power by non-state institutions
- Strong regional / sub-national identities (relative to national identities)⁺³
- Strong platform effects and concentration within digital ecosystems
- Smaller, decentralized units of energy production

Figure 3: Global governance



in traditional energy mix are spread around the georegions and nations – resources stay important for global power position

B - Traditional political power remains

- Strong political power low substitution of public power by non-state institutions
- Moderate platform effects and concentration within digital ecosystems

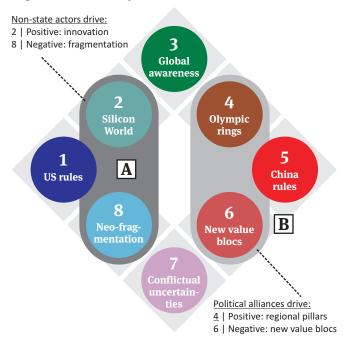
In addition to the distinction between scenarios 2 and 8, a look can also be taken at scenarios 4 and 6. In each case, political alliances are of great importance - on the one hand, in the sense of a strongly multilateral multipillar system (scenario 4) and, on the other hand, as an intensification of system rivalry in the sense of a disintegration into two hemispheres separated primarily by their value orientations (scenario 6). In both cases, Europe strives for a more independent position, but can only really achieve this in scenario 4.

In order to gain a deeper understanding of the forces at work, we can work out the similarities between the neighboring scenarios. This leads to the identification of four further core dimensions.

Globalization (Core questions #4)

If you compare scenarios 2 and 3 with scenarios 6 and 7 in Figure 5 (A versus B), you will see a diametrically opposed picture of globalization. It is also interesting to note that the globalization-critical block – supplemented by scenario 5 – includes a rejection of Western values and a world order more driven by nation states than by multilateral cooperation.

Figure 4: Political power and alliances



A - Multipolar glocalism

- Multipolar geo-architecture based on cooperation
- Openness of China to social / cultural developments
- Glocalism replacement of national-state ideas by global AND regional identities
- USA and Europe build a strong two-pillar alliance
- Globally standardized technology landscape with ways to effectively secure the systems
- High level of decentralization of energy production

B – Weakened globalization

- Reduced level of globalization and world trade due to strong protectionism
- Europe is looking for an independent path but is losing more and more influence
- Low attractiveness and power of Western values in countries outside of the »Western world«+5
- World order is driven by Nation states⁺⁵
- Dominance of national interests and identities⁺⁵
- High trust in states and public institutions combined with strong individualism+5

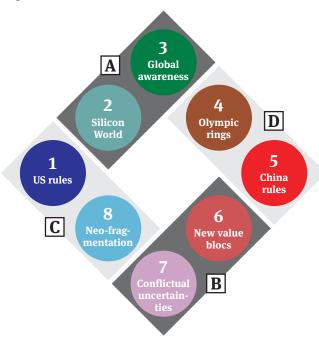


Extra perspective: Europe

A closer look at the European development shows that there are other possibilities besides the strong two-pillar alliance with the USA (see scenarios 2 & 3). In scenario 1,

Europe is closely allied with the USA, but largely powerless and dependent on the Western hegemonic power. In scenario 4, i.e. on the other side, Europe develops into a much more independent pillar in the world order - at a clear distance to the USA and China. This means, for example, that NATO plays a major role in scenarios 1 to 3, while its importance is likely to be weakened in scenario 4. Scenarios 5 to 8 then primarily desribe a critical internal development in Europe.

Figure 5: Globalization and cultural values



Cultural values and trust in public authorities (Core question #5)

The comparison of scenarios 4 and 5 with scenarios 1 and 8 initially provides a blurred picture. If we include the surrounding scenarios, it becomes clear that only scenarios 1 and 8 (Figure 5, C) result in a low-trust world - in contrast to the other six scenarios. What is special about scenarios 4 and 5 (Figure 5, D) is the Chinese dominance within Asia.

C - Individualistic low trust world

• Dominance of the individual - Low trust in communities and public institutions

D - Eastern-oriented high-trust-world

- Chinese leadership in Asia in widely accepted (in scenario 5 more than in scenario 4)
- Strong (economically, ecologically or value-based) migration movements (internal / external) with overall moderate conflicts

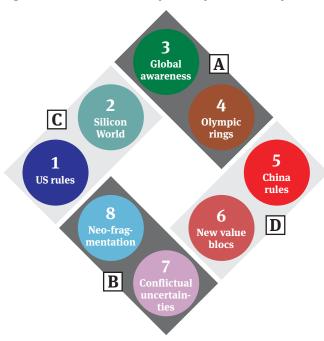


Extra perspective: India

The development of India and other Asian countries can be examined more closely on the basis of this dimension. For example, China's dominance in Asia is recognized

primarily in scenario 5, while a partnership between China and India develops on an equal footing in scenario 3 (and Asian structures remain uncertain in scenario 4). In Scenario 6, India faces the task of having to position itself in global systems competition, possibly as a strong Asian partner in an ecosystem shaped by Western values.

Figure 6: Global economy and system rivalry



Global economy and wealth distribution (Core question #6)

In the sixth core dimension, several aspects of the global economy and wealth distribution are interlinked. It is interesting to note which two poles are opposite each other: A drifting-apart world with slowing economic dynamics (scenarios 7 and 8; Figure 6, B) is contrasted with a converging world in which there is a transformation of the decarbonized global economy and a slowdown in consumption (scenarios 3 and 4; Figure 6, B). With the other four scenarios, the traditional dynamics of the global economy merely form the space in between.

A – World is moving closer together

- The world is moving closer together overall decline in global inequality
- China as a new soft world power with relevant opening in social and cultural development
- Trust in states and public institutions and their community-oriented policies
- Significant restructuring of the global economy towards greater sustainability
- Traditional competitive structures often with advantages for ethically responsible companies
- Significant slowdown in consumption growth through changes in consumption patterns AND circular economy approaches
- High level of decarbonization in energy production
- High sustainability and environmental compatibility of the global agriculture and food industry

B - World is drifting apart

- China China compensates for slowing economictechnical momentum with political aggression
- The world is drifting (further) apart Widespread between the West, the emerging countries and the

- global South
- Overall low subjective well-being and social balance
- Turning away from global world trade slows down world economic momentum
- Low digital participation (Inner-societal digital divide)
- Critical capacity and structure of the global agricultural and food economy to supply the world's population

System rivalry (Core question #7)

The last core dimension deals with global system rivalry, whereby there is a close connection to the first dimension (global power center). A common feature of scenarios 1 and 2 (Figure 6, C) is a rather moderate change in current development - in climate protection as well as in Western dominance in business and technology. China tends to be slowed down and other countries of the global South develop into hotspots. In contrast, China changes the global rules of the game in scenarios 5 and 6 (Figure 6, D). This involves a stronger role for the nation states and only a weak position for Western values in other regions of the world.

C - Western-defended dominance

- China remains open to external influences with a more passive role in foreign policy
- The global South becomes a growth hotspot but the West continues to stand out
- Digital division of the world Few digital superpowers set themselves apart
- Political orientation of Europe clearly with USA⁺³
- Moderate direct pressure to act in (Northern) countries due to environmental and climate impacts

D - China-driven reordering

- China uses uses its economic and technological position/superiority for global political ambitions
- China takes an active role in world markets while maintaining internal separation and emphasizing security
- Emerging countries catch up with the West but the Global South is left behind
- Global balance leads to conflicts within the western industrialized countries
- Competing monetary blocs operate within the given structures
- Low attractiveness and less power of Western values in countries outside of the »Western world«⁺⁷
- World order is driven by Nation states⁺⁷
- Dominance of national interests and identities⁺⁷
- High trust in states and public institutions combined with strong individualization⁺⁷



Extra perspective: China

Core dimensions 6 and 7 also summarize China's role in the world (see figure 6): A: China opens up and becomes an economically and technologically leading

nation which acts as a new soft world power

- B: China compensates for slowing economictechnical momentum with political aggression
- C: China opens up, but couldn't reach a leading position on the world markets
- D: China has an economically and technologically leading position and uses this for a more active role in world politics to safeguard its security-driven system



Extra perspective: Russia

Russia's role is closely related to system rivalry. Whereas in scenarios 1 and 2 Russia is more oriented toward the West, in scenarios 5 to 7 autocracy in Russia is strengthe-

ned and it adopts a decidedly anti-Western position. In the intermediate scenarios, specific developments are conceivable in each case – for example, a more independent power base in scenario 4.

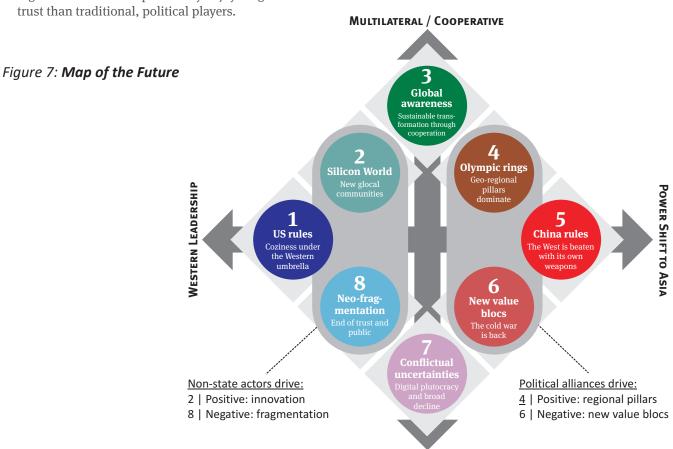
Eight scenarios

The analysis of the seven core dimensions as well as the individual elements of the future scenarios results in eight scenarios that can be easily distinguished from each other:

- US rules Coziness under the Western umbrella.
 This scenario 1 appears, if the United States continue or resume to actively fulfill their leading role in the world.
- Silicon World New glocal communities. This scenario 2 appears, if global tech companies with a high level of social responsibility enjoy far greater trust than traditional, political players.

- Global awareness sustainable transformation through cooperation. This scenario 3 appears, if global awareness is so pronounced that virtually all major nations cooperate and, above all, establish a planetary climate policy.
- Olympic rings Geo regional pillars dominate. This scenario 4 appears, if the world is divided into several spheres of influence, each of which is characterized by specific approaches to solving problems, but which also learn from each other at the same time.
- China rules New role models from the East.

 This scenario 5 appears, if China becomes the clear leading world power, whose hegemonic influence is widely accepted in politics and business.
- New value blocs The cold war is back. This scenario 6 appears, if two blocs and systems, the Western democratic and the Chinese authoritarian, are increasingly in conflict with each other.
- Conflictual uncertainties Digital plutocracy and broad decline. This scenario 7 appears, if hardly any global cooperation is possible and states and groups always face each other in various kinds of conflicts (while a small global elite is able to avoid these conflicts).
- Neo-fragmentation End of trust and public. This scenario 8 appears, if, in an individualized world, people lose confidence in increasingly weak nation states and social cohesion erodes.



DIVISION AND CONFLICTS



US RULES

Deceptive comfort under the Western umbrella

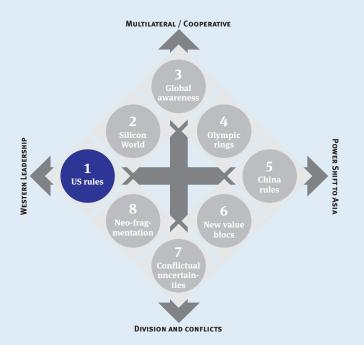
After a phase of internal conflict and hesitance, "the West" is back on the international stage. The increasingly global consciousness of people all over the world is characterized by the pursuit of civil and human rights, values such as individual freedom, law and tolerance, and the idea of liberal democracy. Under the de facto leadership of the United States as the sole and ultimately decisive superpower, the multilaterally shaped world order has been strengthened. Europe remains a subordinate partner of the United States.

China's rise as an economic world power massively slowed down during the 2020s. In particular, the global culture of innovation that was increasingly forming around liberal values was no longer compatible with the authoritarian paradigm. Like other totalitarian states, China struggled to open up economically, but it remained inferior to liberal societies. China's Asian neighbors benefit from this development and new economic hotspots emerge in the global South, many of which are oriented towards Western development patterns.

The dynamic global economy is characterized by a free trade system and the continuation of the existing U.S.-dominated global financial system. Technological development follows global standards, which are shaped by a few digital superpowers – above all the tech giants of the USA. Following traditional structures, companies continue to act on the basis of short-term profit targets while ethical behavior plays only a subordinate role. This also applies to the agricultural and food industries, which are highly cost-efficient but accept negative consequences for the environment.

With the restructuring of their industrial societies, the democracies of the North have succeeded in organizing broad participation in economic development for their inhabitants while consumption patterns remain largely unchanged.

In the case of climate change there is a global divide as well. Highly developed northern states feel little pressure to act and concentrate on mitigating the consequences, while many developing countries suffer more severe consequences, up to the destruction of public and economic structures. In this respect, the largely peaceful global development stands on feet of clay, and migration is a central issue worldwide.



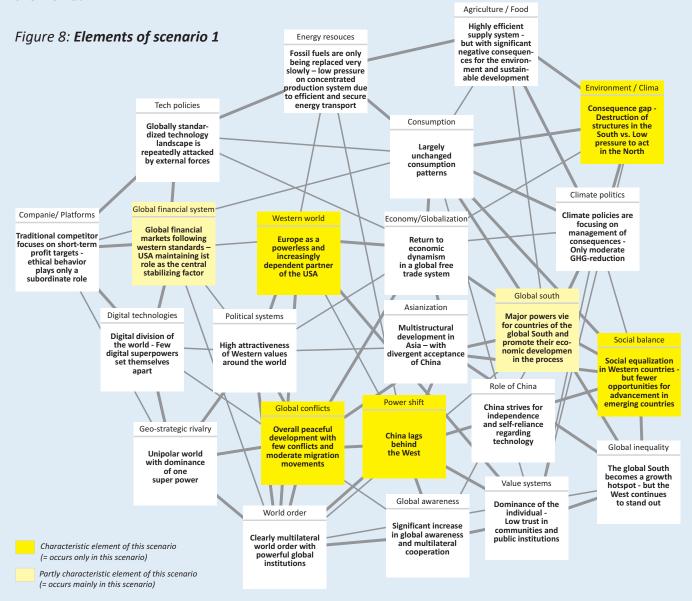
SCENARIO 1 IN BRIEF

- Multilateral world with the USA as the sole and ultimately defining superpower (unipolarity)
- Economic development of China stagnates

 other countries of the global south as
 new growth hotspots
- Social equalization in Western countries
 but fewer opportunities for advancement in emerging countries
- Largely unchanged consumption patterns

 Consequence gap with destruction of structures in parts of the South vs. low pressure to act in the North
- Technological leadership of the West remains

Scenario 1 appears, if the United States continue or resume to actively fulfill their leading role in the world.





SILICON WORLD

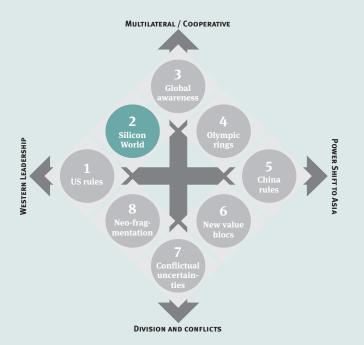
Emergence of new glocal communities

The consequences of climate change are omnipresent – in the industrialized countries as well as in the Global South, where they partly threaten state structures. A global awareness is emerging that this danger can only be countered by a common and consistent global climate policy focusing on the reduction of greenhouse gases as well as the management of the consequences of climate change. This means that the age of nation states is inevitably coming to an end. In addition to the willingness to jointly solve global problems, regional and local activities and identities are also becoming increasingly important, so that one can speak of a broad "glocalization".

Responsibility for the community is becoming a central driver, and civil initiatives beyond common public and political structures are being strengthened. In addition, global companies and their corresponding digital and ethically underpinned ecosystems, are increasingly shaping the development of the world order. At the local level, the line between businesses and civil society actors often blurs as they collectively become key advocates for civil and human rights and universal values such as freedom, legal certainty and tolerance. The United States and the European Union support this development and profit from it.

China's rise as an economic world power has slowed. Above all, the global culture of innovation, which is increasingly formed around individual responsibility, is incompatible with authoritarian paradigms. Like other totalitarian states, China faces the dilemma of having to open up as a whole in order to remain competitive. This gives rise to significant uncertainties. China's Asian neighbors are reacting to this development and in some cases forming their own alliances. New economic hotspots are emerging in the global South, many of which are oriented toward universal values and innovative development patterns.

The transformation of global economic structures is taking place in a free trade system on the basis of global standards set by the tech giants. Social equalization in the industrialized countries and the growth of a global middle class are both a result from this development. Overall, regionally very different circular economy systems and new, sustainable solutions for an efficient agriculture and food economy are emerging. Smaller, decentralized units of energy production in the traditional energy mix are distributed across geo-regions and nations. The global financial system is being adapted to the changing structures in an evolutionary manner.

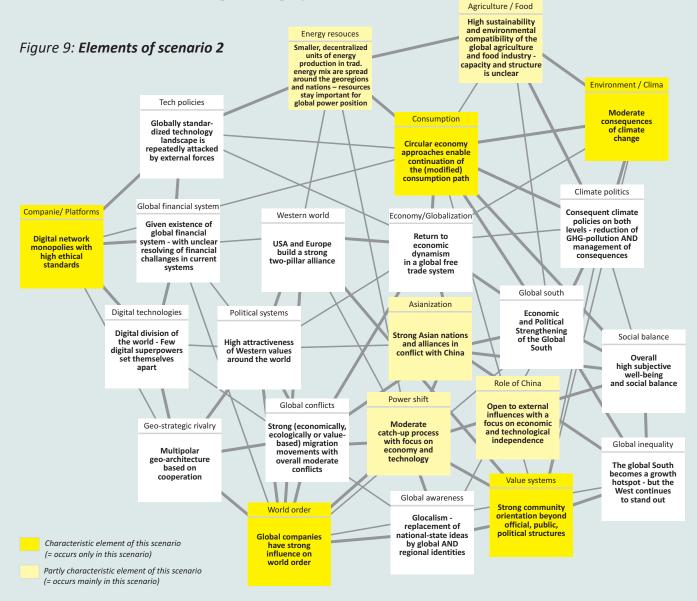


SCENARIO 2 IN BRIEF

- Multipolar geo-architecture with replacement of national-state ideas by global AND regional identities (glocalism)
- Strong community-orientation beyond official, public and political structures
 strong influence of companies and urban areas
- Digital network monopolies act based on high ethical standards
- Moderate consequences of climate change

 innovation (e.g. circular economy,
 decentralized energy production) enable
 continuation of the (modified) consumption
 path

Scenario 2 appears, if global tech companies with a high level of social responsibility enjoy far greater trust than traditional, political players.





GLOBAL AWARENESS

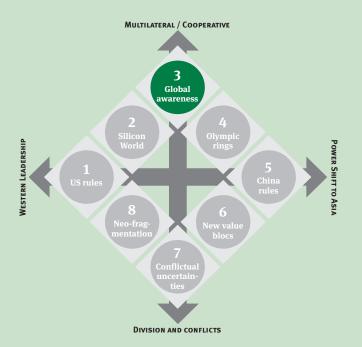
Sustainable transformation through cooperation

The world is moving closer together – not only economically, but also socially and politically. A global awareness of shared responsibility and multilateral solutions is emerging, strongly influenced by global institutions such as the United Nations. This is based on universal human rights and values such as freedom, the rule of law and tolerance. Strong global institutions are no longer Western-dominated, but represent the full range of nations, including particularly the politically strengthened "Global South". Nevertheless, the United States and the European Union remain strong players and drivers of the cooperative world order.

China has opened up economically as well as politically and culturally, becoming a leading nation and an accepted partner in Asia and around the world. Global inequality has decreased overall, mainly due to the growth of a global middle class in China, Asia and large parts of the former developing world. This leads to a decrease of the condition for many global crises. The world is experiencing an overall peaceful development with only moderate migration movements.

The consequences of climate change are being felt all over the world, but without challenging the state structures in the particularly affected regions. Rather, a globally coordinated climate policy is becoming the central "world project", which, beyond dealing with the consequences of climate change, also includes a significant reduction in greenhouse gas emissions. An essential cornerstone of this policy is the production of renewable energies combined with innovations in energy transport and storage.

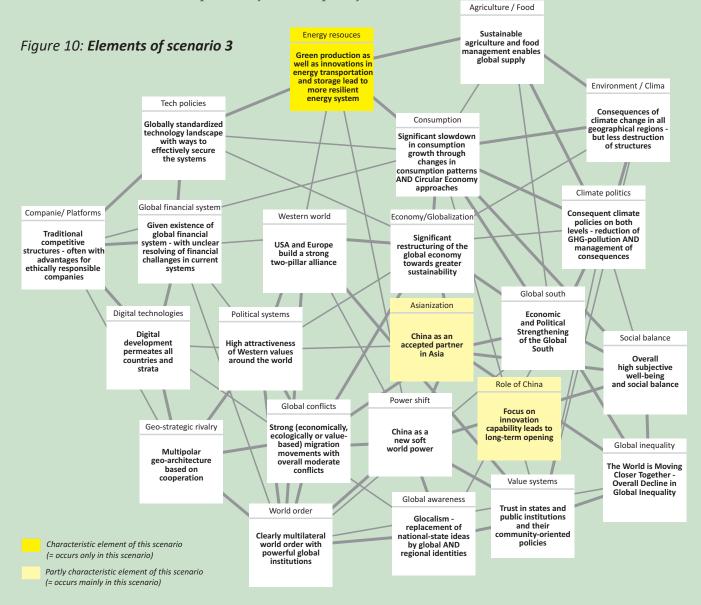
Transforming the global economy toward greater sustainability also involves overcoming the traditional growth and free trade paradigm, for example by changing consumption patterns and expanding circular economies. The agriculture and food sectors are also increasingly shifting to sustainable approaches without compromising global supply. This is possible because innovations can develop freely on the basis of global technology standards. The global financial system is being adapted to the changes in the multipolar geo-architecture.



SCENARIO 3 IN BRIEF

- Clearly multilateral world order with powerful global institutions
- China opens up (economically and politically) and becomes a leading nation and an accepted partner in Asia and around the world
- Economic and political strengthening of the Global South
- The world is moving closer together -Overall decline in global inequality
- Consequent climate policies and significant restructuring of the global economy towards greater sustainability - including changes in global financial system

Scenario 3 appears, if global awareness is so pronounced that virtually all major nations cooperate and, above all, establish a planetary climate policy.





OLYMPIC RINGS

Geo-regional pillars dominate

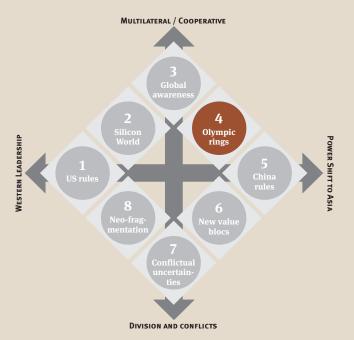
The world is becoming truly multipolar: in addition to the United States and China, former second-row powers such as India, Russia and the European Union are establishing themselves as strong, independent players on the world stage. They represent both regional and overarching geostrategic interests. The basis for this are universal values such as human rights, freedom, the rule of law and tolerance. Therefore, the geo-regional pillars are developing a functioning culture of cooperation with strong, global institutions.

China has opened up economically as well as politically and culturally and has become a new soft world power, leading its own alliance of direct partner states on the one hand, but also working cooperatively with the other global powers on the other.

Global inequality has declined overall – largely due to the growth of a global middle class in China, Asia and large parts of the former developing world. As a result, many global crises can be resolved or defused because important preconditions for conflict no longer exist. The world is experiencing an overall peaceful development with only moderate migration movements.

The consequences of climate change are being felt all over the world, but without challenging the state structures in the particularly affected regions. Rather, a globally coordinated climate policy is becoming the central "world project", which, in addition to dealing with the consequences of climate change, also includes a significant reduction in greenhouse gas emissions. However, building a carbon-neutral energy economy remains location-dependent, leading to global inequalities in security of supply that can also create tensions between states and blocks when it comes to energy transportation, for example.

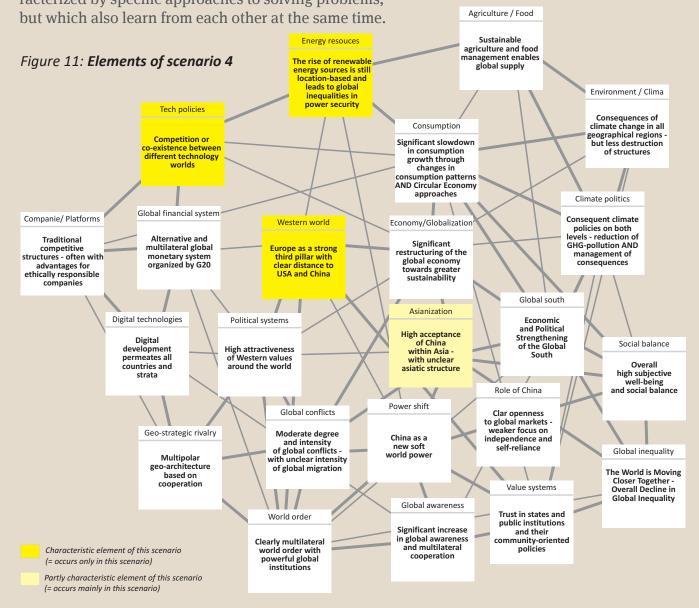
The transformation of the global economy toward greater sustainability is based on changes in consumption patterns and a more multipolar financial system. With the overcoming of the classic growth and free trade paradigm, global standards are also no longer considered to be unreservedly desirable: In many cases, geo-regions are developing their own technology concepts or circular economy systems. Agriculture and the food industry are also increasingly being converted to sustainable and regionally specific approaches without negatively affecting global supply.



SCENARIO 4 IN BRIEF

- Division of the world into several georegional spheres of influence - with an overall innovative competitive structure including different technology worlds
- Europe as a strong (third) pillar with clear distance to USA and China
- China opens up and becomes an economically and technologically leading nation - but with strong competition within Asia
- Multilateral cooperation with focus on climate policies and significant restructuring of the global economy towards greater sustainability (including limitation of global world trade)

Scenario 4 appears, if the world is divided into several spheres of influence, each of which is characterized by specific approaches to solving problems,





CHINA RULES

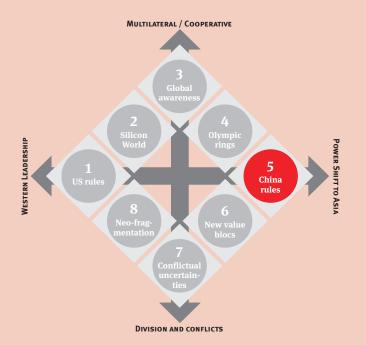
New role models from the East

The Asian century is above all a Chinese century – and it has come faster than many in the traditional industrialized countries could have imagined. Economic success as well as the high efficiency of the state system supported by modern technologies make China the new "role model", while human rights and "Western" values such as freedom, the rule of law or tolerance are no longer considered contemporary in many countries and societies. Especially in Asia and along the new Silk Roads, China's quasi-hegemonic role is accepted or at least not openly questioned.

China's increasing dominance is accompanied by the loss of economic privileges in the Western industrialized countries. There, internal social distribution struggles are occurring and internal conflicts are increasing, allowing illiberal and semi-authoritarian forces to gain power. The United States are retreating from many global conflicts while Europe is too weak to have a weighty say in the new world order. China's central interest is a stable global development so that overarching conflicts are avoided, while there could be significant conflicts within individual states or regions, including corresponding internal migration flows. Democratic movements in states with authoritarian or illiberal systems are coming under intense pressure – civil society structures can be established only in state-controlled niches, if at all.

Decarbonization and decentralization of the energy industry are on the agenda, but the massive industrialization of the 2020s and 2030s is in many cases still based on fossil fuels. As a result, the consequences of climate change are being felt all over the world, albeit without questioning state structures in the regions most affected. However, since global politics is primarily understood as a balancing of national interests, climate policy is still focused on managing short- and medium-term consequences.

The global economy is characterized by a free trade system, largely unchanged consumption patterns and companies that are focused on short-term profit targets and for which ethical behavior plays only a minor role. However, the traditional, Western financial system competes with alternative currency blocs, so that a true, global dynamic does not emerge. The agricultural and food industries are also dominated by a belief in technology and efficiency thinking, while sustainability is hardly taken into account.

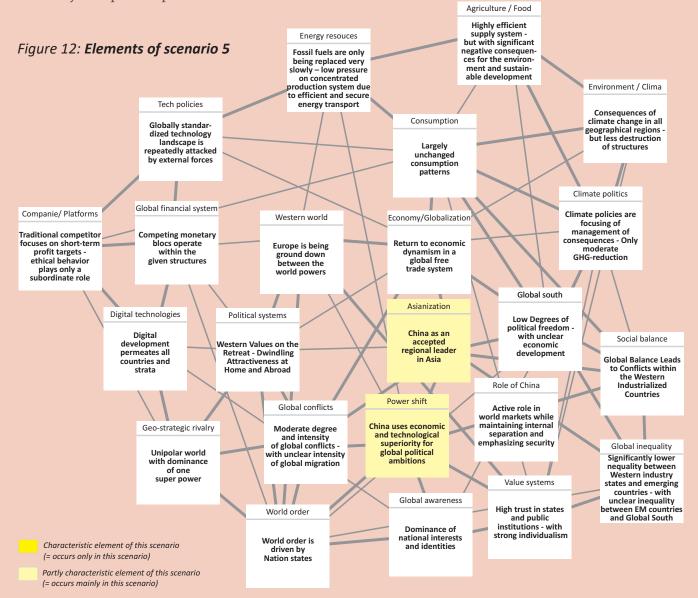


SCENARIO 5 IN BRIEF

- China opens up and beats the inert
 Western countries (which face several
 internal conflicts) with their own weapons
- The world order and the global financial markets are more and more dominated by the new super power (and Asian hegemon)
- Western values are on retreat dominance of national interests and identities
- High economic dynamism despite significant restrictions on free world trade
- Climate policies are not consequent

 short-term political and economical
 interest still dominate

Scenario 5 appears, if China becomes the clear leading world power, whose hegemonic influence is widely accepted in politics and business.





NEW VALUE BLOCS

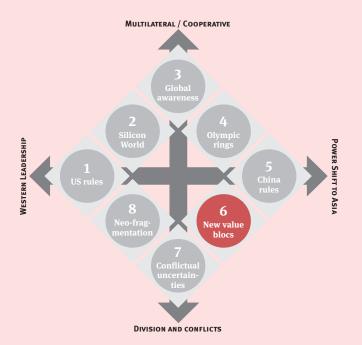
The cold war is back

The U.S.-centered and unipolar world order that emerged with the collapse of the Eastern bloc was only a brief interim phase. With the rise of China, first economically and later politically and militarily, a new competitor has emerged for the U.S. that is far more powerful than the Soviet Union ever was. Based on its economic strength, Communist China is creating its own global alliance, ranging from selected neighbors to many states of the global South to individual European and Latin American countries. At the same time, a Western value bloc dominated by the United States is forming. Europe is searching for its own position, but is constantly torn between human rights-based policy and its own strategic and economic interests, so that it is losing influence overall. Even other major powers such as Russia and India are repeatedly forced to position themselves clearly in the new system competition.

China in particular as well as corresponding emerging countries are catching up with the West – and in some cases achieve leading positions in relevant regions and industries. Other states in the global South are being left behind both economically and politically. As a result, a multitude of global conflicts are occurring, often with a connection to the new West-East conflict. Global migration flows are evaluated from an ideological point of view. The traditional industrialized countries are entering into an efficiency competition with their challengers and are lowering environmental and social standards in the process, so that internal conflicts emerge, which are further exacerbated by immigration.

The world economy continues to develop dynamically – at least within the individual system blocs. Further global exchange is also taking place, but is slowed down by numerous restrictions, different technology standards and the emergence of competing currency systems. Corporate structures in the two power blocs are also developing differently: While a wide range of different companies with different philosophies and strategies are developing in the West, the Chinese power bloc is focusing on technologically focused operations and centralized control.

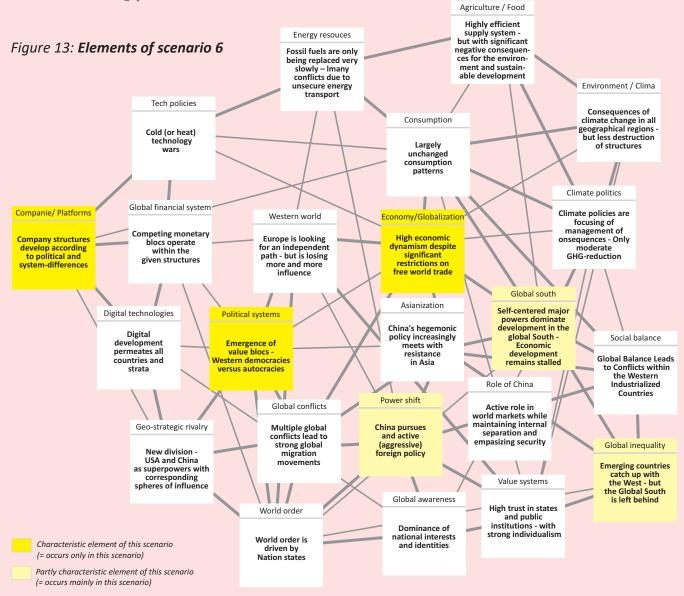
The consequences of climate change are felt in both hemispheres, but are kept within manageable limits in the framework of the respective climate policies. However, there is no further global coordination or consistent restructuring of the economy away from climate-damaging greenhouse gases. The agriculture and food industry also primarily follows efficiency targets while ecological aspects are often not taken into account.



SCENARIO 6 IN BRIEF

- New division of the world emergence of value blocs: Western democracies versus autocracies in a new "cold war"
- China has an economically and technologically leading position despite strong domestic orientation, but its hegemonic policy increasingly meets with resistance in Asia
- Company structures develop according to political and system-differences
- Multiple global conflicts (including intensive climate change) lead to strong global migration movements
- Sustained slumps and low global economic momentum despite largely free trade system

Scenario 6 appears, if two blocs and systems, the Western democratic and the Chinese authoritarian, are increasingly in conflict with each other.





CONFLICTUAL UNCERTAINTIES

Digital plutocracy and broad decline

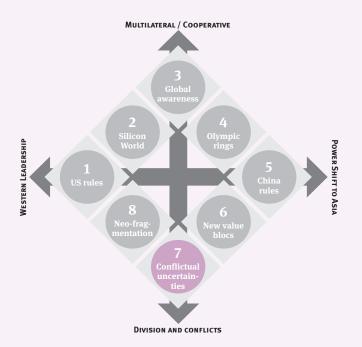
The world finds itself in an age of manifold uncertainties. Universal human rights and Western values such as freedom, the rule of law and tolerance are losing their appeal, while nationalist ideas and (partly) authoritarian forms of rule are increasing. Global institutions are unable to counter this development and are even blocked by the countries that support them. In this largely leaderless world order, numerous conflicts occur, which also repeatedly trigger large migration flows.

Both the United States and China are failing as world powers. While the United States is increasingly shielding itself from the vagaries of the global crisis environment, China is pursuing a more aggressive foreign policy, but is unable to finance it or enforce it globally due to flagging growth momentum. The European Union faces internal conflict to the point of disintegration and is therefore unable to fill the power vacuum. Instead, more and more former second-tier powers such as Russia, India, Japan, Australia, Brazil or Turkey are pushing into the emerging gaps - leading to new conflicts due to the low level of international cooperation.

With the general move away from free trade, the global economy is slipping into a prolonged phase of structural weakness. Occurring challenges can no longer be solved within the existing financial system, but global alternatives are not available. Most companies are operating in crisis mode, leaving little room for ethical considerations and social responsibility.

Many people around the world have to limit their demand for consumption and the global equalization of living conditions is reversing. While the Western industrialized countries are able to maintain their position, the global middle class in Asia is stagnating and the global South is falling further behind. A double divide is also emerging in the digital world, both in digital participation within societies and in digital penetration within individual nations. This is creating a digital plutocracy that develops its own dynamic due to the lack of political control.

The development is exacerbated by the global consequences of climate change, which in numerous countries of the global South are jeopardizing the functioning of state institutions, leading to a lack of societal support. There is no real global climate policy in sight.

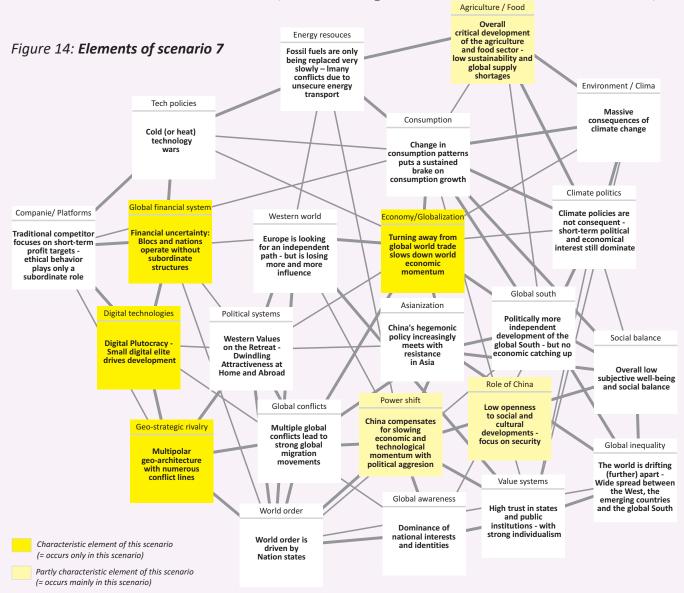


SCENARIO 7 IN BRIEF

- Multipolar geo-architecture in a Nationdriven world order leads to instability, numerous conflict lines and strong global migration
- Lack of global perspectives: Western Values are on the Retreat and China is sheltering

 and thus jeopardizing its economic success
- Today's world financial system is eroding without new global approaches taking its place: Blocs, nations and companies have to work in a world of financial uncertainty
- Rudimentary global climate policy shortterm interest still dominate
- Small elite drives global plutocracy low subjective well-being among the masses

Scenario 7 appears, if hardly any global cooperation is possible and states and groups always face each other in various kinds of conflicts (while a small global elite is able to avoid these conflicts).





NEO-FRAGMENTATION

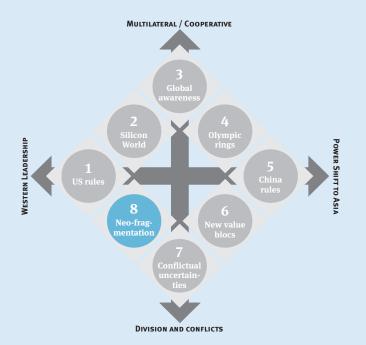
End of trust and public governance

In a highly individualized world, people are losing trust in politics, administration and public media. At the global level, this is also weakening the role of nation states, so that various interest-driven actors – from companies and lobbyists to civil society groups and numerous regional and local entities – are stepping into this gap. Urban areas in particular are becoming actors in their own right on the world stage, so that overall one could speak of a shift toward market states. While the USA and China are able to secure their position in this process, Europe is torn apart between the various centers of power.

The loosening of nation-state structures coupled with the weak position of global institutions is creating a patchwork of different actors and rules. Uniform value systems that provide orientation no longer exist. Instead, competing value systems rise all over the world. Authoritarian ideas are gaining a foothold in the West and, in parallel, Western ideas are attractive worldwide – even if China and other authoritarian states are trying to seal themselves off from this development. In this world without global leadership and cooperation, numerous conflicts occur, which also repeatedly trigger large migration flows.

Digital network monopolies act purely according to power and profit considerations. In doing so, they also rely on alternative private means of payment, thus forcing the public sector to lose control over the monetary system. The digital elite acts largely independently of real developments in specific countries and regions. While Western nations are largely able to maintain their position, the growth of the global middle class in Asia is stagnating and the global South is falling further behind. Many people around the world are having to curtail their consumption desires. This fragmentation ultimately also weakens the dynamics of the global economy – even with formal free trade structures.

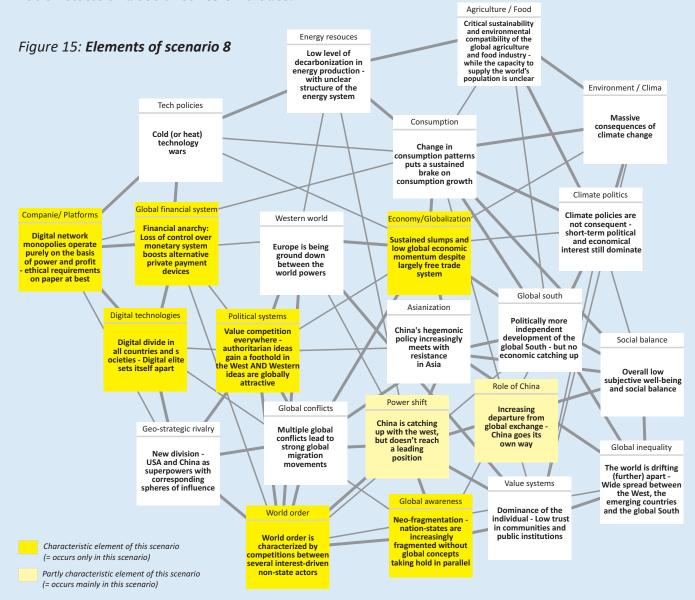
The development is exacerbated by the global consequences of climate change, which in many countries of the global South further restrict the functioning of state institutions. The lack of global cooperation and overarching governance ultimately leads to a lack of reforms in the agricultural and food sector, and in some regions even jeopardize food supplies. Climate policies remain limited to individual regions, segments or corporate initiatives, which makes global success impossible from the start.



SCENARIO 8 IN BRIEF

- In a highly individualized world, people lose trust into politics and public authorities
- Nation-states are increasingly fragmented without global concepts taking hold in parallel. In return, various competing nonstate-actors are gaining in importance
- Digital network monopolies operate purely on the basis of power and profit: Digital divide in all countries and societies
- Value competition is everywhere: authoritarian ideas gain a foothold in the West AND Western ideas are globally attractive.
- Loss of control over monetary system boosts alternative private payment devices

Scenario 8 appears, if, in an individualized world, people lose confidence in increasingly weak nation states and social cohesion erodes.





SCENARIO ASSESSMENT

The New Global scenarios are initially "thinking tools" to which no probabilities are assigned. They are intended to stimulate us to tread hitherto little-used paths of thought – and not just on our own, but especially in public discourse. However, in order to support not only thinking, but also subsequent action, more farreaching questions arise: How much change – seen from today's perspective – is associated with a scenario? What development do we expect in the future (probabilities)? And are there scenarios that we would rather see occur than those of others (preferences)? These questions are explored in the context of a scenario assessment.

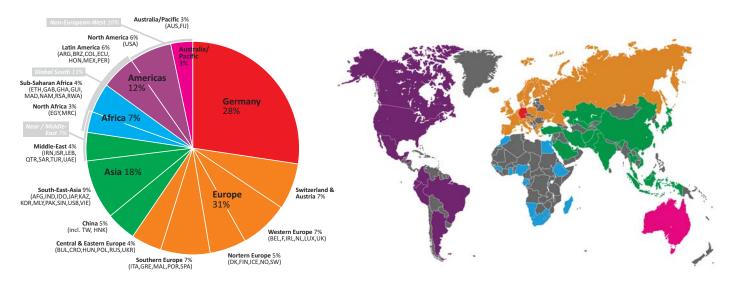
The scenario assessment was conducted in the period September 2021 to January 2022 via an online platform. In the process, the respondents each had to evaluate ten differences in the future space with regard to (1) their proximity to the present situation, (2) their proximity to the expected future in 2035, and (3) their proximity to the personally desired future. From this, three future profiles (proximity to the present, expectation and desire) could be determined. It was also possible to determine how close each of the eight scenarios is to the present, expectation and desire.

A total of 204 experts from 66 countries took part in the survey (see Figure 16). This gives us a good basis for an initial assessment, but by no means a representative picture. Although the regional distribution shows a focus on evaluators from Germany and Europe, all continents and

many georegions are represented with at least 10 evaluators, so that we will present an evaluation for these georegions in addition to the overall evaluation. In the regional segmentation, we first distinguished between ratings from Germany and the five continents (see colors in Fig. 16). Within the individual continents (with the exception of Australia/Pacific), we then distinguished between two and five sub-segments, each of which had more than 10 expert assessments. In addition, we analyzed three cross-continent subregions: (1) the Middle East as a combination of the Middle East and North Africa and (2) the Western countries, based on OECD membership, and (3) the countries of the Global South.

In addition to the regional origin, the age of the respondents and their occupation were also queried and analyzed.

Figure 16: Participants in initial assessment



Current situation

The first question was used in each case to determine what future development is already discernible today. The goal here is not an exact description of the present. Rather, the aim is to determine the starting point for expected or desired changes.

At the scenario level, the survey provides a picture without extreme swings, indicating that elements of all scenarios can already be recognized in the present (see Figure 17). The highest correspondence with the present contains scenario #6 ("New value blocs"), in which a new cold war is described. In addition, there is scenario #8 ("Neo-fragmentation"), which is seen as close to the present, especially in Asia and Latin America, but also in Eastern Europe (see Figure 18). Scenarios #2, #3 and #4, on the other hand, which are particularly characterized by cooperation and multilateral thinking, show the least proximity to the present. Only in Sub-Saharan Africa do Scenarios #3 ("Global Awareness") and #4 ("Olympic rings") almost reach the peak of Scenario 6 in terms of present-day proximity.

If we look at the results of the ten individual questions (see Figure 19), we also see a rather negative view of the present. Above all, the global climate policy prevented by national egoisms and the decoupling of the global South from global prosperity development are seen as characteristic. In contrast, the power shift to Asia and the formative role of politics and public actors are viewed slightly positively. A look at the details provides some further insights:

Today's world is consistently described across all regions, age and occupational groups as dominated by national interests and not very globally solution-oriented – especially in Northern and Eastern Europe, North Africa and North America. Evaluators in China and Sub-Saharan Africa, but also in Germany, already emphasize more strongly the multilateral elements

• The rivalry between the U.S. and China as well as the critical situation of the Global South are seen in almost all regions, age and occupational groups – especially among younger respondents. A different assessment of the present is only found among the evaluators from Sub-Saharan Africa, who expressed a much more positive view of the initial situation overall.

Figure 17: **Nearness of scenarios to the current situation**

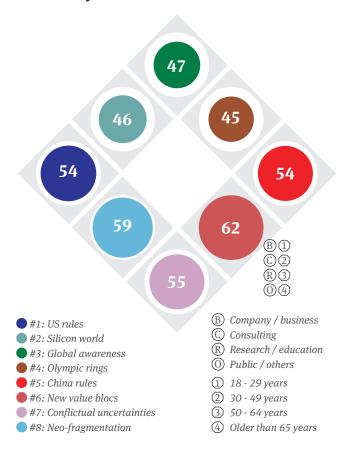
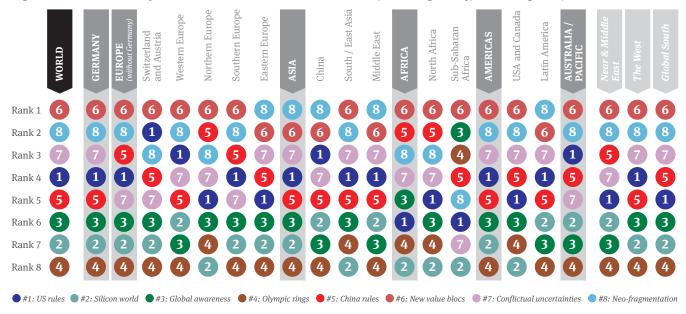
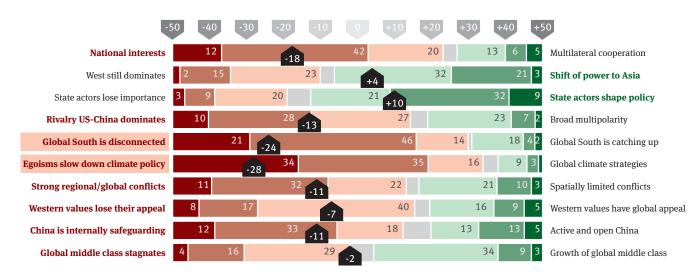


Figure 18: Nearness of scenarios to the current situation (Ranking in different regions)



- Evaluators from the West (USA and Europe, with the exception of Eastern Europe) see a distinctly weaker role for the state in the present.
- A look at Western values shows a clear difference in assessment in relation to age. These values, such as freedom, the rule of law, equality, individualism and tolerance, still have global appeal from the perspective of younger raters today, while they are already losing appeal from the perspective of older raters. Evaluators from the USA and Canada also give a distinctly positive assessment, while the most critical assessments of the present come from North Africa and Latin America.
- China is perceived as significantly more cohesive by evaluators from the USA and Southeast Asia than by evaluators from Africa, the Middle East and China itself.
- The position of the global middle class is viewed very differently by the respondents: While in sub-Saharan Africa, but also in Northern Europe, a clearly positive image of the present prevails, Latin America and Eastern Europe record a clearly critical image of the present here.

Figure 19: Profile of current situation



Expected future 2035

The second question, which is particularly important from the point of view of futurists, is that of the expected future in 2035 (and beyond). The corresponding assessments are then also compared with the nearness to the present situation, so that an expected change becomes apparent.

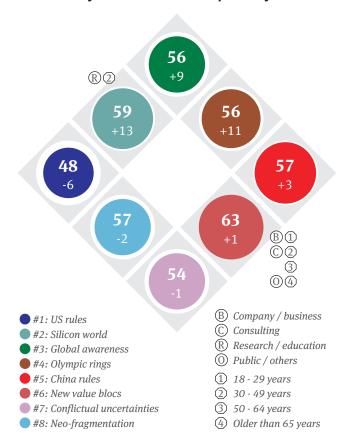
At the scenario level, the high uncertainty regarding global development is reflected in the fact that the expected values of the eight scenarios all lie in a narrow range between 48 and 63 (see Figure 20). Scenario #6 ("New value blocs") – in addition to the highest nearness to the present situation – also has the highest probability. It therefore represents a continuity scenario.

Scenario #2 ("Silicon World") also has a high expected value - particularly in Asia, the Middle East and the global South (see Figure 22). In China, scenario #3 ("Global Awareness") is even ahead, and in Eastern Europe, Scenario #8 ("Neo-fragmentation") has the highest expected values. Scenario #1 ("US rules") is least expected to occur in 2035. Only China, North Africa, Southern Europe and Latin America consider Scenario #7 ("Conflictual Uncertainties") to be even less likely.

A look at the expected changes reveals an overall optimistic picture of the future, with the highest increases in scenarios #2 ("Silicon Word"), #3 ("Global awareness") and #4 ("Olympic rings"), which are characterized by cooperation and multilateral thinking. Only the Eastern European ratings show little of this optimism.

The ratings of the ten individual questions (see Figure 21) underpin the high level of uncertainty, as there is no clear expectation for most of the questions. The most certain is the statement on the expected Power Shift to Asia. In addition, stronger regional and global conflicts are expected in 2035.

Figure 20: Nearness of scenarios to the expected future



It is interesting to look here at the expected changes, which, according to Figure 20, essentially point to the right, i.e., are positive changes. These are more powerful global climate strategies, an overcoming of the U.S.-China rivalry through broad multipolarity, and a significant improvement of the situation in the global South.

Figure 21: Profile of the expected future 2035

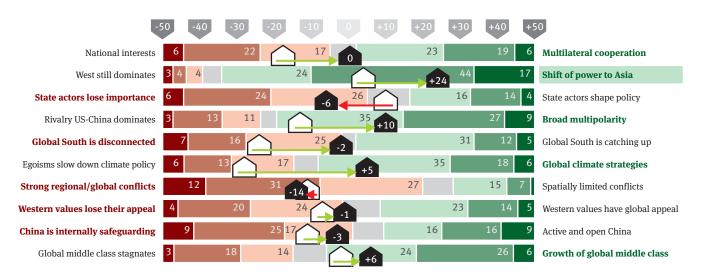
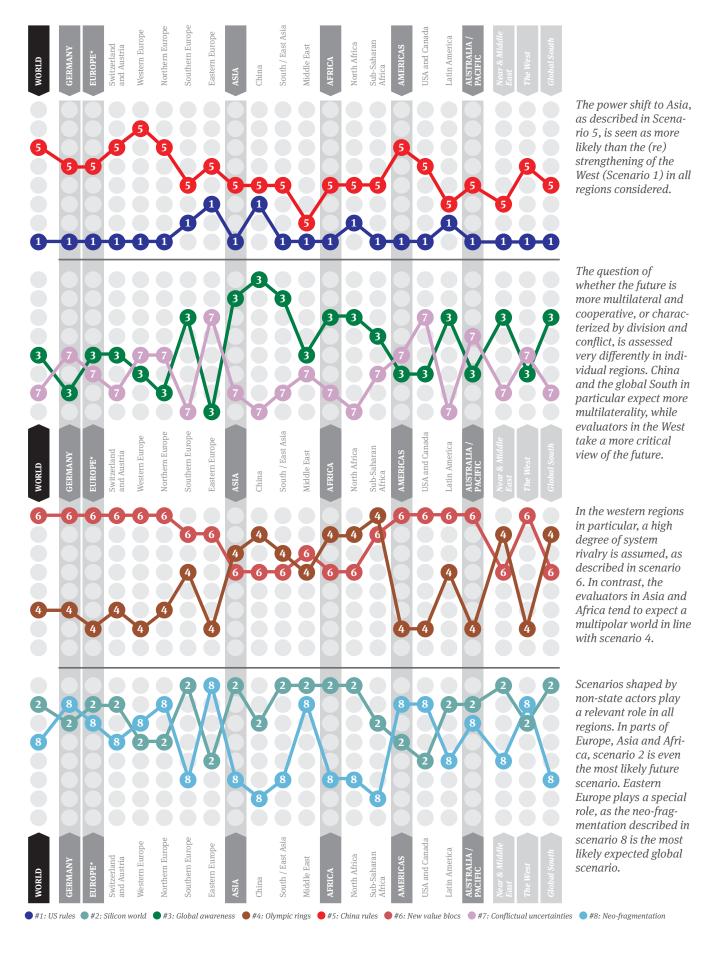


Figure 22:

Nearness of scenarios to the expected future (Ranking in different regions)



Those who look at the individual issues and the evaluator groups at the same time gain additional information:

- Stronger multilateral cooperation is expected by the evaluators above all in Asia, Middle East and Latin America significantly more than in "the West", especially in Germany and Eastern Europe.
- The shift of power to Asia is expected in all regions and groups – especially among younger people and in consulting. In the Middle East and Australia, this expectation is weaker – relatively speaking.
- Evaluators from both the U.S. and China expect an increase in the importance of non-state actors (as do evaluators from the public sector), while such a shift is expected to be less pronounced in Southern and Eastern Europe as well as North Africa.
- In Asia, Africa and Latin America in particular, the global South is expected to catch up and the global middle class is expected to grow – as are corporate and research evaluators. In Western countries, such an expectation is lower.
- The evaluators in the Americas, and especially the younger evaluators, see a high global significance of Western values in the future.
- Asia in particular is expected to have a peaceful, less conflict-ridden future, while other regions expect a much more critical development. This negative view of the future is particularly prevalent in Sub-Saharan Africa, but also in Western and Northern Europe.

Preferred future

Finally, the question was asked what future development is personally desired. These statements are also compared with the present view, so that a desired constancy or desired change is identified.

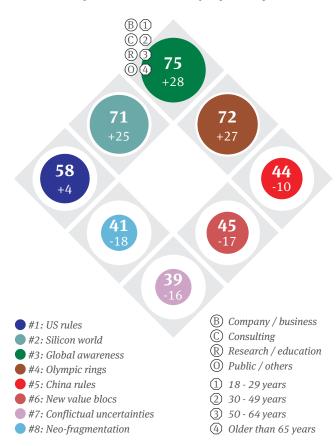
In contrast to the expected future, a clear preference is shown here at the scenario level (see Figure 23): the higher the scenario on the map, the more desirable it is. In this respect, scenario #3 ("Global awareness") describes the most preferred future, followed by scenarios #4 ("Olympic rings") and #2 ("Silicon world"). Only in Eastern Europe is scenario #2 ahead of the otherwise mentioned desired scenario #3 (see figure 24).

For the two unipolar scenarios, there is a tendency towards scenario #1 ("US rules"). This is partly due to the fact that Scenario #1 contains the globally desired value developments, while Scenario #5 ("China rules") assumes much more regid governance in many regions of the world.

Scenario #7 ("Conflictual uncertainties") has the lowest desired value and in this respect can be regarded as the least preferred scenario. In Southern and Eastern Europe, even scenario 5 is at the bottom of the ranking.

The individual questions also show a very clear picture (Figure 25). In particular, the respondents would like to

Figure 23: **Nearness of scenarios to the preferred future**



see greater global cooperation, for example in climate policy, greater multipolarity with a corresponding role for Russia, India and Europe, strong growth of the global middle class, fewer global conflicts and greater importance for universal values worldwide. There are only two questions where no clear preference can be identified – the power shift to Asia and the role of politics and non-state actors such as companies and civil society. These are also the two questions where no significant desire for change is discernible.

Finally, interesting individual developments can also be discerned in the preferred future:

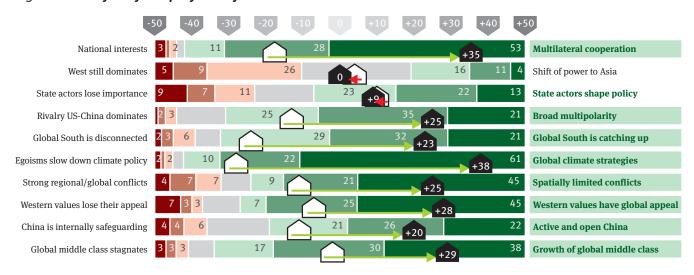
- A world characterized by multilateral cooperation is desired everywhere – but particularly strongly by the evaluators in Germany and North America (and in the age group between 50 and 64). A more national orientation is found in Middle East and in Eastern Europe.
- The desire for a shift of power to Asia exists primarily in Asia itself, as well as in Africa and Latin America. The overall rating in the Global South in +7, while in the West, it is evaluated 6 (both on a scale from -50 to +50). This shift is viewed particularly critically in Australia as well as in Northern and Eastern Europe.
- A (more) multipolar world order is desired in all regions especially in Middle East, Latin America and Eastern Europe.

Figure 24: Nearness of scenarios to the preferred future (Ranking in different regions)



- Catching up with the global South is clearly preferred in the global South itself (especially in southern Africa and Middle East), while approval ratings are relatively lower in Southern Europe and Australia/Pacific.
- A global climate policy is preferred in all regions and all age and occupational groups, with Africa and Eastern Europe bringing up the rear.
- Western values are seen as desirable by all applicant groups – but with lower approval ratings in Asia and the Middle East.
- An open China is viewed positively above all in China itself, while approval ratings are significantly lower in the Middle East.

Figure 25: Profile of the preferred future



Conclusion

1. A global dialogue is possible:
Participants from over 65 countries have engaged in the development and assessment of the New Global Scenarios.

2. The present lacks cooperation:

Today's world is consistently described by the dominance of national interests, a low degree of multinational combined efforts as well as a decoupling of the Global South.

3. The power shift to Asia is in full swing:

Already today, an increasing dominance of Asia can be observed. This shift in power is expected by almost all evaluators to continue in the future.

4. Alliances by all means – system rivalry perhaps:

Global alliances will play an important role in the future. System rivalry as a conflict between value-oriented democracies and illiberal governments up to authoritarian states characterizes the image of the future of Western evaluators in particular, while in China and the global South other images of the future are at least as important.

5. China and the Global South are more optimistic:

Expectations for the future differ among regions. While Asian and African participants anticipate a peaceful, less conflict-ridden future, other regions' experts assume a more critical development.

6. Universal values are part of the future:
Especially younger evaluators see a high global significance of

universal values such as freedom, the rule of law and tolerance.

7. Transformation is a global topic:

While the current situation and its future continuation are viewed as critical, there is a clear and consistent global desire for change. How this transformation should be put into action remains less clear and consistent – but is likely to be THE key future issue.

8. Successful climate policy is only possible with cooperation:

While climate policy often still plays a subordinate role in today's decisions (despite its immense importance), participants expect its role to rise and correspondingly desire intensified combined efforts.

9. Non-state-actors could be the unknown game-changer:

The view on non-state actors such as companies and NGO's is vague and unclear. But in all regions, there are corresponding scenarios that could change the global architecture.

KEY FACTORS

Key	factors	Key uncertainties – Dimensions of future projections
1	Geo-strategic rivalry and alliances	 Intensity of geo-strategic rivalry between the US and China Independent position of middle power (i.e. Europe, India, Russia)
2	Competition of political systems	 Attractivness and power of universal values in countries outside of »the West« Relevance/attractiveness of (partially) authoritarian/regressive currents in »the Western world«
3	World order	 Degree of multilateral co-operation / decision-making Substitution of public power by non-state institutions (companies, NGO's)
4	Global awareness / identities	 Global awareness / Willingness to solve global problems together Strength of regional / sub-regional identities (relative to national identities)
5	Power shift	Role of China (Asia) in economy and technologyForeign policy power of China
6	Role of China	 Openness of China to social and cultural developments Independence and self-reliance of China regarding technology
7	Asianization / Role and structure of Asia	Asiatic structuresAcceptance of China within Asia
8	Western World / USA and Europe	 Political orientation of Europe / Unity of »the West« Power of European Union / Level of integration
9	Global South (Emerging / Developing countries)	Economic development (Closing the gap)Degree of political freedom / independence
10	Global inequality	Inequality between Western industry states and emerging countriesInequality between emerging countries and the Global South
11	Global conflicts and migration	Degree and intensity of global conflictsIntensity of global migration (refugees)
12	Social balance / Global middle class	Rise of the global middle classSatisfaction of the old middle class in the Western Industrialized countries
13	Global environmental situation / Climate change	 Direct pressure to act in (Northern) industrialized countries due to environmental and climate impacts Degree of destruction of political and social structures due to climate impacts in southern countries
14	Climate policies	 Degree of political action to reduce greenhouse gases (GHG)-emissions Intensive of political action to manage the consequences of climate change
15	Value systems / Trust in public authorities	Value orientation (Individualim vs. Collectivism)Trust in state, government and public autorities
16	Economic development / Globalization and world trade	Dynamic of economic developmentDevelopment of global trade / Level of globalization
17	Global finanical system / markets	Existence of global financial systemResolving of financial challenges within current system
18	Company structures / Global platforms	 Adherence of ethical standards within companies (intrinsic / legal) Platform effects and concentration within digital ecosystems
19	Consumption patterns / Resource efficiency	 Change in consumption patterns (in industrial and emerging countries) Relevance of circular economy (and similar sustainability approaches)
20	Digital technologies (AI, XR, QC) / Digitization	 Degree of digital transformation / Digital penetration (Global digital divide) Digital participation (Inner-societal digital divide)
21	Tech policies of nations / Digital policies	Degree of technology-based conflictsStandardization of technology concepts
22	Energy resources and systems	 Structure of the energy system (Security of energy transport / decentralization) Level of decarbonization in energy production
23	Land, agriculture and food	 Capacity and structure of the global agricultural and food economy to supply the world population Sustainability and environmental compatibility of the global agriculture and food industry

Key factors are the issues that are addressed in the scenario process. For each key factor, open questions were discussed and two **key uncertainties** were identified. Their combination enabled the derivation of four to five **future projections**, which in turn are the building blocks of the individual scenarios (for future projections, see individual scenario networks).

NEW GLOBAL SCENARIOS – INTERCONNECTED

Our New Global scenarios did not emerge in a vacuum. On the one hand, they draw on many sources (see page 38) and, on the other, they can be compared with other sets of scenarios that also take a global perspective. We have put some of these global scenarios in relation to the New Global scenarios.

Figure 26: Comparison of scenarios



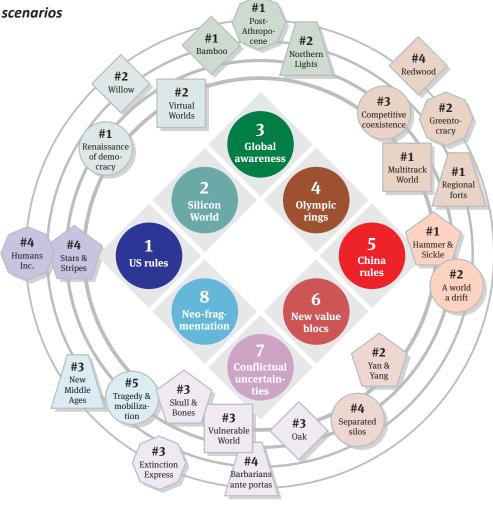
Four scenarios for 2040 developed for the European Union in 2019/2020 based on level of globalization and transformation of economic systems.



Four scenarios for Geopolitical Order in 2025-2030 developed by CSIS in 2020 - based on US and Chinese global influence as main driver.

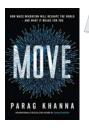


Three scenarios for global collaboration in 2035 developed by OECD in 2021 based on six main drivers of change.





Five scenarios for 2040 developed for the National Intelligence Council in 2021 - based on societal. state and international dynamics.



Four scenarios of the global development developed by Parag Khanna - based on the two main drivers sustainability and global migration.



Plausible scenarios for 2050 developed by Arup in 2019. The four scenarios base on the dimensions societal conditions and planetary health.

TO ME, NEW GLOBAL MEANS ...

What does "New Global" mean to you? What are the most important topics – and how did you perceive the scenario process? We asked these questions to some experts from our scenario team. Here are their answers.



Akua Sena DansuaFormer Ambassador and
Former Minister of State, Ghana

To me, New Global is ...
the ability of political leaders to explore growth and development opportunities for their countries and citizens, devoid of ideological underpinnings, conflict and economic exploitation and in a peaceful and better world.



Karl H. SchreinerFormer Director Education
Bundeswehr Command and Staff College
Germany

To me, New Global means that ...

- (1) I can analyze the rapid changes in an increasingly complex world in a more structured way and thus better relate events and processes.
- (2) the diverse scenarios strengthen my willingness to be open to the future and to change.
- (3) Knowing the breadth and diversity of the experts involved, I can assume a pronounced freedom from ideology, which considerably strengthens my trust in the scenarios.
- (4) working with the scenarios and networking them creates new knowledge and new competencies that are essential for our future.
- (5) this excellent tool can help to better manage the uncertainties on the way to the future, because *"there* is nothing man fears more than being touched by the unknown. One wants to see what is reaching for one, one wants to recognize it or at least be able to classify it. Everywhere, man evades the touch of the unknown". (Elias Canetti, Mass and Power)"



John M. Smart CEO ForesightU, Ann Arbor, USA

To me, New Global means ... we all increasingly recognize it is our global network of knowledge sharing, production, consumption, and "coopetition" that drives today's astonishing technical productivity and wealth creation. Local power and rulesets will continue to shift within this network, but the connectedness, interdependence, diversity, specialization, equity, and health of the network itself will remain paramount. As total global wealth and power grow, equitable and transparent networks are becoming particularly vital. Equitable distribution of power between markets, the state, and civil society, between the holders of capital and labor, between the majority and marginal groups, and equitable treatment of other species in our web of life. Activism for such equitability will continue to grow, and technical capability will matter increasingly less than how people are treated and how they feel. In global leadership, beneficial and inclusive networks will continue to win.



Dr. Tom SommerlatteChairman of the Advisory Board
Arthur D. Little GmbH, Germany

To me, New Global means ... that our globe has to be seen as the ship on which we all sail together on a vast sea. To stay afloat, we have to understand ourselves as members of a single crew with a common course, all be it with different tasks and roles, but cooperating rather than viewing parts of the ship as independent. Instead, we need to master the interdependencies of bow, stern, quill and masts.



Dagobert Hartmann

For me, New Global means that ... geopolitics will increasingly determine our future. The ongoing systemic rivalry between the US and China and the struggle for technological supremacy will shape the next decade. Despite the rivalry between the great superpowers, major global challenges such as climate change or cybercrime can only be solved collaboratively by the world community. In this regard Germany and Europe will play a decisive role as a pioneer of the Green Deal, a digital regulatory power, and a defender of liberal values. The study uncovers the enormous tectonic shifts in economy, society, and politics, and is able to condense them into eight plausible scenarios. Even if they don't claim to predict the future, it's obvious that the times lying ahead of us will be radically different from those we've experienced in our lifetimes.



Aimal Shams ty, Former Deputy Minister in the Government

To me, New Global means ... a clear shift from currently popular thinking of superpower rivalries especially between the US and emerging China. The recent invasion of Ukraine by Russia shows, the world will not be just bipolar but rather multi-polar with several other powerful nations seeking a prominent political and economic role on the world stage. Yet, among all the new and emerging rivalries, there is an increasing sense of optimism in the form of people activism disregarding authoritarian regimes and embracing the modern democratic values. COVID-19 Pandemic and Climate Change risks have been an eye-opener for all nations on the globe that there are only two choices in the long-term for human race; it is either collective effort for shared prosperity or collective self-destruction.

The choice is ours now.



Yelena V. Muzykina, PhD Fellow, Center for Postnormal Policy and Futures Studies, Almaty, Kazakhstan

For me, New Global means ...

living among more chaos, contradictions, and complexity. They generate more uncertainty and black swans. However, we become fast learners of how to navigate through. We become skillful enough to produce a wide range of scenarios that bring unthought insights and broaden future horizons. These scenarios are genuinely multicultural and look like a vast mosaic with a unique pallet of different pieces. People are not shocked by devastating events that will increase due to objective factors but are ready to adjust and operate under them. However, ethical issues start gradually prevail over economic benefits; peacebuilding subdues political dividends; public wellbeing overcomes the elitist lobby. Technology is no longer seen as a threat to humanity: neither does it take us by surprise with its fast developments, for we finally understand and clearly define the objective of our HiTech progression. Unthought futures are easier pictured than the extended present.



Matthias Altendorf CEO Endress + Hauser Group, Switzerland

To me, New Global means that Asia is gaining in importance, economically, politically and culturally - especially China and India. China is transforming itself from a low-cost production location to an innovation engine and is strategically expanding its influence in the world. We face a multipolar world with two dominant players, the U.S. and China. We must counter this systemic competition with openness and not with isolation. Diversity and freedom, as well as peace in Europe, are our strength; convenience and political short-sightedness are our weakness. I see environmental protection, migration and demographic development in the aging Western societies as the greatest tasks. Furthermore, we must guarantee the digital freedom and sovereignty of states and people, otherwise there will be no more democracy and free will formation.

NEW GLOBAL SCENARIOS...

FOR EXECUTIVES

Scenarios can be used by business and public sector executives to build future knowledge and make more robust decisions. They can do this in a number of ways

Basis for specific scenarios

(What specific changes could be relevant for me?)

The New Global scenarios apply to all regions and in all industries. Therefore, they are based on general key factors and can only partially reflect specific developments for individual countries, regions or industries. If companies or organizations want to use more specific scenarios, they can use the New Global scenarios as a basis and focus on the more specific issues in their own scenario work. It is also conceivable to develop your own industry or regional scenarios (or use existing ones) and combine them with the New Global scenarios.

Individual scenario assessment (Do I have blind spots in my view of the future?)

Part of the New Global project was a scenario assessment in which executives from more than 60 countries participated. This provides a global assessment of the present and future, but this does not have to be identical to the view of one's own organization. Therefore, an individual scenario assessment can be carried out so that one's own perspective of the future can be compared with that of the global experts.

Consequence analysis

(What opportunities, threats and options do I have?)

Many of one's own options for action are reactions to environmental developments. Therefore, the first step is often to analyze the impact of the scenarios on one's own company or organization. In this impact analysis, all scenarios should be "kept in play" for as long as possible in order to identify the opportunities hidden in the supposedly more negative scenarios as well as the dangers of a superficially "good" development that are readily suppressed. Concrete options for action can then be derived from these opportunities and threats.

ScMI has facilitated more than 500 scenario processes since the 1990s, supporting companies and public institutions in more than 25 countries. The basis for this is the methodology of scenario management and a variety of formats - from individual seminars and workshops to projects and extensive scenario studies. Most formats combine face-to-face and online activities.

Stress test / **robustness check** (How robust is my strategy?)

The New Global scenarios are like the "global weather forecast" for our business or activity. Therefore, existing strategies or concepts can be checked for their future robustness with the help of the scenarios. In this way, weaknesses in existing strategies are made clear. At the same time, it can also be seen whether and how robust the strategies are against changes in the environment.

Scenario-based decision-making (Which strategy is suitable for global change?)

How we deal with uncertainty depends on how many and which scenarios are considered in a strategic decision. Two extremes can be distinguished: In the framework of focused strategies, one concentrates on an expected scenario and develops a strategy suitable for it. In the context of robust strategies, several - possibly even all scenarios are taken into account in one's own actions. In scenario management, there are various ways of deriving one's own strategies from external scenarios. One particularly frequently used form is strategy scenarios, which are also used to think through one's own range of possibilities.





FOR ORGANIZERS

The New Global scenarios are intended to be a communication tool. They should be discussed, even controversially. Against this background, the authors of the study are available for presentation and discussion at conferences and events (in person and online). For inquiries please contact Gilla Huthmacher at huthmacher@scmi. de or +49 5251 150570.

FOR RESEARCHERS

The New Global scenarios were created in an open scenario process. All results are available on ScMI's website (www.scmi.de). In this respect, researchers and scientists can use all materials in courses without any problems. ScMI is happy to provide templates for this purpose. If you are interested, please contact Gilla Huthmacher (huthmacher@scmi.de | +49 5251 150570).

FOR SCIENTISTS & STUDENTS

We are happy to see the New Global scenarios used and cited in scientific as well as in student papers. Scientists and students are welcome to send a reference to their work to info@scmi. de. We recommend the following format for citations:

Fink, Alexander; Jürgensmeier, Hanna; Ohse, Sarah; Kuhle, Jens-Peter (2022): New Global-Scenarios, World Economy, Power Shift and Global Architectures, ScMI Scenario Management International AG. Paderborn.



FOR PRESS & MEDIA

Full and short-length bios and photos of all authors can be downloaded at ScMI's website (www.scmi.de).

If you are a reporter and want to interview one of the authors for a story, or if you need further research on the New Globalscenarios, please contact Gilla Huthmacher (huthmacher@ scmi.de | +49 5251 150570).

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foresightlab is a transdisciplinary platform founded in 2014 by Klaus Burmeister and Beate Schulz-Montag at the interface of future-oriented research and consulting. In its scenario and foresight projects, it connects different competence partners on a task-related basis in order to jointly explore and test solution approaches for shaping a sustainable future. The main topics are the fundamental upheavals and transitions in work, production and life as a result of the digital transformation and change processes in the economy and society.



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