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**Strategic Thinking in the Information Age and
the Art of Scenario Designing**

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Scenario Thinking in the Information Age

- ◆ Scenario thinking is strategic thinking for the information age
- ◆ One scenario strategies of industrial age are substituted by multiply alternative scenario strategies
- ◆ Emergence of scenario thinking has same timing as emergence of information age

Scenario Thinking in the Information Age

- ◆ Emergence of scenario thinking is response to growing uncertainty of emerging information age
 - ◆ Scenarios are about freedom and choices
- ◆ Scenarios are about choices of future and present

Strategic Thinking

◆ Industrial Age

- ◆ Forecasting
- ◆ Technological Forecasting
- ◆ Prognosing
- ◆ Trend Extrapolation
- ◆ Modelling
- ◆ Strategic Planning
- ◆ Strategic Analysis

◆ Information Age

- ◆ Scenario Thinking
- ◆ Scenario Writing
- ◆ Scenario Planning
- ◆ Scenario Designing
- ◆ Long View
- ◆ Mental Maps
- ◆ Wild Cards
- ◆ Assumption Based Planning
- ◆ War Gaming
- ◆ Learning Organization

Scenario Thinkers

- ◆ Herman Kahn
- ◆ Pierre Wack
- ◆ Gill Ringland
- ◆ Miriam Galt
- ◆ Jerome Glenn
- ◆ Theodore Gordon
- ◆ Liam Fahey
- ◆ Robert Randall
- ◆ Chantel Ilbury
- ◆ Clem Sunter
- ◆ Diana Scarce
- ◆ John Petersen
- ◆ Peter Schwartz
- ◆ James Ogilvy
- ◆ Lawrence Wilkinson
- ◆ Napier Collyns
- ◆ Art Kleiner
- ◆ Kees van der Heijden
- ◆ Adam Kahane
- ◆ Ged Davis
- ◆ Michel Godet
- ◆ Andrew Marshall
- ◆ Katherine Fulton
- ◆ Max More

Strategic Thinkers

- ◆ Herman Kahn
- ◆ Ossip Flechtheim
- ◆ Buckminster Fuller
- ◆ Daniel Bell
- ◆ Yoneji Masuda
- ◆ Alvin Toffler
- ◆ John Naisbitt
- ◆ Pierre Wack
- ◆ Peter Schwartz
- ◆ James Ogilvy
- ◆ Arie de Geus
- ◆ John Petersen
- ◆ Jerome Glenn
- ◆ Peter Senge
- ◆ Napier Collyns
- ◆ Lawrence Wilkinson
- ◆ Art Kleiner
- ◆ Stewart Brand
- ◆ Andrew Marshall
- ◆ Arthur Cebrowski
- ◆ John Garstka
- ◆ Thomas Barnett

Scenario Thinking Organizations

- ◆ RAND Corporation
- ◆ Hudson Institute
- ◆ SRI International
- ◆ Royal / Dutch Shell
- ◆ Batelle
- ◆ Global Business Network
- ◆ Arlington Institute
- ◆ Millennium Project of AC/UNU
- ◆ Net Assessment Office
- ◆ Club of Rome
- ◆ Global Scenario Group
- ◆ Chatham House
- ◆ IDON
- ◆ RAND Pardee Center

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- ◆ Herman Kahn: On Escalation. Metaphors and Scenarios. 1965
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- ◆ Peter Schwartz: The Art of Long View. Planning for the Future in an Uncertain World. 1991
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- ◆ Kees van der Heijden, Ron Bradfield, George Burt, George Cairns, George Wright: The Sixth Sense. Accelerating Organizational Learning with Scenarios. 2002
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- ◆ **John Petersen: Out of the Blue. How to Anticipate Wild Cards and Big Future Surprises. 1999**
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- ◆ **Chantell Ilbury, Clem Sunter: Mind of a Fox. Scenario Planning in Action. 2001**
- ◆ **James Ogilvy: Building Better Futures. Scenario Planning as a Tool for a Better Tomorrow. 2002**
- ◆ **Peter Schwartz: Inevitable Surprises. Thinking Ahead in a Time of Turbulence. 2003**
- ◆ **Rober Lempert, Steven Popper, Steven Bankes: Shaping the Next One Hudred Years. 2003**
- ◆ **Diana Searce, Katherine Fulton: What If ? The Art of Scenario Thinking for Nonprofits. 2004**

Milestones of Scenario Thinking

- ◆ 1950 Herman Kahn started and developed scenario techniques at RAND Corporation
- ◆ 1956 Emerging information society in United States
- ◆ 1960 Herman Kahn founded Hudson Institute
- ◆ 1960 Several Herman Kahn's books on scenario thinking
- ◆ 1970 Warning scenarios of Club of Rome
- ◆ 1970-1980 Developing scenario thinking and scenario planning at Royal / Dutch Shell
- ◆ 1984 Pierre Wack's articles on scenario planning
- ◆ 1990 Emerging World Wide Web

Milestones of Scenario Thinking

- ◆ 1987 Foundation of Global Business Network by Peter Schwartz, Jay Ogilvy, Napier Collyns, Stewart Brand and Lawrence Wilkinson
- ◆ 1995 Wired Magazine – Scenarios Special Edition
- ◆ 1997 The Millennium Project of AC/UNU started
- ◆ 1997 State of the Future reports published every year
- ◆ 1999 Future Research Methods 1.0 edited by Jerome Glenn
- ◆ 1999 Out of the Blue - How to Anticipate Wild Cards and Big Future Surprises by John Petersen
- ◆ 2003 Future Research Methods 2.0 by Jerome Glenn and Theodore Gordon
- ◆ 2004 Pentagon's 2020 warning scenario by Peter Schwartz and Doug Randall

What Are Scenarios

- ◆ Scenarios are stories
- ◆ Scenarios are maps of the future
 - ◆ Scenarios are mental maps
 - ◆ Scenarios are mental models
 - ◆ Scenarios are narratives
 - ◆ Scenarios are pictures
 - ◆ Scenarios are models
- ◆ Scenarios are sets of indicators
 - ◆ Scenarios are tools
 - ◆ Scenarios are art

What Are Scenarios

- ◆ Scenarios are the powerful vehicles for challenging our mental models about the world.
 - ◆ Peter Schwartz
- ◆ Scenarios are a tool for helping us to take a long view in a world of great uncertainty.
 - ◆ Peter Schwartz
- ◆ Scenarios are stories about the way the world might turn out tomorrow, stories that can help us recognize and adapt to changing aspects of our present environment.
 - ◆ Peter Schwartz.

What Are Scenarios

- ◆ Scenarios are attempts to describe in some detail a hypothetical sequence of events that could lead plausibly to the situation envisaged.

◆ Herman Kahn

- ◆ Scenario is a tool for ordering one's perceptions about alternative future environments in which one's decisions might be played out.

◆ Peter Schwartz

- ◆ Scenario is a set of organized ways for us to dream effectively about our future.

◆ Peter Schwartz

What Is Scenario Planning

- ◆ Scenario planning is about making choices today with an understanding of how they might turn out.

◆ Peter Schwartz

- ◆ Scenarios liberated planning from the traditional predict and control approach. They are not accurate forecasts, they are, as Kahn said, thinking tools.

◆ Kees van der Heijden

Steps to Developing Scenarios

Peter Schwartz's Method

- ◆ Step One: Identify Focal Issue or Decision
- ◆ Step Two: Key Forces in the Local Environment
- ◆ Step Three: Driving Forces
- ◆ Step Four: Rank by Importance and Uncertainty
- ◆ Step Five: Selecting Scenario Logic
- ◆ Step Six: Fleshing Out the Scenarios
- ◆ Step Seven: Implication
- ◆ Step Eight: Selection of Leading Indicators and Signposts
 - ◆ Peter Schwartz: The Art of Long View

Scenario Thinking – 5 Phases

According to Diana Searce and Katherine Fulton

- ◆ **Phase One: Orient – Interviews, Focal Issues**
- ◆ **Phase Two: Explore - Critical Uncertainties, Predetermined Element**
- ◆ **Phase Three: Synthesize – Scenario Framework, Scenarios**
- ◆ **Phase Four: Act – Implications, Strategic Agenda**
- ◆ **Phase Five: Monitor – Leading Indicators, Monitoring System**

Scenarios Slovakia-EU 2025

Industrial Technology

**I
N
D
U
S
T
R
I
A
L

A
G
E**

**Problematic
Child**

**Industrial
Periphery**

**Grey
Mouse**

**Information
Express**

**I
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Information Technology

Slovakia-EU 2025 Wild Card Scenarios

- ◆ Ethnic Conflict
- ◆ Social Conflict
- ◆ Collapse of State Finance
- ◆ Permanent Economic Crisis
 - ◆ Terrorist Attack
 - ◆ Local Arm Conflict
 - ◆ Ecological Disaster
 - ◆ Pandemy
 - ◆ Natural Disaster

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Global Driving Forces

- ◆ Information Technology
- ◆ Internet
- ◆ Information
- ◆ Knowledge
- ◆ Education
- ◆ Science
- ◆ Information Capital
- ◆ Knowledge Capital
- ◆ Networking
- ◆ Digital Economy
- ◆ Communication
- ◆ Spirituality
- ◆ Art
- ◆ Culture
- ◆ Health
- ◆ Diversity
- ◆ Emerging Markets
- ◆ Social Capital
- ◆ Sustainability
- ◆ Information Economy
- ◆ Network Economy
- ◆ New Economy

Slovakia-EU 2025

Scenario I. – Industrial Periphery

- ◆ **Driving Forces: Industrial Policymakers plus Market**
- ◆ **Political System: Parliament Democracy, Partisan System, Corruption**
- ◆ **Economy: Second Wave Industrial Economy**
- ◆ **Priorities: Second Wave Industries**
- ◆ **Currency: SKK, EURO since 2012**
- ◆ **Unemployment: 12-18 %**
- ◆ **Inflation: 7-15 %**
- ◆ **GDP Growth: 3-4 %**
- ◆ **Internet: 50-75 % Online**
- ◆ **Social Capital: Decrease**
- ◆ **Demography: Decrease, Ageing**
- ◆ **Organization: Industrial Hierarchies, Crime and Shadow Economy Networks**
- ◆ **Society: Second Wave Industrial Society, Tribalism**
- ◆ **Culture: Industrial Unification**

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Scenario II. – Information Express

- ◆ **Driving Forces: Information Technology plus Market**
- ◆ **Political System: Parliament Democracy, Civic Society**
- ◆ **Economy: Third Wave New Economy**
- ◆ **Priorities: Third Wave Priorities, Information Society, Science, Education, Tourism**
- ◆ **Currency: SKK, EURO since 2008**
- ◆ **Unemployment: 5-8 %**
- ◆ **Inflation: 4-8 %**
- ◆ **GDP Growth: 4-7 %**
- ◆ **Internet: 75-95 % Online**
- ◆ **Social Capital: Moderate Growth**
- ◆ **Demography: Moderate Growth**
- ◆ **Organization: Information and Value Networks**
- ◆ **Society: Third Wave Society, Civic Society**
- ◆ **Culture: Diversity**

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Scenario III. – Problematic Child

- ◆ **Driving Forces: Industrial Policymakers plus Events**
- ◆ **Political System: Parliament Democracy, Partisan System, Corruption**
- ◆ **Economy: Second Wave Industrial Economy**
- ◆ **Priorities: Second Wave Industries**
- ◆ **Currency: SKK, EURO since 2015**
- ◆ **Unemployment: 15-20 %**
- ◆ **Inflation: 8-25 %**
- ◆ **GDP Growth: 0.1-0.5 %**
- ◆ **Internet: 30-45 % Online**
- ◆ **Social Capital: Rapid Decrease**
- ◆ **Demography: Decrease, Ageing**
- ◆ **Organization: Industrial Hierarchies, Crime and Shadow Economy Networks**
- ◆ **Society: Second Wave Industrial Society, Tribalism**
- ◆ **Culture: Industrial Unification, Disruption**

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Scenario IV. – Grey Mouse

- ◆ **Driving Forces: Third Wave Technocracy plus Market**
- ◆ **Political System: Parliament Democracy, Civic Society**
- ◆ **Economy: Transformation to Third Wave New Economy**
- ◆ **Priorities: Third Wave Priorities, Information Society, Science, Education, Tourism, Selected Second Wave Industries**
- ◆ **Currency: SKK, EURO since 2010**
- ◆ **Unemployment: 10-15 %**
- ◆ **Inflation: 5-12 %**
- ◆ **GDP Growth: 3-5 %**
- ◆ **Internet: 70-85 % Online**
- ◆ **Social Capital: Stagnation or Moderate Growth**
- ◆ **Demography: Stagnation or Moderate Growth**
- ◆ **Organization: Hierarchies and Networks**
- ◆ **Society: Emerging Third Wave Society, Civic Society**
- ◆ **Culture: Diversity**

◆ Thank You For Your Attention !