Revolutionizing with Virtualization and AI: Now and in the Future

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White Paper

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Insights on Revolutionizing Planning and Orchestrating Change

Even since we published ***Transforming for Turbulent Times (December 2021)***, the pace and dynamics of global change have accelerated dramatically, driven by several forces:

- Continuing impact of the Covid pandemic,
- Dramatic appearance of immediate impacts of climate change and other dislocations in the global economy, and
- First wave of a new generation of artificial intelligence (AI) and large language model tools.

These changes have demanded that new perspectives, methods, and tools be applied to strategic planning and orchestrating change, to achieve truly revolutionary outcomes.

The first part of this White Paper summarizes Strategic Initiatives' insights to date on how to combine fresh perspectives on the future, methods of transformative change, virtualized engagement environments, embedded and virtualized tools, and first-gen AI to revolutionize planning and the orchestration of change. These have been tested and proven in institutions. We combine these elements under the framework of The Three Pillars of Transformation (slide 5).

We discovered these insights by deploying our transformative methods and models from ***Transforming for Turbulent Times***, but embedded in a different kind of medium. We used virtual engagement environments necessitated by the Covid pandemic, enabled by mash-ups of new collaboration and creativity tools like Zoom and Miro, supported by emerging analytics and AI tools and techniques, and requiring fresh skills in virtual and continuous facilitation.

Using these techniques, we were able to reduce the time and cost of planning - and expand its scope and reach. We also dramatically improved the dynamics and outcomes of transformative change. We created planning and change experiences much better aligned with the challenges of our turbulent times. But we also discerned that even greater leaps in performance would be possible.

The second part of this White Paper (slides 11-17) looks beyond the present tools of transformation to project how current results will be substantially improved over the next few years by the introduction of a new generation of truly revolutionary AI tools and practices. We call this "SciFi AI" to capture its breakthrough potential, need for fresh perspectives, and latent dangers that must be addressed. We provide a framework for deploying and discovering the potential of these tools and practices - starting now and into the future.

Insights on Revolutionizing Planning and Orchestrating Change (Continued)

A Body of Knowledge

This White Paper extends the work presented by the Strategic Initiatives team in the following resources and programs hosted by the ***Society for College and University Planning:***

- Book – ***Transforming for Turbulent Times: An Action Agenda for Higher Education Leaders.***
- Webinar Series – ***"Getting Started on Transformation,"***

  Webinar #1: Transform Existing Planning and Implementation Processes.

  Webinar #2: Destination 2030: The Need for Transformation Architects.

  Webinar #3: Leveraging Your Tools to Revolutionize Transformation Efforts.
- Invited Session at SCUP 2023 - ***"Integrated Tech Tools to Revolutionize Your Strategic Planning,"*** July 31, 2023, Donald Norris, Tim Gilmour, Rob DiCenza.

Slide 18 at the conclusion of this session provides access to these resources and programs jointly provided by ***Strategic Initiatives*** and the ***Society for College and University Planning.***

Strategic Initiatives

S C U P

The Society for College and University Planning

Three Pillars of Transformation

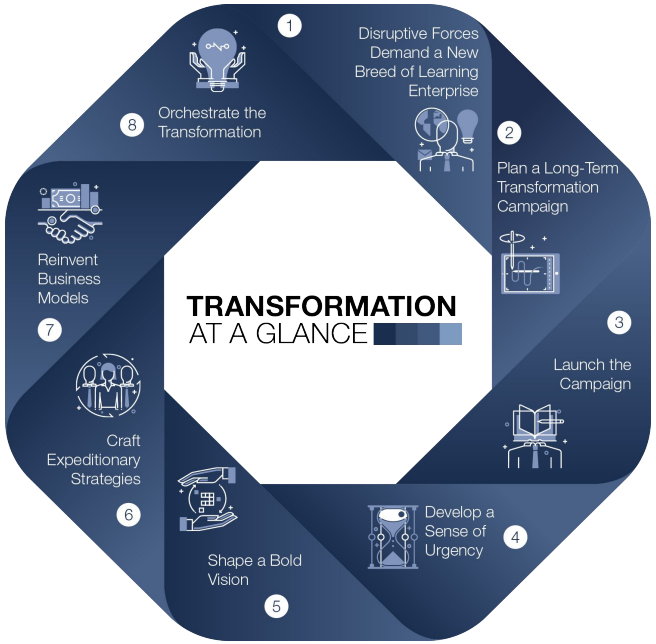
"Transformation requires more than traditional planning. It requires deep engagement and tools that help the institution see a future that is different from its past. We have pioneered ***three pillars of transformative practice for planning and orchestrating transformation*** *"*

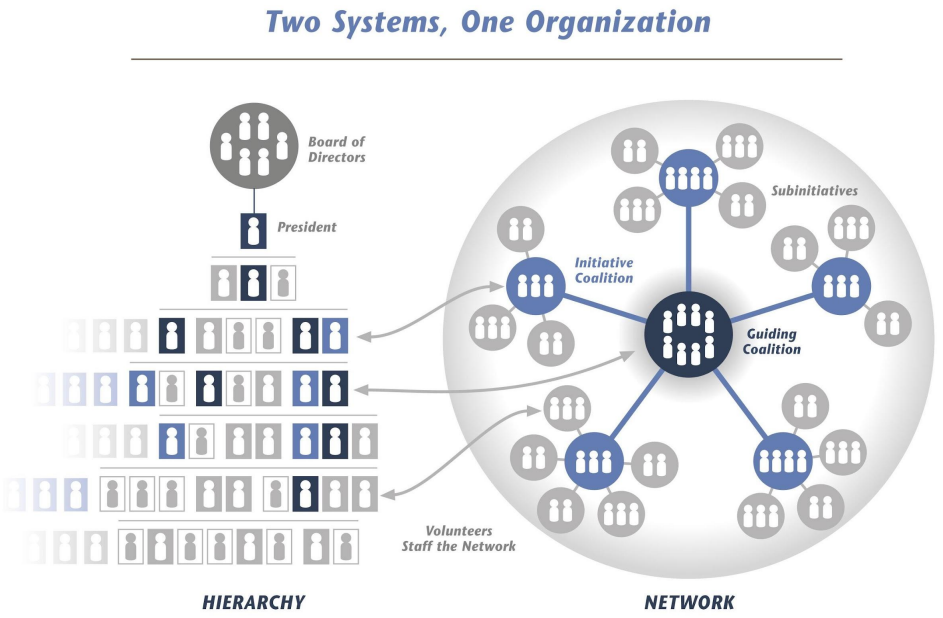
I. Deploy Methods of Transformative Change	**II. Engage Participants Virtually, Deeply and Continuously**	**III. Embed Virtualized Tools**
Transformation Process	Collaboration *Zoom*	Assess Capacity for Transformation
Radical Changes in Mindset	Creativity *Miro*	Plan from the Future Backward
Two-System Organizational Model	Analytics & AI *choose from a range of analytics, generative AI and large language models*	Innovator's Mindset and Design Sprints
Orchestrating Transformative Change		Craft Expeditionary Strategies
Transformation Architect		Expedition Maps
		Reinvent Revenue/Business Models

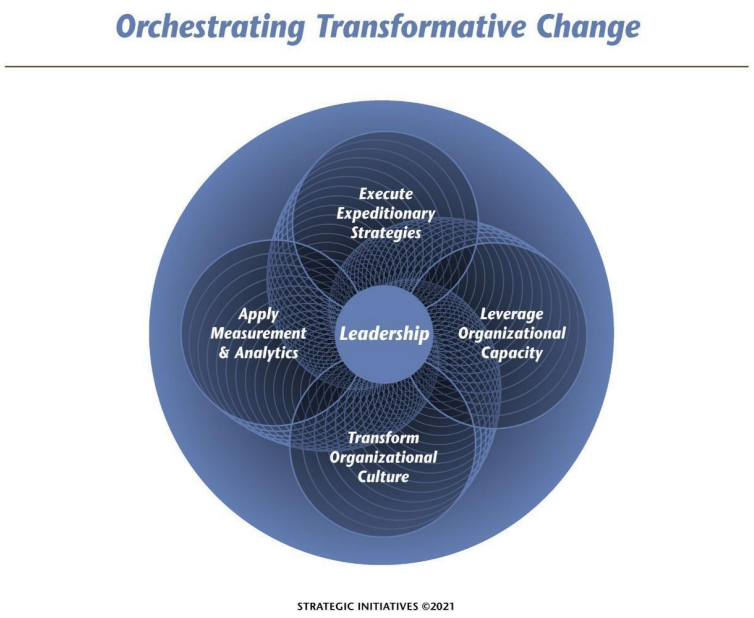
I. Deploy Methods of Transformative Change

"Change at a transformative scale is quite challenging, you need new tools, methods, and dynamics to help you on the journey. These are three of the most important."

***Transformation at a Glance** is an Eight-Step Process to Organize your Orchestration of Transformation.*
***Two System Organization Model** dramatically increases engagement and builds buy-in.*
***Orchestrating Transformative Change** enables leadership to coordinate and lead the elements of Transformative Change.*







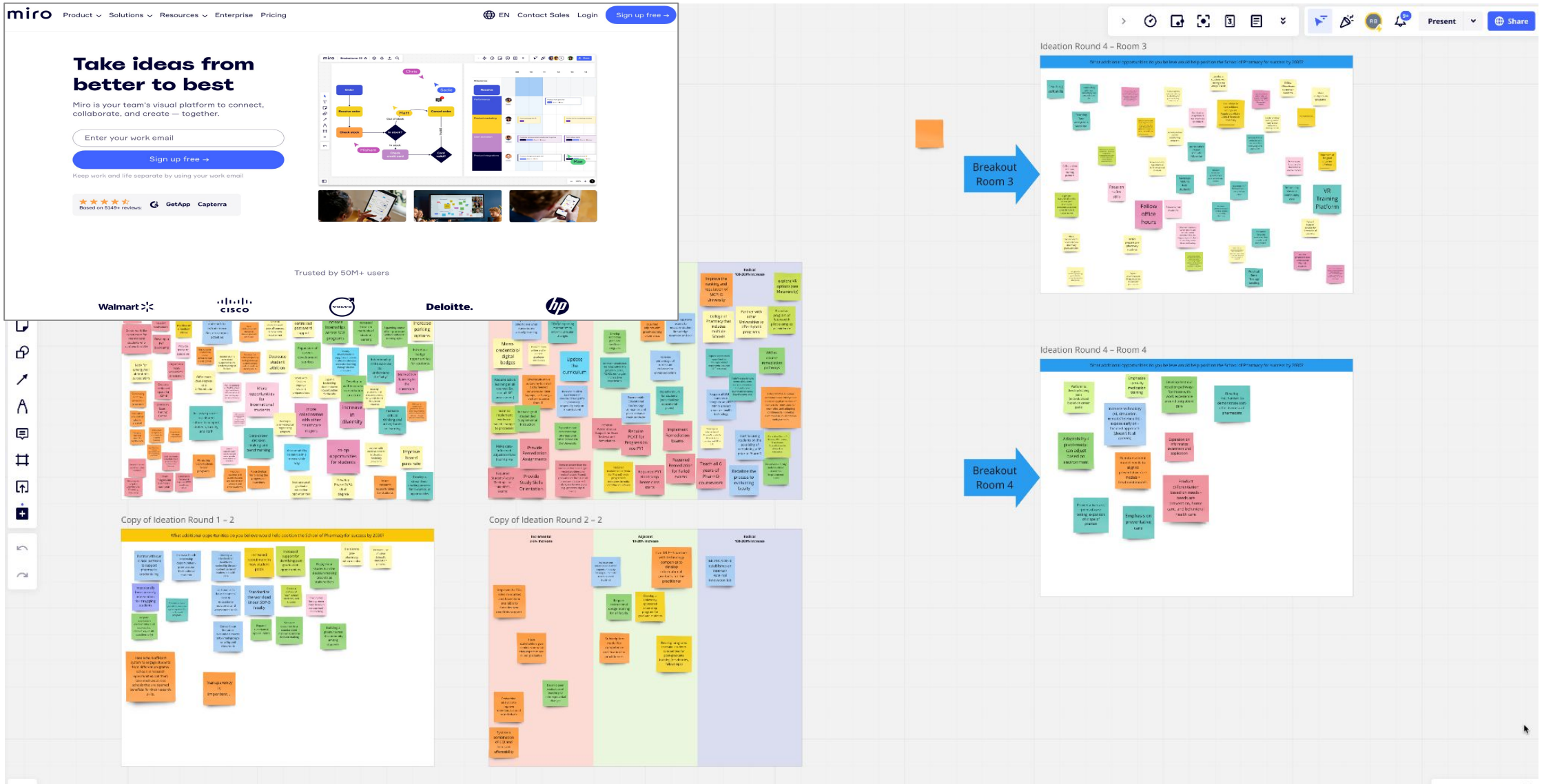
I. Deploy Methods of Transformative Change

"We advocate for a new role – transformation architect – to champion, support, and orchestrate transformation in higher education."
"We have worked with existing transformation architects to refine these examples."

Jump Shifts	Traditional Planner	Transformation Architect	Examples
Mindsets	Incremental	Radical innovation	Futuring, visioning, boundary crossing
Behaviors	Reactive	Proactive champion	Taking risks, failing fast, transparency with dialogues and discussion
Skills/Methods	Diagnosing	Futuring	Transformational strategies, facilitation of engagement, rapid cycle change
Tools	Basic & Fundamental	Advanced	Data literacy, predictive modeling, and forecasting
Processes	Siloed	Integrated	Aligned Action of core and support work processes
Outcomes	Input	Impact	Key performance indicators, leading and lagging measures

II. Engage Participants Virtually, Deeply and Continuously

"Combine Collaboration and Creativity Tools, supported by Analytics and AI, to create a new breed of virtual engagement space."



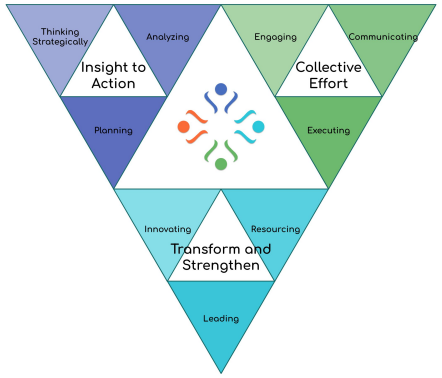
II. Engage Participants Virtually, Deeply and Continuously

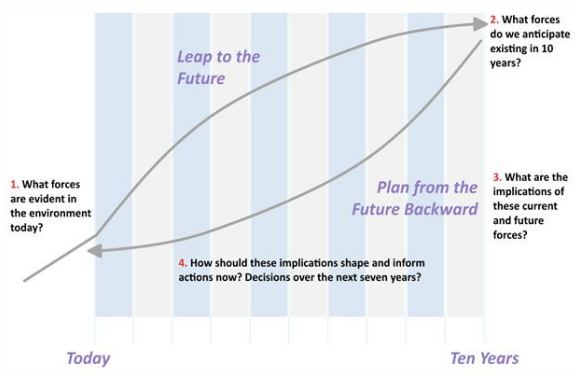
"This new experience space has demonstrated its capacity to improve the dynamics, experiences, and outcomes of planning and orchestrating transformation. But these results are likely to improve dramatically with the introduction of next gen AI over the next few years."

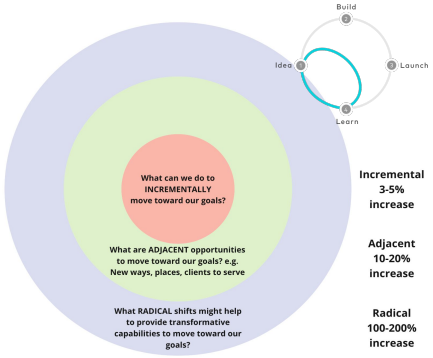
- Provides a canvas where the paint is always wet
- Actively and deeply engage larger communities
- Reach out to external partners and stakeholders
- Enhance facilitation skills and competences
- Facilitate *active* orchestration of transformative change
- Deploy analytics/AI throughout strategy crafting and orchestration
- Generate images to maximize visualization
- Accelerate processes of strategy crafting and orchestrating change, achieving better dynamics, experiences, and outcomes.
- The capacity to embed next gen AI in virtualized environments will likely provide even greater opportunities to improve planning and orchestrating transformation processes, plus all other administrative, academic, and support processes.

III. Embed Virtualized Planning Tools

"The tools of planning/orchestration must be adapted to and embedded in the virtualized environment. By combining a variety of virtualized tools in a customized design tailored to institutional needs, higher education leaders can achieve new levels of transformation – faster and cheaper."

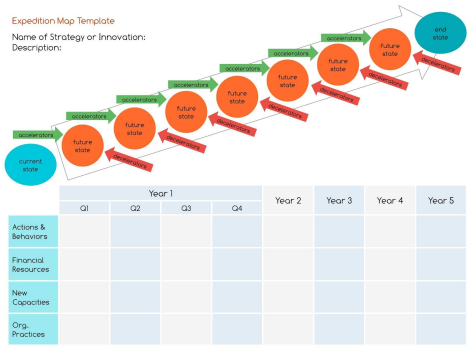


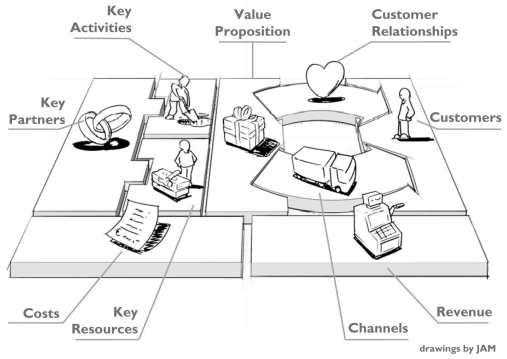




Crafting Strategies through the Design Process

Opportunities	→ *Big Ideas*	→ *Strategies*
1. reactive: recognized due to the changing environment	1. proactive: recognizes the changing environment	1. expeditionary: adaptive to changing environments
2. very broad or very specific	2. works across all partners	2. linked to each partner w/ accountability
3. interesting (maybe)	3. compelling (always)	3. clear & executable
4. value undetermined	4. creates value	4. measurable value/outcomes
5. favorable circumstance, but may not help people focus	5. serves as a focal point of effort	5. focuses behavior over an extended period of time





Revolutionizing with Virtualization and AI
Now and in the Future

Virtualization and AI – Now and in the Future

Strategic Initiatives has demonstrated that the three pillar methodology for transformative change really works. It yields superior experiences, dynamics, and outcomes, aligned with the changing needs of our turbulent times. But the best is yet to come.

We have implemented three pillars using existing tools for collaboration, creativity, and analytics/AI. This included early releases of ChatGPT, Microsoft Bing, and Google Bard. But since then, real and projected advances in AI promise to dramatically change the knowledge, work, and learning ecosystems of every industry and profession. We must prepare our learners for that world.

We use the term “cobot” (cognitive robot) to describe the genre of personal productivity/personal agent tools that individuals will use everyday to function in this new world. In reality there will be many variations on these tools - and probably a host of new names.

We recommend that higher education leaders play a more aggressive role in thinking in the future tense about how AI can transform their institutions and the broader higher education industry. This should include conjuring about the need for serious rethinking of AI’s capacity to be part of the transformation of our broader social/economic systems as suggested by Paul LeBlanc in his recent book, ***Broken: How Our Social Systems Are Broken and How We Can Fix Them.***

We label the future state of AI as “SciFi AI” to capture its potential capacity to boldly go where none have gone before. We recommend a three-step approach to optimize the deployment of virtual engagement/AI environments starting now and continuing into the future:

- *Deploy Virtualized Engagement to Planning and Orchestrating Transformation*
- *Deploy Current Gen AI in an Expeditionary Mode and Learn from It*
- *Aggressively Prepare for the “SciFi AI” of the Future, Thinking in the Future Tense*

The following five slides use these three stages to discuss actions for the following dimensions of virtualization and AI:

- *Engage Virtually, Deeply, Continuously*
- *Planning from the Future Backward*
- *Crafting Expeditionary Strategies*
- *Orchestrating Transformative Change*
- *Reinvent Revenue/Business Models*

Engage Virtually, Deeply and Continuously – Now and in the Future

I. Deploy Virtualized Engagement: ***Faster, cheaper, better***	**II. Deploy Current Gen AI:** ***Be an even better expert and guide***	**III. Prepare for SciFi AI of the Future:** ***Another consciousness at the table & cobots for all***
Deploy virtual engagement environments by combining collaboration tools, creativity tools, analytics and artificial intelligence. Embed virtualized tools, analytics and AI in those environments. *Use virtual engagement environments to support institutional planning processes and orchestration of change.* *Also use such environments to enable individual students to plan for and achieve personalized success.* *Use virtual engagement environments to:* • *Engage participants more efficiently .* • *Expand reach, engage more participants.* • *Accelerate decision making.* • *Keep track of results.* ***Skills and Talent.*** Acquire external facilitation skills as needed to launch and sustain virtualized engagement environments. *Build virtual engagement and facilitation skills in the organization.*	*Actively launch current gen AI as part of virtual engagement environments.* *Use AI in an experimental, expeditionary manner. Also develop skills and insights on looming developments in predictive and generative AI.* *Leverage current AI tools to:* • *Build new levels of engagement.* • *Develop skills in asking large language models the right questions.* • *Expose participants in planning to personal productivity potential of AI.* • *Make sense of patterns of engagement over recurring cycles of futuring, strategizing, and orchestration.* ***Skills and Talent**. Actively attract and develop the AI talent you need – and continue to do so.*	*Aggressively think in the future tense about the SciFi AI of the future.* • *Explore its potential impact on institutional planning and orchestrating change processes and activities.* • *Consider SciFi AI's impact on planning by and for individual student success.* • *Use AI-generated insight to rethink the institution's activities in learning, research and development, and public service.* *Commit to deploying transformative AI as a major strategic direction in all areas of admin/acad/support.* *Rethink and rewire how institutions work using SciFi AI of the Future. Over time:* • *Attain continuous, accelerated engagement of executive management, faculty, staff, partners, and other stakeholders* • *Embed SciFi AI in all processes.* • *Bring AI-based consciousness into every conversation and decision.* ***Skills and Talent**. Upskill people to use their own personal "cobots" to accelerate their pace, raise productivity, and improve outcomes. Make AI-based skills a key element of job descriptions and expectations.*

Planning from the Future, Backward – Now and in the Future

I. Deploy Virtualized Engagement: ***Faster, cheaper, better***	**II. Deploy Current Gen AI:** ***Be an even better expert and guide***	**III. Prepare for SciFi AI of the Future:** ***Another consciousness at the table - cobots for all***
*Embed virtualized methodologies for **Planning from the Future Backward** in all virtual engagement environments.* *Use virtualized tools for PFTFB to:* • *Engage a broader range of internal and external participants.* • *Conduct PFTFB exercises and use them to drive strategy crafting, build expedition maps, and orchestrate transformative change.* • *Keep track of results of current and past PFTFB exercises and work products.* ***Skills and Talent**. Continuously develop skills in utilizing virtualized PFTFB tools.*	*Deploy current gen AI tools to support the virtualized planning environment, use PFTFB methodologies, and experiment with AI-assisted applications.* *Leverage AI-assisted search and insights to:* • *Collect and make sense of insights on future conditions.* • *Pull these insights back to the present and spin and refine future scenarios.* • *Draft and refine text and images in PFTFB materials using current generation AI..* • *Develop organizational capacity to more easily and rapidly update PFTFB materials.* ***Skills and Talent**. Acquire external AI talent as needed to support PFTFB. Develop internal talent at all levels in the organization.*	*Make SciFi AI a central element in the Future Vision and Scenarios of the institution's PFTFB activities:* • *Charge strategic thinking teams with continuous future. scanning activities, supported by AI-generated insights.* • *Utilize both predictive and generative AI tools.* *Leverage virtualized SCiFI AI-based tools to:* • *Place AI-based consciousness at all stages of PFTFB activities.* • *Assess and make sense of both past and current futuring and PFTFB efforts.* • *Predict futures and spin alternate scenarios in real time.* • *Incorporate best practices in PFTFB, gleaned from AI-based searches and predictive tools.* ***Skills and Talent.** Upskill people to deploy their personal cobots to support their participation in PFTFB.*

Crafting Expeditionary Strategy – Now and in the Future

I. Deploy Virtualized Engagement: ***Faster, cheaper, better***	**II. Deploy Current Gen AI:** ***Be an even better expert and guide***	**III. Prepare for SciFi AI of the Future:** ***Another consciousness at the table - cobots for all***
Embed virtualized methodologies for the processes of ***design thinking, strategy crafting, and building expedition maps*** *into institutional virtualized engagement environments. Use these virtualized environments to:* • *Reflect emerging best practice insights on strategic planning – continuous futuring and refinement of vision; two-year, quarterly action plans; resilience and flexibility; strong focus on incentives to achieve outcomes.* • *Manage these processes using virtual environments and supporting tools, analytics and AI.* • *Keep track of results - current and historic.* ***Skills, and Talent.*** *Continuously develop individual skills and organizational capacity in using and facilitating the virtualized environment, embedded tools and AI.*	*Deploy current gen AI tools to support the virtualized planning environment. Use virtualized methodologies for futuring, strategy crafting and expedition map development. Experiment with current AI-assisted applications and tools to develop skills and achieve perspective on emerging AI potentials.* *Use generative AI to:* • *Create and refine future scenarios and text for strategies/ plans.* • *Create and refine expedition maps based on input from AI-based research and futuring.* • *Develop skills in using current gen AI to generate images and videos.* ***Skills and Talent.*** Acquire external AI talent as needed to support Crafting Expeditionary Strategy.	Aggressively think in the future tense about the SciFi AI of the future and how it can be deployed in Crafting Expeditionary Strategy. *Leverage AI-based consciousness and tools to:* • *Make AI-base consciousness a real-time participant in group planning sessions and individual work.* • *Conduct research and assessment to support strategy and orchestration of change– incorporate discovered best practices into orchestration* • *Greatly expand skills and capacity to create and refine text, images, and video for use in scenarios, strategy, and expedition maps.* ***Skills and Talent.*** *Upskill participants to use their personal cobots to support their participation in Crafting Strategy and related activities.*

Orchestrating Transformative Change – Now and in the Future

I. Deploy Virtualized Engagement: ***Faster, cheaper, better***	**II. Deploy Current Gen AI:** ***Be an even better expert and guide***	**III. Prepare for SciFi AI of the Future:** ***Another consciousness at the table - cobots for all***
Embed virtualized methodologies for ***orchestrating transformative change*** *into institutional engagement environments. Use these virtualized environments to:* • *Reflect emerging best practice insights in orchestrating change.* • *Manage these processes using virtual environments and supporting tools, analytics and AI.* • *Keep track of results - current and historic.* • *Virtualize and manage both the creating and updating of expedition maps and their use in transformative change.* ***Skills and Talent.*** *Continuously develop individual skills and organizational capacity in using and facilitating the virtualized environment, embedded tools and AI.*	*Deploy current gen AI tools to support the virtualized planning environment. Use virtualized expedition maps to coordinate all elements of the orchestration of change. Experiment with current AI-assisted applications and tools to develop skills and achieve perspective on emerging AI potentials.* *Seamlessly integrate and make sense of all elements of orchestration supported by expedition maps and a combination of AI tools. Expedition maps cover these five elements:* • ***Execute strategies****, utilizing two-year, quarterly action plans, updated to reflect ongoing environmental changes.* • ***Change culture*** *influenced by AI-based assessment and analysis.* • ***Build organizational capacity*** *especially individual talent* • ***Expand analytics/AI*** *and embed in processes* • ***Transform leadership*** *at all levels to transform for turbulent times.* ***Skills and Talent****. Acquire AI talent as needed to support Orchestrating Transformative Change.*	*Aggressively think in the future tense about the SciFi AI of the future and how it can be deployed in Orchestrating Expeditionary Strategy.* *Use SciFi AI of the Future to:* • *Continuously monitor progress in the execution of strategy, cultural change, organizational capacity, expansion of analytics/AI, and transformation of leadership in prescribed directions.* • *Make sense of changes over time. Report on interactions between these five elements and recommend adjustments.* • *Orchestrate transformation of social and economic systems. Higher education leaders can influence broader transformations in the knowledge, work, and learning ecosystem and play a greater role in societal transformation.* ***Skills and Talent****. Upskill participants to use their personal cobots to support their participation in Crafting Expeditionary Strategy and related activities*

Reinvent Revenue/Business Models – Now and in the Future

I. Deploy Virtualized Engagement: ***Faster, cheaper, better***	**II. Deploy Current Gen AI:** ***Be an even better expert and guide***	**III. Prepare for SciFi AI of the Future:** ***Another consciousness at the table - cobots for all***
Embed virtualized methodologies for Revenue and Business Model Reinvention in the virtual environment. *Utilize the virtualized Business Model Canvas in depicting, evaluating/redesigning programs/ and portfolios.* *Engage a broader range of partners and collaborators.* ***Skills and Talent.*** *Build individual skills in virtualized program development and organizational capacity to accelerate and transform program development, revenue streams, and business models.*	*Deploy current gen AI tools to support the virtualized program development environment and depict business models* *Use AI to improve program design and match with learner, employer and workforce needs needs:* • *Discover best practices in program design.* • *Assess learner/employer needs, match to program design, Improve redesign of specific programs and program portfolios. Use AI to identify and perform due diligence on potential partners.* ***Skills and Talent****. Acquire AI talent as needed to support program development and business modeling.*	*Aggressively think in the future tense about the SciFi AI of the future and how it can be deployed in Reinventing Business Models and Program Portfolios.* *Use SciFi AI of the Future:* • *At all stages of program depiction, assessment, and comparison with reinvention options.* • *Evaluate and engage potential partners and collaborators.* • *Discover and incorporate best practices in Business Model Reinvention.* • *Predict future trends in the knowledge, work and learning ecosystem and reflect in programs and business models.* ***Skills and Talent.*** *Upskill participants to use their personal cobots to support their participation Reinventing Programs, Revenue Streams and Business Models Crafting Expeditionary Strategy and related activities.*

Contact and Access to Body of Knowledge

"Our team has the know how to help you take the next step on your journey of transformation."

Contact

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Body of Knowledge

Information on Transforming for Turbulent Times	–	http://www.strategicinitiatives.com
Case Studies on Transforming for Turbulent Times	–	https://www.strategicinitiatives.com/casestudies
Case Study on Boston Pharmacy School	–	https://www.strategicinitiatives.com/schoolofpharmacyboston
Case Study on Minnesota State University - Mankato	–	https://www.strategicinitiatives.com/msum
Transformation Architect White Paper	–	https://www.strategicinitiatives.com/transformationarchitect
Revolutionizing with Virtualization and AI WhitePaper	-	https://www.strategicinitiatives.com/revolutionizingwithai

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