Theory of Change using Results webs
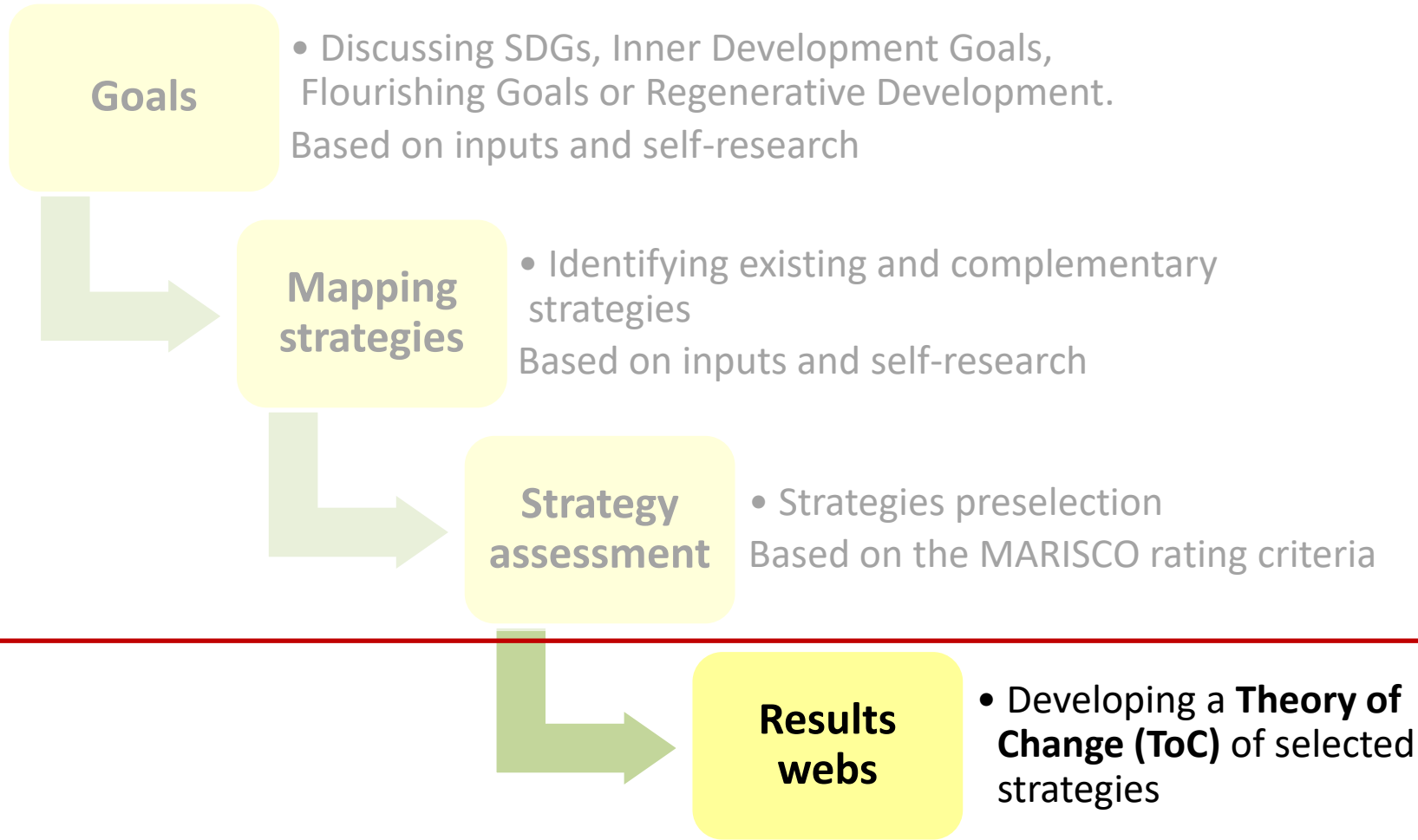
Module: Strategies for change and transformation

Study program
Global Change Management (M.Sc.) – 2nd Term

Luzmila Rosales Richard
Eberswalde April 04, 2025

Eberswalde University for Sustainable Development

Centre for Econics and Ecosystem Management

Strategies for change and transformation
Luzmila Rosales Richard

April 4, 2025

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Road map

Goals
- Discussing SDGs, Inner Development Goals, Flourishing Goals or Regenerative Development.
Based on inputs and self-research

Mapping strategies
- Identifying existing and complementary strategies
Based on inputs and self-research

Strategy assessment
- Strategies preselection
Based on the MARISCO rating criteria

Results webs
- Developing a **Theory of Change (ToC)** of selected strategies

Throughout the module

- March 19 & March 21 (draft)
- From April 7 to April 9 (final)

- From March 21 to April 4

- From March 26 to April 7

- From April 4 to April 9

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Outline and learning goals

I. Theory of Change (ToC)

Guiding questions: What is ToC? How is it used?

Learning goal: To understand the concept and purpose of Theories of Change

II. Results webs (MARISCO tool)

Guiding questions: What is "results webs"? How to develop one?

Learning goal: To understand how to develop a Theory of Change using results webs

I. Theory of Change (ToC)

What is a ToC?
How is it applied?

Theory of Change (ToC)

- A model of a change process that includes **mental representations** and **theoretical assumptions**. It explains and describes **how** and **why** activities of an initiative (e.g., projects, programmes, organizations) are expected to lead or contribute to a **process of change**.

(Belcher et al. 2020; Oberlack et al. 2019)

- A series of causally linked **assumptions** about how a team thinks its actions will help it achieve both **intermediate results and longer-term** conservation and human wellbeing **goals**. It describes how a team **believes or assumes the strategies will act** on indirect threats and opportunities, reduce direct threats, and achieve goals for the conservation of targets.
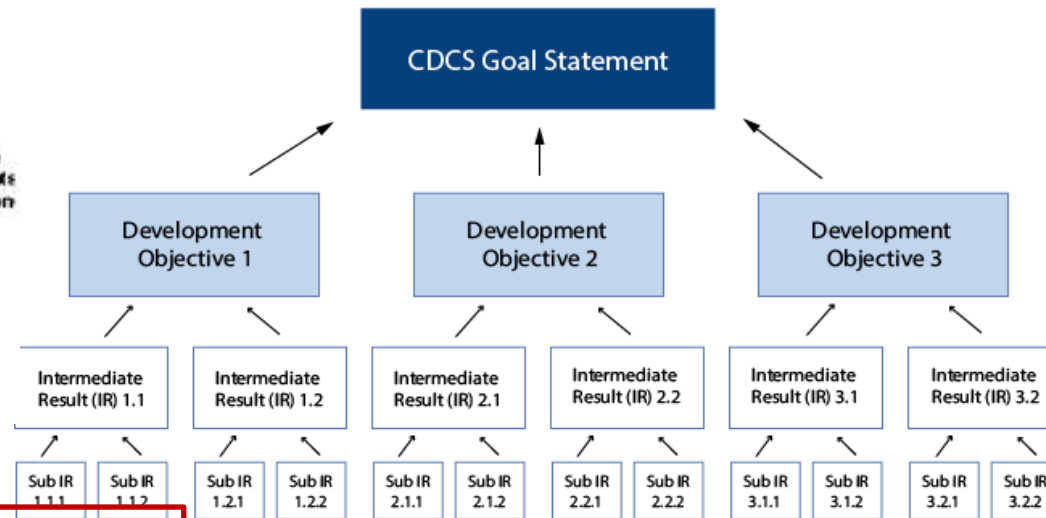
(Conservation Standards, 2020)

Theory of Change (ToC)

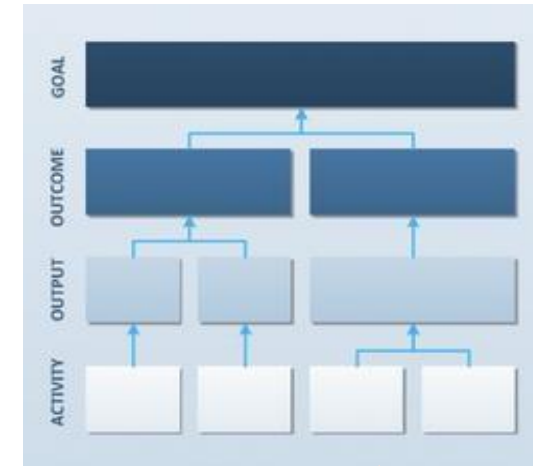## Alternative ways to represent a ToC
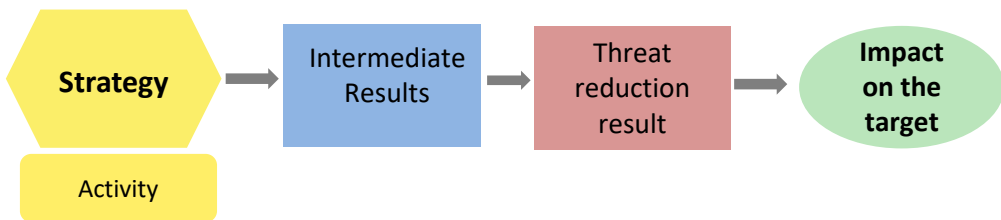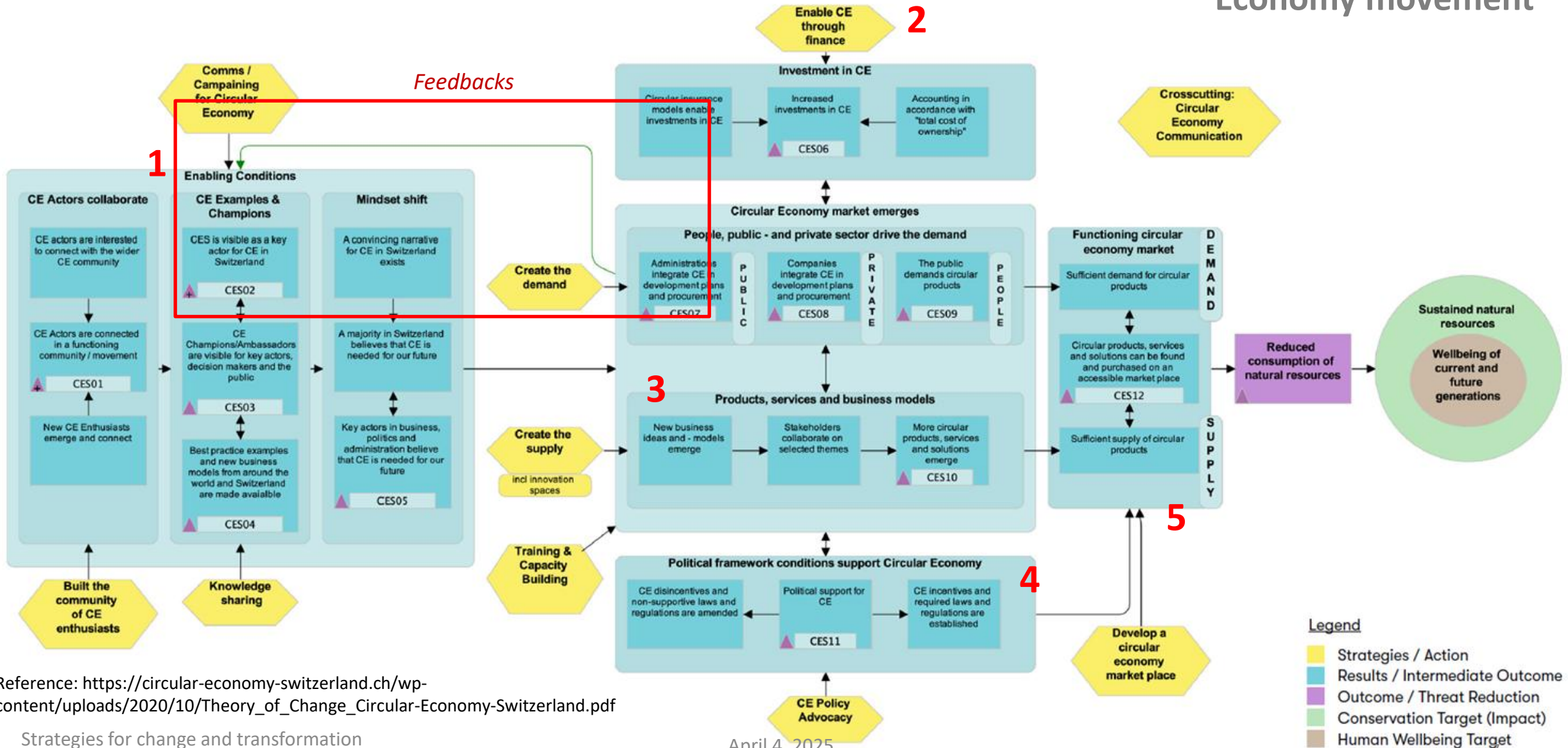

Fishbone diagram
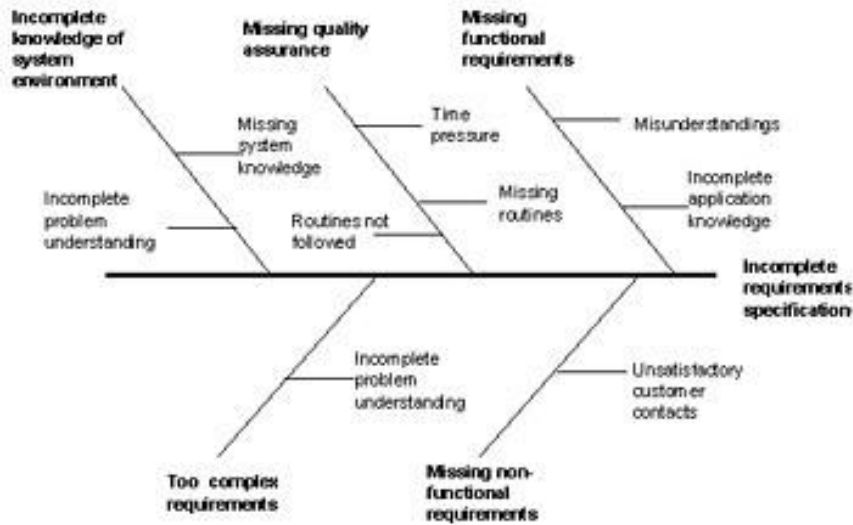
Logframe (Logical Frameworks)

Results Framework

Results chains/webs

A methodology mainly used for designing, monitoring, and evaluating international development projects.

Strategies for change and transformation
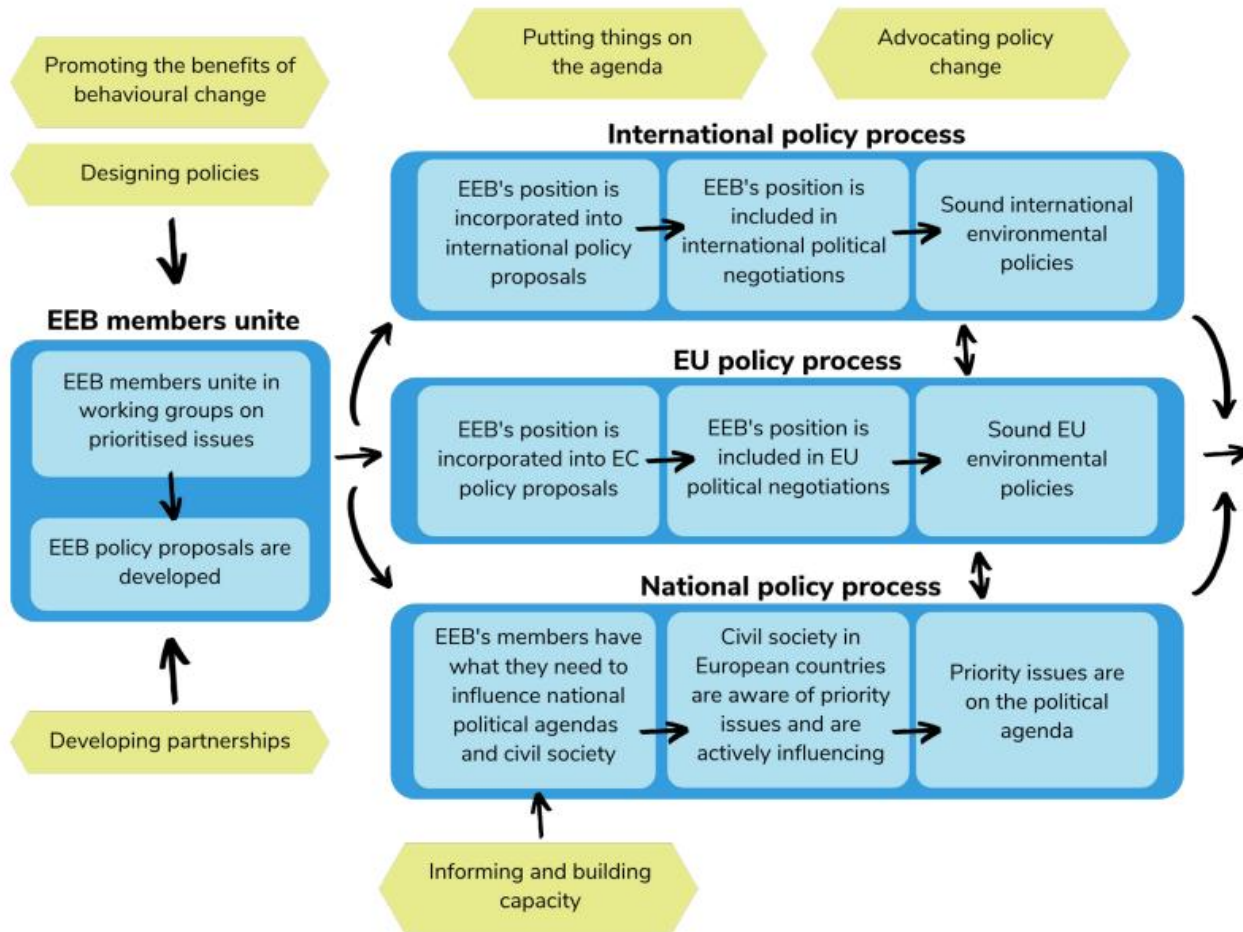Luzmila Rosales Richard

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How is the ToC applied?

Reference: https://circular-economy-switzerland.ch/wp-content/uploads/2020/10/Theory_of_Change_Circular-Economy-Switzerland.pdf

How is the ToC applied?

How is the ToC applied?

(Belcher et al. 2020)

How is the ToC applied?
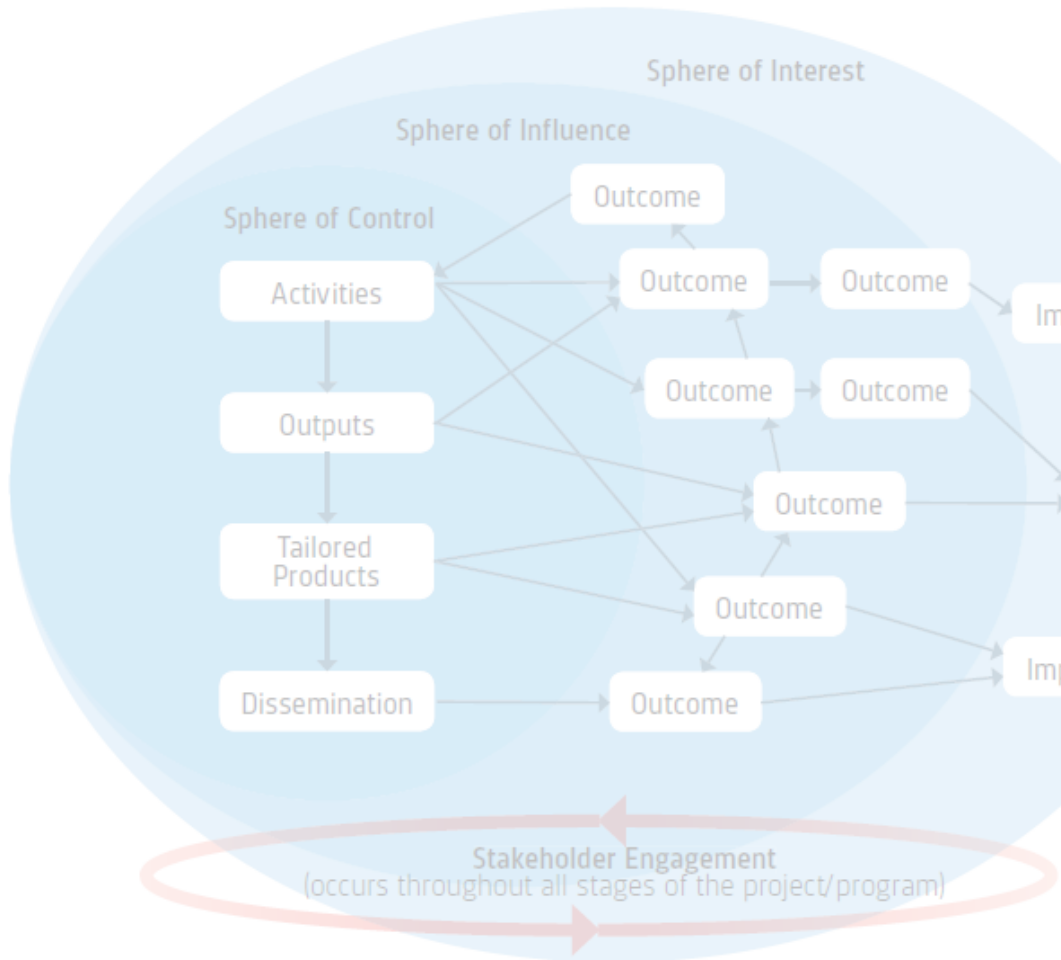
(Belcher et al. 2020)
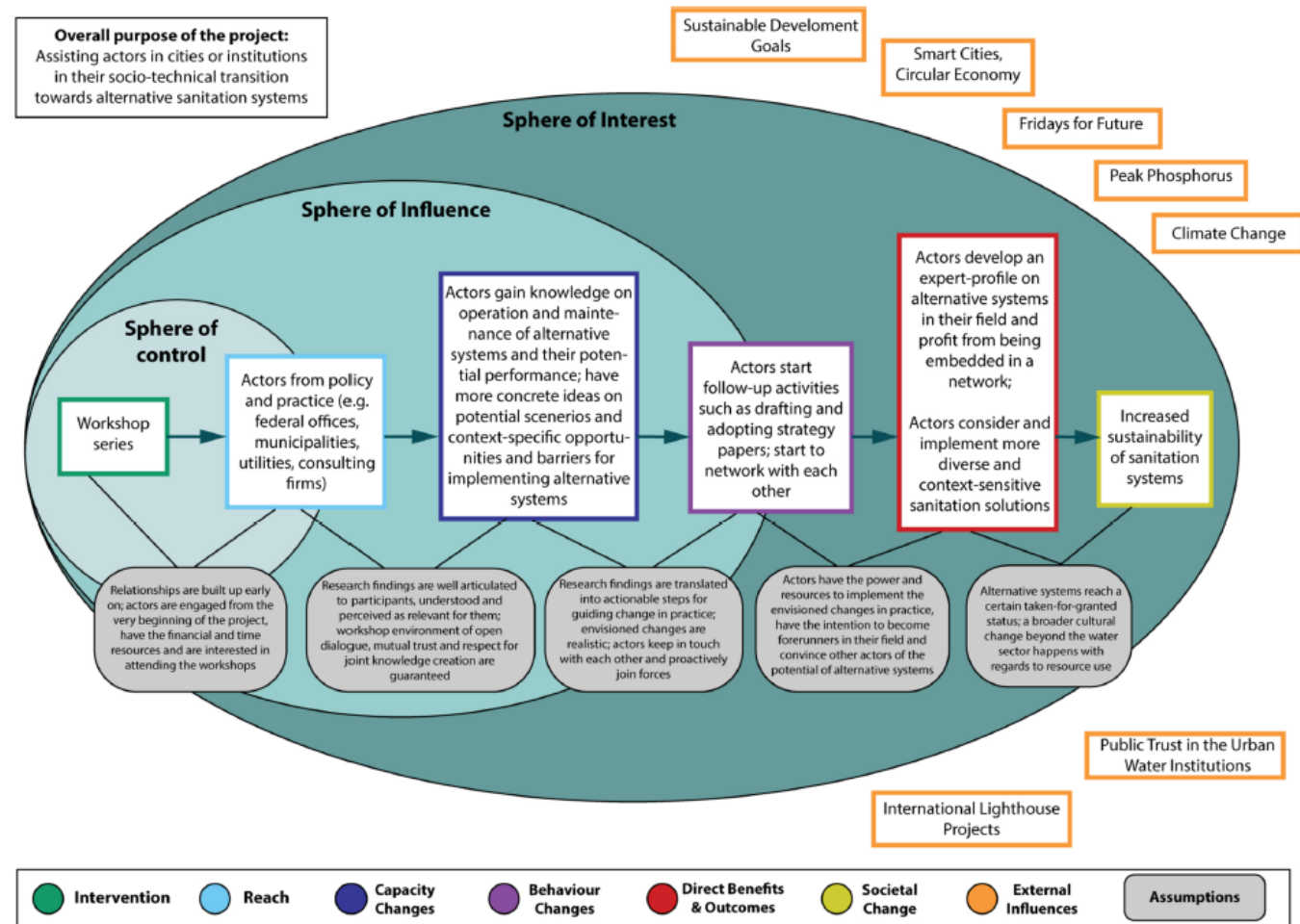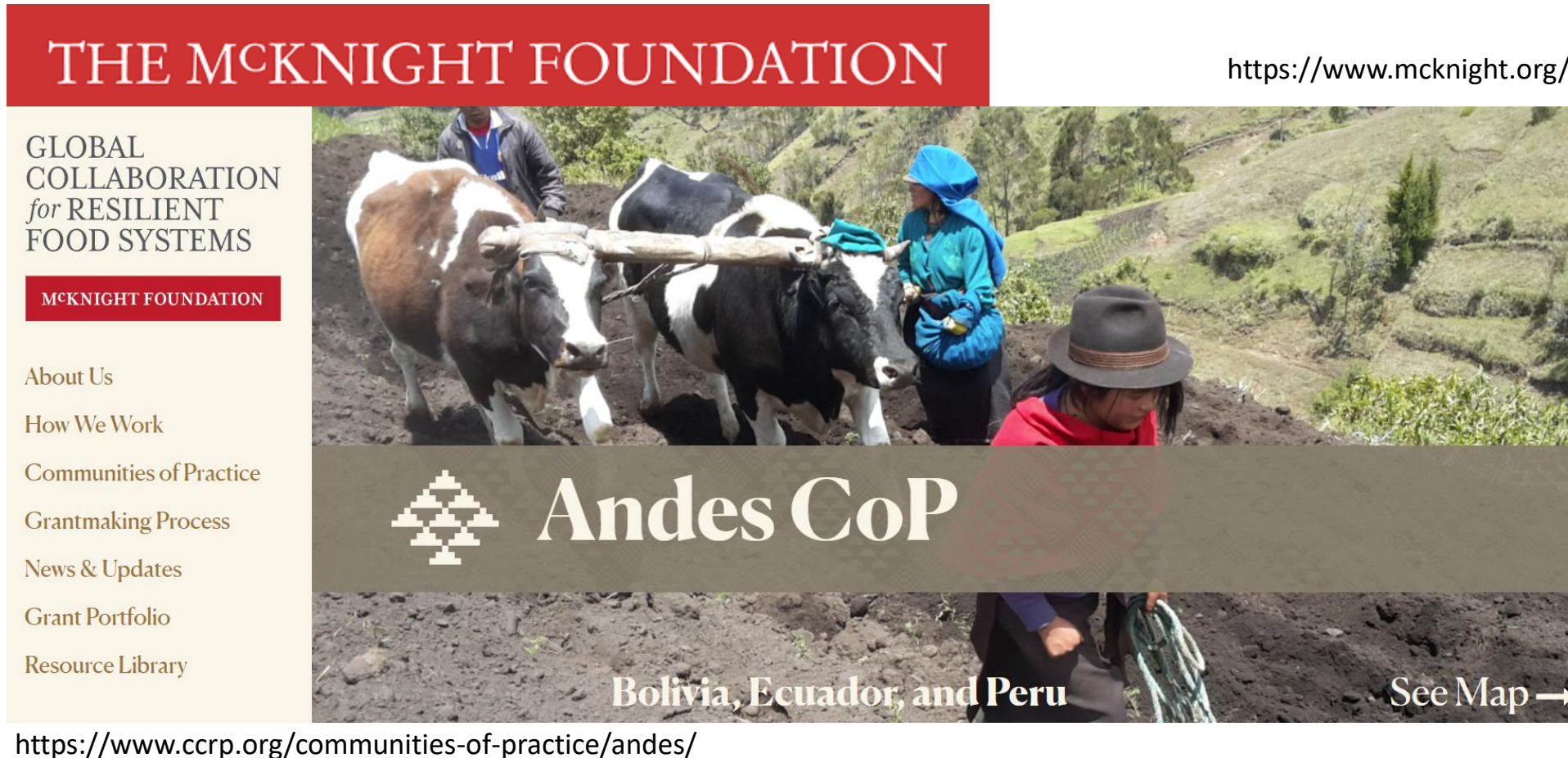
(Deutsch et al. 2021)

How is the ToC applied?

Alternative trends in International Cooperation

https://www.mcknight.org/

https://www.ccrp.org/communities-of-practice/andes/

How is the ToC applied?

CRFS PATHWAYS TO TRANSFORMATION

UNSUSTAINABLE AND/OR INEFFECTIVE AGRICULTURE

RESEARCH & DEVELOPMENT SYSTEMS
- Siloed, discipline-based research
- Blanket silver-bullet solutions
- Key focus on productivity through external inputs
- Hierarchical power relations

FOOD & AGRICULTURE SYSTEMS
- Policies/markets favor large farmers
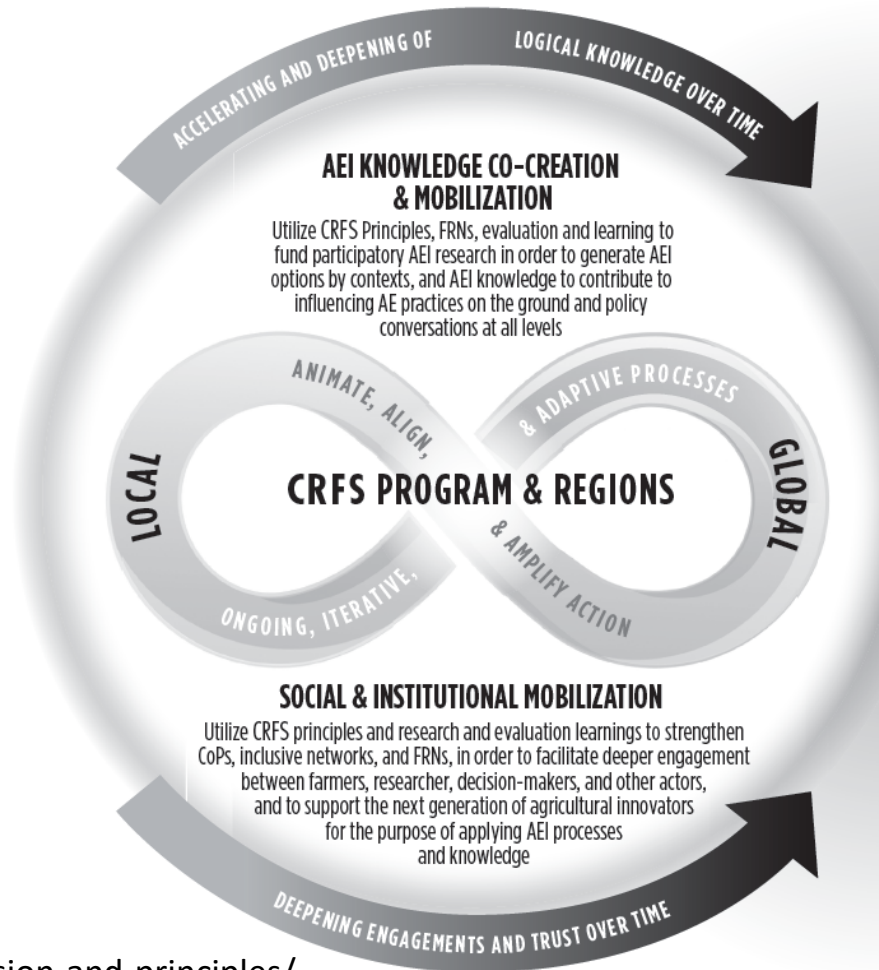- Industrialized farming
- Soil degradation
- Low productivity
- Contributes to and at risk from climate change

SMALL HOLDER FARMING COMMUNITIES
- Food insecurity
- Malnutrition
- Economic insecurity
- Lack of access to research
- Inquality: gender, age, class, ethnicity etc.
- Aging population, migration, rural decline

ACCELERATING AND DEEPENING OF LOGICAL KNOWLEDGE OVER TIME

AEI KNOWLEDGE CO-CREATION & MOBILIZATION
Utilize CRFS Principles, FRNs, evaluation and learning to fund participatory AEI research in order to generate AEI options by contexts, and AEI knowledge to contribute to influencing AE practices on the ground and policy conversations at all levels

ANIMATE, ALIGN, & ADAPTIVE PROCESSES

LOCAL — **CRFS PROGRAM & REGIONS** — **GLOBAL**

ONGOING, ITERATIVE, & AMPLIFY ACTION

SOCIAL & INSTITUTIONAL MOBILIZATION
Utilize CRFS principles and research and evaluation learnings to strengthen CoPs, inclusive networks, and FRNs, in order to facilitate deeper engagement between farmers, researcher, decision-makers, and other actors, and to support the next generation of agricultural innovators for the purpose of applying AEI processes and knowledge

DEEPENING ENGAGEMENTS AND TRUST OVER TIME

CONTEXTUALIZED SCALING OF AGROECOLOGICAL SYSTEMS

RESEARCH & DEVELOPMENT SYSTEMS
- Collaborative, trans-disciplinary
- Responsive to heterogeneity
- Horizontal power relationships
- R4D and D4R

FOOD & AGRICULTURE SYSTEMS
- Resilient
- Integrated
- Multi-functional
- Improved soil health
- Sustainable farming
- Increased crop productivity
- Adapts to and mitigates climate change
- Provides ecosystem services

SMALL HOLDER FARMING COMMUNITIES
- Food security
- Improved nutrition
- Access to research
- Secure livelihoods
- Equity
- Rural vibrancy

CRFS: Collaboration for Resilient Food Systems

https://www.ccrp.org/about-us/vision-mission-and-principles/

How is the ToC applied?
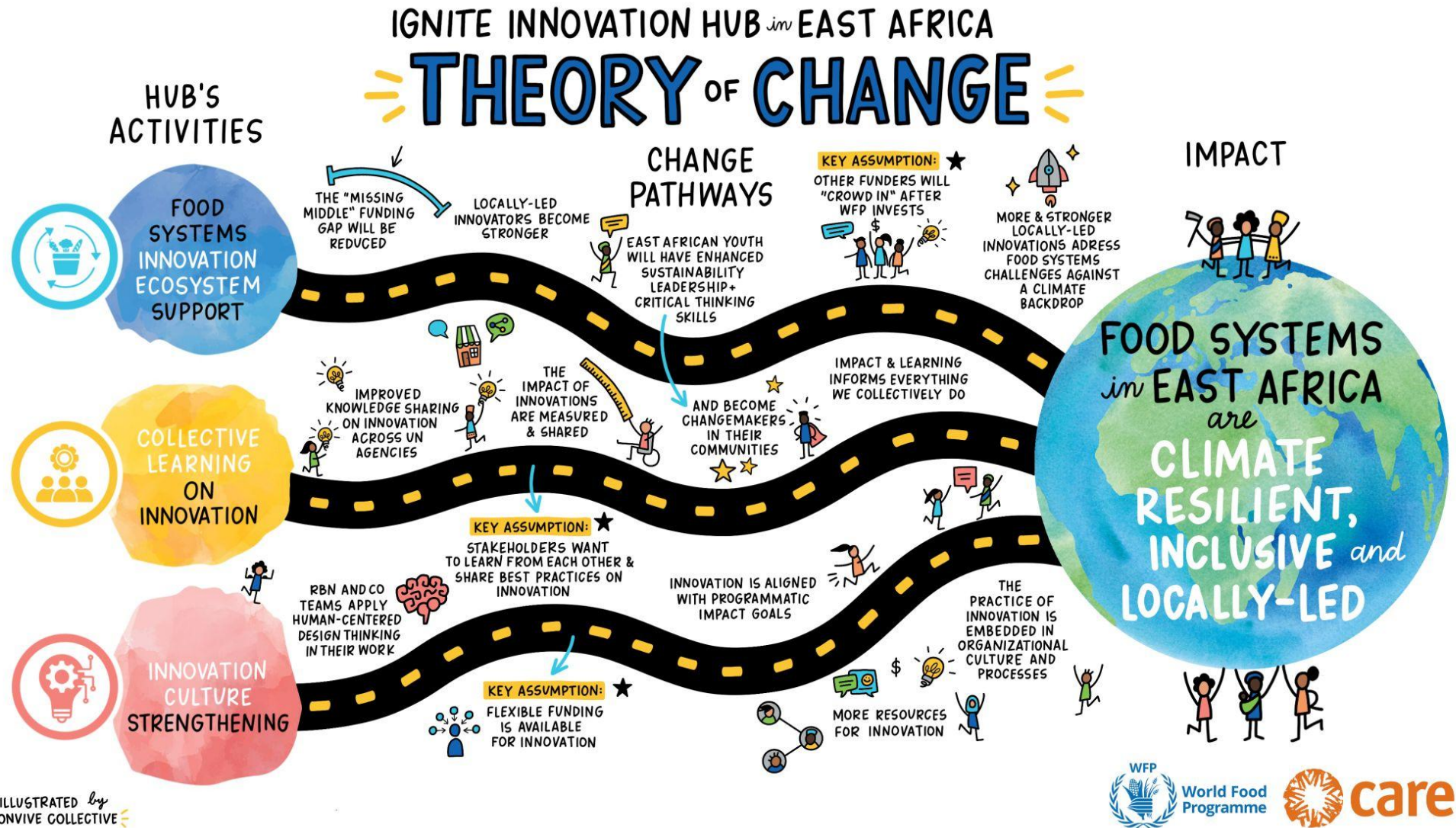
Why develop a ToC?

- To support knowledge (co) production processes

- To understand how and why change can happen

- To foster interdisciplinarity/transdisciplinarity

- To support Adaptive Management:
  - Creating a shared vision, including different perspectives
  - Planning effective interventions
  - Monitoring and evaluation
  - Reflecting, learning, and sharing

However, it requires resources and open-mindedness among stakeholders

(Belcher et al. 2020; Oberlack et al. 2019)

Question by KonKapp from NounProject.com

II. Results webs (MARISCO tool)

**What is "results webs"?
How to develop one?**

MARISCO 2.0

REMEMBER

I. Motivation and geographical scope
1. Motivation, expectation & vision
2. Geographical scope

VII. Operational planning and implementation
27. Monitoring design
28. Operational planning
29. Implementation & monitoring of results & impacts
30. (Non)knowledge management

II. Human wellbeing and social systems
3. Human wellbeing
4. Social services
5. Social systems
6. Key social attributes
7. Ecosystem services

VI. Plausibility and effectiveness
26. Development of results webs

III. Ecosystem functionality
8. Ecosystems & components
9. Key ecological attributes

V. Strategies
19. Goals
20. Identification & mapping of existing strategies
21. Impact analysis
22. Gap analysis
23. Development of complementary strategies
24. Impact analysis (Part II)
25. Strategy rating

IV. Stresses and risks
10. Ecological stress analysis
11. Drivers of ecological stresses
12. Underlying factors & causes
13. Social stress analysis
14. Drivers of social stresses
15. Underlying factors & causes (Part II)
16. Revision & completion of systemic relationships
17. Element rating
18. Identification of systemic drivers, revision & validation

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MARISCO methodology 2.0

Results webs or results chains

Theory of Change (ToC)

Can be represented as

Results webs /chains

| Strategy | Intermediate Results | Threat reduction result | Stress reduction result | Impact on the target |

Activity (Strategy)
Activity (Strategy)
Activity (Intermediate Results)
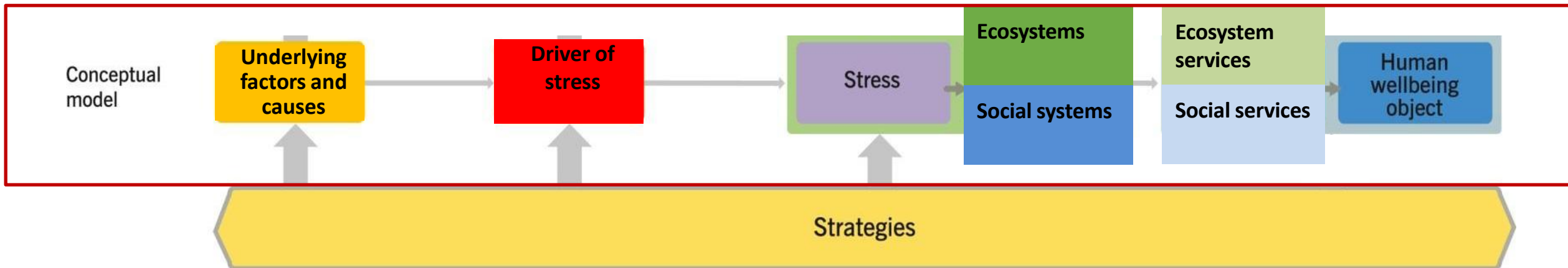Activity (Threat reduction result)

Results webs (MARISCO tool)

A chain of change that contains our **core assumptions** about how a strategy will help to maintain, improve, or restore a target system.

How to develop them?

Results webs (MARISCO tool)

A chain of change that contains our **core assumptions** about how a strategy will help to maintain, improve, or restore a target system.

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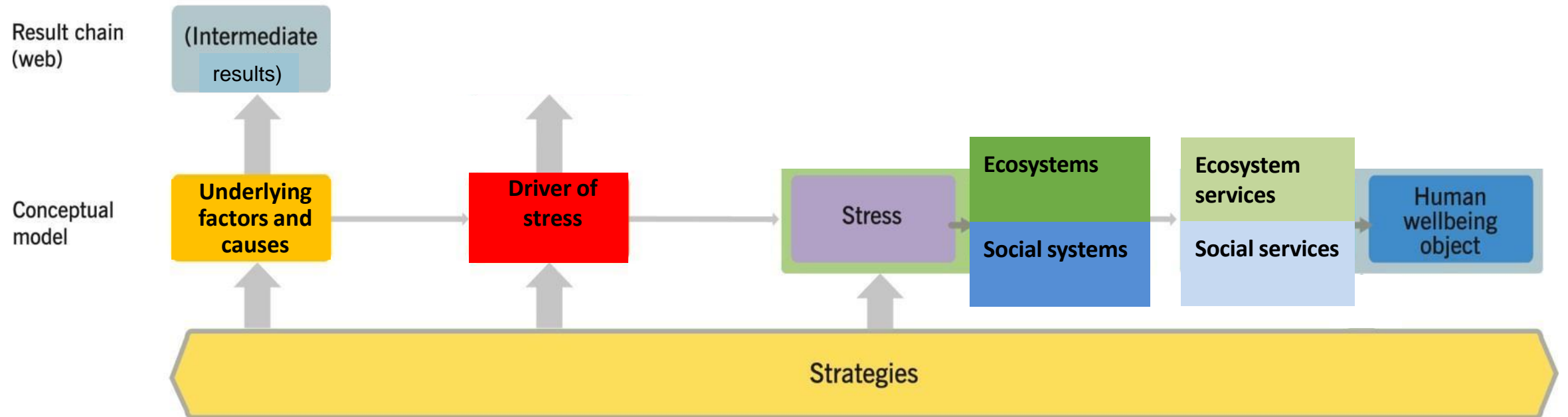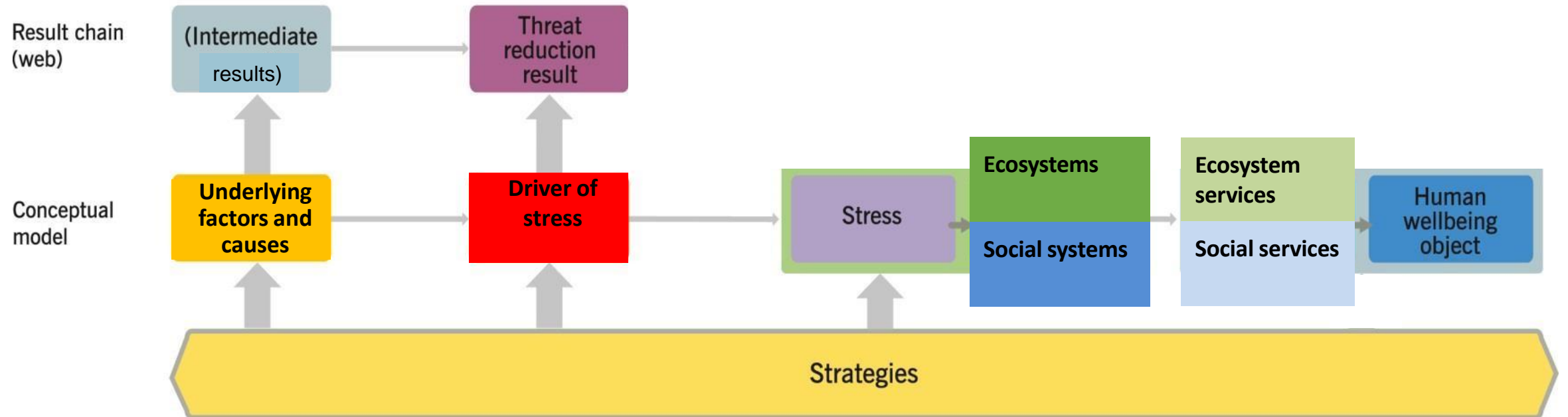## How to develop them?

Results webs (MARISCO tool)

A chain of change that contains our **core assumptions** about how a strategy will help to maintain, improve, or restore a target system.

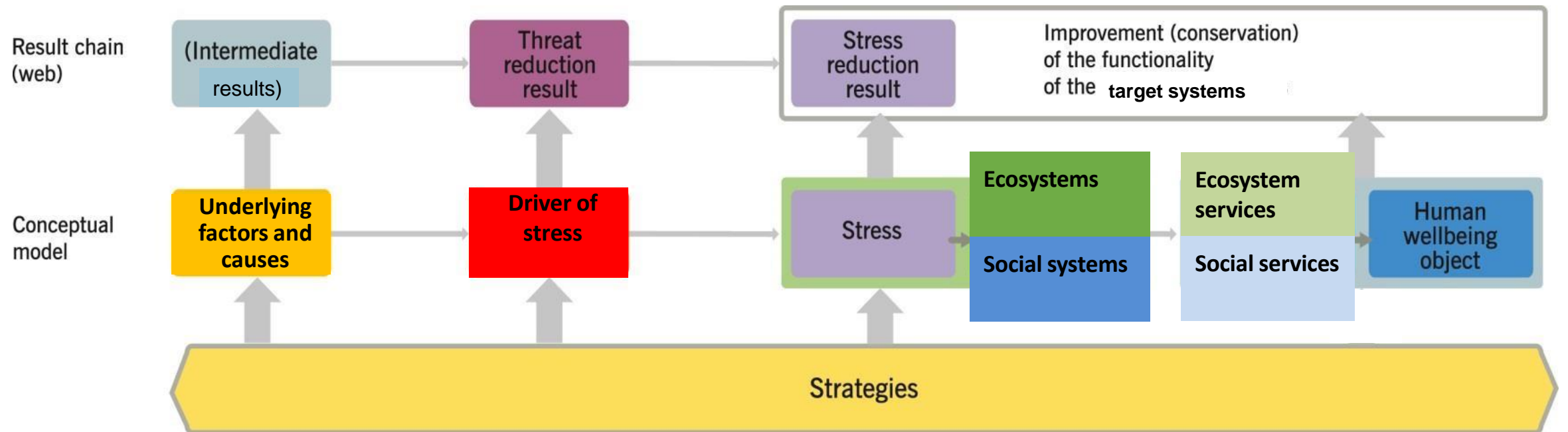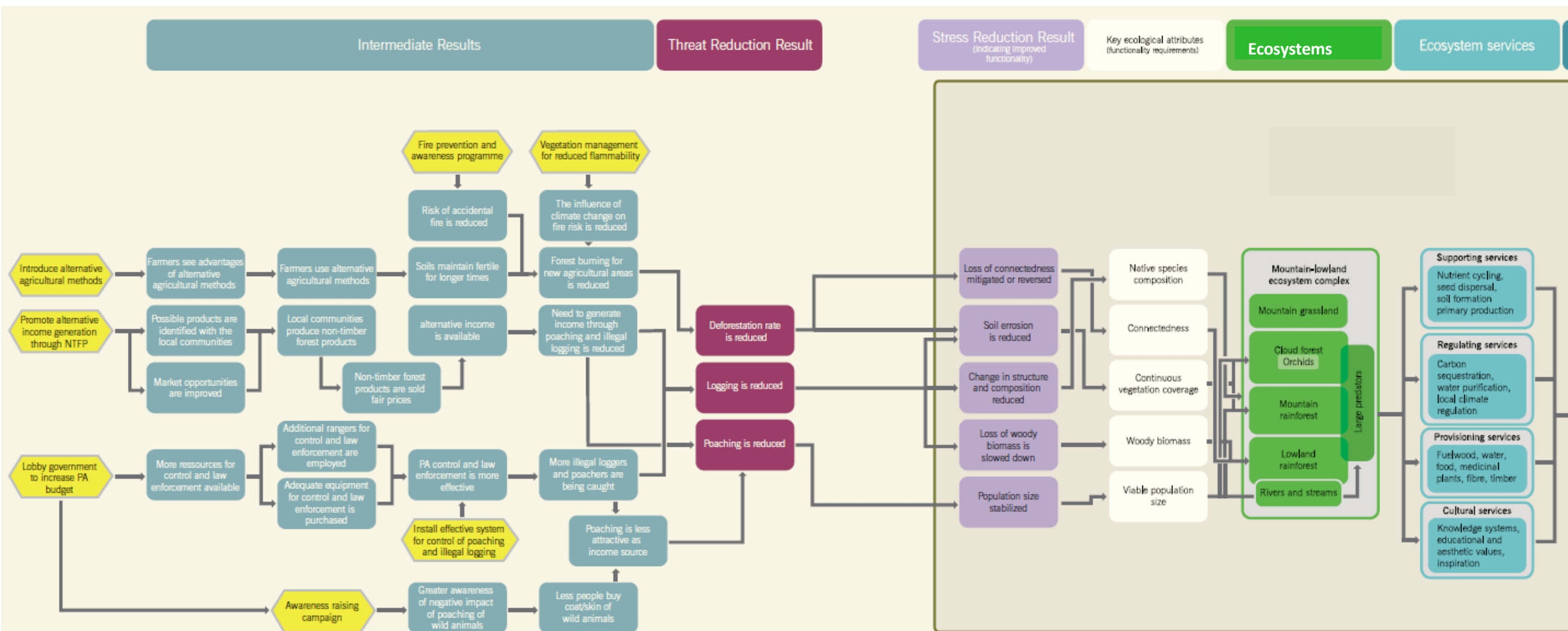## How to develop them?

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MARISCONIA: Results web based on the
conceptual model

Elements of a Results webs
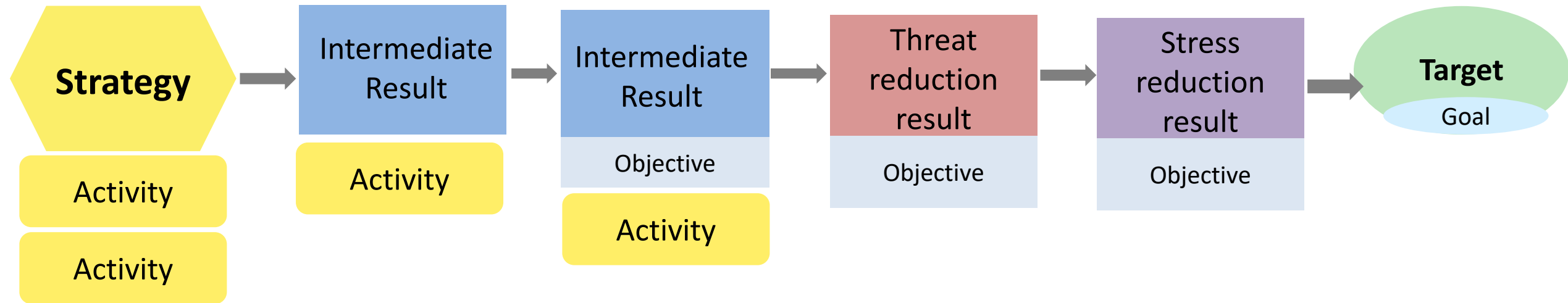
Example of a ToC using results webs (simplified version)
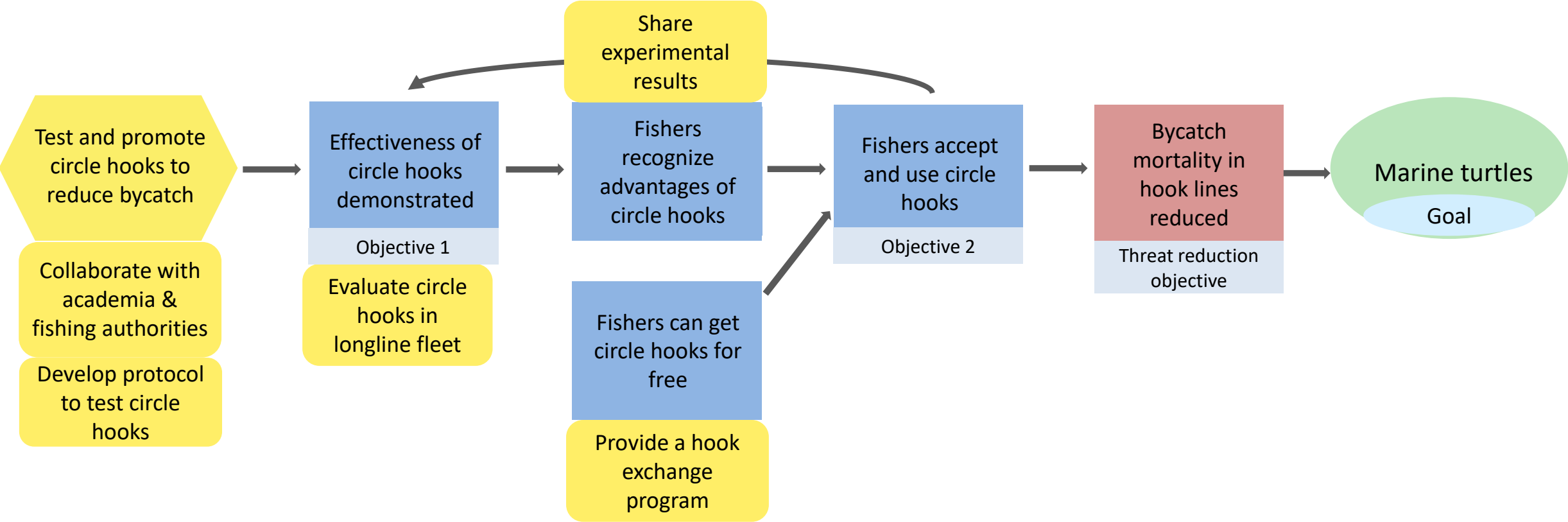
Goal

A formal statement detailing a strategy's desired impact, such as **the desired future status of a target**.

What do we want our Target(s) to look like?

```
Strategy → Intermediate result(s) → Threat reduction result → Stress reduction result → Target
Activity    Intermediate            Threat Reduction           Stress reduction          Goal
            Objective(s)            Objective                  Objective
```

Linked to Targets

Based on a slide from the module Adaptive Ecosystem Management 2022

Objectives

Formal statements of the **different types of results** that you believe are necessary to attain your goals.

What do we need to accomplish along the way?

Based on a slide from the module Adaptive Ecosystem Management 2022

Example of a ToC using results webs (simplified version)

By July **2008**, individual fishers **equal or better** their catch and **reduce** turtle bycatch **by 50%** using circle hooks.
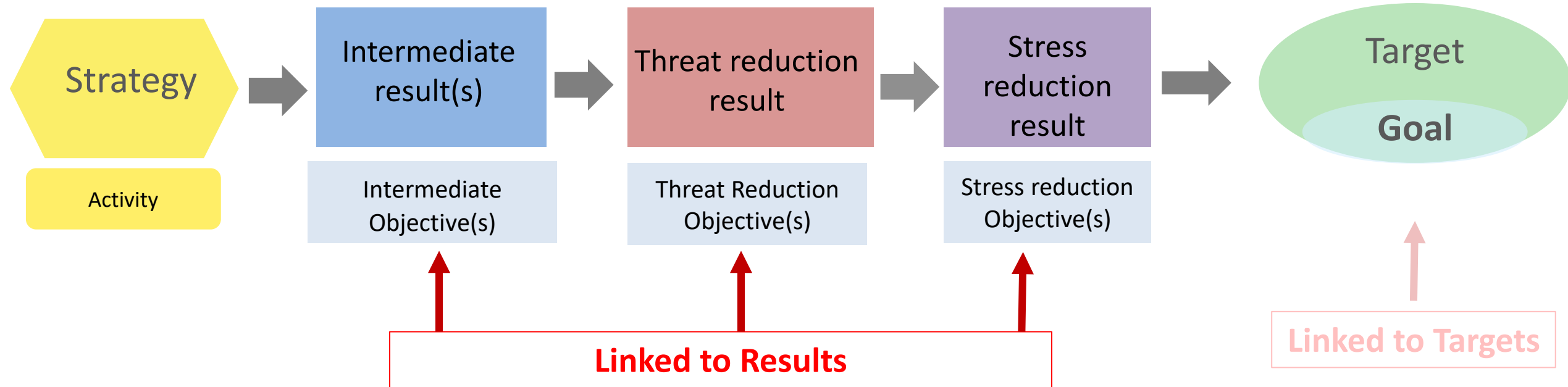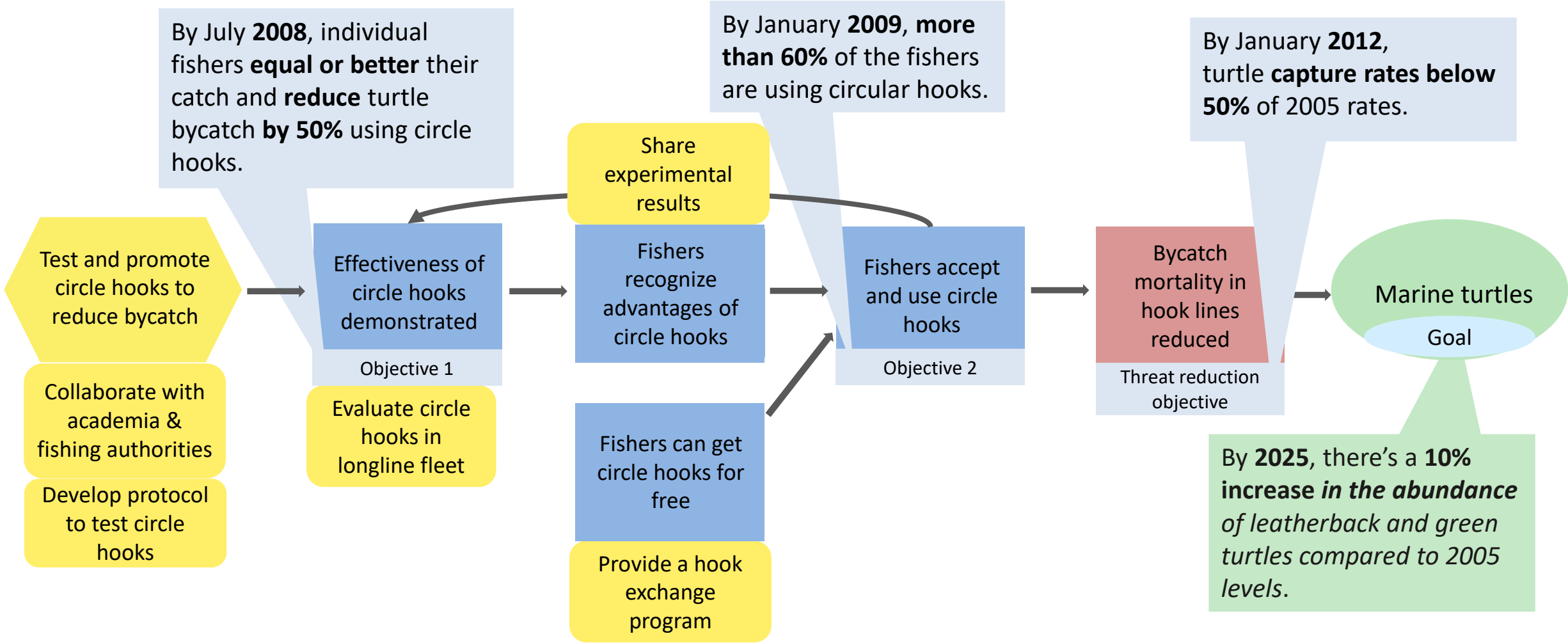
By January **2009**, **more than 60%** of the fishers are using circular hooks.

By January **2012**, turtle **capture rates below 50%** of 2005 rates.

Share experimental results

Test and promote circle hooks to reduce bycatch

Collaborate with academia & fishing authorities

Develop protocol to test circle hooks

Effectiveness of circle hooks demonstrated

Objective 1

Evaluate circle hooks in longline fleet

Fishers recognize advantages of circle hooks

Fishers can get circle hooks for free

Provide a hook exchange program

Fishers accept and use circle hooks

Objective 2

Bycatch mortality in hook lines reduced

Threat reduction objective

Marine turtles

Goal

By **2025**, there's a **10% increase** *in the abundance of leatherback and green turtles compared to 2005 levels*.

Indicadores

A **measure** for a specific information need such as

- the status of a target,

- change in a threat or

- progress toward an objective.

Indicator

Objective 1:

By July **2008**, individual fishers **equal or better** their catch and **reduce** turtle bycatch **by 50%** using circle hooks.
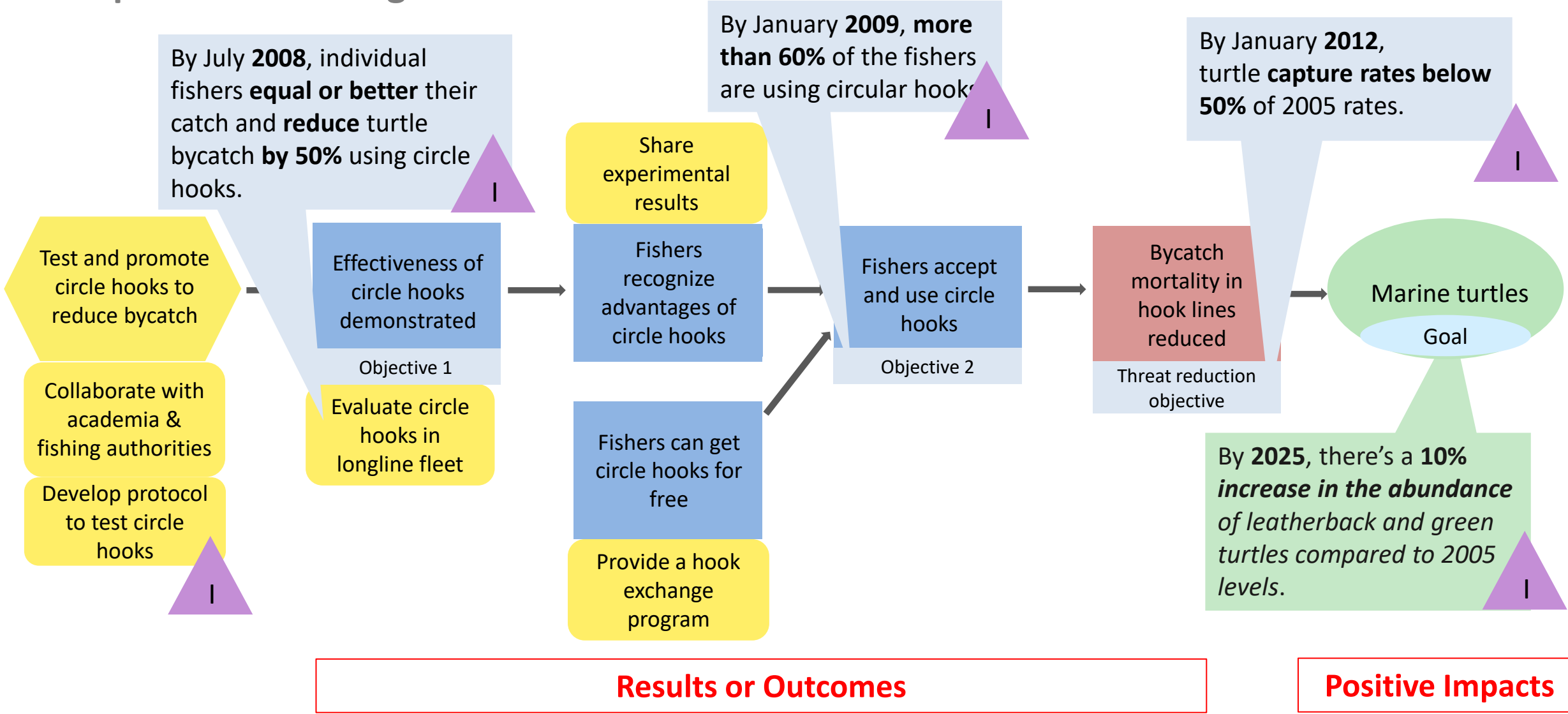
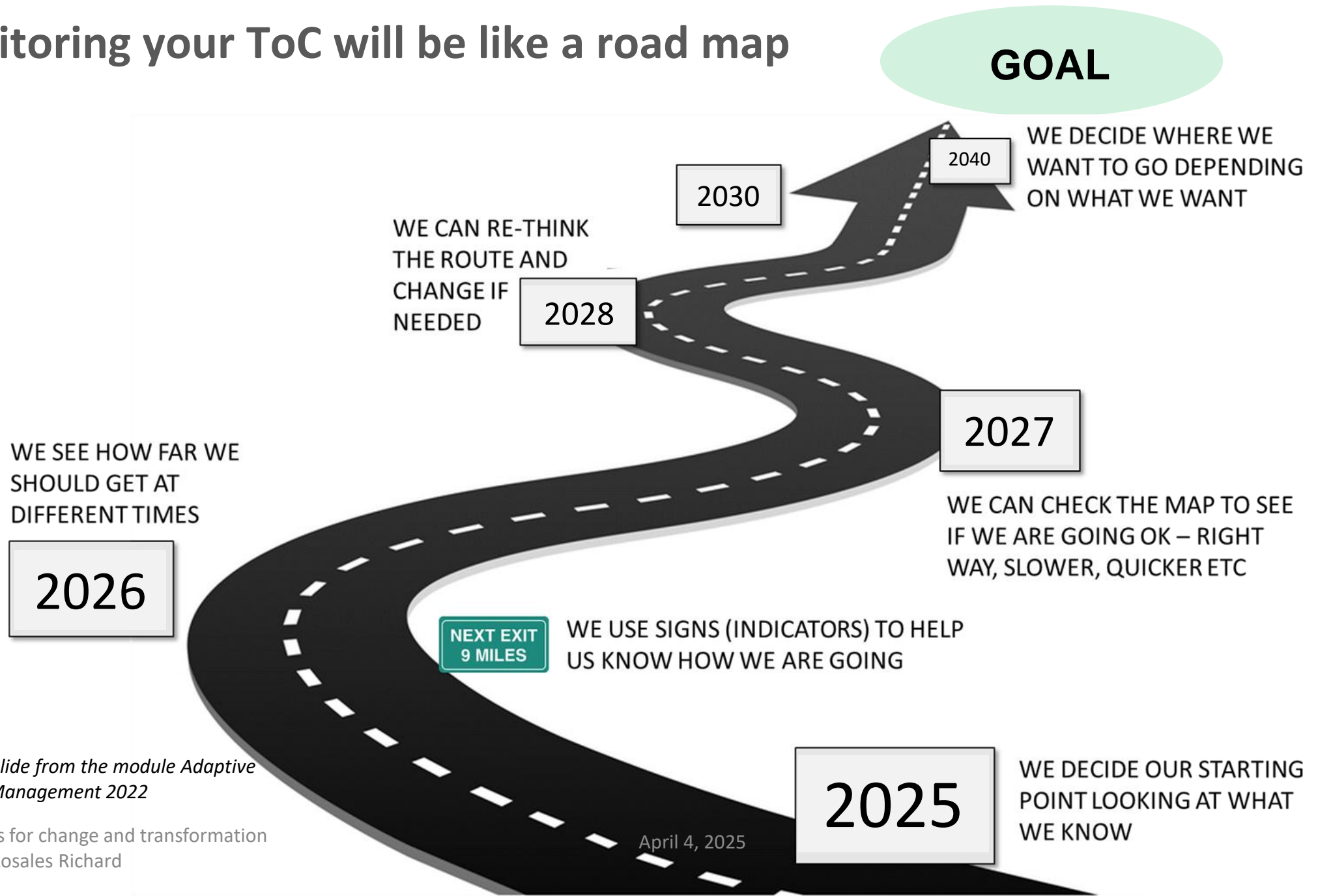**Fishing days, catch rates, weights** for the different commercial species

Number & type of turtles, the hook type used, location of the hooks in the captured turtles.

Based on a slide from the module Adaptive Ecosystem Management 2022

Example of a ToC using results webs

By July **2008**, individual fishers **equal or better** their catch and **reduce** turtle bycatch **by 50%** using circle hooks.

By January **2009**, **more than 60%** of the fishers are using circular hooks

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Threat reduction objective

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Goal

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Results or Outcomes

Positive Impacts

Based on a slide from the module Adaptive Ecosystem Management 2022
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Monitoring your ToC will be like a road map

GOAL

2040

WE DECIDE WHERE WE WANT TO GO DEPENDING ON WHAT WE WANT

2030

WE CAN RE-THINK THE ROUTE AND CHANGE IF NEEDED

2028

2027

WE CAN CHECK THE MAP TO SEE IF WE ARE GOING OK – RIGHT WAY, SLOWER, QUICKER ETC

WE SEE HOW FAR WE SHOULD GET AT DIFFERENT TIMES

2026

NEXT EXIT 9 MILES

WE USE SIGNS (INDICATORS) TO HELP US KNOW HOW WE ARE GOING

2025

WE DECIDE OUR STARTING POINT LOOKING AT WHAT WE KNOW

Based on a slide from the module Adaptive Ecosystem Management 2022

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Question by KonKapp from NounProject.com

Is this a result chain?

NO. A common mistake with developing ToC is to describe the activities the team will do to implement the strategy, rather than the intermediate results.

Promotion of sustainable fishing techniques → Identify sustainable fishing techniques → Meet with fishing cooperatives → Hold trainings → Monitor whether fishers apply techniques → Write a report to donor → Coral reefs / Intertidal systems
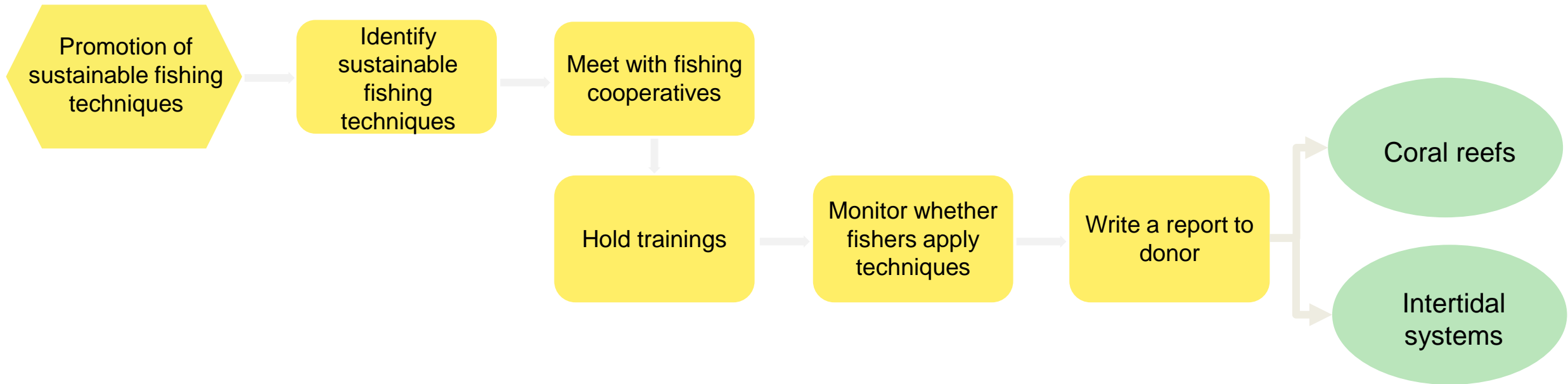
Taken from a slide from the module Adaptive Ecosystem Management 2022

Which of the following is not a results webs?
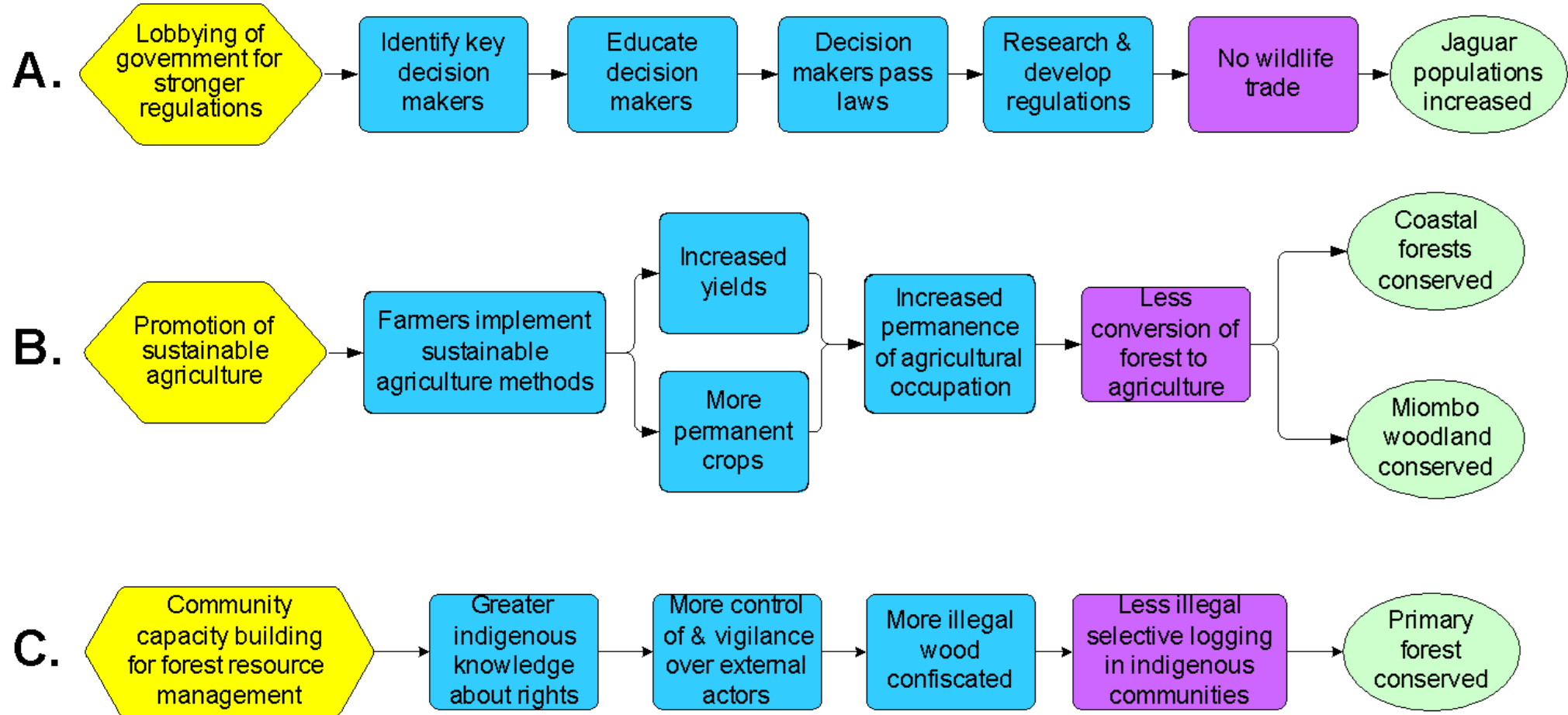
Taken from a slide from the module Adaptive Ecosystem Management 2022

To summarize…

Results webs – MARISCO tool

Results webs:

- They are usually constructed based on the **conceptual model**:

  → Visualisation deepens understanding of the indirect effects of strategies

  → Help build future scenarios for more effective strategic planning

  → Enabling of managers to identify gaps and reduce avoidable risks

- **Results-oriented:** Describes the results we seek to achieve the goal, not the activities.

- **Demonstrates change:** each result describes how the relevant factor in the situation will need to change, e.g., improve, increase or decrease

Results webs – MARISCO tool

Results webs:

- Allow for identification of "*milestone strategies*" -> Strategies which must be put into place before other steps are taken.

- Prepare the way for the design of an **effective monitoring system**.

- Test **"If-then" assumptions**: To detect inconsistencies in logical deduction or to identify unrealistic postulates concerning strategies

- **Not all results need objectives**. Choose results that are essential to achieve for the rest of the chain to work

- Opportunity to include **complementary strategies**.

How you will develop your Theory of Change?

Results webs – MARISCO tool

Instructions

1. Write the title of your selected strategies on a big hexagonal yellow card.

2. Place one of them on the left-hand side of the new results webs sheet (big brown paper)

3. Identify the main underlying factors and drivers likely to be impacted by the strategy.

4. Consider how the strategy will change the related factors and convert them to positive results. Write the formulated results on blue cards.

5. Add activities to clarify how the strategy gets from one result to another.

6. Add complementary strategies to complete the chain of results.

7. Test your chain with the logic "If-then" relationships between results.

8. Finalize your goal(s), add objectives, and indicators.

Results webs – MARISCO tool

✓ Begin analysis with simple results chains before creating complex webs.

✓ Write only one idea per result.

✓ You can start with chains in parallel and match them later.

✓ Reading your chain out loud is a good test of whether the results are "causally linked." Start by saying, "If we implement X strategy, then we will achieve Result A. If we achieve Result A, then Result B will occur…." Ask yourselves if this statement really makes sense. This will help you test your logic. If an "if…then" linkage seems like a "leap of faith," you may need an additional intermediate result to make your assumptions more explicit.

Tips

*Could anyone summarize how you will prepare the **ToC for your strategies**?*

Image source: Brainstorm by Jessica Lock from NounProject.com

Image source: https://www.123rf.com/photo_30662987_what-is-your-task.html

- Each group will develop for its topic a Theory of Change using Results Webs.

- It should include:
  - ✓ Strategies and activities
  - ✓ Intermediate results,
  - ✓ Threat reduction result(s) and stress reduction result(s) (if apply)
  - ✓ Target(s) systems
  - ✓ Goal(s)
  - ✓ Objectives (at least 3)
  - ✓ Indicators (at least 2)

- It doesn't need to cover all the related underlying factors and causes.

- Material will be provided.

Image source: https://www.123rf.com/photo_30662987_what-is-your-task.html

Results chain cards colour code

Strategy → Intermediate Result → Intermediate Result → Threat reduction Result → Stress reduction Result → Target

Activity | | Objective | Objective | | Goal
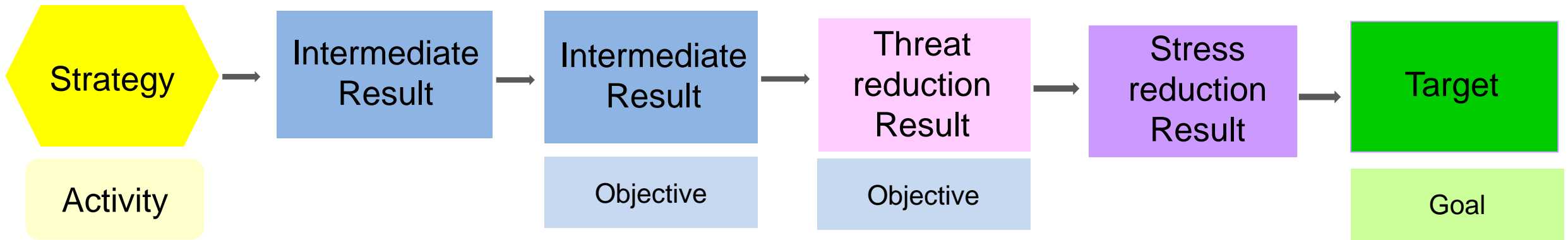
Question by KonKapp from NounProject.com

Optional resources to get inspiration for your activities

This could be useful in the future for those who implement participatory methods

Partizipativ innovativ – only in German

https://www.partizipativ-innovativ.de/

< **Radical Imagination for Racial Justice**

Transformative Research Toolkit

PUBLICATION | MARCH 20, 2024

https://belonging.berkeley.edu/transformative-research-toolkit

scnat knowledge

swiss academy of sciences

de   fr   it   en

Methods and tools for co-producing knowledge

Collaboration between experts and stakeholders from science and practice for tackling real-world, context-sensitive societal challenges. [more]

Image: td-net

| Search by key issues | Search by phases | td-net toolbox (method profiles) + | Method factsheets for td-research + |

| Shared experiences + | Community + | Applying td methods thoughtfully | Capacity Building |

https://naturalsciences.ch/co-producing-knowledge-explained/methods/td-net_toolbox

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References

Belcher B, Claus R 2020. Theory of Change. td-net toolbox profile (5). Swiss Academies of Arts and Sciences: td-net toolbox for co-producing knowledge. www.transdisciplinarity.ch/toolbox. doi.org/10.5281/zenodo.3717451

Deutsch, L., Belcher, B., Claus, R., & Hoffmann, S. (2021). Leading inter- and transdisciplinary research: Lessons from applying theories of change to a strategic research program. Environmental Science & Policy, 120, 29-41. https://doi.org/10.1016/j.envsci.2021.02.009

Oberlack, C., Sietz, D., Bonanomi, E. B., de Bremond, A., Dell'Angelo, J., Eisenack, K., Ellis, E. C., Epstein, G., Giger, M., Heinimann, A., Kimmich, C., Kok, M. T., Manuel-Navarrete, D., Messerli, P., Meyfroidt, P., Václavík, T., & Villamayor-Tomas, S. (2019). Archetype analysis in sustainability research: meanings, motivations, and evidence-based policy making. *Ecology and Society*, 24(2). https://www.jstor.org/stable/26796959

Schick, A., Krause, A. & Ibisch, P. L. (2022) MARISCO: Adaptive management of vulnerabilities and risks at conservation sites. Methodology guide. Centre for Econics and Ecosystem Management, Eberswalde University of Applied Sciences, Eberswalde