Division of Technology, Industry and Economics

UNEP

United Nations Environment Programme
Sustainable Social Housing Initiative
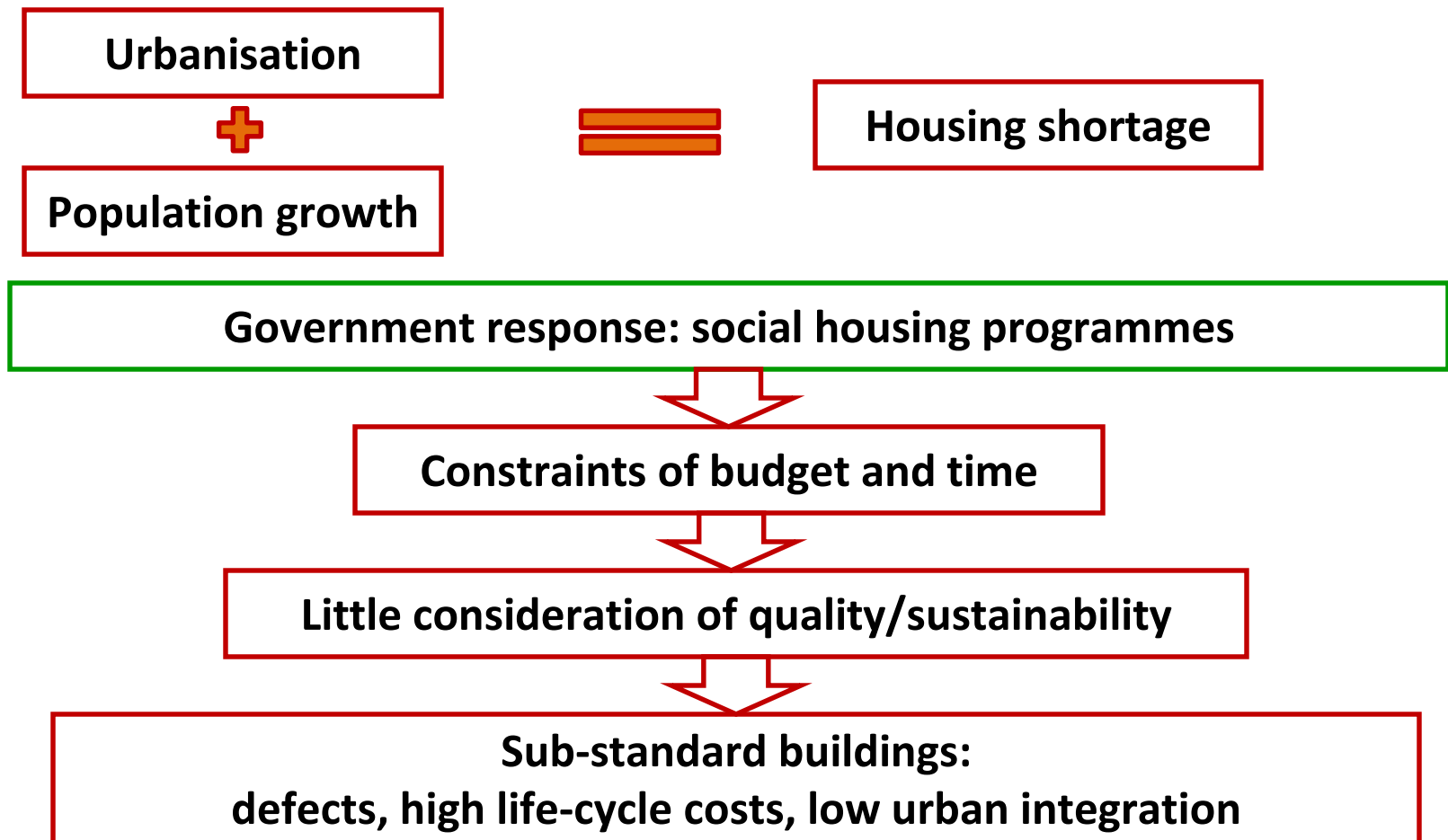
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National Conference on Green Design: Buildings and Habitats

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Rationale and Objectives

Aim: Promote sustainability in social housing projects, ensuring that social housing programmes include design criteria and construction practices that support sustainable building principles.

Urbanisation

+

Population growth

=

Housing shortage

Government response: social housing programmes

⬇

Constraints of budget and time

⬇

Little consideration of quality/sustainability

⬇

**Sub-standard buildings:
defects, high life-cycle costs, low urban integration**

SUSHI Activities

São Paulo (Brazil) and Bangkok (Thailand)

Assessment of context:
- ✓ Climate,
- ✓ Cultural habits,
- ✓ Needs of stakeholders,
- ✓ Availability of market solutions,
- ✓ Policies/ Incentives,
- ✓ Technical capacity,
- ✓ Awareness of benefits.

→

Development of targeted actions:
- ✓ Consultation Workshop,
- ✓ Training programmes,
- ✓ Database of technologies,
- ✓ Analysis of lessons learned from previous initiatives;
- ✓ Site-specific guidelines;
- ✓ Educational video.

Housing developers (public and private)

Policy makers (City; State; National)

Financial institutions

Designers, Architects, Construction Companies

Inhabitants

Generic guidelines

Making the case for sustainability in social housing

Definitions, glossary of terms

Guidance for inclusion of sustainable solutions in social housing projects

Step 1: Mapping & Assessment of context
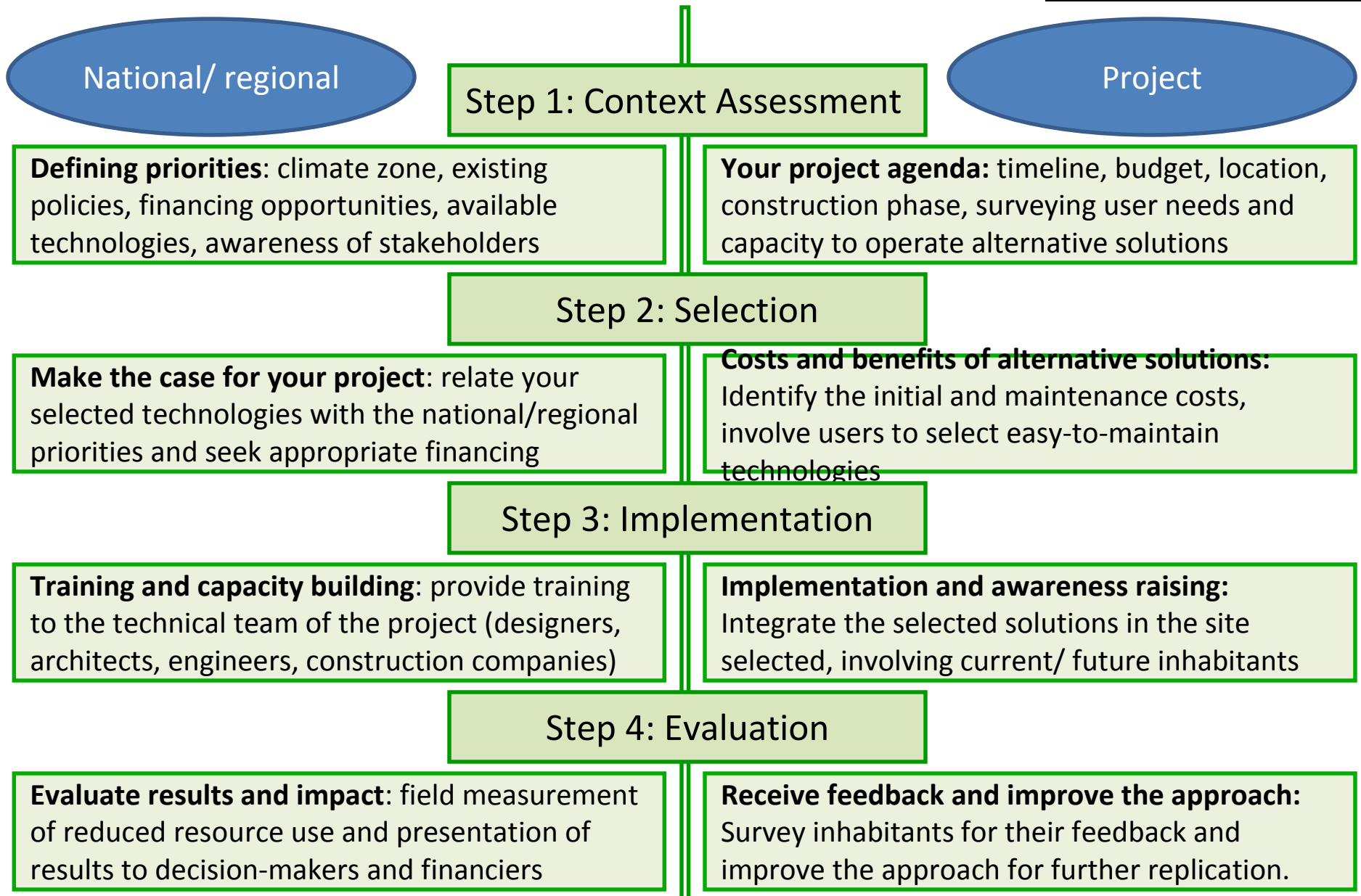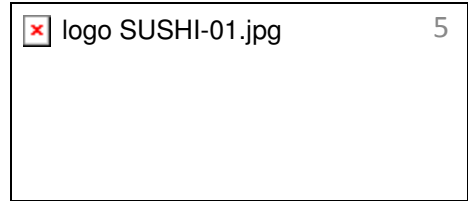Step 2 : Selection of appropriate solutions
Step 3: Implementation
Step 4: Evaluation and Dissemination

Guidelines map

National/ regional

Project

Step 1: Context Assessment

Defining priorities: climate zone, existing policies, financing opportunities, available technologies, awareness of stakeholders

Your project agenda: timeline, budget, location, construction phase, surveying user needs and capacity to operate alternative solutions

Step 2: Selection

Make the case for your project: relate your selected technologies with the national/regional priorities and seek appropriate financing

Costs and benefits of alternative solutions: Identify the initial and maintenance costs, involve users to select easy-to-maintain technologies

Step 3: Implementation

Training and capacity building: provide training to the technical team of the project (designers, architects, engineers, construction companies)

Implementation and awareness raising: Integrate the selected solutions in the site selected, involving current/ future inhabitants

Step 4: Evaluation

Evaluate results and impact: field measurement of reduced resource use and presentation of results to decision-makers and financiers

Receive feedback and improve the approach: Survey inhabitants for their feedback and improve the approach for further replication.

Results and Lessons Learned

- **Training and awareness-raising** are crucial for building capacity and making the case for sustainability;

- **Translate** the impacts into a language understood by stakeholders;

- Consider **cultural** and emotional factors;

- **Stakeholder involvement** and communication: from authority to final user (inhabitant);

- Consider buildings in their **urban environment**;

- Need for **concrete implementation** and monitoring including cost-benefit analysis.

Next steps

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✓Continued collaboration at national level (Thailand, Brazil)

✓Interest in other countries:
    ✓Mexico
    ✓Uruguay
    ✓China
    ✓India

✓Link with other projects:
    ✓UNEP-SBCI (Sustainable Buildings & Climate Initiative)
    ✓UNEP Urban Programme
    ✓UN-Habitat

✓Second Phase in India and Bangladesh:
    ✓Greater focus on urban environment;
    ✓Poverty alleviation/ Slum Upgrading;
    ✓Respond to local context.
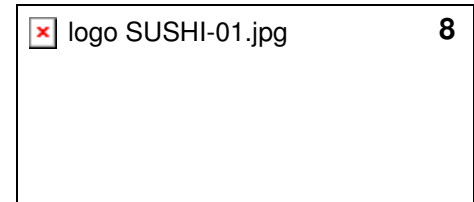
SUSHI II and more information:

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Thank you for your attention