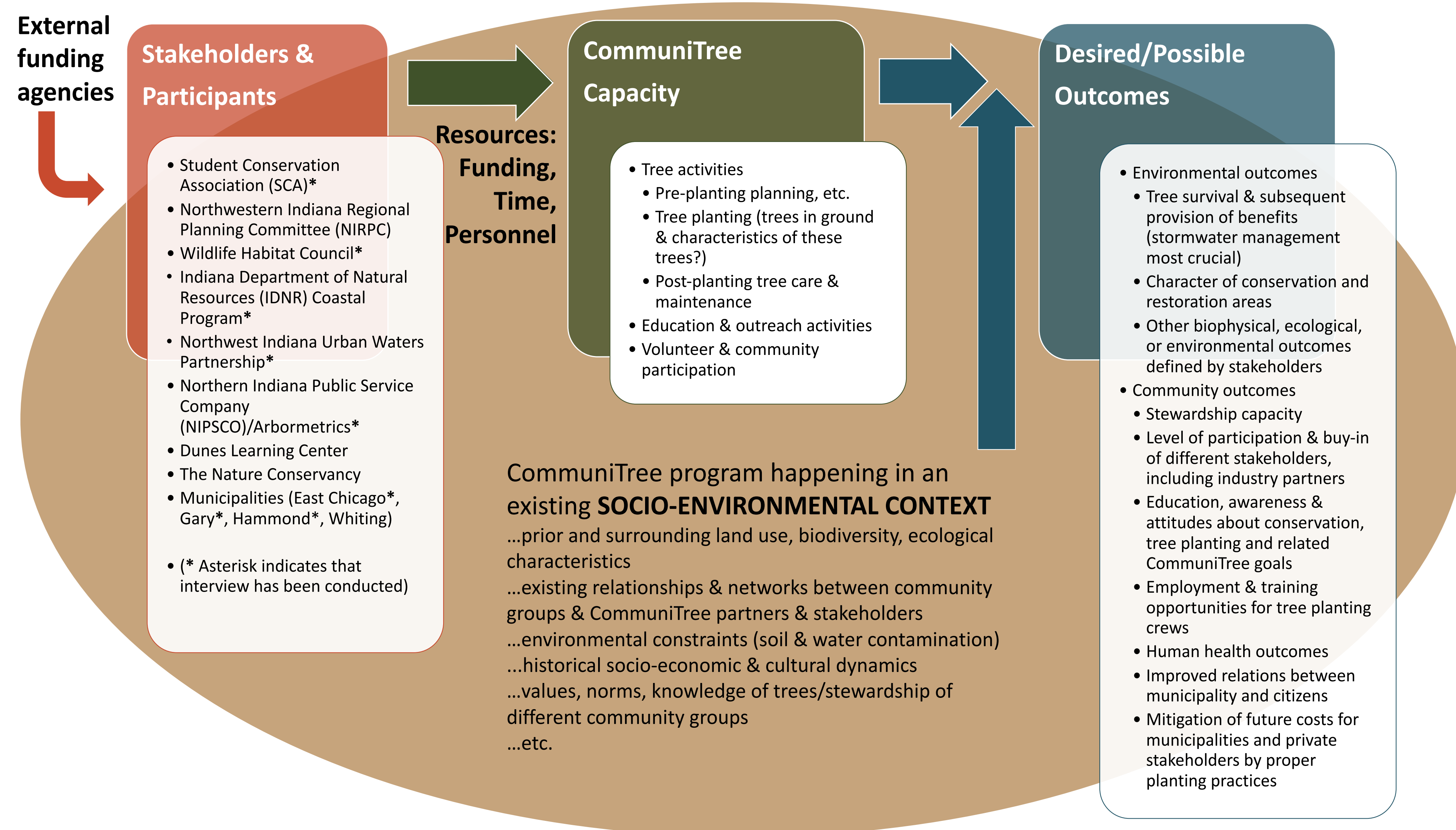# CommuniTree Program Evaluation:
Understanding multi-organizational partnerships for planting trees in underserved communities in Northwest Indiana

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External funding agencies

Stakeholders & Participants

- Student Conservation Association (SCA)*
- Northwestern Indiana Regional Planning Committee (NIRPC)
- Wildlife Habitat Council*
- Indiana Department of Natural Resources (IDNR) Coastal Program*
- Northwest Indiana Urban Waters Partnership*
- Northern Indiana Public Service Company (NIPSCO)/Arbormetrics*
- Dunes Learning Center
- The Nature Conservancy
- Municipalities (East Chicago*, Gary*, Hammond*, Whiting)
- (* Asterisk indicates that interview has been conducted)

Resources: Funding, Time, Personnel

CommuniTree Capacity

- Tree activities
  - Pre-planting planning, etc.
  - Tree planting (trees in ground & characteristics of these trees?)
  - Post-planting tree care & maintenance
  - Education & outreach activities
  - Volunteer & community participation

CommuniTree program happening in an existing **SOCIO-ENVIRONMENTAL CONTEXT**
…prior and surrounding land use, biodiversity, ecological characteristics
…existing relationships & networks between community groups & CommuniTree partners & stakeholders
…environmental constraints (soil & water contamination)
…historical socio-economic & cultural dynamics
…values, norms, knowledge of trees/stewardship of different community groups
…etc.

Desired/Possible Outcomes

- Environmental outcomes
  - Tree survival & subsequent provision of benefits (stormwater management most crucial)
  - Character of conservation and restoration areas
  - Other biophysical, ecological, or environmental outcomes defined by stakeholders
- Community outcomes
  - Stewardship capacity
  - Level of participation & buy-in of different stakeholders, including industry partners
  - Education, awareness & attitudes about conservation, tree planting and related CommuniTree goals
  - Employment & training opportunities for tree planting crews
  - Human health outcomes
  - Improved relations between municipality and citizens
  - Mitigation of future costs for municipalities and private stakeholders by proper planting practices

What is CommuniTree?

CommuniTree is a collaborative, multi-organizational tree planting partnership in Northwest Indiana working to promote the planting and care of trees, with the goal of creating a healthier and more diverse tree population, as well as a community of tree stewards. The effort is supported by partnerships with many community, industry and government agencies.

CommuniTree is in its beginning phases, created in 2016, so this project is designed to make sure that their goals, and the goals of their stakeholders, are in line with desired and obtained outcomes.

Existing Research in Literature

- Zhang, Yaoqi, and Bin Zheng, "Assessments of Citizen Willingness to Support Urban Forestry: An Empirical Study in Alabama". Arboriculture & Urban Forestry, 37.3 (2011): 118-125.

- Jack-Scott, Emily, Max Piana, Blake Troxel, Colleen Murphy-Dunning, and Mark S. Ashton, "Stewardship Success: How Community Group Dynamics Affect Urban Street Tree Survival and Growth". Arboriculture & Urban Forestry, 39.4 (2013): 189-196.

- Westphal, Lynne M. "Urban greening and social benefits: a study of empowerment outcomes." Journal of Arboriculture 29.3 (2003): 137-147.

- Chawla, Louise. "Life paths into effective environmental action." The Journal of Environmental Education, 31.1 (1999): 15-26.

- Turner, Claire and Mike Mitchell, "Planting the Spaces in Between: New York Restoration Project's Tree Giveaway Program". Cities and the Environment (CATE), 6.1 (2013): Article 5.

Methods

Volunteer Survey
Purpose:
  To gauge volunteers' perceptions of CommuniTree and the program through understanding how and why they got involved in the program, what benefits they expect to see from CommuniTree, and where and how they would like to see CommuniTree grow.

- The survey will be distributed electronically or on paper at CommuniTree volunteer events and at neighborhood tree plantings to participatants over the age of 18.

- Topics of questions included involvement with CommuniTree, environmental knowledge, environmental attitudes, and demographic information.

- Select survey questions from are below.

Stakeholder Interviews
Purpose:
  To understand the organization's connection and role within CommuniTree, along with it's goal and expected outcomes in the partnership.

- Interviews were with leaders at CommuniTree stakeholder organizations, as identified by Drew Hart of the US Forest Service.

- "Stakeholder" was defined as an organization that provides or receives resources to or from the CommuniTree program.

- Stakeholder leaders were initially contacted by email, using addresses provided by Drew Hart.

- The interview script was designed by the Spring 2017 Environmental Mixed Methods Research class, and fine-tuned by the research team, including Drew Hart.

- Topics of questions included the stakeholder organization's role in the CommuniTree effort, motivations for becoming involved, and goals and aspirations for CommuniTree. We also collected some personal information about interviewees, such as their position within the organization, their gender, race, and educational background.

- After the first few interviews, we added questions about the communication between stakeholder organizations and what data they would like to track.

Findings Thus Far From Interviews

- All stakeholder leaders were already involved in other tree planting projects with Drew Hart of the US Forest Service before learning about CommuniTree. In many cases, it was the personal interest of thestakeholder leader that led their organizations to partner with the CommuniTree program.

- The level of the formality of stakeholder relationships to the CommuniTree Program varied. The corporation, non-profits, and state agencies directly involved in the application for grants had a more formally documented relationship, and the majority had work orders interviewees submitted to superiors approving the work they dedicated to CommuniTree. Municipalities also had a formally documented relationship because of their approved applications to receive trees.

- Municipalities wished to restore losses due to invasive species, improve relations with their community, provide employment and job training opportunities for citizens, and lower future costs that often arise due to improper planting practices.

- Industry partners also wished to improve community relations and decrease future costs.

- The desired outcomes of non-profit stakeholders were very specific to the mission of their non-profit. The representatives from different non-profit stakeholders prioritized social and ecological outcomes differently based on this mission.

- State government agency partners wished to increase ecosystem services, particularly those that apply to the specific mission of the agency.

- All stakeholders stated a high level of satisfaction with the CommuniTree program, but were interested in planning related to the sustainability of the project and management of trees planted.