Leveraging Web GIS Mapping for Broadening Community Impacts

Peter Chen¹, Rachel Hale²

- 1. Associate Professor, Department of Geography, Sustainability, Community, and Urban Studies (GSCU), University of Connecticut, peter.chen@uconn.edu
- 2. Assistant Director, Research on Resilient Cities, Racism, & Equity (RRCRE), University of Connecticut, rachel.l.smith@uconn.edu

What is Web GIS?

Web Geographic Information System (GIS) allows for scalable identification of community assets (e.g., transportation, facilities, and infrastructure) in real-time through web browsers or mobile devices, without requiring specialized knowledge. Web GIS has been employed in various policy contexts where decision-making relies on spatial data and patterns, such as the COVID-19 dashboard that tracks daily infections and casualties.

Story Mapping: Hartford Love Your Block (LYB) Program

Funded by the City of Hartford and the Hartford Foundation for Public Giving, the Hartford LYB program has provided dozens of mini grants to support urban beautification and renewal projects in Hartford over the past six years. These projects were all proposed and led by community members seeking to make their neighborhoods more livable and impactful. Web GIS-based story mapping has revolutionized how these projects are shared and narrated.

Open Space BLUE HILLS NRZ Look Up to a Brighter Future UPPER ALBANY NRZ Carrie Saxon Perry Mural at Sand WEST END NRZ School ast Hartford Hartford ord Capitol Avenue Creative Placemaking mith Ster Zion Street Mural School MARG NRZ Dr Richard Love Your Earth: Connecting with South Hartford Greenspace Windham, CT 314 58 of 64

Community Asset Mapping: Windham Life Project



Windham Life is a USDA-funded project designed to enhance information sharing about community resources (e.g., food pantries and grocery stores) for residents of Windham County. The asset mapping platform

(windham.life) and tools (e.g., SNAP eligibility checks) help residents make informed food choices.

Policy Recommendations

- Increasing usage and visibility of GIS tools in public communication: Focusing on data-driven maps to enhance communication between policymakers and the community.
- Leveraging GIS tools for evidence-based decision making: Collaborating with universities to leverage GIS in identifying patterns within socioeconomic, infrastructure, and environmental data.
- **Providing funding to GIS-based community projects:** Supporting organizations that actively use GIS to address community needs.