

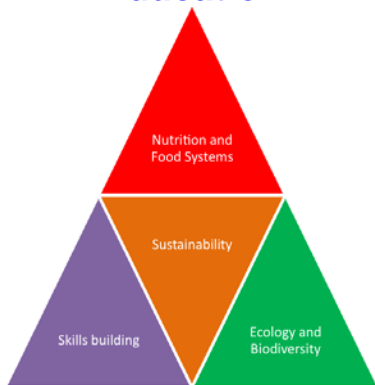


# Henry Street Settlement Rooftop Hydroponic Project

**Goal:** Design a rooftop hydroponic greenhouse that will maximize food production, as well as create educational and job training opportunities for Henry Street Settlement and its community. This is HSS's first step into urban agriculture and continues the Settlement's 100 year record of effecting social change in NYC.

**Methods:** Information was gathered through desk research, site visits and phone and email interviews.

## Education

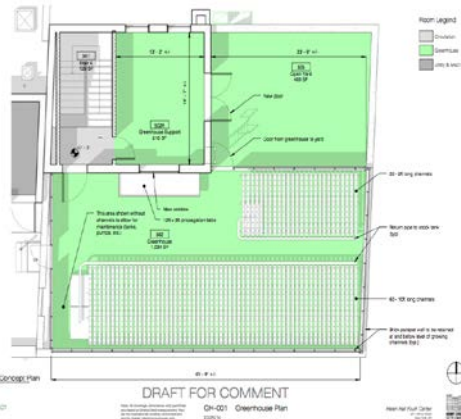


The greenhouse will be used to enhance the Settlement's current curriculum, as well as expand it to include new topics and lessons. The education curriculum will be comprised of four overarching themes: ecology and biodiversity, nutrition and food systems, sustainability, and skills building

## Nutritional Empowerment

HSS NFT Hydroponic Greenhouse Installation:

- 1212 plant spaces
- Bibb lettuce, kale, cilantro
- Potential to produce approximately 10,500 lb of produce annually
- HSS serves over 120,000 meals annually.
- Potential to save over \$1000 on monthly food costs.

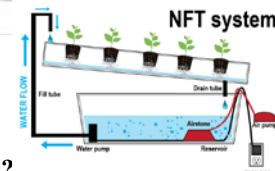


**Total cost: \$82817 Annual costs:\$2462**



NFT Hydroponic System at SkyVegetables Rooftop Greenhouse in the Bronx.

## Job training



## Why NFT Systems?

Nutrient Film Technique (NFT) is a recirculating technique that uses a slight gradient to flow nutrient-rich solution to plants. Plants are situated in a growing medium within the channel so that the roots dangle in a steady stream of water and nutrients; because it is close-looped, the system requires much less water than traditional agriculture and is able to maximize water retention.