

# Resource Material for Recycling and Economic Development in Chattanooga

Sponsored by the Office of Sustainability, City of Chattanooga

## WHY RECYCLING AND ECONOMIC DEVELOPMENT

Materials in the waste stream are valuable because of increased difficulty in extracting virgin materials, the growing world population, and the surging consumption levels of formerly non-industrialized economies. The result is that materials, including organic matter, when properly processed sell for historically high prices.

## VALUE ADDED THE KEY TO ECONOMIC SUCCESS AND REDUCED COSTS FOR THE CITY

By processing materials cities can earn from \$50-\$60 per ton for non-processed mixed recyclables. Chattanooga's Orange Grove Center processes recycled materials for the city and sells materials to nearby markets supporting its workers as well as workers in the paper, plastic, metal plants in the region.

## HOW CAN THE SYSTEM IN CHATTANOOGA GROW?

The Orange Grove Center has underutilized capacity and an easily expandable workforce. Chattanooga households and businesses can recycle more materials at marginal increased costs for processing and resale of materials.

The Orange Grove Center does not handle organic matter. A separate program for organics can be developed. Organic matter—food discards, soiled paper, yard and storm debris comprise perhaps 40% of the city's total waste



stream. High quality compost material can sell for \$100 per ton in the Mid Atlantic region of the US.

## NEW COMPANIES CAN BE RECRUITED TO THE CITY

Niche companies that compost organic matter, digest organic matter to recover methane, manufacture from recycled plastics, from high-grade paper, cotton, and electronic scrap can add value, jobs and expand the city's tax base.

## POTENTIAL IMPACT ON THE CITY OWNED LANDFILL

The city has an estimated 28 years of capacity remaining. This is an invaluable resource that most US cities do not have. With a rapid increase in recycling and composting the landfill life expectancy could be doubled making Chattanooga one of the richest cities in the US with regard to future landfill space. Landfill mining is possible, depending on several factors.

**RESOURCES FOR CHATTANOOGA’S FUTURE GARBAGE SYSTEM**

**Centralized composting and landfill mining:**

Peninsula Composting Company – [www.peninsula-compost.com](http://www.peninsula-compost.com)  
 Hidden Resources – [www.compostingconsultant.com](http://www.compostingconsultant.com)

**Small-scale community based composting:**

Growing Power – [www.growingpower.org](http://www.growingpower.org)  
 ECO City Farms - [www.ecoffshoots.org](http://www.ecoffshoots.org)  
 Bioponica, Inc - [bioponica.org](http://bioponica.org)  
 Elemental Impact - [www.elementalimpact.org](http://www.elementalimpact.org)

**Anaerobic digestion:**

Department of the Environment, San Francisco, CA - [www.sfenvironment.org](http://www.sfenvironment.org)  
 Coker Composting & Consulting – [www.cokercompost.com](http://www.cokercompost.com)  
 Gaia Strategies - [www.insinkerator.com/green](http://www.insinkerator.com/green)

**Deconstruction and resale of building materials:**

The ReUse People – [www.thereusepeople.org](http://www.thereusepeople.org)  
 Second Chance – [www.secondchanceinc.org](http://www.secondchanceinc.org)  
 Life Cycle Building Center – [www.lifecyclebuildingcenter.org](http://www.lifecyclebuildingcenter.org)

**Household food recovery programs:**

Recycle Worlds Consulting – [www.recycleworlds.net](http://www.recycleworlds.net)

**Direct incentives to households:**

Rewards for Recycling, Inc.– [www.rewardsforrecycling.com](http://www.rewardsforrecycling.com)  
 RecycleBank, Inc. – [www.recyclebank.com](http://www.recyclebank.com)  
 Pay As You Throw – [www.paytnow.org](http://www.paytnow.org)

**Reuse enterprises:**

Saint Vincent de Paul of Lane County – [www.svdp.us](http://www.svdp.us)

**Academic credentials for careers in resource management:**

GrassRoots Recycling Network - [www.grrn.org](http://www.grrn.org)

**Extended Producer Responsibility:**

Urban Ore, Inc. – [www.urbanore.com](http://www.urbanore.com)  
 Campaign for Real Recycling, Vancouver, Helen Spiegelman - [spiegelmanhelen@gmail.com](mailto:spiegelmanhelen@gmail.com)

**Business attraction and recruitment:**

Institute for Local Self-Reliance – [www.ilsr.org](http://www.ilsr.org)  
 Saint Vincent de Paul of Lane County – [www.svdp.us](http://www.svdp.us)

**Zero Waste planning:**

Institute for Local Self-Reliance – [www.ilsr.org](http://www.ilsr.org)  
 GrassRoots Recycling Network - [www.grrn.org](http://www.grrn.org)

**Life cycle analysis:**

Sound Resource Management - [www.zerowaste.com](http://www.zerowaste.com)  
 Institute for Energy and Environmental Research – [www.ieer.org](http://www.ieer.org)

**SELECT NEW RULES**

- Ban on purchasing bottled water by City agencies
- Ban on single-use plastic shopping bags
- Ordinance establishing fee on single-use plastic and paper shopping bags
- Ban on purchasing polystyrene for food service ware by City agencies
- Take-back regulations for household hazardous materials
- Ban on use of polystyrene for food service in all City food service establishments
- Ordinance mandating drug-disposal program by pharmaceutical companies
- Purchasing policies
- Voluntary Extended Producer
- Ordinance requiring commercial recycling
- Ordinance establishing a cigarette abatement fee
- Ordinance requiring construction & demolition debris recycling
- Carpet and other product stewardship legislation
- Deconstruction access to public buildings ordinance or contract
- Recycling requirements for construction and demolition (C&D) debris; bond program

## Neil Seldman, Ph.D.

PRESIDENT, INSTITUTE FOR LOCAL SELF-RELIANCE

Neil Seldman, Ph.D., co-founded the Institute for Local Self-Reliance in 1974 and is currently ILSR's President. An economic development planner and former manufacturer, Dr. Seldman specializes in approaches to municipal and commercial solid waste management that emphasize environmental quality and create economic development opportunities for small businesses, community organizations, and other targeted populations.



Dr. Seldman has consulted with city and state governments, citizen groups, and private industry across the nation. His work includes assistance with the formulation and implementation of recycling, solid waste management, and economic development initiatives for numerous municipalities; recruiting environmentally sound businesses for government agencies and community organizations; managing government and foundation research projects encompassing pollution prevention, economic development, recycling, and resource efficiency considerations, and; arranging financial packages, preparing feasibility studies and business plans, and conducting staff training and site assessments for environmentally sound businesses. He is a building deconstruction specialist.

Dr. Seldman has worked with national and international agencies such as the National Science Foundation, the U.S. Environmental Protection Agency, the U.S. Department of Energy, the World Bank, the National Center for Appropriate Technology, and the U.S. Office of Technology Assessment. He has performed contract work for the cities of Atlanta, GA; Philadelphia, PA; Los Angeles, CA; Cleveland, OH; Newark, NJ; St. Paul, MN; and Paterson, NJ. His consulting clients include the city councils of New Haven, CT; Louisville, KY; Chattanooga, TN; Bell and Duarte, CA; Austin, TX; Baltimore, MD; Washington, DC; and the counties of Camden, NJ; Kauai, HI; King, WA; San Diego, CA; and Alachua County, FL.

Dr. Seldman has addressed more than 500 conferences, forums, and town meetings in over 25 states and more than 100 cities. He is the author of dozens of technical reports and hundreds of articles on sustainable development.

Seldman holds degrees from Cornell University School of Industrial and Labor Relations and the Institute of Sino-Soviet Studies at George Washington University, where he also served as Associate Professorial Lecturer of Political Theory.