Poor People, Poor Environments, and Poor Health

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OHIO UNIVERSITY



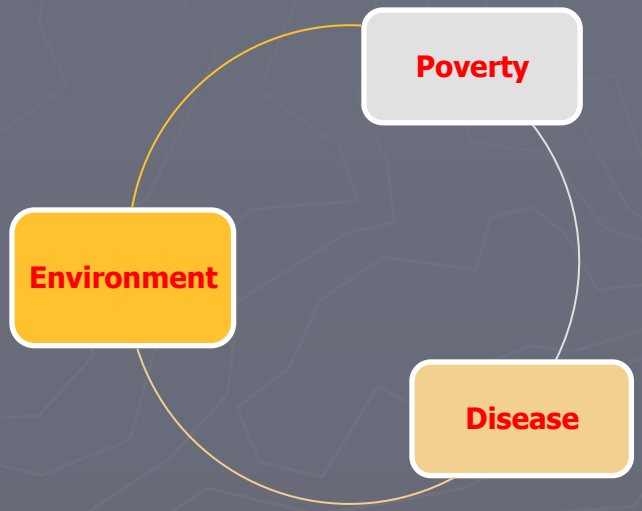


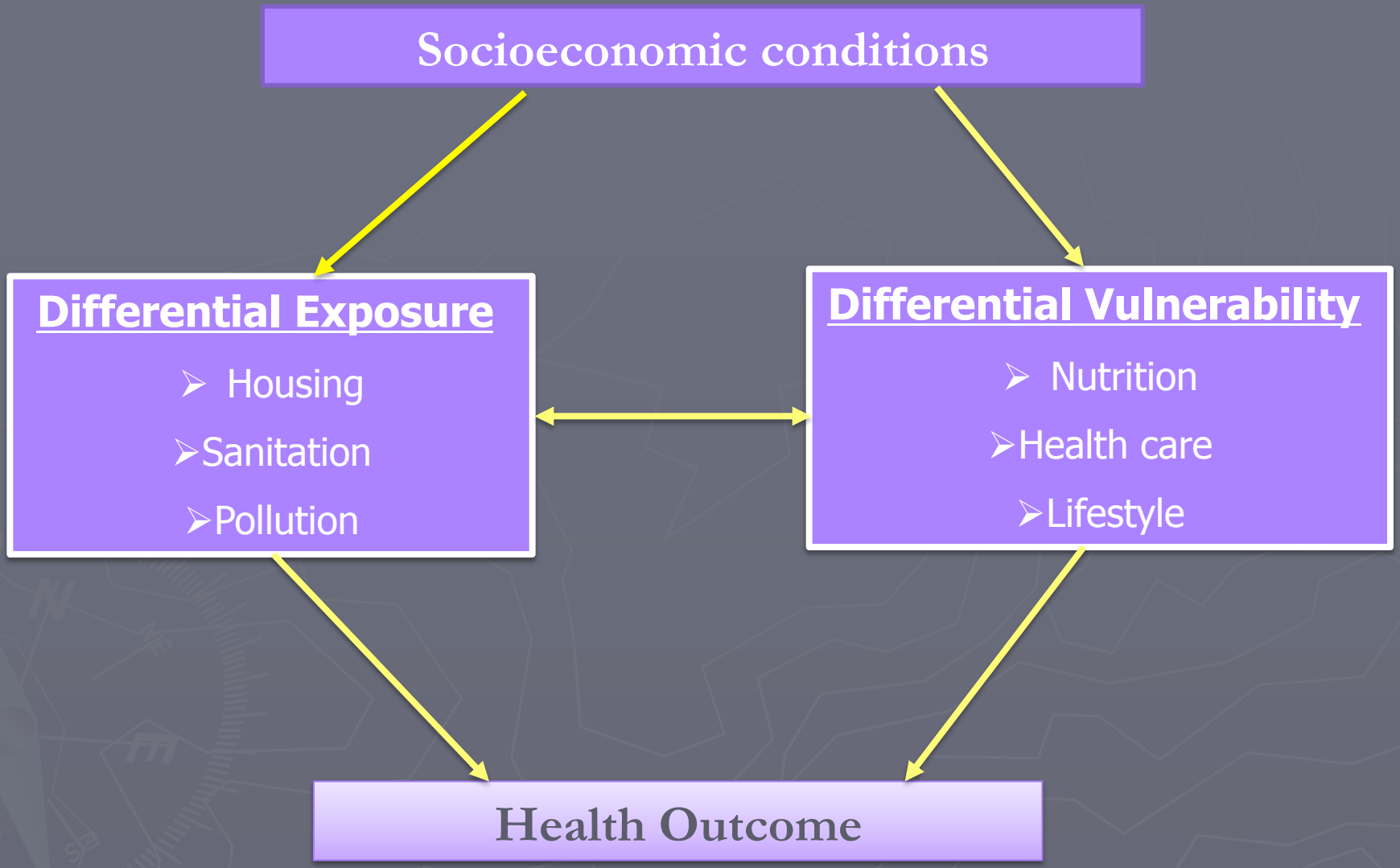
Outline

- Context and introduction to Appalachia
- Two stories
- Rural environmental justice

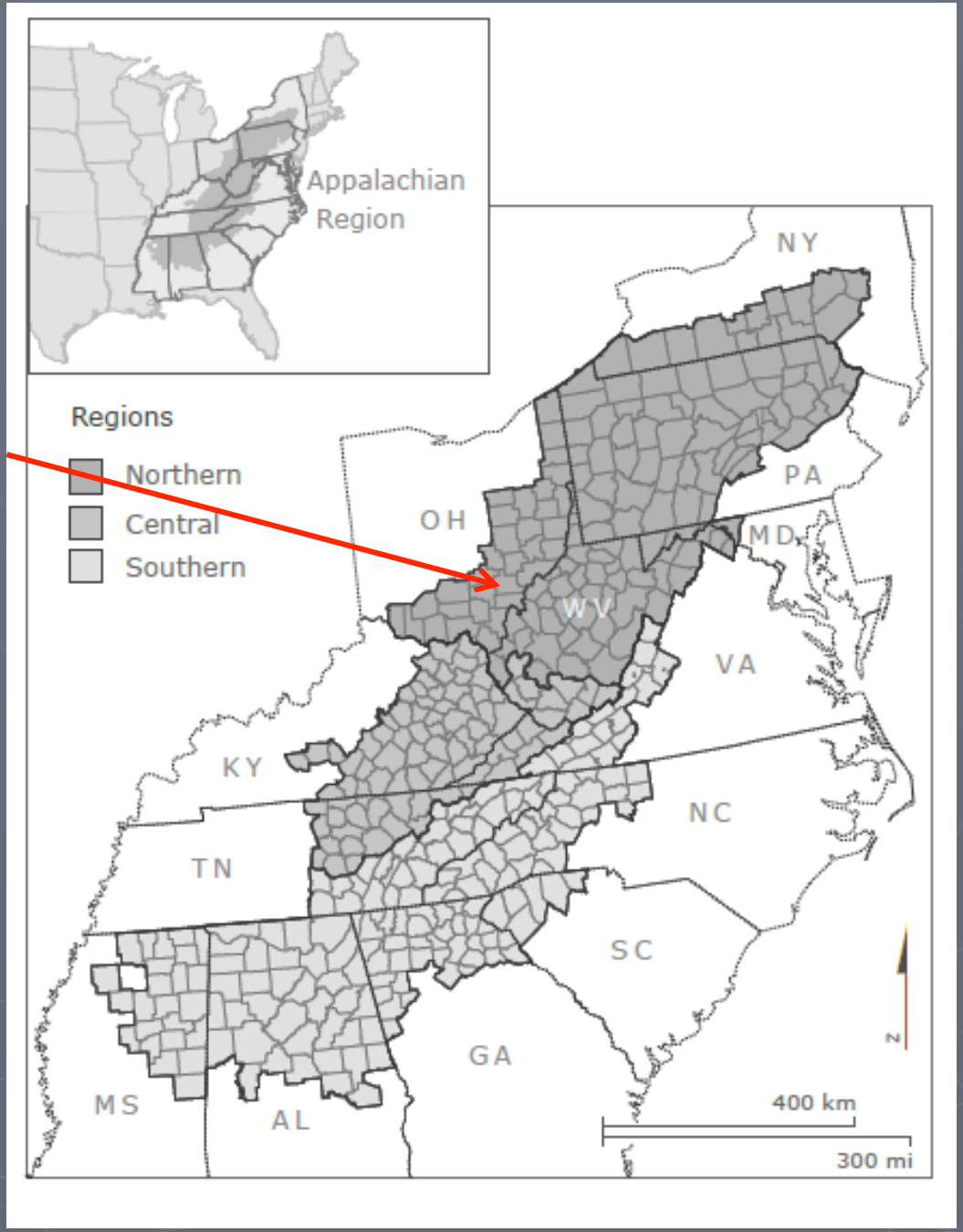
The Cycle

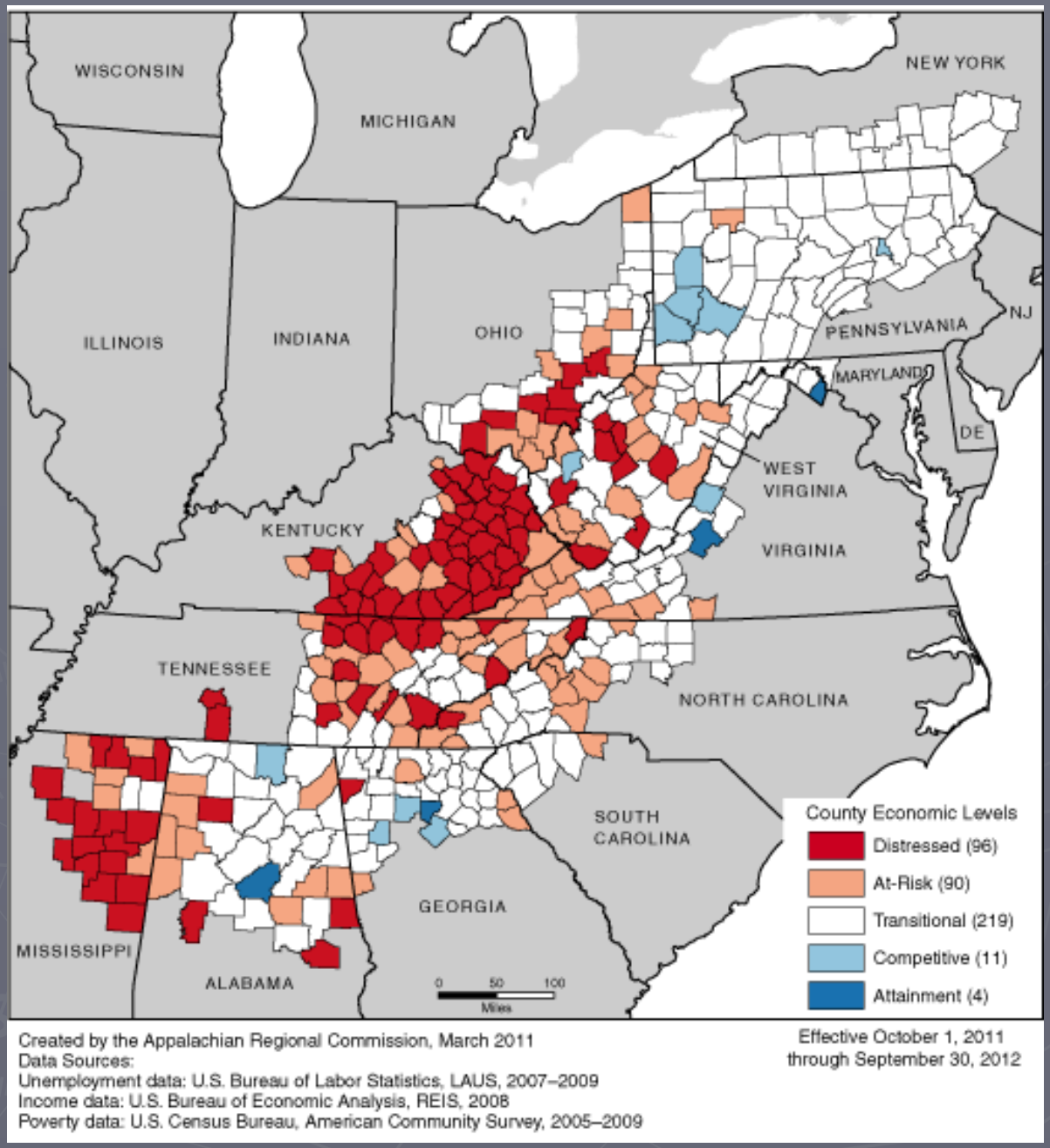
- Poor people live in areas with poor environmental conditions
- Poor people are vulnerable to diseases related to the environment
- Disease contributes to poverty




Socioeconomic conditions
Differential Exposure
Housing
Sanitation
Pollution
Differential Vulnerability
Nutrition
Health care
Lifestyle
Health Outcome

- Appalachia
  - Ohio University



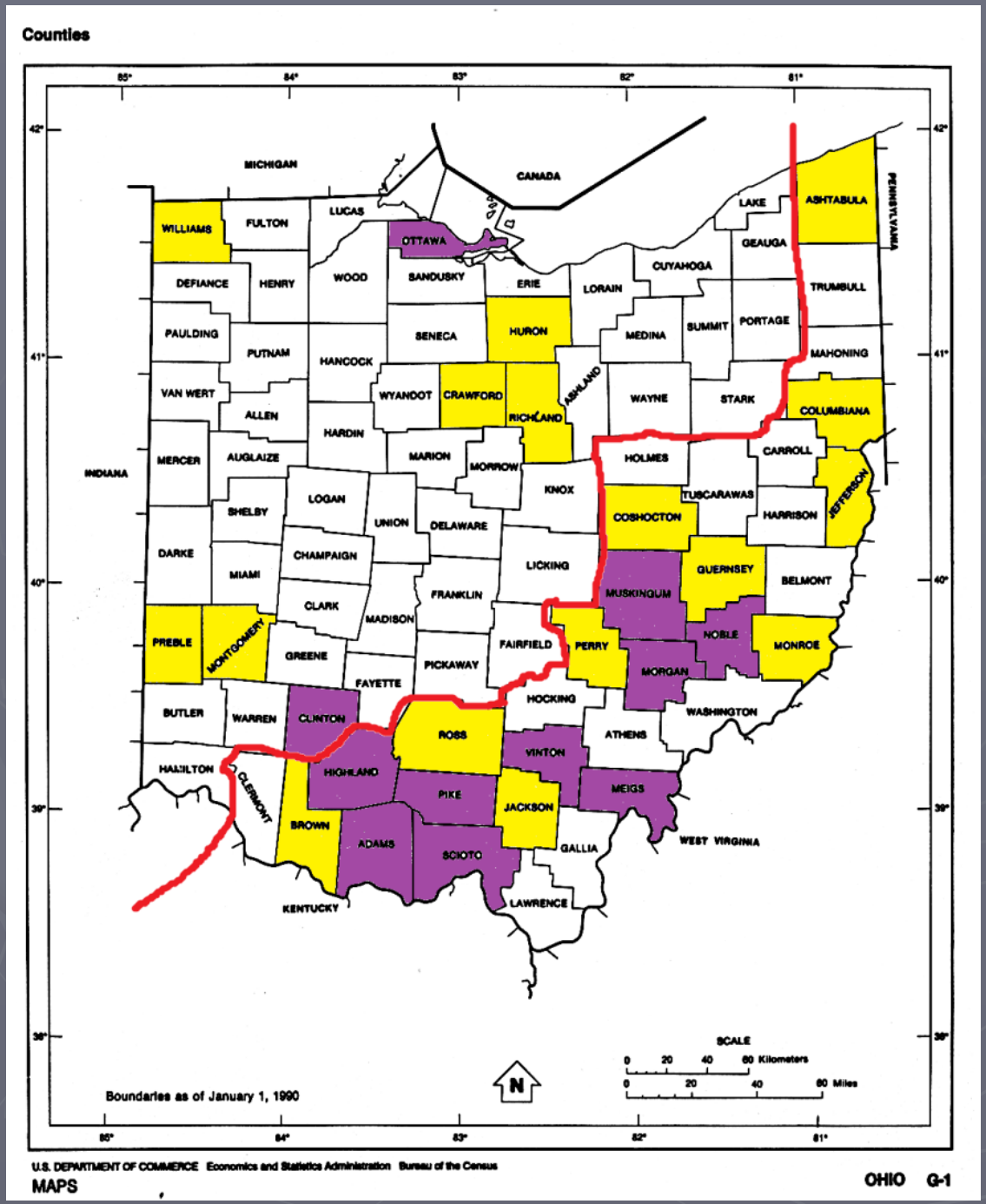


- County Economic Status, 2012

Ohio Socio-economic Indicators

Indicator	Non-Appalachian (56)	Appalachian (32)	T-test
Median household income	**$48,061**	**$38,364**	**7.52***
Mean percent unemployed	**7.70**	**9.09**	**-4.04***
Mean # of manufacturing jobs	**12,740**	**4,565**	**3.94***
Mean percent below the poverty line	**11.21**	**17.23**	**-6.63 ***
Median housing value	**$136,110**	**$106,259**	**5.34***
Per capita income	**24,276**	**19,733**	**7.22***

Source: US Census, 2010

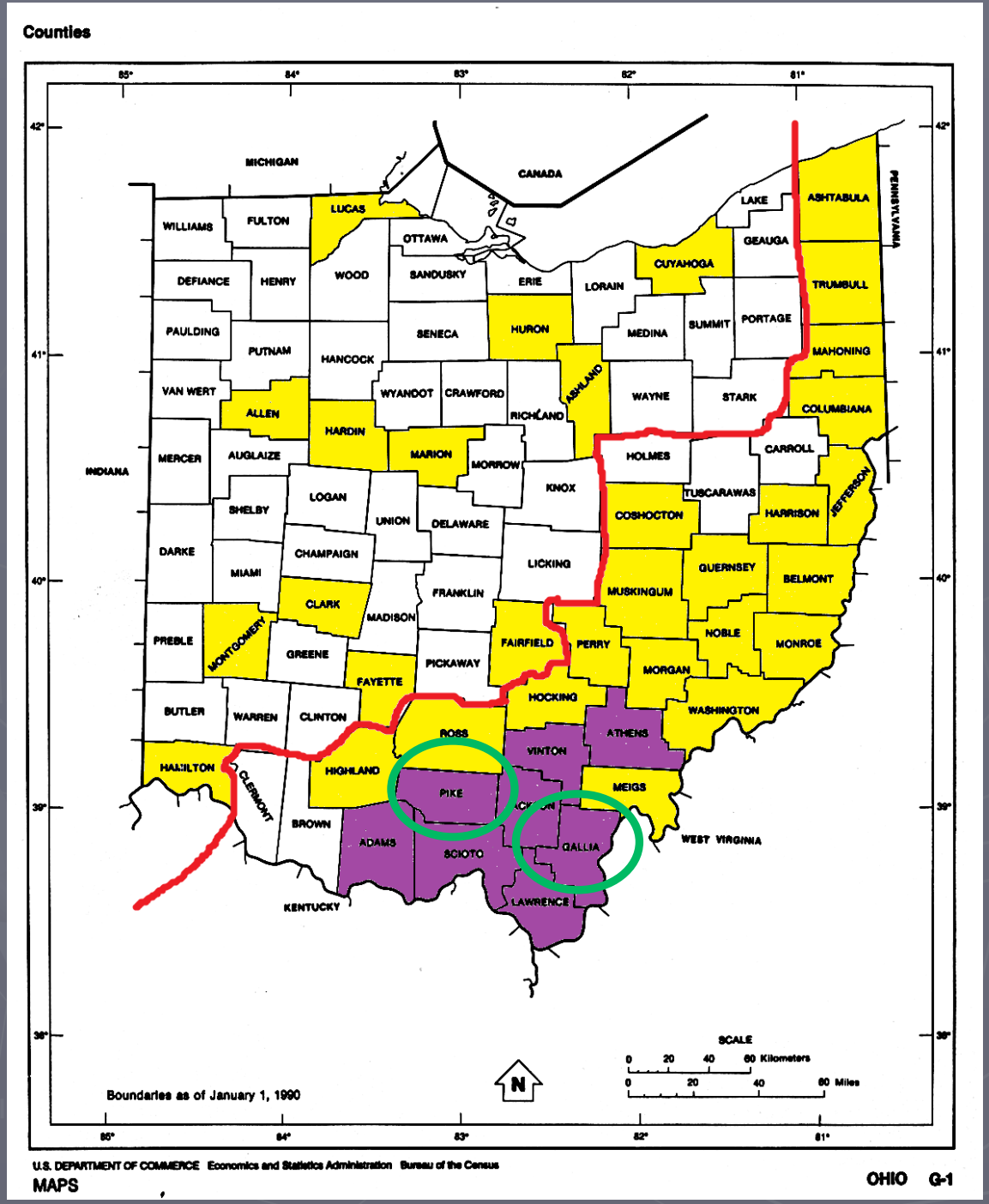


Unemployment Rates, November 2011

Counties in yellow are above the state rate of 8.7%

Counties in purple are above 10.0%

Highest unemployment rate – Pike County (13.9%)



Poverty Rates, 2005-2009

Counties in yellow are above the state rate of 13.6%

Counties in purple are above 20.0%

Highest poverty rate: Athens County (32.8%)

Ohio Environmental Indicators

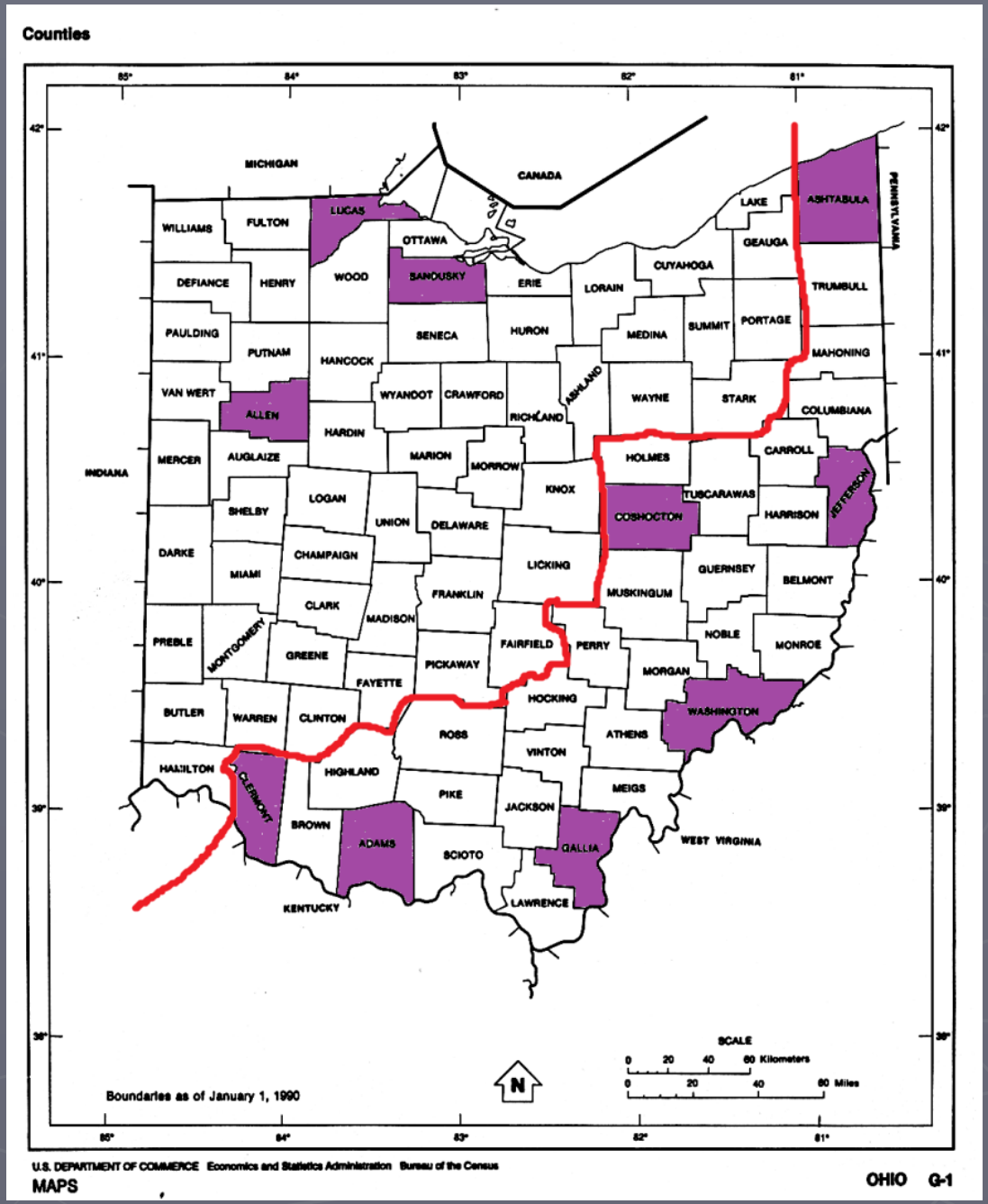
Indicator	Non-Appalachian	Appalachian	T-test
Median total TRI releases, lbs	**344,955**	**498,945**	
Mean total TRI releases , lbs. (2010)[1]	**1,441,609**	**2,826,373**	**-1.22**
Number of permitted facilities	**317**	**229**	**2.98***
TRI releases per manufacturing job[2]	**117**	**759**	**-2.31***
TRI releases per manufacturing $ earned	**35**	**74**	**-1.38**

1. Sources: USEPA, Toxic Release Inventory & Envirofacts
2. Calculated from U.S. Census data

Top 10 TRI Counties in Ohio

7 Appalachian counties = 45.35% of total state

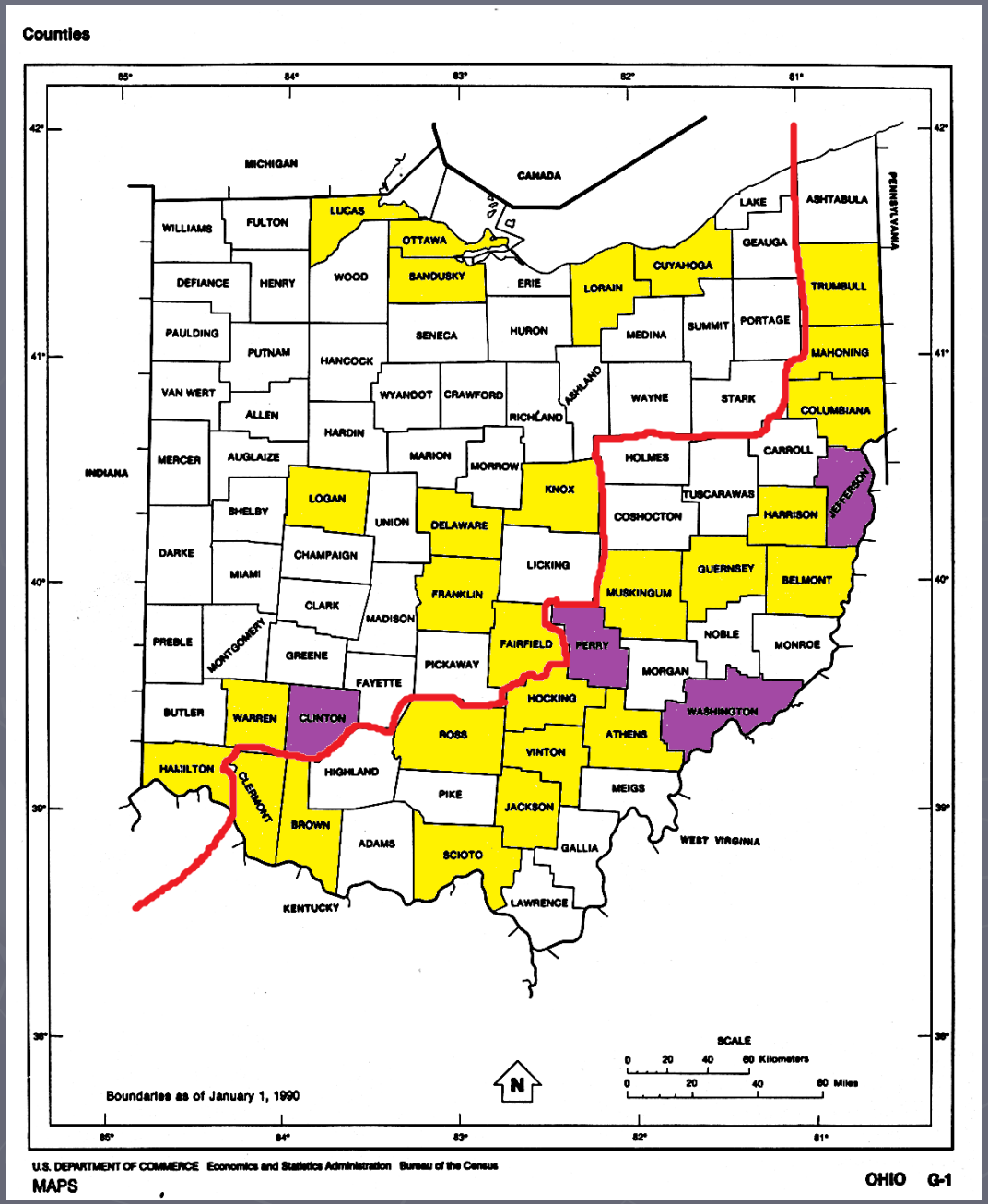
releases



Ohio Health Indicators

Indicator	Non-Appalachian	Appalachian	T-test
Cancer rate per 100,000, age-adjusted	**448.12**	**465.64**	**-2.65***
Cancer mortality rate per 100,000, age-adjusted	**193.01**	**210.53**	**-3.50***
Smoker (%)	**22.80**	**27.28**	**-7.50***
No physical activity (%)	**23.51**	**26.77**	**-6.96***
Overweight (%)	**36.05**	**32.88**	**5.89***
Obese (%)	**26.92**	**29.77**	**-4.55***
Low birth rate (%)	**7.58**	**8.66**	**-4.00***

Source: Ohio Department of Health, Healthy Ohio Community Profiles, 2008



Cancer Incidence

Counties in yellow are above the state rate of 465.1/100,000

Counties in purple are above 500/100,000

Highest cancer incidence = Jefferson County (539.8/100,000)

Local Pollution Havens

1. High levels of pollution
   - TRI, permitted facilities
2. Low levels of economic rewards
   - Manufacturing jobs related to pollution levels
3. Low levels of regulatory controls

Matthews, T. L. (2011). The enduring conflict of 'jobs versus the environment': local pollution havens as an integrative empirical measure of economy versus environment. *Sociological Spectrum*, *31*(1), 59-85.

Story 1: Power Plant

- Cheshire, Ohio
  - Population 2001: Approx 250
  - Current population: About 12
- General James M. Gavin power plant
  - American Electric Power (AEP)
  - 16th largest plant in the U.S.


E Main St
124
833
7
62
554
Cr-8
Cheshire, OH
KMZ
Southeast Ohio.kmz
© 2007 Europa Technologies
Image © 2007 TerraMetrics
© 2007 Navteq
Google
Pointer 38°56'38.36" N 82°06'41.37" W elev 581 ft
Streaming 100%
Eye alt 11.82 mi


Kalamazoo
Lake Erie
Toledo
Cleveland
South Bend
Akron
Youngstown
PENNSYLVANIA
Fort Wayne
Canton
Pittsburgh
OHIO
Columbus
INDIANA
MARYLAND
Indianapolis
Dayton
Cincinnati
WEST VIRGINIA
Louisville
Lexington-Fayette
VIRGINIA
KENTUCKY
Evansville
Roanoke
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MACK
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SCHOOL



July 2001, Monitoring Station noted a reading of 565 ppb of sulfur dioxide for 5 minutes—4 times the regulatory limit

The Cheshire Transaction

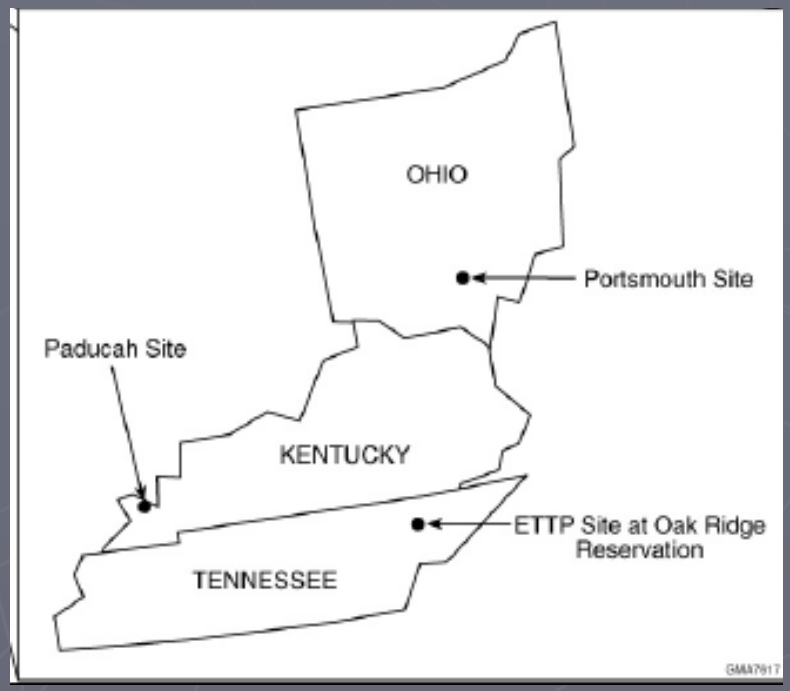
- $20 million
- 3.5 times assessed property value
- Agreement not to sue

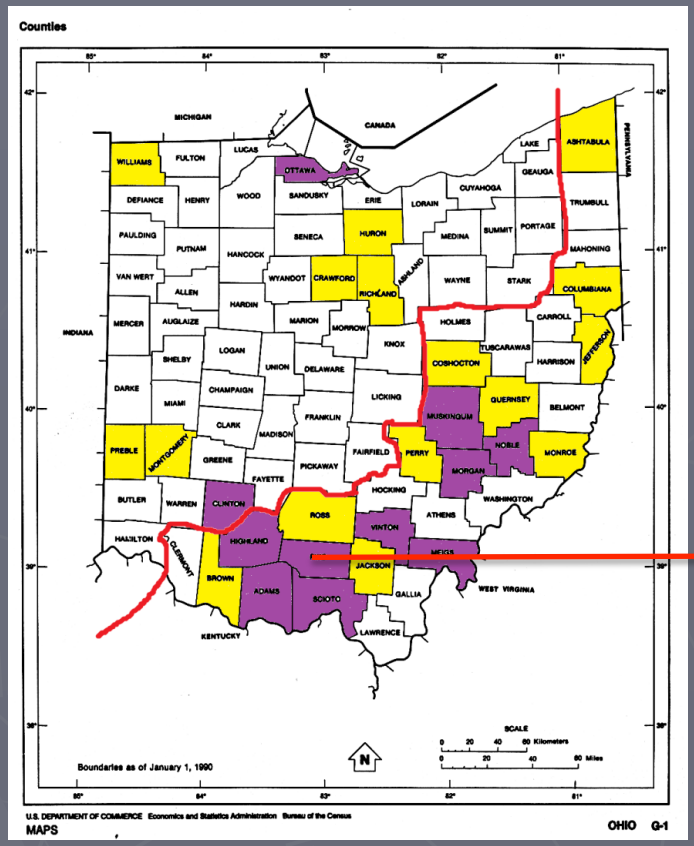
Most Residents Moved and Houses Demolished

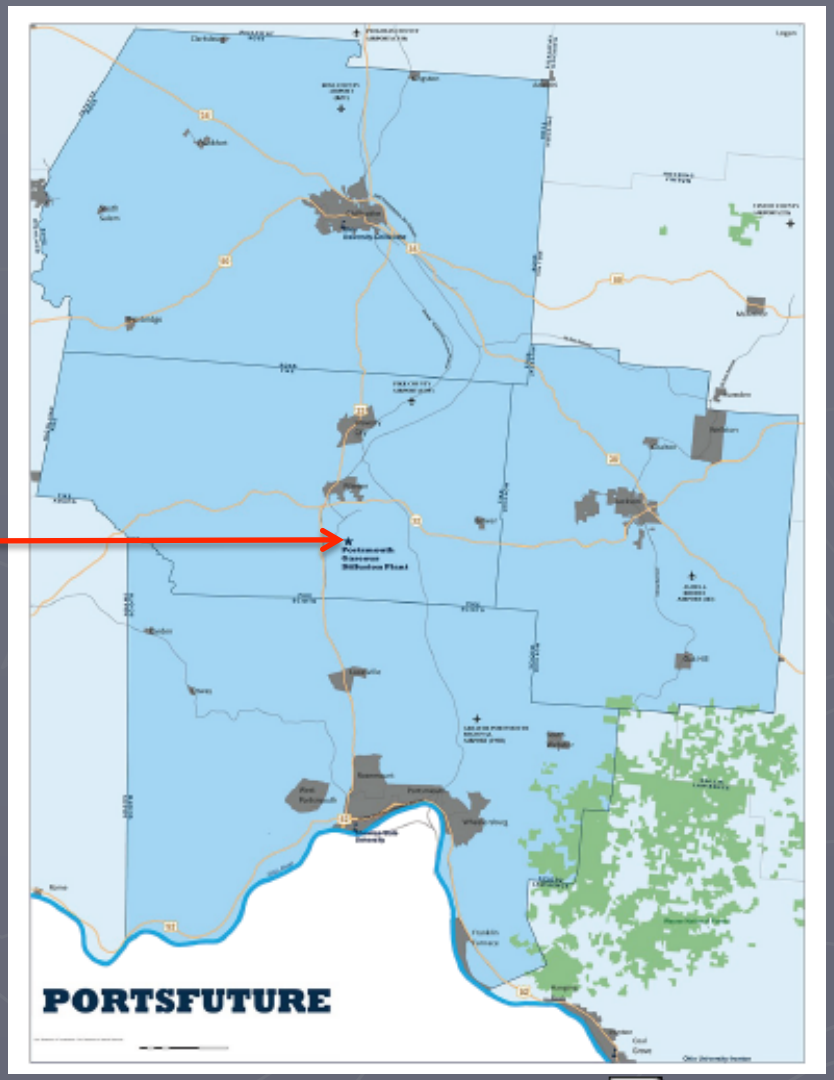


Story 2: Nuclear Legacy

- Portsmouth Gaseous Diffusion Plant (PORTS)
- "Cold standby" in 2001; cold shutdown, 2006
- Decontamination and Decommissioning (D&D), current









Southeast Ohio.kmz




PRESERVING
NATIONAL
SECURITY
is Your Job
...PRESERVING PERSONAL SECURITY IS HIS JOB

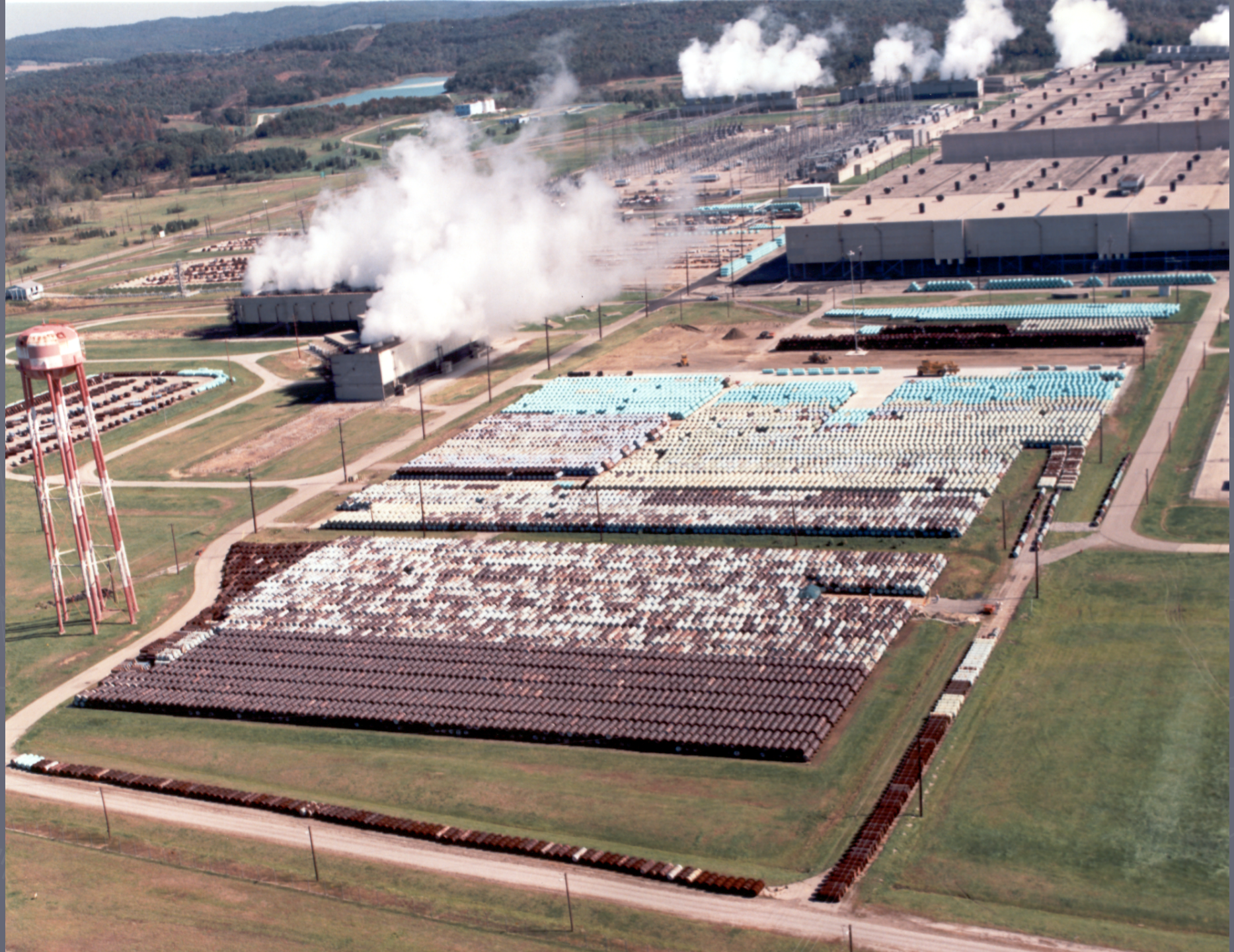

URANIUM
ENRICHMENT

X-326 – ½ mile long, 30 acre roof, 2.6 million sq ft

- X-330 -- ½ mile long, 33 acre roof, 2.8 million sq ft



- X-333 – ¼ mile long, 33 acre roof, 2.8 million sq ft



PORTSfuture

- June 2010-December 2011
- Community Based Participatory Research
- End State Vision

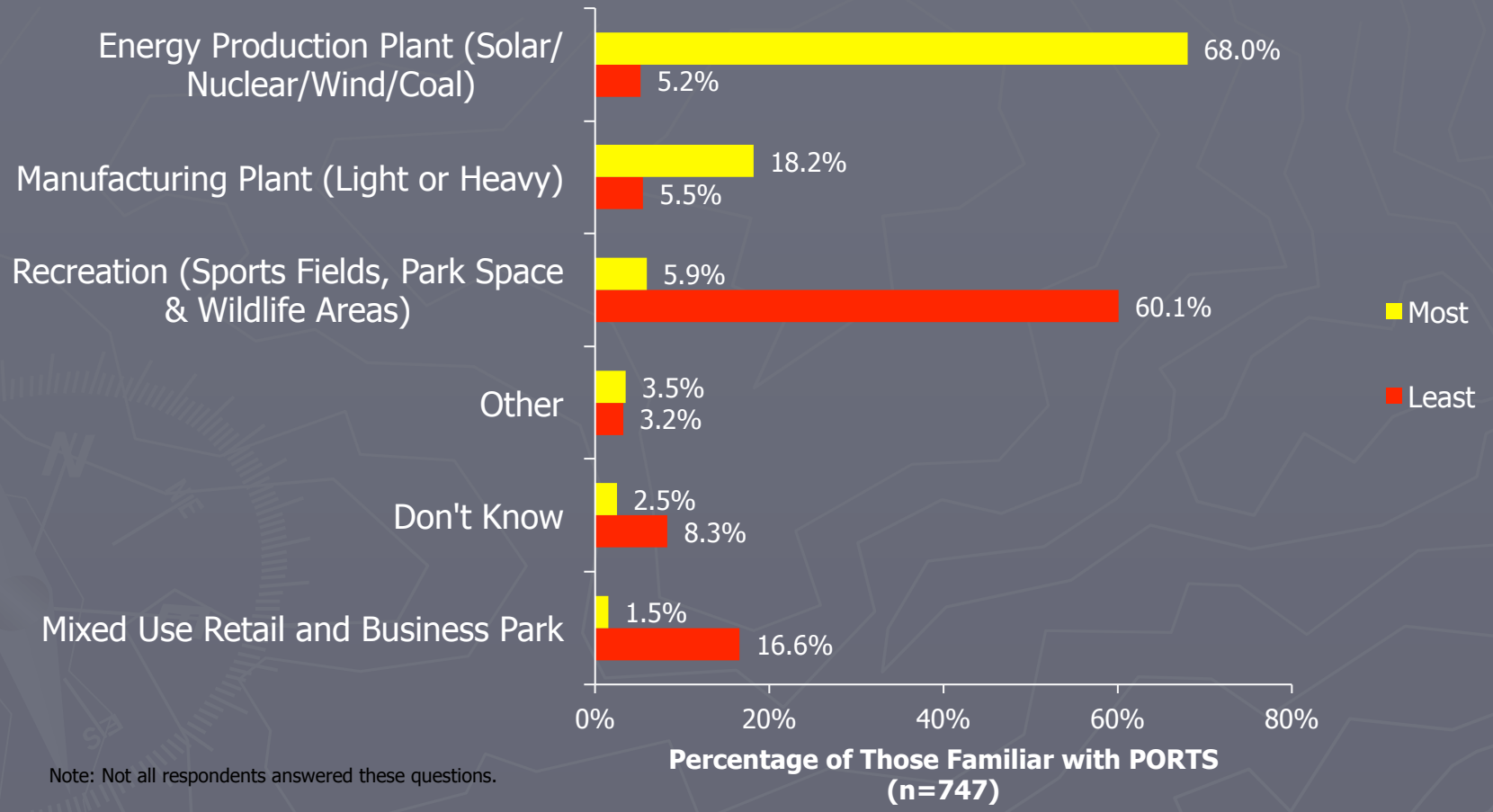
PORTS FUTURE




PORTSFUTURE
PORTSFUTURE



Telephone Poll: Site Preferences



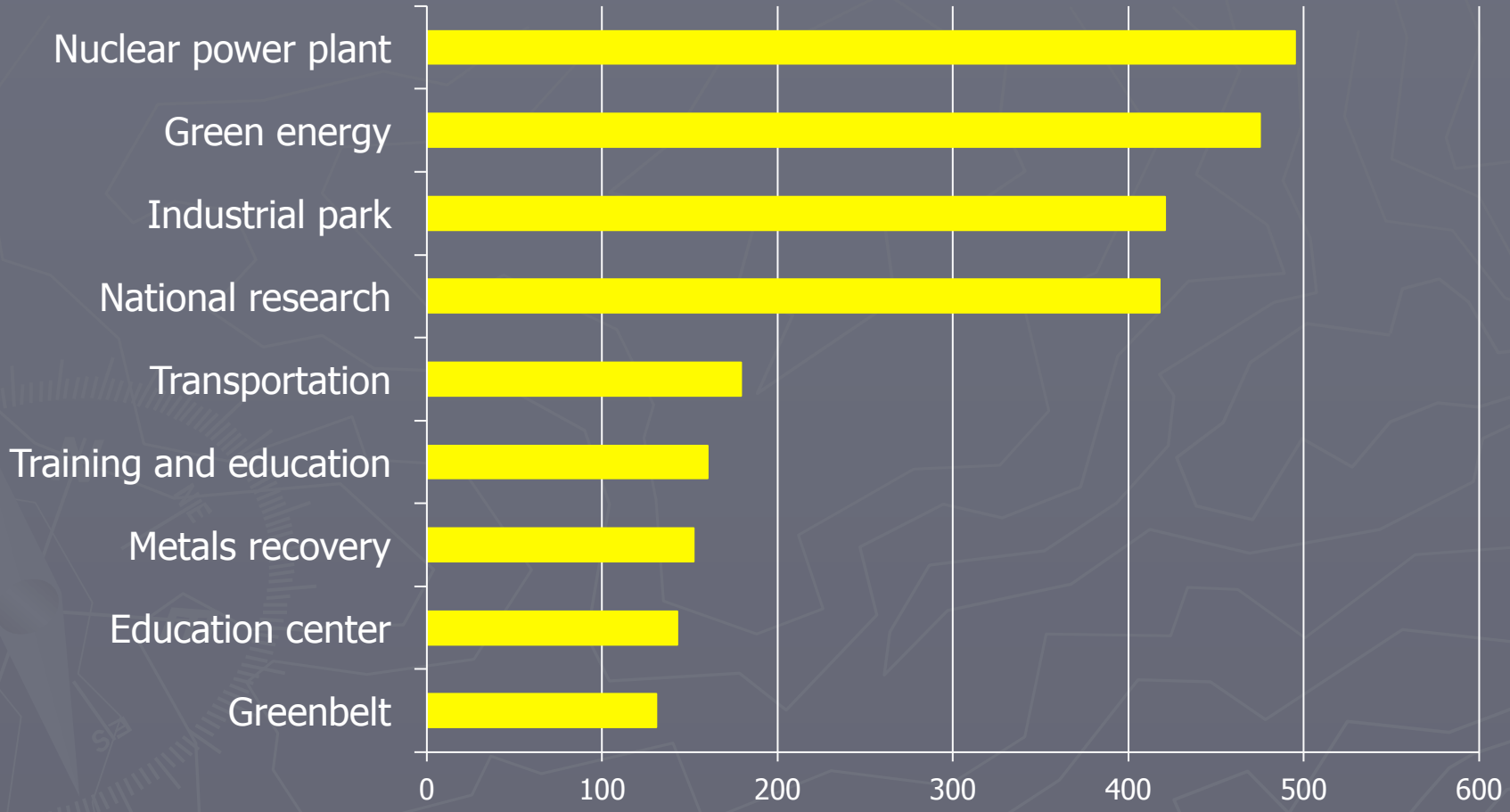
Note: Not all respondents answered these questions.


PORTS FUTURE
IMAGINING THE OPPORTUNITIES
GATHERING YOUR IDEAS
Visit www.portsfuture.com and provide comments
Share your thoughts on the future use of the Portsmouth Gaseous Diffusion Plant
Sign up to receive information and alerts
Make suggestions to us about other interested persons and/or groups that we can contact
GETTING INVOLVED
Stay Informed
Give Feedback
Attend Events
Telephone Surveys · Teams · Advisory Panel
OUTREACH TIMELINE
Summer-Fall 2011
Outreach at county fairs and other events
Submit report of public outreach activities
Winter-Spring 2011
Present and discuss suggestions/findings/ results of Visioning Teams with public
Late Fall 2010-Winter 2011
Convene visioning teams and hold public meetings
Continue outreach activities
Conduct telephone survey
Fall 2010
Summer-Fall 2010
Focus groups
Develop telephone survey
Identify and interview key people
WIN A $25 GIFTCARD
4 winners will be selected
To enter fill out the Public Outreach Project Contact Card
Winners notified by phone or email and need not be present to win
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OHIO UNIVERSITY
Voinovich School of Leadership and Public Affairs


CARPENTERS
Born American,
Raised Union!
Portsmouth, Ohio


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Public Voting Results
(N=1,141)



Local Pollution Havens

1. High levels of pollution
2. Low levels of economic rewards
3. Low levels of regulatory controls
4. Public support and the belief that local short-term economic growth should take precedence to environmental quality

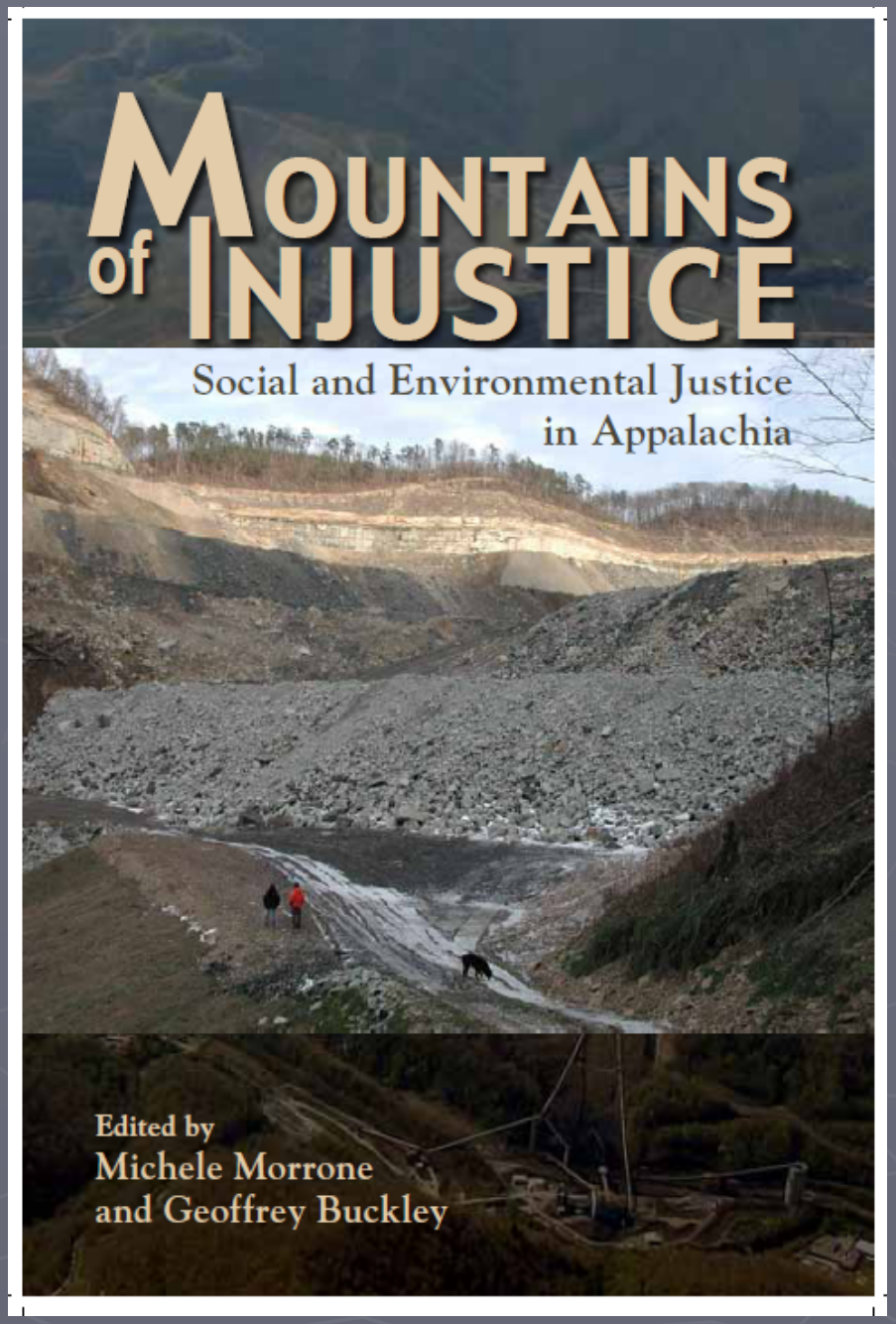
Local Pollution Havens and EJ

- Environmental injustice:
  - When one segment of the population bears a disproportionate burden due to environmental conditions

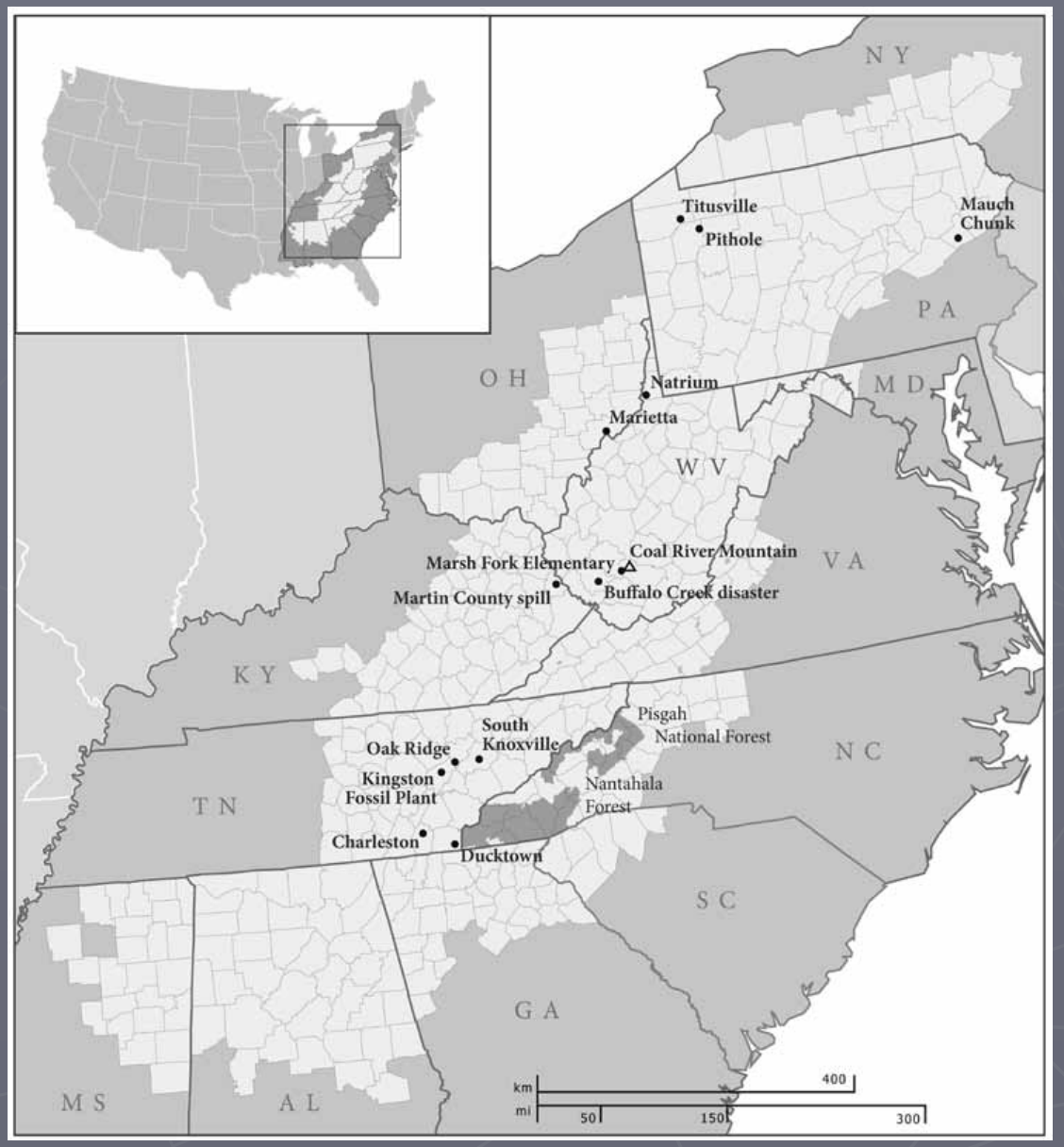


Contents

1. Perspectives
2. Citizen Action
3. In Their Own Words



Places Discussed in Mountains of Injustice



In Their Own Words

- "Housewives from Hell": Perspectives on Environmental Justice and Facility Siting (Michele Morrone and Wren Kruse)
- Stories About Mountaintop Removal In The Appalachian Coalfields (Geoff Buckley and Laura Allen)

Save The Children

- "... one of the reasons that I started looking into this at all is that there were several children in my community that had strange illnesses or you know, my daughter had a bone tumor."

Trust

- "…I think is people were really up in arms and furious that our own government could secretively do this to a community and not tell anybody."

Jobs vs Environment

- "I think they also dangle jobs, which is the economic piece. I think jobs are dangled in poor communities and you know, "We'll come in we'll have 500 jobs." When we know that's a big fat lie."

Home-Schooled Activists

- "So there's health issues, there's outrage, there's getting yourself empowered and organized, and then there's education. Then you get yourself educated so you know what you're talking about cause that's one of the things they'll get you on if you start raising hell about things and you don't know what you're talking about."

Environmental Justice

- "I think environmental justice is about how companies, whether they're the government or private industry or whatever, think they can just come into anybody's neighborhood and build anything they want and do anything they want under a veil of secrecy…"



Photo credit: Vivian Stockman