North Central Texas Air Quality Strategies:

Light-Emitting Diode Traffic Signal Program

NCTCOG
Surface Transportation Technical Committee
April 22, 2005
Presentation Outline

- Program Goals and Scope of Work
- Survey and Survey Results
- Funding Shortfall
- Proposed LED Policy
Program Goals

Reduce Ozone Pollutant level

Convert 50 Percent of Region’s Signals to LED by May 2005

Convert 90 Percent of Region’s Signals to LED by May 2006
Proposed Scope of Work

- Develop and Conduct LED Survey and Analyze Survey Findings
- Research LED Vendors and Technology
- Possibly Develop RTC Policy for LED Based on Survey Findings
Survey

Conducted First Survey in July 2004

Updated Survey in February 2005
Survey Results

Anticipated Deployment by May 2005
Program Goal = 50 Percent
Survey Response = 74.5 Percent
Goal Achieved

Anticipated Deployment by May 2006
Program Goal = 90 Percent
Survey Response = 82.9 Percent
Short by 7.1 Percent or 352 Intersections
Funding Shortfall

Funds Available = $300,000

Estimated Cost per Intersection
$4,000 to $6,000
Convert ~ 60 Locations

Remaining Locations
292 Locations
~ $1.46 Million
Proposed LED Policy

Include LED deployment in existing and future TIP Projects.

Include LED deployment in TAP.
- Phase 2 ~ $6.24 Million
- Phase 3.1 ~ $3.0 Million
- Phase 3.2 ~ $7.0 Million
  - Detector Repair/Replacement
  - LED Implementation
  - Signal Retiming/Coordination

North Central Texas Council of Governments
TAP Phase 3.2

1. NCTCOG hires a consultant(s) to perform the work.

2. NCTCOG provides funding to agencies to complete the work with staff resources.

3. NCTCOG hires a consultant(s) to perform the data collection and provides funding to agencies to complete the work with staff resources.