U.S. Route 45; IL Route 132 to IL Route 173 Millburn Bypass Alternatives Preliminary Impact Evaluation Matrix PUBLIC MEETING 2 - September 2nd, 2010

| | Impact | | | | | Alternatives | | | | | | |
|---|---------|-------------|-------|-------|---|------------------|------------|-------|---|-------|---------|-------|
| Impact Criteria | Measure | Group A | | | | Group B | | | | - | Group C | |
| | | 1 | 2 | 4 | | 1 | 2 | 4 | | 1 | 2 | 4 |
| I. Transportation Performance | | | | | | | | | | | | |
| Network - Total Delay ^e | hours | 32 | 23 | 23 | | 79 | 23 | 22 | | 35 | 26 | 26 |
| Network - Total Travel Time ^e | hours | 88 | 81 | 77 | | 128 | 78 | 70 | | 94 | 78 | 90 |
| Network - Number of Vehicle Stops ^e | number | 2,940 | 2,482 | 2,314 | | 3,612 | 2,372 | 2,109 | | 4,186 | 2,814 | 2,795 |
| Level Of Service (LOS) - Main Intersection ^e | seconds | С | С | С | | F/C ^f | С | С | | С | С | С |
| Pedestrian/Bicycle Accommodations ^c | scale | | | | | | | | | | | |
| Transit Compatibility ^c | scale | | | | | | | | | | | |
| Opportunities for Innovative Solutions ^c | scale | | | | | | | | | | | |
| Safety | scale | | | | | | | | | | | |
| II. Environmental Resources | | | | | | | | | | | | |
| Water Resources | | | | | _ | | | | _ | | | |
| Existing Detention Pond Impacts | acres | 0.00 | 1.30 | 0.00 | | 0.00 | 1.30 | 0.00 | | 0.00 | 1.30 | 0.00 |
| Impervious Area Increase | acres | 10.85 | 14.60 | 11.95 | | 2.64 | 6.67 | 3.85 | | 11.77 | 16.67 | 13.19 |
| Floodplain Impact | acres | 0.49 | 0.49 | 0.49 | | 0.42 | 1.02 | 0.42 | | 0.45 | 1.05 | 0.46 |
| Floodway Impact | acres | 0.00 | 0.00 | 0.00 | | 0.00 | 0.60 | 0.00 | | 0.00 | 0.60 | 0.00 |
| Wetlands | | | | | | | | | | | | |
| ADID | acres | 0.00 | 0.00 | 0.00 | | 0.00 | 0.00 | 0.00 | | 0.00 | 0.00 | 0.00 |
| Non-ADID | acres | 0.02 | 0.05 | 0.00 | | 0.00 | 0.08 | 0.05 | | 0.00 | 0.07 | 0.04 |
| Biological Resources | | | | | | | | | | | | |
| T&E Species | number | 0 | 0 | 0 | | 0 | 0 | 0 | | 0 | 0 | 0 |
| Trees & Landscape ^c | number | | | | | | | | | | | |
| Air Quality ^c | scale | | | | | | | | | | | |
| Energy ^c | scale | | | | | | | | | | | |
| Traffic Noise ^d | scale | 4 | 5 | 4 | | 3 | 4 | 3 | | 2 | 4 | 2 |
| Cultural Resources | | | | | | | | | | | | |
| Historic District Impacts | acres | 0.00 | 2.95 | 0.00 | | 0.56 | 4.11 | 0.47 | | 1.21 | 4.42 | 1.25 |
| Historic Building Impacts (Res & Com) | number | 0 | 0 | 0 | | 9 | 9 | 9 | | 0 | 0 | 0 |
| Potential Archeological Resource Area ^a | acres | 0.00 | 1.70 | 0.00 | | 0.00 | 6.70 | 0.00 | | 3.10 | 8.00 | 3.10 |
| Cemetery Impacts ^c | acres | | | | | | | | | | | |
| Special Lands | | · · · · · · | | | | | | | | | | |
| Forest Preserve District & Park Impacts | acres | 3.14 | 3.14 | 3.14 | | 0.23 | 0.23 | 0.23 | | 0.00 | 0.00 | 0.00 |
| School Property Impacts | acres | 0.00 | 0.00 | 0.00 | | 0.00 | 0.00 | 0.00 | | 0.00 | 0.00 | 0.00 |
| Farmland Impact | acres | 1.92 | 5.40 | 1.92 | | 2.13 | 6.16 | 2.13 | | 13.26 | 17.07 | 11.49 |
| Potential Special Waste Sites ^c | number | | | | | | | | | | | |
| III. Socio-Economic Impacts | • | | | | | | | | | | | |
| Planned Land Use Compatibility | scale | 2 | 4 | 2 | | 5 | 5 | 5 | | 3 | 4 | 3 |
| Community Cohesion | scale | 3 | 3 | 3 | | 3 | 3 | 3 | | 3 | 3 | 3 |
| Residential Displacements | number | 1 | 1 | 2 | | 10 | 11 | 10 | | 0 | 1 | 1 |
| Business Displacements | number | 1 | 1 | 1 | | 2 | 2 | 2 | | 0 | 0 | 0 |
| ROW Acquisition | acres | 16.60 | 25.00 | 19.84 | | 5.74 | 2 17.69 | 8.93 | | 18.04 | 27.65 | 17.71 |
| Economic Impacts ^c | scale | | | | | 5.74 | | | | | | |
| Public Facilities and Services Impact | scale | 2 | 2 | 2 | | 2 | 2 | 2 | | 2 | 2 | 2 |
| Environmental Justice ⁶ | scale | | | | | | | | | | | |
| | | | | | | | | | | | | |
| IV. Cost | - | | | | | | | | | | | |
| Total Length of Improvement | miles | 1.62 | 2.23 | 1.95 | | 1.57 | 2.47 | 1.74 | | 1.81 | 2.88 | 1.97 |
| Length of Improvement - US Route 45 | miles | 1.26 | 1.23 | 1.26 | | 1.27 | 1.26 | 1.27 | | 1.35 | 1.35 | 1.35 |
| Length of Improvement - County/Local Roads | miles | 0.36 | 1.00 | 0.69 | | 0.30 | 1.21 | 0.47 | | 0.46 | 1.53 | 0.62 |
| Estimated Construction Cost (Millions) ^b | dollars | 12.70 | 16.30 | 14.70 | | 11.70 | 18.30 | 12.50 | | 12.58 | 20.34 | 13.53 |

Notes:

^a Based on available GIS data. IDOT environmental surveys ongoing.

^b Does not include the cost for property acquisition or engineering beyond Phase I.

^c Insufficient information to effectively evaluate at this time.

^{*d*} Reflects proximity to new potential noise receptors. Does not consider noise mitigation.

^e Reflects modeled travel performance during PM peak hour of travel for Build Condition with projected 2030 traffic.

^f Reflects the LOS of the two main intersections of Grass Lake Road and Millburn Road with US Route 45

| Scale Key | - Relative Potential Impacts |
|-----------|------------------------------|
| 1 | High Positive Impact |
| 2 | Moderate Positive Impact |
| 3 | Little to No Impact |
| 4 | Moderate Negative Impact |
| 5 | High Negative Impact |

| MATRIX KEY | RELATIVE COMPARISON | | | | |
|------------|---------------------------------|--|--|--|--|
| | Relatively Weak in Comparison | | | | |
| | | | | | |
| | | | | | |
| | | | | | |
| | Relatively Strong in Comparison | | | | |
| | No Significant Difference | | | | |

Each Criteria has at least one Red Alternative (weakest in comparison to the other alternatives) and one Dark Green Alternative (strongest in comparison to the other alternatives). The colors for the remaining alternatives are determined relative to the strongest and weakest alternatives for each criteria.