

Antony (Tony) Fediw, P.Eng Transportation Manager

Professional History

02/2010 - present, AECOM, Transportation Manager 03/2004 - 03/2010, The Corporation of the City of London 05/1990 - 03/2004, Ministry of Transportation 05/1988 - 1990, Delcan, summer student

Education

BESc, Structural Engineering, University of Western Ontario

Registrations

Professional Engineer, Ontario

Years of Experience

With AECOM: 0 With Other Firms: 21

Training and Certifications

Ivey School of Business, Business Foundations, 2005 - 2009

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Mr. Fediw is a senior project manager and professional engineer with more than 20 years of experience specializing in transportation, structure planning, design, construction, inspection, rehabilitation asset management, emergency response, and repair. He also has extensive experience with complex municipal infrastructure projects, environmental assessments, noise issues, and development issues. Mr. Fediw has experience preparing development charges background studies; master servicing plans in the fields of water, wastewater, stormwater management, transportation, and transit; and has been recognized as an expert witness at Ontario Municipal Board hearings. He is presently the manager of Transportation in the AECOM London office and is responsible for municipal, provincial, and federal infrastructure assignments, supporting the team preparing master plans, development charge background studies, and long-range servicing plans. Mr. Fediw has managed more than 70 major capital projects, constructing 25 new structures, rehabilitating 150 structures and hundreds of culverts, as well as undertaking 10 major planning studies for large projects (each over \$30 million in value).

Experience

City of London, Oxford Street Widening, London, Ontario. Managed a project that incorporated the widening of an arterial road from two to five lanes, water main replacement, sanitary sewer replacement, drainage improvements, lighting, land negotiations, and intersection work. [Project value \$13 million, 2005]

City of London, Veteran's Memorial Expressway (formerly Airport Road), London, Ontario. Managed a project that incorporated the widening of an expressway with construction of three bridges, major trunk water mains, drainage improvements, lighting, intersection work, and railway issues. [Project value \$21 million, 2005]

City of London, Clarke Road Bridge Rehabilitation, London, Ontario. Rehabilitation of a bridge using an innovative and costeffective technique that cost \$130,000. It is expected the rehabilitation will safely extend the life of the bridge at least 30 years, while deferring significant capital and social costs. Traditional engineering strategies would have replaced the structure at a cost of \$2 million. [2006]

Highway 6 and 24 Grade Separated Interchange Construction Preliminary Engineering and Detailed Design, Guelph, Ontario. Assisted in planning and preliminary engineering required for replacement of an at-grade intersection with an interchange that incorporated six bridges. The project used an innovative construction method for staging of the CNR Fergus line bridge. [Structural value \$6million, Project value \$12million]

Highway 401 Reconstruction and Widening Planning and Preliminary Engineering, Woodstock to Cambridge, Ontario. Work entailed planning for approximately 24km of roadwork and the rehabilitation/replacement of 18 highway overpass/underpass bridges. [Project value \$30 million]

Bell's Creek Reconstruction, Highway 6 Preliminary Engineering and Detailed Design, Mount Forest. Planning for removal and replacement of the original two-cell rigid frame railway structure with a smaller single span structure. A temporary detour Bailey bridge was used to maintain traffic and avoid an ESA. [Structural value \$800,000, Project value \$2 million]

Highway 401 Reconstruction and Widening Planning and Preliminary Engineering, Windsor to Tilbury. Work entailed planning for approximately 45km of roadwork and rehabilitation/replacement of 22 highway overpass/underpass bridges. [Project value \$204 million]

Highway 3 Reconstruction Preliminary Engineering and Detailed Design, Aylmer to St. Thomas. Rehabilitation and reconstruction of 18 culverts, drainage improvements, and grade raises to improve SSD for 19km of highway. The project included rehabilitation of a large-span, 90-year-old arched culvert. [Structural value \$1.9 million, Project value \$15 million]

Highway 401 Hot In-Place (HIP) Dense Friction Course (DFC) Recycling, Tilbury. Rehabilitation of 19.3km of Highway 401 between Highway 77 and Puce Road. Prepare an alternate bid contract in which the contractor could HIP or use recycled DFC. This was an innovative holding strategy for Highway 401 which was to be reconstructed in 5 to 10 years. The contract preparation required liaison with the HIP contracting industry. [Project value \$2 million]

Highway 401 Widening Geotechnical and Foundation Investigation between Belle River Road and Tilbury. Prepared the terms of reference to investigate reconstruction and widening of Highway 401 for approximately 20km. The project included investigation of the native soils, six grade raises over 7m high, and both flexible and riding pavement designs. [Project value \$25 million]

Highway 23, Maitland River Bridge Replacement and Grade Raise, Listowel. Prepare the geotechnical information report (GIR), pavement design report (PDR), and geotechnical terms of reference to reconstruct the approaches to Maitland River Bridge and widening Highway 23. The project included investigation of the native soils, a grade raise over 4m, and cold in-place recycling. [Project value \$2.5 million] **Grand River Bridge Replacement, Argyle Street (Old Highway 6) Planning and Preliminary Engineering, Caledonia.** The construction of a 280m-long, 9-span bridge, possible detour bridge, intersection improvements, and 1km of highway reconstruction in an urban environment. Collaborated with other functional staff and consultant team in the planning for an preparation of TESR, PDR and PICs. [Project value \$8 million]

Highway 401 Reconstruction and Widening Planning and Preliminary Engineering, Highway 4 to Highbury Avenue, London, Ontario. In partnership with the city of London, the work entailed planning for approximately 14.4 km of roadwork and the rehabilitation/replacement of 12 highway bridges. Collaborated with municipal staff, other functional staff, and consultant team in the planning for and preparation of TESR, PDR, and PICs. [Project value \$40 million]

Coldwater River Bridge Rehabilitations, Highway 12 Preliminary Engineering and Detailed Design, Coldwater. Managed a project that incorporated intersection improvements, lighting, drainage improvements, two bridge rehabilitations, and culvert reconstruction. The culvert reconstruction utilized trenchless technology due to traffic constraints. [Project value \$2 million]

Fish Creek Bridges Replacement, Highway 23 Planning and Preliminary Engineering, Kirkton and Woodham, Ontario. Managed the planning for the replacement of three bridges, pavement restoration, collection of survey data, traffic counts, public information centres, and environmental impact studies. These three bridge sites and two towns were located within a floodplain area. The bridges were to be replaced due to their structural condition. Flooding was occurring due to conditions outside of the ministry's control. A recent flood had made the replacement of these sites a local political issue. Prior to the issuance of the TESR, consultation with ministry senior management was required to solicit support for a risk managed solution. Consultation with local stakeholders of the risk management plan garnered local support of the plan and construction proceeded without a "bump up" request or significant public resistance. [Project value \$4 million]

Innisfil Creek Bridge Replacement, Highway 27 Planning and Preliminary Engineering, Cookstown. Initiated a project that consisted of replacement of one bridge and 4 km of pavement reconstruction. The preliminary engineering consisted of: the collection of preliminary data, collection of survey information, traffic counts, structural design report, constructibility review, and hydrological study. [Project value \$2 million]

Hawkestone Creek Culvert, Highway 11 Preliminary Engineering and Detailed Design, Orillia. Formulated and managed an innovative culvert replacement design in an environmentally sensitive area under heavy traffic conditions. Specifically, the project involved detailed design for the jacking of a precast box concrete liner inside an existing culvert. This was

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the first attempt using this method of construction by the ministry and saved an estimated \$1.5 million. [Project value \$500,000]

Bayfield River Bridge Rehabilitation, Highway 4 Planning and Preliminary Engineering, Clinton. Conceived an innovative pier reconstruction in a manor sympathetic to the original construction that extended the residual life of a heritage bridge for 30 years. [Project value \$500,000]

Little Lake Bridge Rehabilitation, Highway 400 Preliminary Engineering and Detailed Design, Barrie. Rehabilitation of a 12lane bridge in an area of high AADT. Traffic staging played a major role in the planning for the bridge rehabilitation. A painting component of the work incorporated the use of low VOC coatings. The preparation of this contract required a great deal of liaison with the coating industry and head office R&D. [Project value \$1.2 million]

Big Otter Creek Bridge Rehabilitation, Highway 3 Preliminary Engineering and Detailed Design, Tillsonburg. Oversaw the preliminary engineering and detailed design for a project that included bridge rehabilitation, traffic lights, illumination and intersection improvements. [Project value \$1 million]

Project Management

Punslinch Road 6 Bridge Rehabilitation, Highway 401 Preliminary Engineering and Detailed Design, Guelph, Ontario. Supervised junior staff to manage the collection of survey data, traffic counts, environmental impact studies and follow-up on detailed design for rehabilitation of one bridge. The detailed design promoted a scaled back rehabilitation philosophy commonly used throughout the ministry at the time. [Project value \$800,000]

Blandford Road 5 Overpass Rehabilitation, Highway 401 Preliminary Engineering, Woodstock. Oversaw the collection of preliminary data, survey work, traffic counts, public information centres, and environmental impact studies for beam replacement and rehabilitation of one bridge and 0.5 km of pavement resurfacing. [Project value \$800,000]

Willeys Side Road Rehabilitation, Highway 401 Detailed Design. Managed a consultant working for a contractor preparing a girder replacement on a bridge damaged in a construction vehicle strike. The contractor had damaged the bridge during paving. [Project value \$600,000]

Four Bridge Rehabilitations, Highway 402 Preliminary Engineering and Detailed Design, Sarnia. Supervised junior staff to manage a consultant acquired to collect traffic counts, materials testing, electrical engineering, preparing a TESR, and detailed design for rehabilitation of four bridges and 10km of pavement restoration in an urban area. [Project value \$3.4 million]

Ausable River Bridge Rehabilitation, Highway 21 Preliminary

Planning and Detailed Design, Grand Bend. Supervised junior staff to manage a consultant acquired to collect preliminary data, traffic counts, materials testing, electrical engineering, prepare a TESR, and detailed design for rehabilitation of a 3-span truss bridge. [Project value \$2 million]

Structural Project Planning

Grand River Bridge, Highway 3 Planning and Preliminary Engineering, Cayuga. The planning for and preparation of TESR, PDR, PICs for a 250m long heritage bridge in an urban environment. [Project value \$4 million]

Atherley Narrows Bridge, Highway 12 Preliminary Engineering and Detailed Design, Orillia. Assisted in the planning and detailed design for/and preparation of TESR, PDR, PICs and hearing of necessity for construction of two 300m-long, 11-span bridges, intersection improvements and 6 km of highway widening in an urban environment. The bridges were 300m long in an urban setting, located in an extremely sensitive environment with First Nation issues. Construction proved to be challenging and required the pioneering of a remedial construction technique to underpin one of the bridge's foundations. [Project value \$21 million]

Detailed Structural Design and Project Management

Sportsworld Drive Widening, Highway 8 Preliminary Engineering and Detailed Design, Kitchener, Ontario. Responsible for the collection of preliminary data, subconsultant management, review of all structural engineering documents, and construction liaison for rehabilitation of one bridge and pavement restoration. [Project value \$3.6 million]

Pine River Bridge Replacement, Highway 90 Preliminary Engineering and Detailed Design, Angus. Responsible for the collection of preliminary data, subconsultant management, review of all structural engineering documents, and construction liaison for rehabilitation of one bridge and pavement restoration in an urban area. [Structural value \$2 million, Project value \$4 million]

TH&B Railway Overhead Rehabilitation, Old Highway 2 and Highway 403 Preliminary Engineering and Detailed Design, Cainsville. Responsible for collection of preliminary data, subconsultant management, review of all structural engineering documents, and construction liaison for rehabilitation of one bridge and pavement restoration in an urban area. [Structural value \$800,000, Project value \$4 million]

Highway 400 Reconstruction and Widening Detailed Design, North of Highway 9 to Highway 89. Specifically, the work entailed the planning for approximately 18.7km of roadwork and the rehabilitation/replacement of four highway underpasses bridges. [Project value \$8.5 million]

Credit River Culvert Widening, Highway 10 and 24

Preliminary Engineering and Detailed Design, Orangeville. The rehabilitation of five culverts, traffic channelization, illumination, traffic lights, and pavement reconstruction restoration in an urban area. Work entailed collection of preliminary data, hydraulic studies, a detailed review of all structural engineering documents and construction liaison. [Structural value \$600,000, Project value \$8 million]

Big Creek River Bridges Rehabilitation, Highway 40 Preliminary Engineering and Detailed Design, Kent Cty. The rehabilitation of five bridges and pavement restoration in a rural area. Work entailed the collection of preliminary data, detailed review of all structural engineering documents and construction liaison. [Structural value \$3 million, Project value \$8 million]

Highway 401 Reconstruction Preliminary Engineering and Detailed Design from Highway 4 to West of Union Road, London, Ontario. The rehabilitation of four bridges, pavement restoration, interchange reconfiguration, illumination and signage. Specifically, the work entailed the collection of preliminary data, detailed review of all structural engineering documents and construction liaison. [Structural value \$2 million, Project value \$12 million]

Highway 4 Widening Detailed Design from Highway 401 to Talbotville South Limits. The widening/rehabilitation of one bridge, grade raises, and 4km of pavement reconstruction. Work entailed collection of preliminary data, detailed review of all structural engineering documents and construction liaison. [Structural value \$1.8 million, Project value \$3.6 million]

Marden Creek Culvert Widening and Reconstruction Preliminary Engineering and Detailed Design, Highway 6, Guelph. This section of highway was adjacent to a seminary and cemetery. Noise and environmental concerns were a key feature of the project's planning. [Structural value \$400,000, Project value \$8 million].

Woods Creek Culvert Rehabilitation Detailed Design, Highway 6, Fergus. An innovative repair technique was utilized to defer a large capital expenditure. [Structural value \$40,000, Project value \$60,000]

Wye River Bridge (Martyr's Shrine) Rehabilitation Preliminary Engineering and Detailed Design, Highway 12, Midland. Bridge rehabilitation in tourist area. Traffic control issues and bridge aesthetics were important inputs. [Structural value \$400,000, Project value \$1.9 million]

Highway 402, ACR Steel Girder Repairs Preliminary Engineering and Detailed Design. Rehabilitation of two structures and 10km of pavement reconstruction. Work entailed collection of preliminary data, detailed review of all structural engineering documents, and construction liaison. [Structural value \$2.6 million, Project value \$18 million]

Emergency Response/Bridge Postings

Highway 79 and Highway 402. Managed the inspection, design, and contract preparation for a bridge hit by paving train operation. Closure of a lane was required for three months. An innovative welded solution was used for the repair.

Wellington County Road 25 at Highway 401. Managed the inspection, design, and contract preparation for a bridge hit by truck that started a fire and burnt for four hours. The closure of Wellington County Road 25 was required for three months. A concrete collar was used to strengthen a damaged column. Extensive fieldwork was required to verify the fire caused no damage to the reinforcing steel.

Master Plans

City of London, 2009 Development Charges Study, London, Ontario. Managed an external consultant over four years, from initiation to final completion. The resulting product reformed past practices which placed the city in a poor financial situation, leading to delays in developer's claiming monies owed to then, and deferred the construction of infrastructure. The new study saved the city taxpayer approximately \$100 to 200 million in tax revenue, reduce development charges commitments approximately \$100 million, while providing for an aggressive capital construction program to be constructed. Additional savings will likely be realized in 2010 when the transportation master plan is adjusted. [2004-present]

City of London, Engineering Department Lead on Official Plan, London, Ontario. Contributed to a team charged with updating the city's official plan for both policy and growth boundary adjustment needs. Changes to this document are a watershed for all future policy changes planned by the city over the next five years. Significant changes to policies will enable the city take property during development of land, manage growth, start green box composting programs, protect source water recharge areas, restrict certain sanitary services, begin to plan for HOV lanes, or a peripheral freeway. Managed expectations and contributions from across all the city's divisions and external stakeholders. Several contributors had conflicting positions on several issues that required facilitating arbitration to produce compromise solutions. Ultimately, required to condense over 2000 text changes into a concise 3-page report for senior management review. This abridged version considerably eased the work load and review time of senior management and politicians. [2008]

City of London, Engineering Department Lead on the Growth Management Implementation Strategy, London, Ontario. Member of a team tasked with implementing change and prepare policy, financial analysis, reports to council and committees, produce presentation materials, and make presentations to council and external stakeholders. The concept of limiting development within the urban growth boundary by strategically

investing in infrastructure over a period of time was new to the city. This was a politically charged issue that received much media attention and created much council debate. It required fair, honest, and objective presentations at all times while working to provide information to both sides of the political spectrum. The end product was widely accepted by most stakeholders across the wide political affiliations. [2008]

City of London, Engineering Department Lead of Southwest Area Plan, London, Ontario. Represent EESD and guided the planning department through the multiple servicing options for this area. Additionally tasked with reporting back to the EESD divisions any significant changes to timing of infrastructure projects. The city is considering changes to standards and specifications that may impact individual EESD Divisions. Ensure that each division's voice be heard in the process and that any proposed changes to specifications and/or standards are workable and accepted by the affected divisions. This required arbitration to produce compromise solutions. [2009]

City of London, 2007 Development Charges Update Study, London, Ontario. Monitor cash flow and predicted building permit activities and revenues in a development charged reserve fund. Created a model that predicted financial balances 5 to 10 years into the future; it has been 98% accurate over the last three years. The date from this model was used to increase DC rates \$2,000 (+30%). [2007]

City of London, Engineering Department Lead of Place-Making Guidelines (Urban Design Standards, London, Ontario. Represented the city engineering department on a steering committee guiding activities of an external consultant who will recommend new alternative standards based upon the success of similar documents in other municipalities. Ensuring all EESD operational and financial concerns are identified and addressed while seeking creative solutions. Facilitated arbitration to produce win/win compromise solutions. [2009-2010]