

The South March Highlands (“SMH”) has been described as a “**wild island**” of natural landscape within the City of Ottawa. Until recently it remained largely in its original natural state because its rugged landscape was unsuitable for agriculture. SMH is at the southern tip of the Precambrian Shield bedrock outcrop known as the Carp Hills which is over a Billion years old. Its geology is uniquely complex and its wetland-rich land has been described as “**an island of rugged, heavily-glaciated, rocky, Gatineau Hills-like habitat**”. No other major city in the world includes a vigorous old growth forest with endangered species such as this. The closest is perhaps Vancouver’s Stanley Park which is 1/3 the size, contains ½ the variety of vascular plants, and no species-at-risk (“SAR”) compared to the SMH.

The SMH is rated as a Provincially Significant Area of Natural and Scientific Interest (“ANSI”) for both its Life Science value (895 hectares) and for its unique Wetland Complex (114 hectares). It has been valued by scientists as the “**most important reservoir of ecological potential**” in the City of Ottawa because it has the densest bio-diversity and its 30 eco-types of vegetation provide a wide variety of resources for the renewal of depleted natural areas elsewhere. There are 10 distinct habitats within the SMH that are home to 18 SAR and one of the largest deer wintering yards (925 hectares) in the City of Ottawa (“City”).

The hydrology of SMH is integral to both the Carp River as well as to the Shirley’s Bay wetland complex in the Greenbelt. The SMH is ecologically unique in the City of Ottawa, supporting over 440 native species of vascular plants, including: 64 Regionally Significant, 50 Locally Significant, 6 Provincially Rare, and 2 Nationally Endangered species. It has the highest floristic diversity of any natural area in Ottawa.

This habitat is home to 75 species of Mammals, Fish, Amphibians, and Reptiles including 5 species-at-risk and 2 locally uncommon species. The habitat is crucial for 164 species of birds, including 136 species that are known to breed in this area, 9 SAR, and 30 Regionally Significant species that inhabit this ecosystem. The area is also home to the Monarch Butterfly, another species at risk, and possibly other interesting insects however no study of insect or bryophyte (non-vascular plant) species has ever been performed.

Yet, even though various Regional, Kanata, and Ottawa City Official Plans “protected” the SMH since 1972, less than 1/3 of the original area remains. In 1981, against the recommendation of regional planning staff, the Regional Municipality Planning Committee chaired by Marianne Wilkinson allowed Campeau Corporation to obtain a plan of subdivision for the area on the basis of a “woefully inadequate” environmental assessment (EA). The Campeau EA was based on insufficient field time, incomplete field coverage, ignored important data bases of information and made no attempt at critical interpretation of the sources that were used. This enabled Campeau to ultimately develop the Kanata Lakes area to the south, but left the SMH untouched until the land was sold to KNL – a consortium of Urbandale and Richcraft.

The land that currently remains is now threatened by Terry Fox Drive (TFD) expansion as well as urban development.

In 2000 the City of Kanata prepared an Environmental Study Report (“ESR”) that recommended that TFD be routed through the centre of this fragile ecosystem. The routing chosen by the City had the highest ecological impact of the 4 alternative routes considered in the study and completely ignored the results of the 3 public criteria workshops that consistently rated ecological impact as the most important evaluation criteria for the City to use. Two of the four reasons for choosing the environmentally worst option were to mitigate the impact that TFD would have on future development within the area – development that was not approved at that time, and on lands that were not zoned for urban expansion

at that time. The chosen route, however, anticipated a major western expansion of the urban boundary since it was the western-most of the alternatives considered. This ESR was approved by a only 1 vote majority by the amalgamated City of Ottawa Planning Committee on the condition that the implications of moving the urban boundary would be understood and mitigated.

In 2004, at the request of concerned residents, Councillor Alex Munter initiated a scientific Special Study of the Natural Environment Area (“NEA”) status of lands south of the proposed road. Despite findings that justified protective zoning, later that year an EA Addendum for the TFD expansion was prepared that used inflated population forecasts to justify an expansion of the urban boundary. An EA Addendum is required whenever there has been a material change to either the planning or environmental context for a project. The Notice of Completion was filed for this EA Addendum on January 2005. A Notice of Completion creates the only opportunity for interested parties to formally intervene in the EA process and they only have 30 days to file a formal appeal (called a “Part II Order Request”).

The 2004 EA Addendum included a further 500m shift of the road alignment westward, resulting in a design that longitudinally runs along 1.4 Km of the Carp River floodplain instead of skirting the edge of it as it did in the 2000 recommended alignment. According to the 2004 EA Addendum, the landowner (now Richardson Ridge development) agreed to pay for the incremental cost of floodplain mitigation. However, according to the City manager responsible for development charges there is no plan to recoup this multi-million dollar cost.

A Part II Order Request was filed by a land developer that was not resolved until January 2007 after a private deal was struck with the City that relocated the Goulbourn Forced Road (GFR) & TFD intersection so that it would provide easier access within the subdivision that the developer was planning. Note that a subdivision plan had not received even a draft approval at that point in time. This deal had the effect that GFR could no longer serve as a conduit for south bound traffic along 2<sup>nd</sup> Line Road (part of the original justification for the TFD extension). The City has adopted the position that changing the intersection is not a material change to the EA Addendum even though GFR is the boundary of the project scoped by the 2005 EA Addendum.

Meanwhile, developers (KNL/Urbandale) challenged the 2004 NEA zoning and obtained an Ontario Municipal Board (“OMB”) ruling in 2005 that approved a draft plan of subdivision for development within the southern half of the SMH that was transected by the arc of the planned expansion to TFD.

The City does not own all of the land for the road and according to the Right of Access agreements signed with two developers, Richardson Ridge and Uniform have been paying preferred agricultural rates of property taxes since 2005 – even though the lands are zoned General Urban as a result of the OMB ruling. Furthermore, these agreements provide that the City will never assess them higher property taxes as a result of building the road to service their developments.

Neither of the 2000 or 2004 “environmental” assessments, nor the OMB, addressed the ecological impact of both the road and urban development. Neither EA considered the change in planning contest introduced by the proclamation of the Canadian Species at Risk Act in 2003. The scope of the Special Study’s was restricted by the City to a narrow area and did not examine the holistic impact of road and urban development on the SMH.

Notwithstanding the limited scope, the Special Study’s findings (effectively ignored by the OMB) included the warning that ***“Extensive forest clearing...reduces the overall ecological diversity and***

***significance of the South March Highlands” and “... has major implications for the ecological significance of both the SSA in particular and the South March Highlands in general. That includes a major reduction in the ecological corridor function...it is clear that the extension of the Terry Fox Road arterial across the South March Highlands will constitute a major ecological challenge to the Provincially Significant values throughout a large segment of the South March Highlands.”.***

In 2006, the City of Ottawa confirmed amendments to the Official Plan that effectively creates the TFD roadway as the outer edge of the western urban boundary. Inside the curve of TFD, areas previously identified as NEA were changed to General Urban Area or to Urban Natural Feature. In effect most of the forested area was re-zoned to general urban use inside the arc of TDF, while outside the roadway arc some lands remained zoned as conservation forest, agricultural or general rural.

In 2007, the OMB upheld the change to urban boundary and this change was included in the City's Official Plan. The City then prepared another EA Addendum in 2007 but has never filed Notice of Completion for it. In order to accelerate qualification for federal Infrastructure Funding, the City adopted the position that it did not need to complete the 2007 EA Addendum even though there have been two OMB rulings affecting zoning since 2005 Notice of Completion.

In 2007, Ontario became the leading jurisdiction in North America for SAR protection when it passed the Ontario Endangered Species Act (“ESA”). Even though there is no impact analysis on SAR in any of the 2000 ESR, 2005 EA Addendum, or the unfiled 2007 EA Addendum, the City has taken the position that the passage of either the federal or provincial ESA does not constitute a material change to the environmental planning context.

The unpublished EA Addendum in 2007 provided for changes to rail-grade separation. But when the City accelerated the project for 2010 construction, it decided to incorporate the design for a raised rail crossing but not implement the bridge until later. Use of the raised-crossing design in the context of a level-crossing implementation results in a rail-crossing that violates Transport Canada regulations for train line-of-sight safety and poses a serious risk to human safety. Without public review, there is no opportunity to ensure the safety of this rail crossing.

In 2008, a scientific study of the conservation forest (located primarily north of TFD) found that *“The [current] ecological integrity of the flora and vegetation in the Conservation Forest is also exceptionally high, as measured by the ‘naturalness’ of the native flora. The native flora of the study area demonstrates an average Coefficient of Conservation (CC) rating of 5.08 - higher than any City of Ottawa Urban Natural Area... The Coefficient of Conservation provides a rating of the ‘naturalness’ of native plant species (i.e. the degree to which each species requires relatively pristine conditions) on a zero to 10 scale, where 0 indicates species having no requirement for natural habitat and 10 indicating taxa which require pristine habitat. Ottawa and eastern Ontario urban natural areas typically average under 4.0.”.*

However, the same study also warned that ***“The Conservation Forest is clearly in a fragile state and facing serious challenges to its long term ecological integrity... the Conservation Forest is presently too small to fully represent South March Highlands natural features and functions.”***

In 2008, the Minister of Environment (“MoE”) issued an order setting conditions regarding the approval of the Carp River Restoration Plan (“CRRP”), 1 km of which overlaps with, and is hydraulically interconnected to the management of drainage for TFD. In 2009, flooding in the Carp River watershed affected 1500 homes in Kanata. According to the 2005 EA, TFD will impact the floodplain storage area

by over 45,000 cubic metres – significantly exacerbating the risk of flooding since the impact of the road was analyzed using an assumption that peak flows would be 30- 40% less than what it is now understood to be.

According to the 2009 TFD Storm Water and Floodplain Management Report, the construction of TFD “**directly impacts the Carp River floodplain**”. In 2010, as a result of the discovery of questionable parameters used by the City for hydraulic modeling of the Carp River flood levels, the MoE required that CRRP be regulated as a sewage works requiring approval under the Ontario Water Resources Act. Yet, even though there is a 1km overlap between TFD and the CRRP, and even though it is now known that the storm culverts planned for TFD are insufficient for the task, there has been no re-examination of the design impact of TFD storm water management on the setting of Carp River grades. This presents a very real risk of flooding both upstream in Glen Cairn and downstream to the village of Carp.

In 2010, to qualify for federal funding, the City completed two Canada Environmental Assessment Agency (CEAA) Screening Studies for different parts of TFD that cross through the SMH. The City subdivided the project into two parts (A & B) so that they could meet federal deadlines for approvals for Infrastructure Funds. Even though both the content and depth of these studies are larger than the original EAs, the City chose to perform those studies without public review and input.

The City’s CEAA studies also rely heavily on environmental mitigation plans for which there has been minimal to no scientific basis. The City’s own Forest and Greenspace Advisory Committee found that:

- Eco-passageways proposed as mitigation for turtle habitat fragmentation are regarded as experimental by the scientific community and there is no scientific evidence that they will even be used by turtles.
- The City has no idea about the size of the population of SAR in the area and therefore cannot adequately assess the impact of TFD on them.
- The size and location of eco-passageways were determined on the basis of least project cost and a 3-month long winter study of wildlife movement (when many mammals and all amphibians and reptiles are hibernating).
- Vegetation studies have been piece meal and have never holistically examined the entire SMH context. All the vegetation studies were focused only on vascular plants.
- Herpetofauna (reptile & amphibian) studies for the road were based on a random-walk that only conducted a single sample of the area, except for the salamander study which was required to be performed in greater depth by the CEAA.
- Fisheries studies have been cursory, never exceeding 2 days in length.
- Despite the fact that Blanding’s turtle, a SAR, has been repeatedly observed in SMH since at least 1991, there has never been a radio-telemetry study of their movement to identify the extent of impact on their critical nesting areas.
- Even though the Monarch Butterfly, a SAR, has been observed in SMH there has never been an insect study.
- Although the SMH are known to contain mosses and the area is known to be thousands of years older than Mer Bleu, Stony Swamp and other areas known to contain rare species, there has never been a comprehensive study of Bryophytes (non-vascular organic species such as mosses and liverworts), or of Lichens and Fungi.

The Part B CEAA Study contains material changes to the planned re-alignment of Shirley’s Brook. Over the past 10 years, 5 different re-alignments of Shirley’s Brook (depending on which EA is referenced)

have been proposed – even though previous studies determined that re-habilitation of the brook was not necessary. None of these changes examined the collateral impact on drainage and floodplain requirements, nor did they examine the collateral impact on SAR, nor did they examine the downstream impact on Shirley’s Bay in the Greenbelt. According to the City’s 2003 Position Paper on Shirley’s Brook the only reasons for relocating the brook were to accommodate a 4-lane design for the road and to facilitate KNL’s drainage of the area. However, according to the Part B CEAA Study, a relocation of the brook is no longer necessary to accommodate the 4-lane design. It would appear that the million dollar relocation of the brook is solely for the benefit of KNL.

The fisheries impact analysis presented in the CEAA Part B Study conveniently omits the presence of a SAR, Bridle Shiner, at the location impacted by the various re-alignments of Shirley’s Brook. The effect of omitting this information results in a material reduction in the risk assessment for fish habitat. To-date the Dept of Fisheries and Oceans has declined to revisit their approval of this project because Bridle Shiner isn’t listed for the SMH in their SAR database. Yet separate studies conducted by the City of Ottawa in each of 1998, 1999, and 2000 confirm the presence of Bridle Shiner in SMH.

Meanwhile the City, Ontario MNR, and Environment Canada continue to ignore the uncharacteristic and increasingly blunt warnings from scientists about the serious fragmentation of habitat caused by TFD.

- The 2004 Special Study determined that the extension of TFD will sever the eco-connectivity of the SMH to the extent that it is called a “**Berlin Wall**” by Dan Brunton, the foremost scientific authority on the area.
- The leading turtle scientist in Canada, Ron Brooks, has declared that, regardless of the proposed mitigation measures, building the road will eradicate the entire population of Blanding’s turtle.
- The City of Ottawa’s expert Forest and Greenspace Advisory Committee passed a unanimous resolution expressing “**grave concerns about the ecological damage caused by the TFD extension**”, denouncing the proposed mitigation measures as seriously inadequate and expressing concern over the failure of the City to protect the area.
- The Ottawa Field Naturalists, Canadian Bio-Diversity Institute, Greenbelt Coalition, Riverkeeper, Ecology Ottawa, Sierra Club, Save Our Greenspace, and several other ecological and community groups have endorsed a statement that the road should be abandoned.

The justification for the road evaporated with the tech bubble in 2001, yet the City’s revised traffic study in 2004 was recalibrated upward in 2004 even though employment in the high tech industry in Kanata has never exceeded the 2000 peak.

- The City’s Auditor General in 2007 found that the population projections used to justify it and several other projects were unrealistic and unreasonable since actual growth has been 80% less than forecasted.
- City Management agreed with the AG’s findings and undertook to review all existing growth-related plans and programs.
- In 2008 the City reduced the forecast in the Transportation Master Plan but failed to subsequently update the TFD traffic study (used to justify the increase in scope of the project in the 2005 EA).
- The City has never obtained Council approval to continue with a project that no longer fills an economic need.

- The City's Transportation Master Plan, 2008, continues to assert without justification that the rationale for the TFD expansion project is that it *"Accommodates the vehicular capacity deficiencies for growth areas in Kanata"*.

Meanwhile, in 2010 another developer in the area (Richcraft) as applied to the OMB to have the lands outside of the arc of TFD zoned for urban development – yet again using the road to justify the push of the urban boundary westward. This application is currently being reviewed by the OMB and is opposed by community and ecological groups.

The Municipal Class EA Process is unambiguous in requiring that an EA Addendum must be prepared whenever there has been a 5-year lapse of time between filing the Notice of Completion and the commencement of construction. Notice of Completion for the 2005 EA was filed January, 2005 and project construction for Parts A & B did not commence until April 2010.

The City holds the position that the 5-year limit applies only to the 2000 ESR for which construction started in 2003 south of the area scoped in the 2005 EA Addendum. This position conveniently ignores the fact that, by definition, a subsequent EA Addendum represents a material change in scope to the project. The original ESR was divided into 5 sections and the EA Addendum changed the entire location of the fifth section. Work done on the other 4 sections prior to the EA Addendum is irrelevant. To assert that the 2005 EA Addendum does not reset the lapse-of-time clock defies any reasonable interpretation of Ontario's Environmental Assessment process.

Ontario's MoE staff have concluded that, under the Municipal Class EA Process, it is up to the proponent to decide whether an EA Addendum is necessary. Consequently, the MoE has to-date declined to require the City to update its 2005 EA. This would appear to be in contravention of the Ministry's Statement of Environmental Values that states, in part, ***"The ministry works to protect, restore and enhance the natural environment by: Undertaking compliance and enforcement actions to ensure consistency with environmental laws"***