GEOG 311 Camosun Bog Reflection Group 20 Qingyang Liu #13593158 (*Submission Representative*) Raquel Herrera #50006155 Javiera Mondaca

It is noted that Camosun bog has provided various ecosystem services to not only the nearby community, but the whole geographical region. Considering its indispensable contribution to our society, the city should seriously evaluate the potential environmental and social consequences of this site's redevelopment.

Different from viewing the bog online, we have gained some unique experiences and insights from our field trip to the bog: surprisingly, a music sound became louder and louder from behind when we stepped into the bog zone: a man carrying a music player walked quickly and soon overtook us and disappeared into the woods. His presence reminded us of an active function of the bog as usable space for leisure and recreation –which contributes to promoting healthy behaviour and arguably in the long term keeping healthcare expenses low for the city. Considering schools nearby, we also see the bog as a living laboratory for education purposes. Most importantly, Camosun bog is a valuable habitat for various nonhuman organisms such as rare bird and endemic plant species. Its presence preserves a number of indigenous species, which are adopted by the first nations as medicine and food that embedded invaluable traditional knowledge in our modernized world. Camosun bog is also a great buffer in respect of our current global climate change: its functions of storing water, sequestering carbon, purifying water, air, and soil by intercepting contaminants, ameliorating flooding, etc., are precious and beyond human's capability to replicate.

With this in mind, the city should evaluate that whether the overall gains from urbanizing the site surpass all those ecosystem services. If this bog is redeveloped, all the carbon stored will be released to the atmosphere and further exacerbate global warming; the absence of vegetation, which has a function of absorbing precipitations by leaves and roots and is replaced by impervious surface, would require new drainage systems to manage stormwater runoff. But adding multiple drainage pipes may further aggravate the situation: the high volume of peak storm discharge in the river may be a disaster for aquatic organisms. It is also evident that Vancouver's canopy cover is already declining (City of Vancouver Urban Forestry Strategy, 2014): eliminating the bog would be a huge drawback on the city's goal of reaching a 22% canopy cover by 2020.

We also recognized that the redevelopment has a certain series of advantages: considering that we human occupy this place, developing affordable housing is a priority for Vancouver citizen's lives; it is also arguable that methane emissions from the rewetting and rehabilitation of the bog could intensify global warming. However, despite the fact that developing affordable housing is a critical goal for all, eliminating all the bog's far-more-extensive benefits would put the cart before the horse and against our so-called "Greenest City" visions.

Above all, the city should be aware that we human has already enjoyed numerous benefits and services provided by Camosun bog for the last thousands of years. We propose that the indispensable functions and ecological benefits still overtake the benefits of urban development.

References:

City of Vancouver Urban Forestry Strategy. 2014. Retrieved from: http://vancouver.ca/files/cov/Urban-Forest-Strategy-Draft.pdf