

# Gateway Program

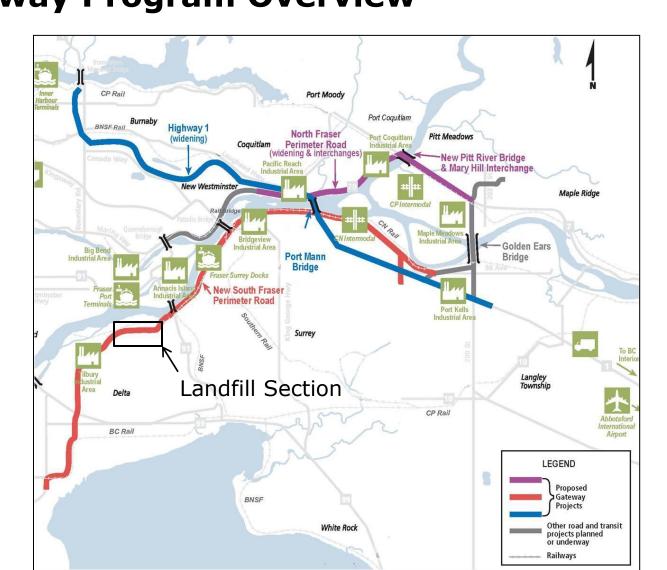


#### **South Fraser Perimeter Road**

**EMA of BC Workshop** 

Landfill Closure Project - February 21, 2013

## **Gateway Program Overview**





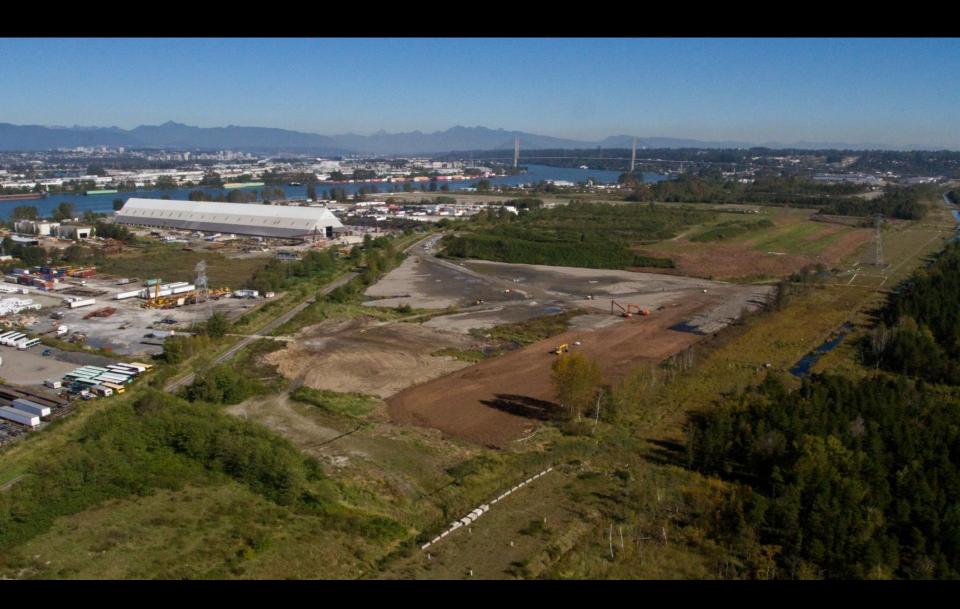
### **SFPR Landfill Project Overview**

- Alignment crosses 5 historic DLC waste Landfills
- Alignment was chosen to maximize potential of underutilized industrial land
- Key supporters are the Corporation of Delta, Ministry of Environment, neighbouring landowners
- Proper closure of these landfills has been identified as a key component in the future development potential of the area

## **Location Map: Pre-Construction**



### **Location Photo: Pre-Construction**



### Gateway Program: South Fraser Perimeter Road Project

### **Landfill Closure - Phase 1**

### Required Work:

- Excavation of landfill material
- Temporary cover
- Highway Construction

#### Risks:

- Landfill fire
- Leachate

#### Gateway Program: South Fraser Perimeter Road Project

### **Permits Required**

- Waste Discharge Permit-Ministry of Environment
  - To create Beta Lands
- Landfill Closure Plan-Ministry of Environment
  - To close the landfills
- Waste Discharge Permit-Metro Vancouver
  - To discharge leachate to the sanitary sewer

### **Phase 1 – Construction Waste Movement**



## **Phase 1 - Temporary Cover**



## **Phase 1 - Highway Construction in Landfill**



### Gateway Program: South Fraser Perimeter Road Project

### **Landfill Closure Phase 2**

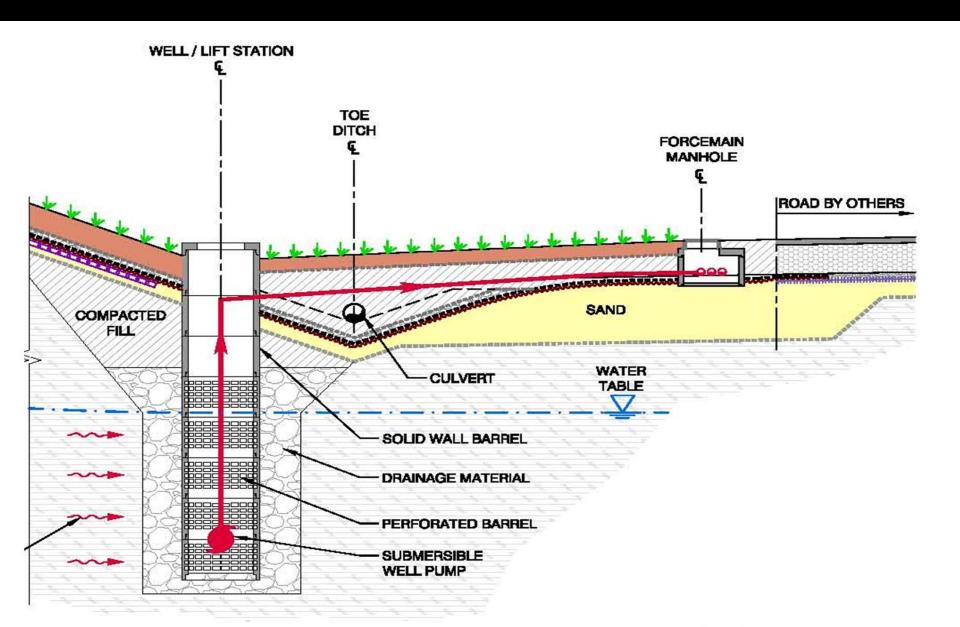
### Required Work:

- Capping of Landfills
- Leachate Collection System
- Landfill Gas Collection

#### Risks:

- Landfill fire
- Leachate

### **Leachate Collection Cross Section**



### Phase 2 – Leachate Collection System



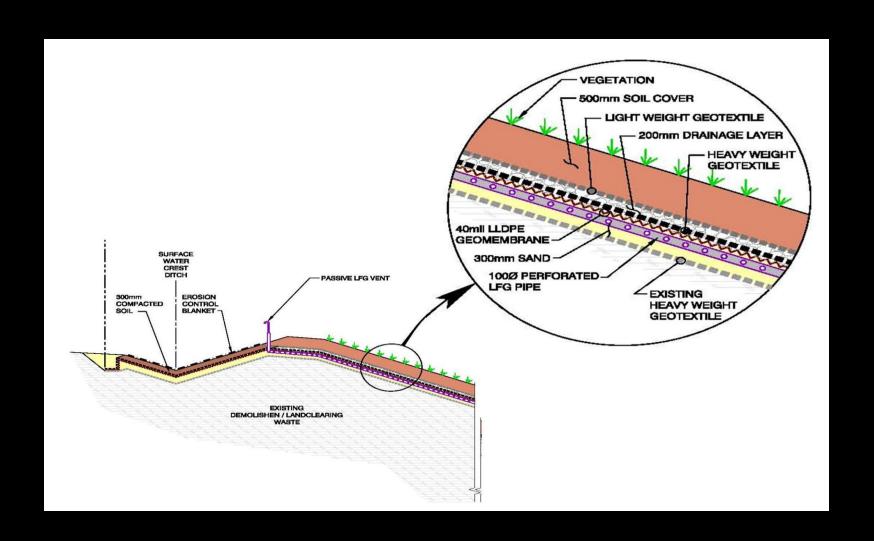
### **Phase 2 - Leachate Collection System**



### **Leachate Collection System**



### **Phase 2 - Landfill Cover Cross Section**



## **Phase 2 - Gas Collection System**



### **Phase 2 - Geomembrane on DSS**



### **Phase 2 - Geomembrane on Beta**



## **Phase 2 - Drainage Gravel**



### **Phase 2 - Soil and Erosion Protection**



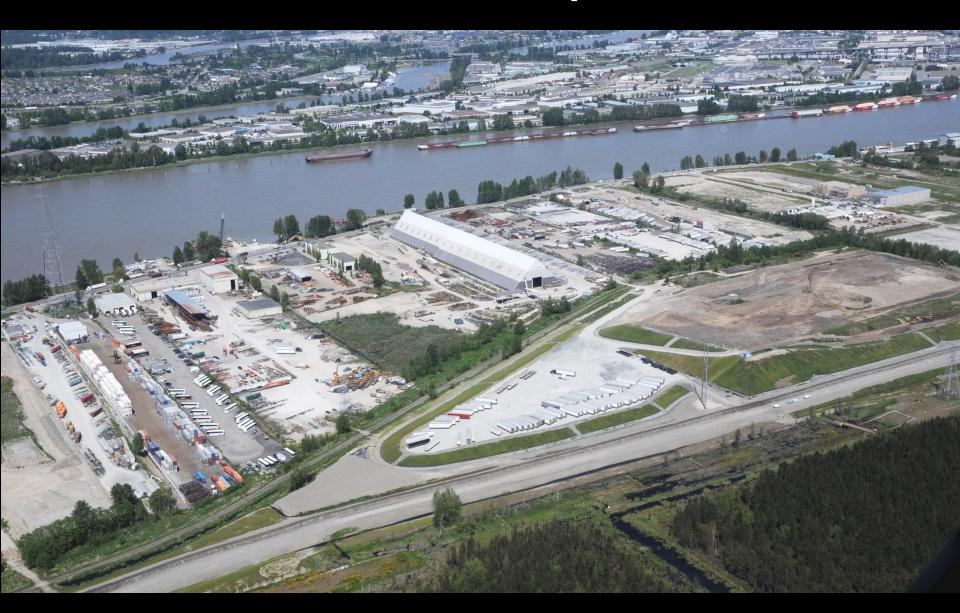
### **Before Construction**



## Halfway through



## **Beta Lands Completed**



## **DSS Completed**



## **The Results**





# Gateway Program



#### **South Fraser Perimeter Road**

EMA of BC Workshop

Landfill Closure Project - February 21, 2013