

General Motors' Delta Township Assembly Plant

Alberici Constructors, Inc., Lansing, Michigan

Alberici Constructors has built the world's first automobile manufacturing plant to receive the Gold rating from the LEED program of the U.S. Green Building Council.



Intuition & Logic was involved in the initial design charrettes during the planning stages and responsible for the LEED Credit 6.2 Stormwater Management, Treatment analysis. We then provided final design services for the stormwater system.

A large extended detention, vegetated swale is the main source of detention for the

entire 415 ac site. The swale outfall control structure is a sluice gate that limits the site release rate to 50cfs or less for 100-yr return interval storm events and those more frequent than the 100-yr return. The drawdown time for the 100 year storm event at a 50cfs maximum outflow rate is 10 hours for the Northwest Detention Swale. The extended drawdown provides time for suspended solids to settle. An existing detention pond and wetland area on the east side of the site also help reduce suspended solids. Maintaining hydrology in the wetland was a key component of the design.

